

ISBN no. 978-1-99-101253-1 Project no. 21.01/ PRJ0045688

Public version

Residential building supplies market study

Final report

Date: 6 December 2022



Karakia

Mai e, mai e
Mai e tāwhiwhi atu ki a koe e Tāne
Tāne Whakapiripiri
Tāne te Wānanga
Tāne te Waiora
Tāne nui a rangi
Haumi e, hui e, taiki e!

Acknowledgements to the creative sources
Acknowledgements to Tāne
Tāne the gatherer of people
Tāne the learned
Tāne the gatherer of knowledge
Tāne the exalted
Joined together in acknowledgement!

This karakia refers to Tāne, who is commonly referred to in the construction of traditional meeting houses. The karakia identifies some of the many aspects of Tāne and acknowledges the place of the home in nurturing whānau.

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Glossary | Kuputaka

Builders Market participants who conduct the onsite and/or offsite

construction of residential buildings including, for example,

developers, group home builders and sole traders.

Building Code The Building Code is contained in Schedule 1 of the Building

Regulations 1992 and continues in force under the Building (Forms) Regulations 2004 and the Building Act 2004. The Building Act governs the building sector and sets out the rules for the construction, alteration, demolition and maintenance of new and existing buildings in New Zealand.

BCA Building Consent Authority, the function contained within

each Territorial Authority or private organisation permitted

to perform building consenting and Building Code

compliance certification functions under the Building Act

2004.

Clear compliance pathways Pathways for building products to comply with the Building

Code through Acceptable Solutions and/or Verification

Methods, and referenced Standards.

Designer Designers (including architects, draughtspersons, engineers

and quantity surveyors) prepare plans and specifications for building work. They also provide advice on compliance of

building work with the Building Code.

Distributors Companies who distribute key building supplies to builders

(eg, merchants).

HUD Te Tūāpapa Kura Kāinga, Ministry of Housing and Urban

Development.

Importers Market participants who import building supplies used in

the construction of residential buildings.

Key building supplies The products and product systems used to build the major

components of residential buildings. See the definition of "major components of residential buildings" below and Table 1.1 for the general type of building supplies within the

scope of study.

Major components of residential buildings

For the purposes of this study, the major components of residential buildings are the foundation, flooring, roof, walls (structural and non-structural, interior and exterior) and

insulation.

Manufacturers Market participants who produce in New Zealand the

building supplies used in the construction of residential

buildings.

MBIE

Ministry of Business, Innovation & Employment, Hīkina Whakatutuki.

Merchants

Market participants who act as intermediaries purchasing building supplies from manufacturers or importers and selling to builders or other end users. These include:

- Major merchants (eg, Bunnings, Carters (operated by Carter Holt Harvey (CHH)), Independent Timber Merchants (ITM), Mitre 10 and PlaceMakers (operated by Fletcher Building); and
- Smaller merchants and specialist retailers.

OSM

Off-Site Manufacturing is the manufacture of components and buildings offsite in a factory, which are then transported to the site where they are needed. OSM can also be referred to as prefabrication, which is sometimes shortened colloquially to 'prefab'. We discuss in Chapter 9 the range of processes that OSM can cover.

Residential For, or directly related to, the housing of people.

Standards NZ Standards New Zealand, Te Mana Tautikanga o Aotearoa.

Statistics NZ Statistics New Zealand, Tatauranga Aotearoa.

Suppliers Manufacturers and importers who supply merchants and

> other parts of the distribution chain. This includes intermediary manufacturers of prefabricated building

supplies.

The Commission Commerce Commission, Te Komihana Tauhokohoko.

Vertical arrangements Arrangements between market participants at different

> levels of the supply chain including contractual arrangements. For example, arrangements reached by suppliers to provide rebates to merchants if a certain

volume is purchased.

Vertical integration A firm operating two or more levels of the supply chain. For

> example, one firm with ownership interests in entities operating as both a manufacturer and merchant.

Chapter 1 Introduction and purpose | Kupu whakataki me te pūtake

Introduction | Kupu whakataki

1.1 This report sets out our findings from the market study into residential building supplies (this study) and our recommendations for improving competition.

Purpose of this chapter | Te pūtake o tēnei wāhanga

- 1.2 This chapter describes the purpose of this study and the process we have followed.
- 1.3 Topics covered are:
 - 1.3.1 the scope of the study and our approach to it;
 - 1.3.2 our framework for analysing competition;
 - 1.3.3 the structure of our report;
 - 1.3.4 our process; and
 - 1.3.5 next steps.

Scope of the study and our approach to it | Te whānuitanga o te take wānanga me te huarahi i whāia

The Minister issued terms of reference for a market study into key residential building supplies

- 1.4 On 22 November 2021, the Hon Dr David Clark, Minister of Commerce and Consumer Affairs (Minister), published a notice under section 51(1) of the Commerce Act 1986 (the Commerce Act) requiring us to undertake a study into any factors that may affect competition for the supply or acquisition of key building supplies used to build the major components of residential buildings.
- 1.5 We must carry out this study in accordance with the terms of reference issued by the Minister. However, we may also consider any ancillary matters that are related to, but not explicitly covered by, the terms of reference.¹

.

Section 51A(4)(b) of the Commerce Act.

1.6 The terms of reference for this study are set out in the box below.²

Notice for Commerce Commission Competition Study into Residential Building Supplies

I, Dr David Clark, Minister of Commerce and Consumer Affairs, pursuant to section 51(1) in Part 3A of the Commerce Act 1986, require the Commerce Commission to carry out a competition study into any factors that may affect competition for the supply or acquisition of key building supplies used to build the major components of residential buildings.

Matters to be considered in the study may include, but are not restricted to:

- The industry structure for key building supplies covered by this study.
- The nature of competition for these key building supplies, including any industry pricing practices or acquisition requirements that impact on competition.
- Impediments to the entry or expansion of new or innovative building supplies, such as "green" building supplies or novel prefabricated products.

For the purposes of this study, major components of residential buildings are the foundation, flooring, roof, walls (structural and non-structural interior and exterior) and insulation.

The Commerce Commission should make its final report for this study publicly available by **6 December 2022**.

1.7 In asking us to undertake this study, the Minister stated that it is critical that Kiwis have access to fairly-priced building materials, because good housing underpins a range of social, economic and health outcomes.³

Key building supplies

- 1.8 The terms of reference direct the study to examine any factors that may affect competition for the supply and acquisition of key building supplies used to build the major components of residential buildings the foundation, flooring, roof, walls (structural and non-structural, interior and exterior) and insulation.
- 1.9 The terms of reference are neutral as to the style of residential building structure and define the scope of study by reference to the "building envelope".
- 1.10 Table 1.1 below describes the general type of building supplies that are within the scope of the study.

New Zealand Gazette "Notice for Commerce Commission Competition Study into Residential Building Supplies" (22 November 2021) (Gazette Notice), available at: https://gazette.govt.nz/notice/id/2021-au4934.

Hon Dr David Clark "Govt to review high cost of residential building supplies in market study" (21 November 2021) https://www.beehive.govt.nz/release/govt-review-high-cost-residential-building-supplies-market-study.

Table 1.1 List of building supplies in scope

Major components of residential buildings	Key building supplies in major components
Foundation	Concrete, timber, steel reinforcing
Flooring	Concrete, particleboard, strandboard
Roof	Steel roofing, other sheet metal roofing, metal and concrete tiles, shingle and membrane roofing
Walls (structural/framing)	Timber framing, laminated veneer lumber (LVL), steel framing, concrete masonry, polyblock, rammed earth framing
Walls (exterior/cladding)	Weatherboard (timber/fibre-cement/uPVC), clay and concrete bricks, metal cladding, non-weatherboard fibre cement, plywood, stucco, sheet steel
Walls (interior)	Plasterboard, wet lining
Walls (interior/exterior)	Window/door framing (aluminium, timber, composite, uPVC, fibreglass, and steel), glazing, doors
Insulation	Walls and ceiling: Glass wool and polyester Floor: Underslab, polystyrene, glass wool, polyester, perimeter edge, under footing

Sources: Commission review of BRANZ (2020), Trends in materials used in new houses; Deloitte Access Economics (2018), Cost of residential housing development; BRANZ (2008), New house price modelling.⁴

1.11 The scope and duration of the study are prescribed by the terms of reference. Competition for the supply or acquisition of building supplies other than key building supplies used in the major components of residential building falls outside the scope of the study contemplated by the terms of reference. So too do the services associated with residential building such as professional services (for example, architectural, design or engineering services) trades and other labour except where these are relevant to competition for key building supplies. The study is not directed to consider additional inputs contributing to the overall cost of residential construction such as financing costs or the cost of land.

BRANZ "Trends in materials used in new houses" (July 2020), available at:
https://d39d3mj7qio96p.cloudfront.net/media/documents/BRANZ RN Physical characteristics 1.pdf;
Deloitte Access Economics "Cost of residential housing development: A focus on building materials"

(December 2018), available at:

https://www2.deloitte.com/content/dam/Deloitte/nz/Documents/Economics/nz-en-DAE-Fletcher-cost-of-residential-housing-development.pdf; BRANZ "New house price modelling" (2008), available at: https://d39d3mj7qio96p.cloudfront.net/media/documents/SR196 New house price modelling.pdf.

- 1.12 The terms of reference for the study focus upon competition for key building supplies. The study asks whether competition is working to benefit consumers through the prices they pay for key building supplies, the quality and range available, and the level of innovation relating to them. It does not extend to a full examination of the cost of residential building.⁵
- 1.13 The study considers whether competition for the supply or acquisition of key building supplies is working effectively and, if not, how competition could be improved to work better for the benefit of New Zealand consumers over the long term. It considers how competition is operating at all levels of the supply chain for key building supplies and the relevance, for competition, of the legislative change envisaged by the programme of Building Reform being led by the Ministry of Business, Innovation & Employment (MBIE).⁶
- 1.14 Some commentators and submitters have described challenging conditions in recent times, globally and domestically, including acute supply chain pressures, materials shortages and price increases. We discuss these conditions in Chapter 2. These conditions are expected by many to continue in the short to medium term, though there are now some indications that these pressures are starting to ease. Some also suggested that the study's findings could be skewed by short-term impacts of these conditions and the COVID-19 pandemic.

Some parties submitted that housing construction costs in New Zealand are too high, that there is not an 'economy market segment', that the problem this study needs to solve is the cost of housing construction, and that we should carry out international benchmarking to understand an 'international best practice' cost of housing assembly. For example, Castalia on behalf of Affordable Building Coalition "Submission on residential building supplies market study draft report" (1 September 2022) at 4 and 6-13; Monopoly Watch "Submission on residential building supplies market study draft report" (1 September 2022) at 8. The focus of this study, however, is competition for key building supplies and the overall cost of housing construction is not within the terms of reference. Further, regarding the individual cost of key building supplies, our additional paper on the scope of the study explained that we did not intend to undertake detailed international benchmarking, and the reasons for that. We noted that, instead, our focus would be on understanding the factors that may be affecting competition for the supply or acquisition of key building supplies in New Zealand, Commerce Commission "Residential building supplies market study – Additional paper on the scope of this study" (31 March 2022) at 8.

We note in this respect both MBIE's Building for Climate Change (BfCC) programme and MBIE's announced review of the building consent system, Ministry of Business, Innovation & Employment "Review of the building consent system" https://www.mbie.govt.nz/have-your-say/building-consent-system-review/. MBIE is the central regulator of building and construction and is the steward of the Building Code. The review of the building consent system is a part of MBIE's ongoing programme of Building Reform.

1.15 While we have considered some issues that have emerged from, or been exposed by, changing global conditions in recent times, we have not closely examined factors affecting the international supply chain or short-term impacts of the COVID-19 pandemic on competition given the focus of this study is on the broader factors affecting competition. We have considered supply chain resilience more generally when exploring the extent to which competition is working well.

The two complementary approaches we are taking to this study

- 1.16 As we signalled in our <u>additional paper on the scope of this study</u>, we have taken two complementary approaches to this study:
 - 1.16.1 We have examined the factors affecting competition across the range of key building supplies, such as the building regulatory system.
 - 1.16.2 We have examined more closely the factors affecting competition for three key building supplies, as case studies.

Factors affecting competition across the range of key building supplies

- 1.17 We have examined the factors affecting competition across the range of key building supplies used to build the major components of residential buildings, as directed by the terms of reference. These include the industry structure and the nature of competition, including any pricing practices or acquisition requirements that impact on competition.
- 1.18 This has included examining:
 - 1.18.1 how concentrated the supply of different key building supplies appears to be and the extent to which other supplies may be viewed as substitutes;
 - 1.18.2 the distribution options available to suppliers of key building supplies and how decisions to stock key building supplies are made by the major merchants; and
 - 1.18.3 the arrangements between the suppliers of key building supplies and the major merchants, such as supply and rebate arrangements.
- 1.19 We have also sought to identify the conditions of entry and expansion for key building supplies including, but not restricted to, new or innovative building supplies, as directed by the terms of reference. This has included:
 - 1.19.1 examining whether or not the building regulatory system creates any impediments to competition and innovation;

We note MBIE's urgent actions on plasterboard and the Government taskforce established recently to examine the shortages in plasterboard, Hon Dr Megan Woods "Plasterboard taskforce set up to ease shortages" (21 June 2022) https://www.beehive.govt.nz/release/plasterboard-taskforce-set-ease-shortages.

- 1.19.2 considering 'new or innovative' supplies, such as 'green' building supplies and novel prefabricated products, in the context of the broader themes of building for climate change and standardisation (offsite manufacturing and prefabrication); and
- 1.19.3 seeking to understand how decisions to specify and purchase key building supplies are made, the factors that influence those decisions, and how those factors may affect competition for key building supplies.

Factors affecting competition for three key building supplies

- 1.20 In parallel to considering the factors affecting competition across the range of key building supplies as discussed above, this study has considered three key building supplies in more detail as case studies.
- 1.21 We have used a case study approach because it is not feasible for this study to examine in depth the factors affecting competition for each of the individual supplies in the categories described in Table 1.1 above. There are many hundreds, possibly several thousand, different building supplies within the scope of the study.
- 1.22 These case studies were not 'mini market studies'. The purpose of these case studies was to assist us to more closely consider the factors that may be affecting competition for key building supplies such as the industry structure, nature of competition, pricing practices or acquisition requirements, strategic, behavioural or regulatory barriers to entry or expansion through particular examples, and has enabled us to consider observations, findings or recommendations that could be applied across key building supplies more generally.
- 1.23 The three key building supplies we selected for closer study were:⁸
 - 1.23.1 concrete (including cement);
 - 1.23.2 plasterboard; and
 - 1.23.3 structural timber.

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⁸ Commerce Commission "Residential building supplies market study – Additional paper on the scope of this study" (31 March 2022) at [24].

- 1.24 We selected the three case study supplies based primarily on:
 - 1.24.1 the relatively high proportion of the cost of residential building that these materials represent, compared to other supplies;^{9, 10}
 - 1.24.2 the relatively high concentration of suppliers for these materials;¹¹ and

1.24.3 responses from submitters highlighting these materials as important and as having limited alternative suppliers. 12

Our framework for analysing competition | Tā mātou anga hei tātari kaiwhakataetae

Competition that works well for consumers

1.25 This study considers whether competition is working well for consumers of key building supplies. Its purpose is to identify and assess factors that may affect competition for the supply or acquisition of key building supplies used to build the major components of residential buildings, and to make any recommendations that we consider may improve competition.¹³

In our Additional paper on the scope of the study (31 March 2022) we described (in footnote 5 of that paper) the basis for selecting the case study supplies in part by reference to analysis (by us) of a Deloitte Access Economics report (2018). Our analysis involved averaging across the building typologies in the Deloitte report, focusing only on key building supplies within the scope of study. Deloitte Access Economics objected to the reference to their report in footnote 5. We have acknowledged the objection and that it would have been more accurate to have stated in footnote 5 that our observation was based on Commerce Commission analysis of Deloitte's report.

Set out below are the costs contributions of our case study supplies, without adjustment for "out of scope" supplies and referencing the typologies separately (as set out in Deloitte's report (pages 8 and 73-78)), as a % of the total cost of building materials for residential housing development: - Framing timber was estimated to represent 8% of (in each case, Auckland) double storey house, 8% of a townhouse, 8.2% of a low-rise apartment, 4.6% of a concrete high-rise apartment and 7% of a timber high-rise apartment; - Concrete represented 7.4% of a double storey house, 10.7% of a townhouse, 4.3% of a low-rise apartment, 23.9% of a concrete high-rise apartment and 5.5% of a timber high-rise apartment; - Plasterboard represented 2.5% of a double storey house, 3.7% of a townhouse, 4.6% of a low-rise apartment, 3.4% of a concrete high-rise apartment and 4.2% of a timber high-rise apartment).

- We note also that Castalia, on behalf of the Affordable Building Coalition (ABC) has, throughout the study, maintained a challenge to the analysis and figures in Deloitte's 2018 report, for example, Castalia on behalf of Affordable Building Coalition "Submission on residential building supplies market study draft report" (1 September 2022) at 4 and 8. It has not been necessary for us, in considering the factors affecting competition for key building supplies, to resolve this disagreement.
- The Cabinet Paper identified concrete, glass wool insulation, and plasterboard as supplies with high levels of concentration. Deloitte Access Economics' December 2018 report discussed plasterboard, cement, insulation, and structural timber as supplies with relatively high levels of concentration. Our initial analysis indicated that plasterboard, cement and structural timber are likely highly concentrated.
- Plasterboard was the material most commonly highlighted in response to our Preliminary Issues paper as having limited choice of suppliers.
- Sections 48, 51A and 51B of the Commerce Act and our terms of reference.

- 1.26 This study does not enquire into compliance with the provisions of the Commerce Act relating to anti-competitive conduct. Therefore, a conclusion that particular conduct affects competition, and may be the subject of a recommendation, is not a conclusion that it breaches provisions of the Commerce Act. We retain the ability to separately investigate anti-competitive conduct if information collected during this study, or outside of it, gives us reason to believe that anti-competitive conduct may be occurring. Similarly, we may separately investigate conduct which we consider could breach the Fair Trading Act 1986.
- 1.27 The overriding aim of this study is the same as the purpose of the Commerce Act itself: to promote competition in markets for the long-term benefit of consumers within New Zealand.¹⁴
- 1.28 Competition is defined in the Commerce Act as meaning "workable or effective competition".

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... workable competition is a practical description of the state of an industry where government intervention to make the market work better is not justified because the socially desirable outcomes generated by competition already exist to a satisfactory degree.

A workably competitive market is one that provides outcomes that are reasonably close to those found in strongly competitive markets...

The degree of rivalry is critical. In a workably competitive market no firm has significant market power and consequently prices are not too much or for too long significantly above costs...

In our view, what matters is that workably competitive markets have a tendency towards generating certain outcomes...

...the tendencies in workably competitive markets will be towards the outcomes produced in strongly competitive markets.

Wellington International Airport Ltd and Others v Commerce Commission [2013] NZHC 3289 at [13]-[15], [18] and [22], available at:

https://forms.justice.govt.nz/search/Documents/pdf/jdo/53/alfresco/service/api/node/content/workspace/SpacesStore/1c117dea-b8ba-491e-ba1d-d4cd30dbe522/1c117dea-b8ba-491e-ba1d-d4cd30dbe522.pdf.

Section 1A of the Commerce Act. This was emphasised by the Transport and Infrastructure Select Committee in its report back to Parliament on the draft market studies legislation – Commerce Amendment Bill 2018 (45-2) (Select Committee report) at 1, available at:

https://www.parliament.nz/en/pb/sc/reports/document/SCR_80263/commerceamendment-bill.

Section 3(1) of the Commerce Act.

1.29 We have developed Market Studies Guidelines to assist interested parties to understand our approach to a market study. 17 Our Market Studies Guidelines describe characteristics of competitive markets that are working well and those that may be observed in markets that are not working well. They also describe market features that could affect competition and that are relevant to this study. 18

Our approach to assessing competition in this study

- 1.30 We present a series of findings and recommendations for improvements to the factors affecting competition that, in turn, we would expect to produce better long-term market outcomes for consumers, including in respect of prices, quality, range and service.
- 1.31 The suite of recommendations seeks to identify feasible options that will provide tangible improvements in competition for key building supplies without undermining the other key policy objectives of the building regulatory system. The aim is to produce better long-term outcomes for consumers safe, healthy and durable homes, that can be built with a wider range of cost-effective key building supplies, including those that are new or innovative.
- 1.32 Cost-benefit analysis may be useful as part of a policy decision-making process. We have not undertaken cost-benefit analysis as part of developing our recommendations. Due to the interrelationships between the recommendations, the effects on the functioning of the supply chain and competition need to be considered in aggregate.

Structure of our report | Te hanga o tā mātou pūrongo

- 1.33 In Chapter 2 we begin with background information on the residential building supplies industry in New Zealand. We cover the importance of building supplies to New Zealanders and introduce the main participants, including Māori, in the industry. We provide an overview of the characteristics of residential building in New Zealand and note the acute demand and supply chain pressures the industry currently faces. This chapter provides context for the discussion that follows.
- 1.34 In Chapter 3 we describe the key themes arising from our engagement with Māori stakeholders through this study. This chapter provides context for the recommendation and observations that we make in Chapter 10.
- 1.35 In Chapter 4 we discuss the role that regulation plays in the industry. We cover the key elements of the building regulatory system, how the building regulatory system operates in practice, and the extent to which the elements of the building regulatory system may be acting as barriers to the entry and expansion of key building supplies.

¹⁷ Referred to as Competition Studies in Part 3A of the Commerce Act.

¹⁸ Commerce Commission "Market Studies Guidelines" (19 November 2020) at [12]-[20].

- 1.36 In Chapter 5 we discuss how key building supplies are specified and purchased, and consider the incentives, preferences and potential biases of the parties involved in selecting building supplies for residential building projects. We also discuss the implications for competition for key building supplies which flow from the way decisions to choose building supplies are made.
- 1.37 In Chapter 6 we discuss competition between suppliers of key building supplies. We look at market concentration and explore the impact on competition of the number and types of suppliers for different categories of key building supplies. We also discuss the impact of vertical integration on competition, including allocation policies used by suppliers during recent supply shortages.
- 1.38 In Chapter 7 we discuss competition at the merchant level, including the degree of market concentration, and conditions of entry and expansion (including use of land covenants and exclusive leases).
- 1.39 In Chapter 8 we discuss arrangements between market participants at different levels of the building supplies industry supply chain and whether they appear to affect competition for key building supplies. In particular, we consider the likely effect of rebates, loyalty schemes, and other vertical arrangements.
- 1.40 In Chapter 9 we discuss impediments to the entry of 'new or innovative' building supplies, such as 'green' building supplies or novel prefabricated products. We consider this in the context of the broader themes of building for climate change and standardisation (offsite manufacturing and prefabrication).
- 1.41 In Chapter 10 we set out recommendations that seek to improve competition and produce better long-term market outcomes for consumers.
- 1.42 We have included additional information in the attachments to our report:
 - 1.42.1 Attachment A: Plasterboard case study discusses the findings of our plasterboard case study.
 - 1.42.2 Attachment B: Structural timber case study discusses the findings of our structural timber case study.
 - 1.42.3 Attachment C: Concrete and cement case study discusses the findings of our case study into cement and ready-mix concrete.
 - 1.42.4 Attachment D: Supplier survey provides further information about our supplier survey.
 - 1.42.5 Attachment E: Builders/specifiers survey provides further information about our builders/specifiers survey.
 - 1.42.6 Attachment F: Regulatory and standards system survey provides further information about our survey on the building regulatory system.

- 1.42.7 Attachment G: Additional maps of merchant stores provides additional maps showing the locations of the major building supplies merchants' stores.
- 1.42.8 Attachment H: Rebates stylised example sets out examples of the way different rebate structures can impact merchant decisions.

Our process | Tā mātou tukanga

Papers we have published

- 1.43 On 22 November 2021, we released a <u>statement of process</u>, outlining the process we intended to follow over the course of this study.¹⁹
- 1.44 On 17 December 2021, we released a <u>preliminary issues paper</u>, seeking responses from interested parties on the preliminary issues we intended to explore during this study.²⁰ We received 25 submissions on our preliminary issues paper.
- 1.45 On 25 February 2022, we sought cross-submissions on our preliminary issues paper. We received cross-submissions from four parties.
- 1.46 On 31 March 2022, we released an <u>additional paper on the scope of this study</u>, and sought submissions from interested parties regarding any regulatory barriers to the entry or expansion of key building supplies.²¹
- 1.47 On 4 August 2022, we released a <u>draft report</u>, seeking comment from interested parties on our preliminary findings and draft recommendations.²² We received 26 submissions on our draft report.
- 1.48 From 27 to 29 September 2022 we conducted a consultation conference to hear the further views of stakeholders.²³ Sixty-five parties attended our conference. Following the conference, we sought final submissions, including cross-submissions, by 13 October 2022. We received 12 post-conference submissions.
- 1.49 Copies of the papers we published, our draft report and related material, and all the public versions of the submission we received in response, are published <u>on our website</u>.

Commerce Commission "Market Study into Residential Building Supplies – Statement of Process" (22 November 2021).

Commerce Commission "Residential building supplies market study – Preliminary Issues paper" (17 December 2021).

²¹ Commerce Commission "Residential building supplies market study – Additional paper on the scope of this study" (31 March 2022) at [32].

²² Commerce Commission "Residential building supplies market study – Draft report" (4 August 2022).

²³ Conference transcripts are published on our website.

Information collection

- 1.50 The residential building supplies industry services a diverse range of participants. We have therefore sought to collect information from a wide range of sources and to meet with a wide range of parties. 24 These parties have included building supplies merchants, manufacturers and importers of key building supplies, building industry representatives, government agencies, and a range of industry peak bodies with differing perspectives on the industry. We have met with over 70 parties in total.
- 1.51 We thank all these parties for the information they have provided, and for their ongoing engagement in this study.
- 1.52 We asked interested parties to complete surveys between March and May 2022 to assist us to understand how competition is working at different levels of the residential building supplies industry.²⁵ We received:
 - 1.52.1 105 responses to our survey on specifying and purchasing key building supplies; and
 - 1.52.2 136 responses to our survey on the building regulatory system.
- 1.53 The feedback we received was valuable for informing this study and has contributed to the findings set out in our report.
- 1.54 We also distributed a supplier survey to around 500 suppliers of key building supplies, but did not get a large response. The small sample size of responses was insufficient to draw any generalised conclusions. However, some of the qualitative responses raised relevant themes and, where that was the case, we have considered those alongside the other material we have received.

Advice and report by industry expert John Gardiner

- 1.55 We engaged an industry expert, John Gardiner, to provide his views and opinions to assist us to assess whether there are regulatory barriers to the entry or expansion of key building supplies and, if so, what those barriers are.
- 1.56 We engaged Mr Gardiner for his expertise and experience working both within the building regulatory system and as a consultant to suppliers seeking to navigate this system. We asked Mr Gardiner to identify, from his expertise and experience, any features that make it difficult for suppliers of building products to navigate and use this system in practice.
- 1.57 We have considered whether the features Mr Gardiner identified amount to regulatory, behavioural, or other impediments to the entry and expansion of key building supplies.

We note concerns raised that there have not been enough submitters to our process or substantial engagement from organisations interested in affordable housing, for example, Monopoly Watch "Cross submission on residential building supplies market study draft report" (17 October 2022) at 7.

²⁵ See Attachments D, E and F.

- 1.58 We also asked Mr Gardiner to propose possible improvement measures to address the practical difficulties he identified. We have considered those improvement measures when developing our recommendations where we identify factors affecting competition.
- 1.59 Mr Gardiner's report was published alongside our draft report.²⁶

How we have engaged with Māori

- 1.60 As an Independent Crown Entity, we are committed to engaging with Māori and supporting future-focused Māori-Crown relationships, through taking a good-faith, collaborative approach to engaging with Māori on our work.²⁷ To achieve this, we are continuing to build our understanding of our role as a Treaty partner under the Treaty of Waitangi (the Treaty) and doing work to better understand Te Ao Māori and what this means for our work.²⁸
- 1.61 Our commitment extends to engaging with Māori to acknowledge and strengthen our relationship with Māori, and to better understand, and reflect, Māori perspectives in our work. We acknowledge that effective engagement with Māori is key to realising the potential of this partnership, which will enable us to support better quality outcomes for Māori.²⁹
- 1.62 We are committed to genuine engagement with Māori and acknowledge rangatiratanga and the status of Māori as Treaty partners. We also acknowledge the important role mātauranga Māori has in finding solutions to challenges we face as a nation.³⁰
- 1.63 Prior to our draft report we sought to hear and understand specific perspectives from Māori on the residential building supplies industry. On 4 May 2022 we held an initial hui, inviting a range of Māori partners and stakeholders to share their insights on the residential building supplies industry. A range of individuals and organisations attended the hui from iwi and Māori businesses.
- 1.64 We also heard from representatives of Kāinga Ora and Te Tūāpapa Kura Kāinga, Ministry of Housing and Urban Development (HUD).

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022).

The Treaty of Waitangi/Te Tiriti o Waitangi is a founding document of government in New Zealand and is one of the major sources of New Zealand's constitution. Our reference to "the Treaty" is to both the English and Te Reo versions.

Te Arawhiti "Guidelines for engagement with Māori" (1 October 2018), available at: https://www.tearawhiti.govt.nz/assets/Maori-Crown-Relations-Roopu/6b46d994f8/Engagement-Guidelines-1-Oct-18.pdf.

Te Aka Māori Dictionary defines "mātauranga Māori" as "Māori knowledge – the body of knowledge originating from Māori ancestors, including the Māori world view and perspectives, Māori creativity and cultural practices", see https://maoridictionary.co.nz/.

²⁷ Hon. Grant Robertson "Enduring Letter of Expectations" (15 October 2019), available at:

https://comcom.govt.nz/__data/assets/pdf_file/0030/183990/Enduring-Letter-of-Expectations-to-all-Crown-Entity-Boards.pdf.

1.65 A few parties who had registered to attend this hui were not able to join on the day. We followed up with those parties after the hui and were able to connect with two of them to hear their further perspectives.

24

- 1.66 A summary of the views expressed at the hui He Kohinga Kōrero was published on our website alongside our draft report.³¹ During our consultation conference in September 2022, we dedicated a session to hearing the views of Māori partners and stakeholders. This allowed us to continue our engagement with Māori and to test our preliminary findings and draft recommendations with the interested parties who attended.
- 1.67 We set out the key themes from these engagements in Chapter 3. As well, we have incorporated information shared with us in the relevant sections of our report.
- 1.68 Hearing from Māori about their experiences of the residential building supplies industry has enabled us to better understand Māori perspectives, concerns, and aspirations regarding the industry. We acknowledge the diversity in views and perspectives we heard. Hearing a range of Māori voices necessarily means there was a variety of perspectives expressed. We also acknowledge that the comments we heard do not represent the views of all Māori.

Confidential information shared with us

- 1.69 We have endeavoured to make our report as accessible to interested parties as possible. However, some information within our report must out of necessity be redacted from view, as is indicated by the use of square brackets like this: [].
- 1.70 Much of the information we have collected in the course of this study is considered confidential or commercially sensitive by the supplying party.
- 1.71 It is important that interested parties and others providing us with relevant information continue to feel confident participating in this study and supplying us with information that we can use to develop our views.
- 1.72 Accordingly, when deciding whether information provided to us is commercially sensitive and/or confidential or can be published, we consult with the party who has provided it and balance these considerations against our obligations to adhere to the principles of natural justice in the course of this study, operate as transparently as practicable, and comply with our legal obligations under the Official Information Act 1982 (OIA).
- 1.73 If we receive a request for any information referred to or collected in connection with this report, we will consider whether to make the information available in accordance with the OIA.

Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022).

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1.74 Our Market Studies Guidelines contain further information about how we protect confidential information provided to us during this study and how we respond to OIA requests related to this study.³²

Next steps | Ngā mahi ā muri atu

- 1.75 This report sets out the findings of this study and the recommendations we are making to both industry, and to the Minister, to improve competition for the supply and acquisition of key building supplies.
- 1.76 The Minister is required to respond to our final report within a reasonable time after it is made publicly available.³³

Commerce Commission "Market Studies Guidelines" (19 November 2020).

³³ Section 51E of the Commerce Act.

Chapter 2 Overview of the building supplies industry | Tirohanga whānui ki te ahumahi putunga hanga whare

Introduction | Kupu whakataki

- 2.1 This chapter provides background information on the residential building supplies industry, as context for the rest of the chapters in this report.
- 2.2 Topics covered are:
 - 2.2.1 the importance of building supplies to New Zealanders;
 - 2.2.2 Māori involvement in the industry;
 - 2.2.3 how the key building supplies used in residential construction vary;
 - 2.2.4 the industry supply chain and the construction process;
 - 2.2.5 the main participants in the industry;
 - 2.2.6 characteristics of residential building in New Zealand;
 - the acute demand and supply chain pressures the industry has faced in recent times;
 - 2.2.8 climate change and implications for the future of building supplies; and
 - 2.2.9 legislative reform and other policy processes.

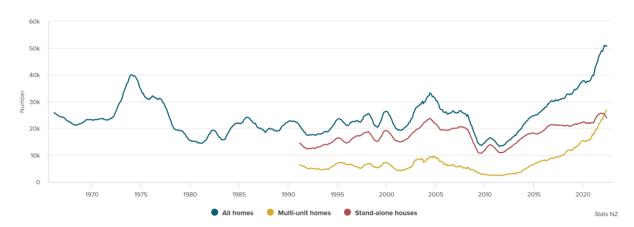
The importance of building supplies to New Zealanders | Te hiranga o ngā putunga hanga whare ki ō Aotearoa tāngata

2.3 Residential construction is an important part of the New Zealand economy, and has significant implications for the wellbeing of New Zealanders. Housing and household utilities is the single biggest expenditure category for most New Zealand households.³⁴ Maintaining, improving and expanding our housing stock is a critical part of providing for New Zealand's growing population.

Statistics NZ "Household expenditure statistics: Year ended June 2019" (March 2020), available at: https://www.stats.govt.nz/information-releases/household-expenditure-statistics-year-ended-june-2019.

2.4 As shown in Figure 2.1 below, residential building activity has increased since 2012. Annual consents for new residential homes reached record high levels in May 2022, and 50,736 were issued in the year ended June 2022 (up 14% from the previous year).³⁵ The value of residential building work was estimated at \$21.2 billion in the year ended December 2021 (about 6.1% of GDP), up from \$6.2 billion in the year ended December 2012.36

Figure 2.1 New residential homes consented, 12-month rolling totals March 1966 to June 2022



Source: Statistics NZ.37

- 2.5 The value of alterations and additions to residential buildings was \$2.4 billion in the year ended December 2021, comprising over 11% of the total value of consented work.³⁸ This has increased from \$1.2 billion in the year ended December 2012.
- 2.6 Figure 2.1 shows that the majority of growth in new consents in the last 10 years has come from multi-unit homes. This intensification of New Zealand's housing stock impacts the types of building methods employed and materials used.

38

³⁵ Statistics NZ "Consents for homes still high, but down for stand-alone houses" (1 August 2022), available at: https://www.stats.govt.nz/news/consents-for-homes-still-high-but-down-for-stand-alone-houses/.

³⁶ Statistics NZ Infoshare "Building activity by region (Annual-Dec)", available at: https://infoshare.stats.govt.nz/default.aspx?AspxAutoDetectCookieSupport=1;].

³⁷ Statistics NZ "Consents for homes still high, but down for stand-alone houses" (1 August 2022), available at: https://www.stats.govt.nz/news/consents-for-homes-still-high-but-down-for-stand-alone-houses/. 1. [

- 2.7 Building materials have been estimated to comprise 16 to 24% of the total cost of residential housing development in New Zealand, and 23 to 33% if the costs of land and infrastructure are excluded.³⁹ Labour, GST and professional services make up the bulk of the remaining costs.
- 2.8 However, product or process innovation, the structure of the supply chain and services associated with the supply of building materials, will impact on construction costs in ways that are not captured by the cost of building materials alone. Products or processes that increase the speed of construction, for example, should contribute to lower labour costs.
- 2.9 Currently, the average cost to build residential homes in New Zealand is approximately \$2,773 per square metre. However, the cost varies depending on the region, building typology, and the higher or lower specification of house.
- 2.10 Building supplies and building methods contribute to the quality of a residential home, which is of critical importance to the wellbeing of New Zealanders. Warmer and drier homes offer long-term health and social benefits, and energy efficient homes cost less each month to keep warm and dry.
- 2.11 The Building Code provides minimum standards that new buildings must meet or exceed. Some of the minimum standards in the Building Code appear to be behind international standards (particularly in relation to warm, dry and healthy homes), and the energy performance of our existing housing stock is generally low.⁴¹

These estimates vary depending on location and construction typology. Further detail can be found in Deloitte Access Economics "Cost of residential housing development: A focus on building materials" (December 2018) at 13, available at:

https://www2.deloitte.com/content/dam/Deloitte/nz/Documents/Economics/nz-en-DAE-Fletcher-cost-of-residential-housing-development.pdf. We note also that Castalia, on behalf of the Affordable Building Coalition (ABC) has throughout the study maintained a challenge to the analysis and figures in Deloitte's 2018 report, for example, Castalia on behalf of Affordable Building Coalition "Submission on residential building supplies market study draft report" (1 September 2022) at 4 and 8.

As of 2022 Q2, Residential building consent analysis tables, available at: https://www.interest.co.nz/property/residential-building-consent-analysis. As noted in paragraph 1.12, we have not examined, or undertaken detailed international benchmarking, of the full cost of residential building, and we heard examples of significantly higher estimates. Kiwi Infrastructure estimates that New Zealand developers build at \$3,800 per sqm for the average residential development, Kiwi Infrastructure "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 3. We have also heard of instances of building costs materially exceeding this figure in particular regions because of regionally specific factors, Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022).

41 []; []; [

OECD Better Life Index states that the energy performance of New Zealand's building stock is generally low, OECD "Better Life Index – Housing" https://www.oecdbetterlifeindex.org/topics/housing/.

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2.12 Programmes such as Homestar promote building to higher standards than the standards in the Building Code, and Healthy Homes standards have introduced requirements to improve the quality of existing rental housing.⁴²

Māori involvement in the industry | Tā te Māori whai wāhi ki te ahumahi

- 2.13 Māori are active participants across the construction industry.
- 2.14 The proportion of Māori workers in the industry appears to be growing. ⁴³ As of 2018, 35,100 Māori were working in the construction industry, making it the second largest employer of Māori. ⁴⁴ This includes approximately one-fifth of all self-employed Māori sole traders, and 23 per cent of all Māori employers. ⁴⁵ Construction is a significant proportion of Māori value-add (GDP), being the fourth largest contributor of real production GDP from the Māori sector in 2018 at around \$1.5 billion. ⁴⁶
- 2.15 While Māori are significantly represented in the labour component of the industry, submissions emphasised there is little representation at the decision-making and Board level and few pathways into those roles.⁴⁷ We heard examples of how this affects outcomes for Māori involved in the building industry.⁴⁸

The Homestar standard is approximately 30% higher than the minimum requirements in the Building Code, though this will vary depending on the specific Homestar rating,

Ministry of Business, Innovation & Employment "Building and Construction Sector Trends Annual Report 2022" (October 2022) at Figure 15, available at: https://www.mbie.govt.nz/dmsdocument/25439-building-construction-sector-trends-annual-report-2022.

BERL and Reserve Bank of New Zealand, Te Pūtea Matua "Te Ōhanga Māori 2018 – The Māori Economy 2018" (January 2021) at 13 and 27, available at: https://www.rbnz.govt.nz/-/media/0212182a319f481ea4427bcf5dd703df.ashx. For figures from 2015, see: Ministry of Business, Innovation & Employment "Building a Future Māori in the Construction Sector" (February 2015) at 11, available at: https://www.mbie.govt.nz/dmsdocument/1065-hkkar-construction-report-february-2015-pdf.

BERL and Reserve Bank of New Zealand, Te Pūtea Matua "Te Ōhanga Māori 2018 – The Māori Economy 2018" (January 2021) at 27.

BERL and Reserve Bank of New Zealand, Te Pūtea Matua "Te Ōhanga Māori 2018 – The Māori Economy 2018" (January 2021) at 17.

We also note Ministry of Business, Innovation & Employment "Māori in the Labour Market – December 2020 Quarter (unadjusted)", available at: https://www.mbie.govt.nz/dmsdocument/13559-maori-in-the-labour-market-december-2020-quarter-unadjusted/.

Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 2.

- 2.16 Māori are major residential developers and landlords, including through Iwi and Post-Settlement Governance Entities (although not limited to those). 49 For example, Ngāi Tahu Property's development portfolio includes three of Canterbury's largest master-planned residential developments. Māori small-to-medium enterprise (SME) building companies are active throughout New Zealand. Māori and the Crown are partnering on projects that aim to speed up the delivery of Māori-led housing through initiatives such as Whai Kāinga, Whai Oranga. 50
- 2.17 Other involvement includes as designers—for example, TOA Architects—and as distributors of building supplies—for example, Toa ITM.⁵¹
- 2.18 Given the significant involvement of Māori in the construction industry, any factors affecting competition for key building supplies that we identify also impact on Māori.
- 2.19 In addition, Māori as homeowners, landlords, and tenants may face less equitable outcomes as they are less likely to own homes. Māori are more reliant on social housing, on average live in lower quality houses (eg, houses affected by dampness, mould and cold), and are disproportionately likely to live rurally, which makes rural supply and cost issues particularly acute for them. ^{52, 53, 54}
- 2.20 Through the Housing Policy and Services Kaupapa Inquiry, the Waitangi Tribunal is currently considering the Crown's delivery of state services, programmes and support enabling Māori access to adequate housing. The Inquiry has four broad themes: housing policy, practice and regulation of the housing market; social housing the provision of 'public housing' by government; use and development of Māori land for housing; and the relationship between poor physical and mental health (and other socio-economic factors) and housing.

BERL and Reserve Bank of New Zealand, Te Pūtea Matua "Te Ōhanga Māori 2018 – The Māori Economy 2018" (January 2021) at 17-19.

Te Rūnanga o Ngāi Tahu "Ngāi Tahu Property" https://ngaitahu.iwi.nz/investment/ngai-tahu-property.

Te Rūnanga o Toa Rangatira has also noted that its strategy and delivery of housing is "through progressively acquiring a set of vertically integrated businesses", which included its acquisition of Toa ITM: Matai O'Connor "Porirua housing project to provide 880 new homes, Ngāti Toa iwi prioritised" (14 December 2021) RNZ https://www.rnz.co.nz/news/te-manu-korihi/457888/porirua-housing-project-to-provide-880-new-homes-ngati-toa-iwi-prioritised.

Statistics NZ "Te Pā Harakeke: Māori housing and wellbeing 2021" at Figure 1, available at: https://www.stats.govt.nz/reports/te-pa-harakeke-maori-housing-and-wellbeing-2021; Westpac New Zealand, BERL and OpinioNative "Mahi tahi tatou, kaha ake tatou. The Māori economy – obstacles and opportunities." (October 2021) at 4, available at: https://www.westpac.co.nz/assets/About-us/sponsorship/documents/The-Maori-economy-obstacles-and-opportunities-Westpac-NZ-Oct-2021.pdf.

Statistics NZ "Te Pā Harakeke: Māori housing and wellbeing 2021" at Figure 7, available at: https://www.stats.govt.nz/reports/te-pa-harakeke-maori-housing-and-wellbeing-2021.

Environmental Health Intelligence New Zealand "Urban-rural profile"

https://www.ehinz.ac.nz/indicators/population-vulnerability/urbanrural-profile/. Māori have a higher proportion of the population living in small urban areas (14.7% of the Māori population) and rural areas (18.0%), compared with the total population (10.0% and 16.3% respectively).

Waitangi Tribunal | Te Rōpū Whakamana i te Tiriti o Waitangi "Housing Policy and Services Inquiry", available at: https://waitangitribunal.govt.nz/inquiries/kaupapa-inquiries/housing-policy-and-services-inquiry/.

- 2.21 The Crown's response to the Inquiry is being led by HUD, with the Māori and Iwi Housing Innovation Strategy, MAIHI Ka Ora, guiding that approach. That strategy enjoins Government agencies to "work with each other and with Māori in genuine partnership over the next 30 years towards a shared vision that all whānau have safe, healthy, affordable homes with secure tenure, across the Māori housing continuum".
- 2.22 We discuss the key themes arising from our stakeholder engagement with Māori over the course of this study in Chapter 3.

How the key building supplies used in residential construction vary | Te rerekētanga o ngā putunga hanga whare noho

- 2.23 Chapter 1 sets out the general types of key building supplies that are within the scope of this study. Key building supplies within scope are a subset of all building supplies used for residential building. For example, plumbing and electrical supplies are excluded, as are building supplies for commercial construction or infrastructure (such as roads).
- 2.24 The mix of key building supplies is likely to vary depending on the type of residential building being built, and/or the building method (for example, onsite or offsite construction). Some key building supplies can be provided as a product system, which is a group of products that work together to achieve a particular function required by the Building Code.
- 2.25 Residential housing in New Zealand can take many forms but can be broadly categorised into standalone houses, townhouses, and apartments. Differences between these typologies affect the relevant set of materials and their contribution to overall cost.⁵⁷
- 2.26 Recently there has been an increase in higher density housing in New Zealand, supported by Government initiatives to enable greater housing density.⁵⁸ This trend is likely to continue with the Resource Management (Enabling Housing Supply and Other Matters) Amendment Act 2021 expected to impact planning rules.

Te Tūāpapa Kura Kāinga, Ministry of Housing and Urban Development "Wai 2750 Kaupapa Inquiry" https://www.hud.govt.nz/our-work/wai-2750-kaupapa-inquiry/.

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For example, we understand construction of high-rise apartments is generally a more specialised process than the construction of low-rise apartments and can involve different materials (timber framing is generally only used in buildings of three storeys or less).

Te Tūāpapa Kura Kāinga, Ministry of Housing and Urban Development "Enabling Housing Density" https://www.hud.govt.nz/urban-development/enabling-housing-density/.

Industry supply chain and the construction process | Tā te ahumahi hei tuku putunga me te tukanga hanganga

- 2.27 Residential building supplies pass through a series of levels of the supply chain before they are used in construction. Most key building supplies are supplied through merchants, though there are differences in the supply chain between building supplies, for example:
 - 2.27.1 some products exhibit a much greater degree of direct sales than others (eg, window joinery is almost entirely direct to market sales);⁵⁹ and
 - 2.27.2 there are specialist installers for some building supplies, such as insulation and roofing.⁶⁰
- 2.28 Figure 2.2 below provides a high-level summary of the supply chain for residential building supplies. Each red box represents a group of market participants, but is not intended to reflect any formally defined market.
- 2.29 In reality there is more complexity in the supply chain than Figure 2.2 suggests and differences depending on the particular building supplies. It does not include participants that, while not directly involved in the supply chain, can influence the choice of materials (such as designers or building consent authorities).

Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [4.2]; Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 5.

Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 31 and 33; Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 5.

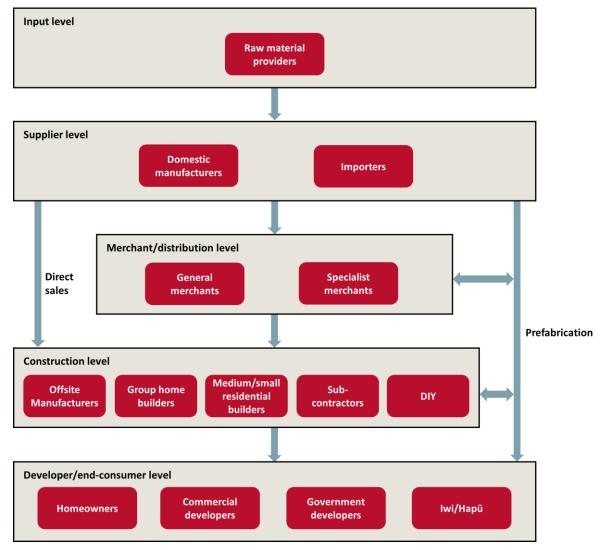


Figure 2.2 High-level generic supply chain for residential building materials

Source: Commerce Commission.⁶¹

2.30 In addition to suppliers and distributors of key building supplies, builders, homeowners, and a number of other participants play significant roles in the end-to-end construction process.

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2.31 Figure 2.3 below presents a high-level summary of the construction process and identifies industry participants with significant influence. Figure 2.3 is a stylised overview and does not seek to capture all relationships in the process. ⁶² In particular, it understates the number of influential relationships that designers have with various other industry participants across several different stages in the construction process. ⁶³

Materials Materials Imported Manufactured Product assurance Merchants for construction materials Designers draw up plans Plan assessed for Building Code compliance Builders and other tradespeople purchase materials Construction **Build assessed for Building Code** compliance and consented Consumer

Figure 2.3 High-level summary of the construction process

Source: Ministry of Business, Innovation & Employment. 64

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OffsiteNZ pointed out that offsite manufacturing involves a number of quality control processes earlier in the construction process and said that, if offsite manufacturing was featured in Figure 2.3, it would highlight the benefits of this, OffsiteNZ "Submission on residential building supplies market study preliminary issues paper" (3 February 2022) at 2.

^{63 [}

Ministry of Business, Innovation & Employment "Residential Construction Sector Market Study Options Paper" (November 2013) at 8, available at: https://www.interest.co.nz/sites/default/files/residential-construction-sector-options-paper.pdf.

Industry participants | Te hunga whai wāhi ki te ahumahi

- 2.32 By category, the main participants in the industry include:
 - 2.32.1 suppliers, who manufacture or import building supplies;
 - 2.32.2 merchants, who distribute building supplies to builders;
 - 2.32.3 builders, broadly categorised as SME builders and larger group home builders;
 - 2.32.4 designers (eg, architects), who prepare the plans for a project including specification of the building supplies to be used;
 - 2.32.5 homeowners and end consumers, who own and/or reside in residential buildings;
 - 2.32.6 developers, who typically prepare the land for new housing to be built on and may also manage associated residential construction projects;
 - 2.32.7 Kāinga Ora, a public sector developer and provider of social housing; and
 - 2.32.8 regulatory bodies, such as building consent authorities (BCAs).

Suppliers of key building supplies

- 2.33 Some domestic manufacturers specialise in a general category of building supplies such as timber (for example, Red Stag) or ready-mix concrete (for example, Allied Concrete). Other manufacturers have ownership interests in entities supplying a range of different building supplies.
- 2.34 In addition, a number of international or domestic companies import key building supplies into New Zealand.
- 2.35 Offsite manufacturers are both purchasers of key building supplies (as inputs) and suppliers of a product which include key building supplies such as a prefabricated component or an entire modular build. Offsite manufacturers purchase materials, then process and assemble them to supply more complex key building supplies to merchants or builders (for example, frame and truss prefabrication, structural insulated panels (SIPs) and windows).
- 2.36 Chapter 9 discusses offsite manufacturing (OSM) in more detail, including its potential to positively impact competition for the supply of key building supplies.

Merchants and vertical integration

2.37 At the distribution level, the five major merchant chains which operate nationally are PlaceMakers, Carters, ITM, Bunnings and Mitre 10. PlaceMakers, Carters and ITM cater primarily to builders and trade customers, while Bunnings and Mitre 10 have both trade centres and retail-focused stores.

- 2.38 PlaceMakers and Carters are vertically integrated merchants, each being part of larger groups engaging in business activities spanning several levels of the supply chain.
 - 2.38.1 Fletcher Building manufactures products including plasterboard (Winstone Wallboards), cement (Golden Bay Cement), concrete (Firth) and insulation (Tasman Insulation). It also operates PlaceMakers and is active in residential development and construction (Fletcher Living and Clever Core).
 - 2.38.2 Carter Holt Harvey (CHH) manufactures products including structural timber (CHH Woodproducts) and also operates Carters.
- 2.39 There are other vertically integrated participants in the supply chain for some key building supplies.⁶⁵
- 2.40 Outside of the major merchants, a number of smaller merchants and specialist retailers have varying presence and carry varying product ranges throughout New Zealand.

Builders

- 2.41 At the residential construction level, there is a wide range of different business models ranging from SME builders to nationwide group home builders (GHBs).
- 2.42 There is a large and diverse range of SME builders, as well as subcontractors and doit-yourself (DIY) builders. SME builders can be sole traders with one or two staff or contractors or a group of builders that typically build a small number of homes per year (for example, up to 10 buildings per year). SME builders typically purchase building supplies from merchants for each build.
- 2.43 GHBs may operate on a national or multi-regional basis. They typically have a national office but may also operate a franchise model. GHBs build a larger number of homes per year, may offer a suite of standard plans, and maintain national accounts with merchants for purchasing building supplies. Some GHBs also operate as developers. GHBs include the likes of GJ Gardner Homes, Signature Homes, Mike Greer Homes, Golden Homes, and Classic Developments.
- 2.44 Purchasers of key building supplies also include a growing number of offsite manufacturers. Some prefabricate a component of a building (such as a wall) and assist in the construction process, while other offsite manufacturers aim to build entire buildings in a factory and complete assembly onsite.

For example, Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at figures 11-15.

Designers and specifiers

2.45 Designers (including architects, draughtspersons, engineers and quantity surveyors) prepare plans and specifications for building work. They also provide advice on compliance of building work with the Building Code.⁶⁶

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2.46 Designers often decide what key building supplies are to be specified on the building plans and therefore used in construction. Sometimes these decisions are made in consultation with their clients and the builder.

Developers

- 2.47 Developers engage in a range of activities. From purchasing land, arranging the construction of infrastructure and connection of services, sub-dividing and selling the sites, to constructing (or co-ordinating the construction by other builders) of residential housing, and either selling or renting the resulting properties.
- 2.48 Developers can range in size and scale. Some focus on smaller projects of two to three terrace houses for example, while other developers focus on large apartment buildings and retirement villages.
- 2.49 Developers may have a greater or lesser impact on the purchases of key building supplies, either through specifying and sourcing building supplies for build partners or letting build partners source their own contractors and building supplies. It also appears that a small number of developers have sought to influence the purchase of key building supplies through land development covenants or agreements that confer certain rights to supply (or to offer the supply) of building supplies on related-party merchants. We discuss these and other covenants and exclusive leases in Chapter 7. Some developers may also be builders by trade and, accordingly, likely to be directly involved in the construction process and sourcing building materials.
- 2.50 We have also observed that some developers emphasise social outcomes and therefore place emphasis on affordability and quality.⁶⁷

Kāinga Ora

2.51 Kāinga Ora is a public sector provider of social housing and the Government's lead urban developer.

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- 2.52 HUD is the Ministry that oversees Kāinga Ora. HUD provides the overall strategic direction, including monitoring and oversight, of Kāinga Ora. Kāinga Ora's functions focus on delivery, for example, through providing homes and housing services on behalf of Crown entities.⁶⁸
- 2.53 Kāinga Ora is involved in the building of new homes, as well as redevelopment of existing homes. It partners with the development community, Māori, local and central government, and others on urban development projects of all sizes. Through its work programme to develop and provide social housing, it is the end consumer of key building supplies in New Zealand and is responsible for approximately 7 to 8% of new homes built in New Zealand each year through its construction partners.⁶⁹
- 2.54 Kāinga Ora tenders for a lead contractor to manage the construction of its residential housing projects and takes a hands off approach to sourcing key building supplies. Build partners typically source their own building supplies provided they meet the requirements of the job.⁷⁰
- 2.55 Kāinga Ora operates Consentium, a standalone and independent division within Kāinga Ora that provides building consent services.⁷¹
- 2.56 Kāinga Ora has a unique position. As well as being a large-scale social housing developer, it is also the long-term owner of the property and its mandate includes long-term social outcomes.
- 2.57 We understand that, as a result of this, Kāinga Ora is focused on the economic and social benefits of higher-quality homes. For example, in June 2020 Kāinga Ora announced a commitment to build all its new homes to 6 Homestar standard, noting that this means its homes will be built to be warmer, healthier and more efficient for tenants. Māori are specifically considered under the Te Aranga Design Principles which are "... founded on intrinsic Māori cultural values and aim to enhance the mana whenua presence, visibility and participation in urban design". Ta

Consentium "Quality building consent and inspection services" https://www.consentium.co.nz/.

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Te Tūāpapa Kura Kāinga, Ministry of Housing and Urban Development "Kāinga Ora – Homes and Communities Act 2019" https://www.hud.govt.nz/our-work/kainga-ora-homes-and-communities-act-2019/.

In FY 2021/22 Kāinga Ora delivered 1,815 newly built homes with a net increase in public and supported housing of 1,340 dwellings, Kāinga Ora "Te Pūrongo Ā-Tau – Annual Report – 2021/22" available at: https://kaingaora.govt.nz/assets/Publications/Annual-report/Annual-report-2021-22.pdf.

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Kāinga Ora "Healthier homes under Homestar" (9 June 2020) https://kaingaora.govt.nz/news/healthier-homes-under-homestar/. Homestar is a rating tool run by the New Zealand Green Building Council. Its requirements exceed Building Code standards, see discussion in Chapter 9.

Kāinga Ora "Our approach to building" https://kaingaora.govt.nz/developments-and-programmes/our-approach-to-building/.

Homeowners and end consumers

- 2.58 At the end-consumer level, there are homeowners and other end consumers who live in residential buildings. This includes owner-occupiers, landlords and tenants of rental properties.
- 2.59 Preferences of homeowners and other end consumers can influence the types of structures being built and the choice of materials.
- 2.60 Kāinga Ora is a developer and long-term owner of its buildings and is a substantial driver of demand for residential construction. Hapū and iwi are also building large-scale residential developments or working in partnership with other developers.

Regulatory bodies and their roles

- 2.61 MBIE's Building Performance Branch is the building regulator and sets the performance requirements under the Building Code. The performance requirements of the Building Code influence developers' and designers' decisions for building supplies.
- 2.62 BCAs are organisations that are accredited and registered to issue building consents, carry out inspections, and issue compliance certificates. Issuing consents includes an assessment that the building supplies and systems proposed, including how they are to be used, will perform to meet the Building Code.
- 2.63 Standards NZ is an independent unit that sits within MBIE and is responsible for managing the development of standards in New Zealand. As discussed in Chapter 4, standards are agreed specifications for products, processes, services and performance.⁷⁴ Compliance with standards is generally voluntary but can be mandatory when cited in Acts, regulations or other legislative instruments. When adopted by MBIE into Acceptable Solutions or Verification Methods, standards can (among other things) specify the performance standards required of building supplies.
- 2.64 CodeMark is a product certification scheme that provides a pathway for establishing compliance with the Building Code. There are currently four bodies accredited to issue CodeMark certificates in New Zealand, with one based in New Zealand (BRANZ) and the remaining three in Australia.
- 2.65 Building Research Association of New Zealand (BRANZ) is an independent research and testing organisation involved in understanding the design and construction of the built environment in New Zealand. In addition to CodeMark certification, BRANZ has a range of functions, including independent building product testing, assurance and consultancy services, and it undertakes and commissions research (funded by the Building Research Levy).⁷⁵

Standards New Zealand "Explaining standards" https://www.standards.govt.nz/about/explaining-standards/

BRANZ "About BRANZ" https://www.branz.co.nz/about/.

Characteristics of residential building in New Zealand | Ngā āhuatanga o te hanga whare noho i Aotearoa

- 2.66 Some characteristics of residential building in New Zealand have implications for the nature of competition.
- 2.67 New Zealand is a geographically distanced island nation. New Zealand's small market can make it challenging to achieve efficient scale for domestic manufacturing. The combination of a small market size and isolated geographic location (with associated transport costs) can also make it less attractive to import products manufactured overseas, relative to other countries.
- 2.68 The cyclical nature of New Zealand's construction sector has been described as a boom-bust cycle.⁷⁷ This cyclical pattern of expansion and contraction may influence domestic manufacturers' and suppliers' motivations to invest in capacity.⁷⁸
- 2.69 Notable historical events, such as 'leaky homes' and the Christchurch earthquakes in 2010 and 2011, have had significant influences in shaping the building regulatory system as it stands today. ⁷⁹ It seems the regulatory and industry response to leaky homes, in particular, has driven a focus on ensuring the weathertightness and durability of homes, and conservatism in design and consenting that continues today.
- 2.70 Figure 2.4 below shows there has been some growth in larger-scale builders but that the mix of smaller builder size has been broadly similar for the last decade, and feedback we have received indicates there has not been notable industry change since 2012. Figure 2.4 shows that approximately 50% of homes built in 2018 were by builders who constructed fewer than 10 homes per year.

An assessment" (3 August 2022) at [10] and [13].

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Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [24.2].

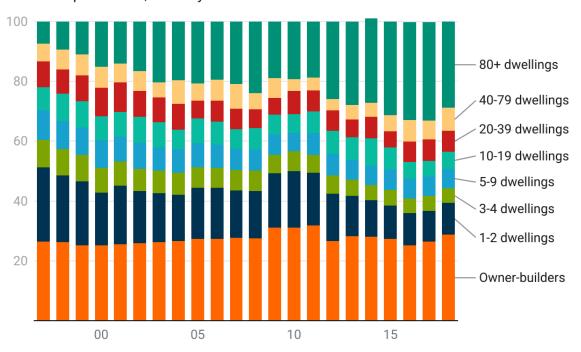
Ministry of Business, Innovation & Employment "New Zealand Sectors Report 2013 – Construction" (November 2013) at 61, available at: https://www.mbie.govt.nz/assets/77439ddc45/Construction-report-2013.pdf; National Association of Steel Framed Housing Inc "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 2.

⁷⁸

John Gardiner "Practical issues with the building regulatory system for suppliers of building products –

Figure 2.4 Market shares by builder size

Consents per annum, March years



Source: Infometrics analysis, BCI New Zealand dataset.80

- 2.71 A number of submitters maintain that New Zealand has a prevalence of, and preference for, bespoke housing, which is reflected in our varied existing housing stock.⁸¹
- 2.72 In 2012 the Productivity Commission described the industry as "a fragmented 'cottage industry' dominated by very small independent builders constructing bespoke homes", and also noted low productivity growth of the industry.⁸²

Gareth Kiernan/Infometrics "Larger firms increase their share of residential building activity" (October 2018), available at: https://www.infometrics.co.nz/article/2018-10-larger-firms-increase-share-residential-building-activity.

[[].

Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [12.1(a)]; HW Richardson Group Ltd "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 4;

New Zealand Productivity Commission - Te Kōmihana Whai Hua o Aotearoa "Housing Affordability" (March 2012) at 8, available at: https://www.productivity.govt.nz/assets/Documents/9c8ef07dc3/Final-report-Housing-affordability.pdf.

- 2.73 While the Productivity Commissions observations about the small business demographic appears still to hold at the time of this study, the number of multi-unit homes has increased significantly since 2012, which indicates some degree of greater standardisation.83,84
- 2.74 Castalia, on behalf of the Affordable Building Coalition (ABC), submitted that a consumer preference for bespoke housing should not be assumed, and that New Zealand currently lacks a low-cost standardised-design house assembly segment of the market.85 We agree that a consumer preference for bespoke housing should not be assumed.

The acute demand and supply chain pressures the industry has faced in recent times | Te kaha o te hiahia me ngā pēhanga whakarato putunga o nā noa nei

- 2.75 An increase in demand for key building supplies, as well as supply chain pressures, has led to supply shortages for some key building supplies during the course of this study (for example, structural timber, plasterboard, and insulation).86
- 2.76 Demand pressures are illustrated by the significant increase in consents for new homes granted since 2020.87 Consents for alterations increased sharply during the same period.88

83 Most construction businesses (97.9 per cent) were small businesses with fewer than 20 employees. Of these, 65 per cent were sole operators with no employees, Ministry of Business, Innovation & Employment "Building and Construction Sector Trends Annual Report 2022" (October 2022) at [3.1.2].

The%20building%20and&text=Activity%20across%20the%20sector%20remained,workforce%20pipeline %20continued%20to%20grow.

85 Castalia on behalf of Affordable Building Coalition "Submission on residential building supplies market study draft report" (1 September 2022) at 11-12.

86 Lawrence Gullery "Builders face 'shortages all over the place' thanks to 'beserk' housing market and Auckland's lockdown" (5 September 2021) https://www.stuff.co.nz/business/property/126289729/builders-face-shortages-all-over-the-placethanks-to-berserk-housing-market-and-aucklands-lockdown.

87 See Figure 2.1 above.

88 2021 saw an 11.7% increase in consents for alterations from 2020, compared with a 2.9% constant annual growth rate for alteration consents for the period 2011-2021, [

⁸⁴ Ministry of Business, Innovation & Employment "Building and Construction Sector Trends Annual Report 2022" (October 2022) at [3.1.4], available at: https://www.mbie.govt.nz/building-andenergy/building/building-system-insights-programme/sector-trends-reporting/building-andconstruction-sector-trends-annualreport/#:~:text=Key%20findings%20from%20the%202022%20report,-

- 2.77 The COVID-19 pandemic has also placed pressures on the residential building supplies industry, among others. As well as the impact of lockdown restrictions in New Zealand, there has been major disruption to global supply chains.⁸⁹
- 2.78 The Government-mandated lockdown periods (including the Alert Level 4 lockdown periods from 25 March 2020, and 17 August 2021) resulted in production outages and loss of production where businesses closed down for prescribed periods.
- 2.79 A survey conducted by the Construction Sector Accord identified two key issues facing the wider construction sector (including residential) in mid-2021 as being:⁹⁰
 - 2.79.1 increases in the price of materials and supplies; and
 - 2.79.2 shortages of materials and supplies, particularly structural and non-structural wood products.
- 2.80 The survey also highlighted that although the COVID-19 pandemic was the main driver of these issues, a large proportion of respondents also viewed it as exacerbating pre-existing issues. Worldwide shipping was commonly identified as being the cause of the issues, followed by delays in manufacturing.
- 2.81 Supply shortages for specific key building supplies can impact the entire construction process and those working in it. For example, payments to builders for construction work are often based on hitting key milestones (for example, internal wall lining), which may cause flow-on disruptions for other industry participants.
- 2.82 This means that acute supply shortages for some key building supplies delay builders achieving key milestones and this in turn delays payment and may impact project cash flow, and in some cases, financial viability. If a milestone cannot be completed on schedule, completion of the build may be delayed, which may also cause flow-on disruptions for other industry participants. Similarly, homeowners may be affected if the project is delayed or if the builder fails financially while the project is incomplete.⁹¹

Ministry of Business, Innovation & Employment "Building and Construction Sector Trends Annual Report 2022" (October 2022) at 8-9, available at: <a href="https://www.mbie.govt.nz/building-and-energy/building/building-system-insights-programme/sector-trends-reporting/building-and-construction-sector-trends-annual-report/#:~:text=Key%20findings%20from%20the%202022%20report,-

The%20building%20and&text=Activity%20across%20the%20sector%20remained,workforce%20pipeline %20continued%20to%20grow.

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Construction Sector Accord "Construction Sector Accord supply chain research issued" (21 September 2021), available at: https://www.constructionaccord.nz/news/news-stories/construction-sector-accord-supply-chain-research-issued/.

- 2.83 The rising cost of building supplies and supply chain pressures that have been present over the course of this study have been well publicised in the media. 92 Such conditions are not conducive to good consumer outcomes. They can also expose areas of fragility in supply chains. For example, the Alert Level 4 lockdowns appear to have revealed building industry supply chain dependency on a small number of suppliers in Auckland, as well as the industry's exposure to shortages in key building supplies such as plasterboard and structural timber.
- 2.84 Demand appears to have eased slightly since May 2022, with monthly consents for new homes beginning to reduce, and long-term forecasts for residential construction activity also dropping. 93, 94, 95
- 2.85 Supply and demand for plasterboard and structural timber are reported to be coming back into better balance. This does not mean that the challenging times for the building industry are over. It appears that some of the impacts of global supply constraints and rising cost of input materials for suppliers are still being felt.⁹⁶
- 2.86 We agree with the observations of the International Competition Network (ICN) in a recently published Steering Group statement on the role of competition and competition policy in times of economic crisis. ⁹⁷ In particular, competitive markets are more flexible and resilient, and respond faster and more effectively to economic disruptions. They promote economic growth and innovation in the long run. Conversely, markets become more fragile and face a significantly higher risk of systemic failure when they are consolidated and less competitive. Open and competitive markets add resilience to respond to changes in supply chains.

For example, increasing costs and material shortages are impacting construction firms, Geraden Cann "Construction 'probably entering bust cycle' with 92 companies liquidated this year" (29 May 2022) https://www.stuff.co.nz/business/128740312/construction-probably-entering-bust-cycle-with-92-companies-liquidated-this-year.

BRANZ and Pacifecon National Construction Pipeline Report 2022 (July 2022) at [3.1]-[3.3], available at: https://www.pacifecon.co.nz/pipeline/index.aspx; [].

Tina Morrison "Fletcher Building plans to increase Gib price by 15.4%" (5 November 2022) https://www.stuff.co.nz/business/130387061/fletcher-building-plans-to-increase-gib-price-by-154.

⁹³ As identified in Figure 2.1 above.

lt appears that supply issues impacting the market look to be stabilising. EBOSS "Q3 2022 Construction Supply Chain Report (August 2022), available at: https://www.eboss.co.nz/construction-supply-chain-report/q3-2022; The market for plasterboard appears to be moving to more 'normalised' levels of demand, Tina Morrison "Plasterboard coming back into balance after step up in manufacturing, imports" (8 October 2022) https://www.stuff.co.nz/business/129975853/plasterboard-coming-back-into-balance-after-step-up-in-manufacturing-imports">https://www.stuff.co.nz/business/129975853/plasterboard-coming-back-into-balance-after-step-up-in-manufacturing-imports.

⁹⁷ ICN "ICN Steering Group Statement: The Role of Competition & Competition Policy in Times of Economic Crisis" at 3, available at: https://www.internationalcompetitionnetwork.org/wp-content/uploads/2022/10/SG Statement-Role-of-Competition-in-Times-of-Economic-Crisis-2022.pdf.

2.87 We also note that the Government has asked the Productivity Commission to hold an inquiry into the resilience of the New Zealand economy to supply chain disruptions. The inquiry will explore how New Zealand can build its economic resilience, with a particular focus on competition, diversification, substitution, innovation, and economic geography. The Productivity Commission's inquiry may provide insights for the building supplies industry, in addition to those from a competition perspective in this study.

Climate change and implications for the future of building supplies | Te panoni āhuarangi me ōna pānga ki te anamata o ngā putunga hanga whare

- 2.88 Government policy to address climate change will make it increasingly important for residential housing (building structures and materials, and the construction process itself) to be sustainable and to limit carbon emissions, as part of reducing the emissions contribution of the construction industry as a whole.
- 2.89 It is also becoming more important for residential housing to be resilient to withstand the effects of the changing climate. This is likely to include higher temperatures, rising sea levels, more frequent extreme weather events, and changes in rainfall patterns.¹⁰⁰
- 2.90 Building for Climate Change (BfCC) is a long-term programme run by MBIE to reduce emissions from constructing and operating buildings, and to make sure buildings are prepared for the future effects of climate change. BfCC is likely to require the introduction of new or innovative 'green' building supplies as a key pathway to reducing the carbon footprint of residential housing.
- 2.91 Other programmes that promote low emissions buildings include:
 - 2.91.1 Homestar, an independent rating tool for assessing the health, efficiency, and sustainability of homes. Homestar is operated by the New Zealand Green Building Council; and
 - 2.91.2 Healthy Homes standards, which require specific and minimum standards for heating, insulation, ventilation, moisture and drainage, and draught stopping in rental properties.
- 2.92 Chapter 9 discusses new or innovative building materials, including 'green' building supplies.

Hon Grant Robertson "NZ's resilience to supply chain disruptions to be investigated" (8 November 2022) https://www.beehive.govt.nz/release/nz%E2%80%99s-resilience-supply-chain-disruptions-be-investigated.

New Zealand Productivity Commission - Te Kōmihana Whai Hua o Aotearoa "Productivity Commission investigating NZ's economic resilience to supply chain disruptions" (8 November 2022") https://www.productivity.govt.nz/news/productivity-commission-investigating-nzs-economic-resilience-to-supply-chain-disruptions/.

Ministry of Business, Innovation & Employment "Building and Construction Sector Trends – Annual Report" (29 September 2021) at 5, available at: https://www.mbie.govt.nz/dmsdocument/16973-building-andconstruction-sector-trends-annual-report-2021-pdf.

Legislative reform and other policy processes | Te whakahou ture me ētahi atu tukanga kaupapa here

- 2.93 Chapter 4 outlines the ongoing legislative reform and other policy processes that have been underway during this market study and are ongoing.
- 2.94 The most significant of these is the Government's Building System Legislative Reform Programme, being conducted by MBIE.
- 2.95 Phase 1 is nearing completion. The Building (Building Products and Methods,
 Modular Components, and Other Matters) Amendment Bill received Royal Assent on
 7 June 2021. This amendment legislation is accompanied by a set of new regulations that address policy issues identified by MBIE. They are:
 - 2.95.1 regulations relating to new minimum product information requirements which will commence on 11 December 2023; and
 - 2.95.2 regulations relating to a new Modular Components scheme (named 'BuiltReady') and strengthening of CodeMark. 101
- 2.96 In June 2022, MBIE implemented a range of actions to address the plasterboard shortage, including releasing guidance for:¹⁰²
 - 2.96.1 designers, contractors and building owners regarding using building products different to those originally specified; and
 - 2.96.2 BCAs on how to manage product substitution.
- 2.97 On 21 June 2022, the Minister of Building and Construction announced the establishment of a Ministerial Taskforce to look at what can be done to ease plasterboard shortages. 103
- 2.98 On 21 July 2022, MBIE commenced consultation on a review of the building consent system (Consent Review), releasing an issues discussion document.¹⁰⁴

Building Performance "About BuiltReady" https://www.building.govt.nz/building-code-compliance/product-assurance-and-certification-schemes/builtready/about-builtready/.

Building Performance "Plasterboard substitution in Aotearoa New Zealand"

https://www.building.govt.nz/projects-and-consents/build-to-the-consent/making-changes-to-your-plans/plasterboard-substitution-in-aotearoa-new-zealand/.

Hon Dr Megan Woods "Plasterboard taskforce set up to ease shortages" (21 June 2022) https://www.beehive.govt.nz/release/plasterboard-taskforce-set-ease-shortages.

Ministry of Business, Innovation & Employment "Issues discussion document: Review of the building consent system" (21 July 2022), available at: https://www.mbie.govt.nz/have-your-say/building-consent-system-review/.

- 2.99 The Consent Review will consider all elements of the building consent system, starting from the point at which buildings are procured and designed. These elements are identified by MBIE as:
 - 2.99.1 institutions how the regulatory regime is structured;
 - 2.99.2 practice how regulation is implemented; and
 - 2.99.3 system management how the building regulatory system is managed.
- 2.100 MBIE intends to report back on this review in 2023, enabling consideration of the findings of this study in that process.
- 2.101 Certain other policy initiatives that have some relevance to our study include Rautaki Hanganga o Aotearoa New Zealand's Infrastructure Strategy 2022-2052, and Aotearoa New Zealand's First Emissions Reduction Plan. 105, 106 We discuss the relevance of these initiatives in Chapter 9.
- 2.102 Most recently, in November 2022 the Government announced that it has:
 - 2.102.1 established a Critical Materials Taskforce, which is intended to monitor emerging supply chain risks and to provide guidance, advice, data and information to inform MBIE's Critical Materials and Products Work Programme;¹⁰⁷ and
 - 2.102.2 asked the Productivity Commission to hold an inquiry into the resilience of the New Zealand economy to supply chain disruptions, as noted above.

Te Waihanga, New Zealand Infrastructure Commission "Rautaki Hanganga o Aotearoa – New Zealand Infrastructure Strategy 2022-2052" (2022), available at: https://strategy.tewaihanga.govt.nz/strategy.

Ministry for the Environment, Manatū Mō Te Taiao "Emissions reduction plan" (16 May 2022), available at: https://environment.govt.nz/what-government-is-doing/areas-of-work/climate-change/emissions-reduction-plan/.

Hon Dr Megan Woods "Taskforce set up to protect construction industry from product shortages & delays" (24 November 2022) https://www.beehive.govt.nz/release/taskforce-set-protect-construction-industry-product-shortages-delays.

Chapter 3 Themes of our Māori stakeholder engagement | Ngā kaupapa o ngā hui me ngā kaiwhaipānga Māori

Summary of findings

- Our engagements with Māori in this study are important to give proper effect to
 Treaty obligations and to ensure that Māori needs and priorities are properly heard,
 understood and addressed to support them to achieve their aspirations within the
 sector. We expect that supporting Māori in this way will also support improved
 competition more broadly.
- Treaty obligations require the challenges in residential construction to be addressed.
- Māori are active participants across the industry.
- Māori experience challenges with the building regulatory system and the consenting process, some of which are shared with other submitters and some of which reflect needs and aspirations that are unique to Māori.
- Strong relationships are critical and are particularly important to Māori.
- Support is needed to grow capability and capacity among the Māori workforce and among Māori businesses.
- There are challenges in delivering better housing outcomes for Māori. Although improvement of housing outcomes generally falls outside the scope of this study, we consider that addressing the issues identified, and improving competition, can contribute to this goal.

Introduction | Kupu whakataki

- 3.1 This chapter describes the key themes arising from our engagement through this study with Māori stakeholders.
- 3.2 Chapter 1 sets out our commitment to engaging with Māori and supporting future-focused Māori-Crown relationships, through taking a good-faith, collaborative approach to engaging with Māori, and our commitment to better understanding, and better reflecting, Māori perspectives in our work. We also acknowledge the important role mātauranga Māori has in finding solutions to challenges.¹⁰⁸
- 3.3 To follow through on that commitment in this study, we hosted a hui Māori in May 2022 as part of our work towards the draft report. A detailed summary of the key themes from the hui can be found in *He Kohinga Kōrero*, which we published alongside the draft report. 109

See paragraphs 1.60 to 1.68 above.

Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies

Market Study - Summary of key themes" (4 August 2022).

- 3.4 We also dedicated a session at the consultation conference, held following the release of the draft report, to hearing from Māori. 110
- 3.5 We would like to thank those who took the time to contribute to this aspect of the study, whether through attending the hui or the Māori caucus session at the consultation conference, making a written submission, or speaking with our project team.
- These engagements are important to give proper effect to Treaty obligations and to ensure that Māori needs and priorities are properly heard, understood and addressed to support them to achieve their aspirations within the sector. We expect that supporting Māori in this way will also support improved competition more broadly.
- 3.7 The interested parties who engaged with us described uniquely Māori experiences of the building regulatory system and some uniquely Māori priorities for building. Other issues described were common across the industry, affecting Māori and non-Māori similarly.
- 3.8 The key themes to emerge and which we cover in this chapter are:
 - 3.8.1 Treaty obligations require the challenges in residential construction to be addressed;
 - 3.8.2 Māori are active participants across the industry;
 - 3.8.3 Māori experience challenges with the building regulatory system and the consenting process, some of which are shared with other submitters and some of which reflect needs and aspirations that are unique to Māori;
 - 3.8.4 strong relationships are critical and are particularly important to Māori;
 - 3.8.5 support is needed to grow capability and capacity among the Māori workforce and among Māori businesses; and
 - 3.8.6 there are challenges in delivering better housing outcomes for Māori.

Treaty obligations require the challenges in residential construction to be addressed | E ai ki ngā takohanga ā-tiriti me whai ki te whakatau i ngā wero i roto i te hanganga whare noho

3.9 We heard and acknowledge that Treaty obligations, across government, require the challenges in the residential construction sector to be addressed, and central to this is enabling Māori to do things for themselves.¹¹¹

111 Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 2.

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022).

- 3.10 We heard that there has been an historic failure to involve Māori in decision-making and Treaty obligations have not been adequately prioritised. It was also emphasised that optimal outcomes require a co-ordinated, whole of government approach, working together with Māori. We heard that, at times, there is unnecessary duplication of effort. Working independently risks depriving some initiatives of the scale that they need to be effective. It
- 3.11 One participant noted that there was a need to challenge councils to take action to deal with Māori in accordance with their Treaty obligations, including relationship building with Māori to support issues when they arise.¹¹⁵

Māori are active participants across the industry | He kaha tonu te kuhu a te Māori i a ia anō puta noa te motu

- 3.12 Māori are active participants across the construction industry: significantly represented in the labour component of the industry, but also as major residential developers and landlords, and Māori-owned SME building companies are active throughout New Zealand. Māori are also involved in building design and distribution, and interested in 'green' building supplies and opportunities in OSM. However, Māori appear to be comparatively under-represented in sector leadership, for example, at the decision-making and Board level, and it appears difficult to identify and access opportunities for leadership. 118
- 3.13 We outline this involvement in more detail in Chapter 2 and we discuss below the ways in which Māori participation in and significance to the industry could be better supported in a number of ways.

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National Māori Authority "Submission on residential building supplies market study draft report" (31 August 2022) at 2 and 6.

National Māori Authority "Submission on residential building supplies market study draft report" (31 August 2022) at 4 and 6; Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [943]-[962]; National Māori Authority "Cross-submission on residential building supplies market study draft report" (13 October 2022) at 3.

Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [3870]-[3882]; Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [223]-[229]; National Māori Authority "Crosssubmission on residential building supplies market study draft report" (13 October 2022) at 1.

¹¹⁵ Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 6.

See above at paragraphs 2.14 and 2.16-2.17.

National Māori Authority "Submission on residential building supplies market study draft report" (31 August 2022) at 5; Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [344]-[369].

See above at paragraph 2.15.

There are challenges with the building regulatory system and the consenting process | Inā te kaha o ngā wero i te pūnaha ture hanga whare me te tukanga whakaaetanga

51

- 3.14 Māori experience challenges with the consenting process, rising building costs, and supply chain disruption. Some of these issues reflect a shared experience with other participants in the building regulatory system. Some reflect a uniquely Māori perspective.
- 3.15 We heard that BCAs are restrictive in what they consent and what they do not consent. Examples of issues experienced and shared with other submitters to this study include that building consents can be costly and take a long time to issue; that there are differences in interpretation between BCAs and between individual consent officers of a BCA; and that some consent officers do not understand the trade, which can lead to unnecessary increased costs. 119
- 3.16 We also heard that Māori can find it difficult engaging and communicating with BCAs and that while Māori may prefer to communicate through conversation rather than "by email", councils tend to require that most communication be in writing. This point is related to one that follows about the importance of fostering strong working relationships.
- 3.17 Māori also described some consenting challenges associated with building papakāinga on communally owned Māori land, which includes requirements for houses to be relocatable (limiting options for building supplies), as well as difficulties in raising finance (currently only one bank finances the papakāinga model).^{121, 122}
- 3.18 In addition, some Māori told us their views have not been heard through Resource Management Act and Council spatial planning processes, with an example given that some councils have not listened to Māori perspectives relating to issues such as Māori land ownership and the importance to Māori of developments having a community focus. While not all of these issues fall within the scope of this study, some of the challenges that Māori face within the building regulatory system appear unique to Māori and others have impacts for Māori that differ from the impacts experienced by others.

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¹¹⁹ Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 4-5.

Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 4.

¹²¹ Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 5.

Te Puni Kōkiri, the Ministry of Māori Development "Supporting new homes and papakāinga" (21 September 2022) https://www.tpk.govt.nz/en/nga-putea-me-nga-ratonga/maori-housing-support/supporting-new-homes-and-papakainga.

Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 5.

Strong relationships are critical and are particularly important to Māori | He mea nui whakahirahira ngā tūhononga ki te Māori

52

- 3.19 Fostering strong relationships is critical and we heard how important this is for Māori. As noted above, Māori relationships with government actors need to be strengthened to give effect to Treaty obligations. A number of other relationships in the building industry also could be strengthened.
- 3.20 For example, strong relationships between BCAs and builders from the outset of projects were emphasised as critical to ensuring projects can be completed on time and in accordance with the Building Code. They may also make it easier to communicate, understand and find solutions for any bespoke building needs.
- 3.21 We heard that some BCAs and Māori organisations are already making concerted efforts to build strong relationships, with successful results. It was considered that reductions in project risk and consent failure rates could be achieved where relationships are prioritised through, for example, face-to-face discussions with BCAs at planning stages of building projects. 125
- 3.22 Additionally, we heard that there is a need to develop stronger relationships both among BCAs and between BCAs and Māori.
- 3.23 We heard that specifically in relation to Māori, BCAs could benefit from a stronger focus on incorporating a Te Ao Māori viewpoint in their work and establishing appropriate relationships to assist with doing so.¹²⁶
- 3.24 The National Māori Authority's submission suggested that this needs to go further, with Māori having a voice and influence in the consenting design process on issues such as which products are approved for use and, more broadly, which products enter New Zealand.¹²⁷
- 3.25 Other significant relationships were identified as important at a business-to-business level.
- 3.26 We heard the importance of developing a strong network of Māori businesses. With many Māori businesses in the industry being small-to-medium enterprises, attaining expertise also necessitates working alongside non-Māori businesses.

See paragraph 3.9 above. See also: Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [610]-[651], [687]-[691], [761-764] and [826]-[829].

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [590]-[635].

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [771]-[775] and [884]-[904].

National Māori Authority "Cross-submission on residential building supplies market study draft report" (13 October 2022) at 1-2.

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [912]-[917].

- 3.27 One suggestion for improvement was to facilitate knowledge transfer through tender allocations (whether through public or private procurement), with a certain percentage of the work awarded to Māori businesses on large build projects, working alongside the lead contractor. This would assist in developing skills, experience and track record in large-scale projects and, over time, assist Māori businesses in growing scale.
- 3.28 We heard that relationships need cultivating in order for Māori businesses to be able to compete effectively with the incumbents.¹³⁰
- 3.29 We note and agree with the observations made about the importance of fostering strong relationships. This has relevance to competition for key building supplies particularly where it relates to the building consent process, and to assisting Māori businesses to grow scale.
- 3.30 We therefore support the direction of MBIE's review of the building consent system to address any barriers to Māori in determining and fulfilling their own social, cultural and economic aspirations.¹³¹

Support is needed to grow capability and capacity | Mā te whai tautoko e piki ai te āheinga me te rauhanga

- 3.31 The importance of fostering strong relationships is connected with a further key theme, which is that support is needed to assist Māori in the sector to build capability and capacity to realise their aspirations.
- 3.32 Participants in our hui told us that Māori are significantly represented in the labour component of the industry, but there is very little representation at the decision-making and Board level and few pathways into those roles. We heard examples of how this affects outcomes for Māori involved in the building industry. 133

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [1072]-[1111] and [1126]-[1138].

Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 9-10; Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [967]-[1084];

Ministry of Business, Innovation & Employment "Issues discussion document: Review of the building consent system" (21 July 2022) at 36, available at: https://www.mbie.govt.nz/have-your-say/building-consent-system-review/.

See also: Ministry of Business, Innovation & Employment "Māori in the Labour Market –

December 2020 Quarter (unadjusted)", available at: https://www.mbie.govt.nz/dmsdocument/13559-maori-in-the-labour-market-december-2020-quarter-unadjusted/.

Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022).

- 3.33 We heard that Māori are interested in being involved, including as business owners, at all levels of the supply chain for residential building supplies. We also heard about the opportunities that Māori see in encouraging uptake of new building methods and products, and particularly in developing scale in respect of these. There was reference to the government's procurement policy, through which mandated agencies have a target of 5 per cent of contracts being awarded to Māori businesses. 136
- 3.34 We heard that in some instances, support will be required to upskill and upscale to access these opportunities.¹³⁷ For example, government agencies seek to contract with Māori businesses in part because of procurement policies. However, we were told that many Māori businesses are not currently able to profit from these opportunities because they do not possess the requisite expertise to participate in procurement processes (for example, with pricing and tendering for larger-scale building projects).¹³⁸
- 3.35 Interested parties highlighted a number of industry-led initiatives that appear particularly promising in working towards realising these aspirations:
 - 3.35.1 The initiatives supported by the Construction Sector Accord and its Māori advisory group, Kōtuiā te hono. 139

Specifically in relation to Māori, the Accord is working to develop Māori end-to-end supply chains, grow Māori SME capability (including to equip more Māori SMEs to tender for larger and more complex work), support a construction mentorship programme for Māori and explore procurement options such as establishing Māori procurement panels.¹⁴⁰

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at 7-12.

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [230]-[234] and [365]-[369].

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [929]-[933]; Te Puni Kōkiri, the Ministry of Māori Development "Progressive Procurement" https://www.tpk.govt.nz/en/a-matou-whakaarotau/maori-economic-resilience/progressive-procurement.

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [457]-[466].

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [967]-[1041].

Construction Sector Accord "New operating model for Construction Accord" (2 August 2022) https://www.constructionaccord.nz/news/news-stories/new-operating-model-for-constructionaccord/.

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [905]-[939]; Construction Sector Accord "Construction Sector Transformation Plan: 2022-2025" (July 2022) at 25, available at: https://www.constructionaccord.nz/transformation-plan/.

3.35.2 Platforms such as Amotai, originally developed by Auckland Council. 141

Amotai is a supplier diversity intermediary that, using its database, connects Māori and Pasifika-owned businesses with buyers wanting to purchase goods, services and works. It also supports those buyers to better engage with Māori and Pasifika-owned businesses. We heard that such databases are both useful for diversifying procurement and can assist at a broader level by facilitating consultation with Māori working in various industries. 143

3.35.3 The BRANZ-developed Artisan platform.

This has the potential to improve outcomes for those living and working in more remote locations, such as rural areas where Māori disproportionately live. 144 Artisan is a digital solution which enables remote inspections. A consented project is set up by a BCA in Artisan with a "shot" specific to each build stage check. Builders and subcontractors take photos and videos on Artisan, whereupon inspectors can review, communicate with the build team and sign off work virtually. 145

3.36 We acknowledge that this work is underway and support its expansion as a means of enhancing Māori capacity and capability in the sector. We expect that this will have flow-on effects for competition for key building supplies.

Challenges in delivering better housing outcomes for Māori | Ngā wero o te tuku huanga whare noho pai ake mō te Māori

- 3.37 Some broader themes relating to improving housing for Māori were also raised in our engagement with Māori stakeholders. Improvement of housing outcomes generally falls outside the scope of this study. However, we consider that addressing those issues identified above, and improving competition, can contribute to this goal.
- 3.38 The supply of housing stock to regional and rural areas was raised as an important issue needing further focus. This is because Māori have a higher proportion of the population living in small urban areas (14.7% of the Māori population) and rural areas (18.0%), compared with the total population (10.0% and 16.3% respectively). 146

Amotai "Our Founding Story" https://amotai.nz/news/our-founding-story.

Amotai "About Amotai" https://amotai.nz/about.

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [927]-[962].

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [792]-[817].

BRANZ "Artisan" https://www.branzartisan.nz.

Environmental Health Intelligence New Zealand "Urban-rural profile" https://www.ehinz.ac.nz/indicators/population-vulnerability/urbanrural-profile/.

- 3.39 Challenges identified included the cost of transport, frequency of supply, and limited competition (often a single supplier that controls the market), leading to higher costs. Developing OSM at scale and transporting it to the regions was regarded as a promising solution.¹⁴⁷
- 3.40 We note, at a government level, the work of HUD and MAIHI Ka Ora the National Māori Housing Strategy, which was co-developed by the Crown and Māori. 148 This strategy is described as "elevat[ing] the Māori and Iwi Housing Innovation (MAIHI) Framework for Action [and] providing a strategic direction that puts Māori at the heart of Aotearoa New Zealand's housing system". 149
- 3.41 Alongside this is the MAIHI Ka Ora Implementation Plan, which sets out specific plans for 2021–2024. MAIHI Ka Ora is primarily focused on the delivery of better housing outcomes for Māori as end users—it aims for the Crown and Māori to work together in genuine partnership towards a shared vision that "all whānau have safe, healthy, affordable homes with secure tenure, across the Māori housing continuum". 151
- 3.42 In pursuing this aim there is significant scope for growth for Māori businesses throughout the supply chain. For example, the strategy's prioritisation of Māori-led local solutions necessitates empowering iwi and hapū. These groups would in turn be well-placed to identify local Māori businesses that could deliver the projects required.
- 3.43 A recent development relating to OSM is the partnership between HUD and Toitū Tairāwhiti through the Whai Kāinga Whai Oranga programme, which recently opened the new Toitū Tairāwhiti BuiltSmart OSM facility in Gisborne. BuiltSmart creates completely finished houses to be transported elsewhere. This type of partnering and co-investment in innovative solutions has the potential, over time, to transform the industry as well as delivering real housing solutions and tangible benefits for Māori.

Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [514]-[543].

In particular, by HUD in partnership with Te Puni Kōkiri, the Ministry of Māori Development.

Te Tūāpapa Kura Kāinga, Ministry of Housing and Urban Development "MAIHI Ka Ora – the National Māori Housing Strategy" https://www.hud.govt.nz/our-work/maihi-ka-ora-the-national-maori-housing-strategy.

Te Tūāpapa Kura Kāinga, Ministry of Housing and Urban Development "MAIHI Ka Ora: The National Māori Housing Strategy – Implementation Plan" (11 March 2022), available at: https://www.hud.govt.nz/documents/new-t17-document-page-6/.

Te Tūāpapa Kura Kāinga, Ministry of Housing and Urban Development "MAIHI Ka Ora: The National Māori Housing Strategy" (2021) at 3, available at: https://www.hud.govt.nz/documents/new-t17-document-page-5/.

Te Tūāpapa Kura Kāinga, Ministry of Housing and Urban Development "MAIHI Ka Ora: The National Māori Housing Strategy" (2021) at 15, available at: https://www.hud.govt.nz/documents/new-t17-document-page-5/.

Megan Woods and Peeni Henare "Government partners with Toitū Tairāwhiti to deliver up to 150 new homes for whānau" (11 May 2022), available at: https://www.beehive.govt.nz/release/government-partners-toit%C5%AB-tair%C4%81whiti-deliver-150-new-homes-wh%C4%81nau; Stuart Nash and Peeni Henare "Toitū Builtsmart to deliver homes and jobs to Tairāwhiti" (28 October 2022), available at: https://www.beehive.govt.nz/release/toit%C5%AB-builtsmart-deliver-homes-and-jobs-tair%C4%81whiti.

3.44 Initiatives such as this may also help to meet concerns expressed by the National Māori Authority that government processes are slow to adapt and to adopt innovation, such as that offered by mātauranga Māori. 154 It said further that there are a range of disruptive practices available that could open the door to substitute products. 155 In its view, there is also a need for funding for Māori research projects, to be led by Māori. 156

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National Māori Authority "Submission on residential building supplies market study draft report" (31 August 2022) at 3-6.

National Māori Authority "Submission on residential building supplies market study draft report" (31 August 2022) at 5-6.

National Māori Authority "Cross-submission on residential building supplies market study draft report" (13 October 2022) at 3.

Chapter 4 Building regulatory system | Pūnaha ture hanga whare

Summary of findings

- The building regulatory system is making it difficult for competing suppliers of key
 building supplies to enter the New Zealand market and expand their businesses.
 Despite the flexibility that is available in the system to use and adopt new products, it
 is too slow, costly and uncertain to get them accepted for general use. This is due to
 the combined effect of:
 - the way the building regulatory system (comprising the Building Act and various related instruments and processes, most relevantly the Building Code, the processes and methods that facilitate or that can be used to demonstrate compliance with the Building Code and the consenting system) is applied to building products; and
 - the decision-making behaviours of designers, builders, BCAs and government agencies in response to and in applying the different elements of the building regulatory system.
- The Building Code and associated instruments and processes are complex to navigate. The Building Code uses qualitative words and phrases to set performance criteria for building work and for building products. Establishing what the qualitative words and phrases mean in practice generally involves starting with the Standards currently referenced in Acceptable Solutions and Verification Methods. It is those Standards that are generally used to establish the required performance criteria for products. These compliance pathways for building products (ie, through Acceptable Solutions and Verification Methods, and referenced Standards) are narrow and there are few 'streamlined' processes.
- These pathways have their origins in the National Standards under the Building Act 1991 and, while they are not the only means of complying with the Building Code, they have become embedded as "how we build here". These compliance pathways have not been expanded to keep pace with contemporary building practices or the development of new products, limiting the potential for competition from alternative, new or innovative building supplies.
- The building regulatory system does not enable timely response to changing markets and innovations in building products. It continues to incentivise designers, builders and BCAs to favour familiar building products over new or competing products.
- The practice of designers specifying products by brand in building plans and consent applications and the perceived difficulty and cost of product substitution incentivises builders to continue to use the specified brands.
- The building regulatory system is complex to navigate making it difficult for product suppliers and designers to find useful information about new or innovative products that will help them to assess whether products would be compliant with the Building Code.

Introduction | Kupu whakataki

4.1 This chapter discusses the core elements of the building regulatory system that apply to building products. 157 It considers whether features of the current building regulatory system, and their application in practice, inhibit entry or expansion in the markets for key building supplies.

4.2 The topics covered are:

- 4.2.1 the key elements of the building regulatory system;
- 4.2.2 the ways in which the elements of the building regulatory system may be acting as barriers to entry and expansion in the markets for key building supplies; and
- 4.2.3 the building system law reforms.
- 4.3 This chapter focuses specifically on the regulation of building materials within the context of the building regulatory system. It does not cover regulations that may impede competition for key building supplies that are outside this scope such as anti-dumping legislation, the New Zealand Emissions Trading Scheme (ETS), obtaining resource consents, and approvals from the Overseas Investment Office for certain capital investments. Where relevant these matters are discussed elsewhere in our draft report.¹⁵⁸
- 4.4 It also does not specifically cover impediments to the entry of 'new or innovative' building supplies, such as 'green' building supplies or novel prefabricated products although the general observations we make in this chapter would apply equally to these products. Matters specific to those building supplies are separately discussed in Chapter 9.

The key elements of the building regulatory system | Ngā āhuatanga matua o te pūnaha ture hanga whare

Purpose of this section

4.5 This section describes the key elements of the building regulatory system and how they fit together.

The building regulatory system discussed in this chapter applies to all building products when they are used in building work. As described in paragraphs 2.23 and 2.24 above, key building supplies are a subset of all building supplies used for residential building. We use the term building regulatory system to refer to a single broad reaching regulatory system incorporating various elements or subsystems.

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For example, the ETS is discussed in paragraphs C69 to C77 below.

- 4.6 The key elements of the building regulatory system for purposes of this report include the Building Act 2004 as amended (Building Act) and various related instruments and processes, including:
 - 4.6.1 the Building Code which sets out the performance criteria that all new building work must meet;¹⁵⁹
 - 4.6.2 the non-mandatory means of demonstrating compliance with the Building Code which are determined by MBIE, being Acceptable Solutions and Verification Methods;¹⁶⁰
 - 4.6.3 the standards made by Standards New Zealand or other accredited bodies (Standards), some of which are cited by MBIE in Acceptable Solutions and Verification Methods;
 - 4.6.4 the other means of demonstrating compliance with the Building Code including product certification and Alternative Solutions; and
 - 4.6.5 the consenting system which includes the building consent processes that are run by BCAs usually territorial authorities (Tas) which include city and district councils.
- 4.7 These elements and the agencies with key roles relating to these elements are discussed in more detail below.

Overview of the Building Act, Building Code and key agencies

Objectives of the Building Act and Building Code

- 4.8 The regulation of all building in New Zealand sits under a framework consisting of:
 - 4.8.1 the Building Act;
 - 4.8.2 Building Regulations (other than the Building Code); and
 - 4.8.3 the Building Code (also a Building Regulation).
- 4.9 The Building Act provides for the regulation of buildings, building work and various occupational groups in the building industry, and the setting of requirements and standards that are intended to ensure good building performance. A key focus of the Building Act is the health and safety of people using buildings.

These are non-mandatory as other methods to demonstrate compliance are also available.

Section 16 of the Building Act.

In the Building Act, "building work" is defined as "work for, or in connection with, the construction, alteration, demolition or removal of a building; and on an allotment that is likely to affect the extent to which an existing building on that allotment complies with the Code and includes sitework and design work that is restricted building work".

- 4.10 The Building Act was also amended recently by the Building (Building Products and Methods, Modular Components, and Other Matters) Amendment Act 2021 (Building Amendment Act 2021), which amongst other matters provides for a streamlined framework for consenting structures built offsite.
- 4.11 Building Regulations (other than the Building Code) cover matters such as prescribed forms, lists of specified systems, defined terms, and rates of levies and fees which are largely irrelevant for purposes of this report. However, they also include some relevant regulations such as those setting out the criteria for accreditation as a product certification body or as a BCA.
- 4.12 The Building Code sets performance criteria that all new building work must meet, and covers aspects of building such as stability, protection from fire, access, moisture, safety of users, services and facilities, and energy. The Building Code focuses on how a building must perform in its intended use rather than specifying the building method or building products that must be used. To this end, when regulating 'building work' the Building Act indirectly regulates the products that are used in the building work, but does not prescribe how work should be done and contains no prescriptive requirements stipulating that certain products should be used. 163, 164
- 4.13 Compliance with the Building Act and with the Building Code can be demonstrated through a range of compliance pathways, which we discuss later in this chapter.
- 4.14 Published Standards also have a role to play in compliance pathways. Where they are developed by Standards New Zealand (Standards NZ) their development in New Zealand is governed by the Standards and Accreditation Act 2015. A key purpose of the Standards and Accreditation Act is to provide for Standards that are consistent with international practice, that facilitate trade, and protect the health, safety and wellbeing of individuals.
- 4.15 The core policy objectives reflected in each of these legislated components of the building regulatory system are to ensure that homes and buildings are safe, healthy, and durable, while still allowing for innovation in building work (and by implication the products used in building construction).

The Building Code is contained in the Building Regulations 1992 which continue to apply through the Building (Forms) Regulation 2004 despite the repeal of the Building Act 1991.

This includes design work to the extent that the design work is restricted building work as set out in the Building (Definition of Restricted Building Work) Order 2011. The Order defines restricted building work as including design work that is related to a building's structure, weathertightness or fire safety systems. The definition of restricted building work for design only applies to residential buildings and small-to-medium apartment buildings.

As discussed later in the chapter, the Building Act specifically regulates building products via the (voluntary) product certification scheme and the (soon to be mandatory) building product information requirements.

Central Regulator (Ministry of Business, Innovation & Employment), Standards NZ and Building Consent Authorities

- 4.16 The key agencies with roles related to the Building Act, the Building Code, and the processes and methods that facilitate or that can be used to demonstrate compliance with the Building Code are MBIE, including its Building Systems Performance branch (which manages the NZ building laws and regulations that protect public safety and property), its Building and Tenancy Branch, Standards NZ, and BCAs.¹⁶⁵
- 4.17 MBIE's Building Systems Performance branch is the steward of New Zealand's building and construction regulatory system with its work including the following:
 - 4.17.1 overall management and monitoring of the system that regulates building work;
 - 4.17.2 setting performance requirements in the Building Code;
 - 4.17.3 producing documents and guidance on ways to comply with the requirements in the Building Code (including Acceptable Solutions and Verification Methods); and
 - 4.17.4 monitoring the performance of BCAs in relation to building work.
- 4.18 Standards NZ is an independent unit that sits within MBIE. It is responsible for managing the development of, and providing access to, Standards in New Zealand. It was established in 1932, following the Napier earthquake, to develop Building Standards. Today, its role includes:
 - 4.18.1 Standards development and Standards update processes in New Zealand for the building and other sectors;
 - 4.18.2 participation in international Standards developments; and
 - 4.18.3 providing access to Standards, which includes both the free publication and the sale of Standards. 166
- 4.19 The policy of Standards NZ is to base New Zealand Standards on international Standards as far as possible, although there will be times where local conditions and circumstances need to be incorporated.

Other agencies such as the occupational registration board also have a role, but these are not relevant to our market study.

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Standards NZ is self-funded so it charges for Standards development and sells Standards. It also provides free access to Standards that have been sponsored, which includes a large number of Building Standards sponsored by MBIE.

- 4.20 According to Standards NZ, this approach better enables the international exchange of goods and services as these international Standards generally reflect the best practice of industry and regulators worldwide and cover conditions in a variety of countries that New Zealand trades with.
- 4.21 Standards NZ also states that this policy is in line with its obligations under the World Trade Organization's Code of Practice, which requires the elimination of technical standards as barriers to international trade. 167
- 4.22 A BCA is a construct of the Building Act and is an organisation that is accredited and registered to issue building consents. Most BCAs are Tas, ie, local and district councils. However, it is possible for a non-TA to be an accredited and registered BCA. Consentium, a standalone and independent division of Kāinga Ora, is at present the only accredited and registered non-TA BCA.¹⁶⁸
- 4.23 The BCAs responsibilities include:
 - 4.23.1 issuing building consents;¹⁶⁹
 - 4.23.2 inspecting building work for which they granted a building consent;
 - 4.23.3 issuing notices to fix;
 - 4.23.4 issuing code compliance certificates;¹⁷⁰ and
 - 4.23.5 issuing compliance schedules and amending them where the specified systems are affected by building work.
- 4.24 There are 67 TA BCAs in New Zealand. ¹⁷¹ These range in size from authorities with very large populations such as Auckland Council to authorities with very small populations such as MacKenzie District Council. The Building (Accreditation of Building Consent Authorities) Regulations 2006 provide that BCAs must have a system for allocating the building control function work described in paragraph 4.23 to employees or contractors who are competent to do the work.

Standards NZ "International engagement" https://www.standards.govt.nz/develop-standards/international-engagement/.

¹⁶⁸ Consentium "Quality Building consent and inspection Services" https://www.consentium.co.nz/.

A building consent is the formal approval permitting an applicant to undertake building work in accordance with the plans and specifications approved by the BCA.

A code compliance certificate is a formal statement by a BCA that building work carried out under a building consent application complies with the building consent. It provides assurance to the owner and subsequent property owners that the approved plans and specifications have been followed.

MBIE maintains a list of BCAs on its website, Building Performance "Building Consent Authorities (BCA Register", available at: https://www.building.govt.nz/building-officials/find-a-bca/.

4.25 Between them BCAs currently process approximately 50,000 residential building consents for new dwellings per year, with the major metropolitan councils handling a substantial majority of all applications. For example, of the new dwellings that were consented for the year ended April 2022 approximately 21,500 of these were in Auckland, 4,700 in Christchurch, and 2,500 in Henderson-Massey. In contrast, only 12 new dwellings were consented in Wairoa, 19 in Kawerau, and 32 in Waimate over the same period. 172

Key provisions of the Building Act

- 4.26 The key purposes of the Building Act are to provide for the regulation of building work, the establishment of a licensing regime for building practitioners, and the setting of performance standards for buildings to ensure that:
 - 4.26.1 people can use buildings safely without endangering their health, including escaping a building in case of fire;
 - 4.26.2 buildings have attributes that contribute appropriately to the health, physical independence and wellbeing of the people who use them;
 - 4.26.3 buildings are designed, constructed and able to be used in ways that promote sustainable development.
- 4.27 The Building Act also promotes the accountability of owners, designers, builders and BCAs who have responsibilities for ensuring that building work complies with the Building Code and describes their responsibilities.¹⁷³
- 4.28 Relevantly, the Building Act also outlines matters relating to the Building Code and building controls (such as building consents and where building consents are not required), and the requirements of building work.
- 4.29 The responsibilities of the different participants in the building sector are primarily expressed by reference to the ways their activities contribute to the compliance of building work with the Building Code:
 - 4.29.1 Suppliers are not currently obliged to provide information about their building products. However, as discussed in paragraphs 4.243 to 4.247 below, they will be required to make a minimum level of information about their products publicly available from 11 December 2023.¹⁷⁴

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Statistics NZ sets out the new buildings consented by TA for each year ending on April for 2017 to 2022, Statistics NZ "Building consents issued April 2022" at Table 6, available at:

https://www.stats.govt.nz/assets/Uploads/Building-consents-issued-April-2022/Download-data/building-consents-issued-april-2022.xlsx.

Section 3 of the Building Act.

^{&#}x27;Manufacturers and suppliers' are manufacturers, importers, distributors and retailers of products that can be used in building work.

- 4.29.2 If they do provide information, suppliers must ensure it is accurate.¹⁷⁵ In particular, if a supplier states that the product will, if installed in accordance with the technical data, plans, specifications, and advice prescribed by the manufacturer, comply with the relevant provisions of the Building Code, they are responsible for ensuring that this is the case.¹⁷⁶
- 4.29.3 Designers' plans and specifications must be sufficient to result in building work that complies with the Building Code if the building work is properly completed in accordance with those plans and specifications. This includes specifying products and building methods that will comply with the Building Code.
- 4.29.4 Builders are responsible for making sure their work complies with the building consent and the related plans and specifications.¹⁷⁹ This includes making sure they use the specified products (subject to the possibility of product substitution). Where building work is not covered by a building consent, builders are responsible for ensuring that the work complies with the Building Code.¹⁸⁰
- 4.29.5 Building owners are responsible for obtaining the necessary consents for the building work and ensuring that any building work they carry out complies with the building consent or, if there is no building consent, with the Building Code. 181

The Building (Building Products and Methods, Modular Components, and Other Matters) Amendment Act 2021 introduced the power to make regulations to prescribe minimum requirements for information about building products that are available to the New Zealand market. These requirements will commence on 11 December 2023. This information will need to be provided by product manufacturers and suppliers. Distributors and/or retailers will need to check that the products they distribute or sell meet the information requirements.

Section 14G of the Building Act.

A designer is someone who prepares plans and specifications for building work or who gives advice on the compliance of building work with the Building Code, including engineers and architects.

Section 14D of the Building Act.

A builder is any person who carries out building work, whether in trade or not, including carpenters, plumbers and other tradespeople.

Section 14E of the Building Act.

Section 14B of the Building Act.

- 4.29.6 Building work is consented through processes run by the local BCA where the building work is taking place. 182 The relevant BCA is responsible for checking that an application for a building consent, including the combination of products used, will result in buildings that will comply with the Building Code. It is also responsible for checking that the building work that has been done complies with the plans and specifications that were attached to the building consent through inspections during the build. 183 Where there is product substitution it also assesses whether this change qualifies as a minor variation (which does not require an amended building consent), or whether an amended building consent is required. 184, 185
- 4.30 Under the Building Act written contracts are required for any building work where the cost exceeds \$30,000. The contract must contain prescribed information which includes information about the building work, timeframes, costs, payments and what to do in the event of a dispute. 186
- 4.31 The Building Act also includes implied warranties that are provided by anyone building or selling household units. 187
- 4.32 The warranties, which are mandatory and cannot be contracted out of, include that:
 - 4.32.1 building work will be carried out in a proper and competent manner;
 - 4.32.2 building work will be carried out in accordance with the plans and specifications set out in the contract and the relevant building consent;
 - 4.32.3 all materials to be supplied for use in the building work will be suitable for the purpose for which they will be used;
 - 4.32.4 unless otherwise stated in the contract, all materials to be supplied for use in the building work will be new; and
 - 4.32.5 that the building work will be carried out in accordance with and comply with all legal requirements, including, the Building Act and the regulations (which include the Building Code). 188

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The one exception is Consentium which operates nationally.

Section 14F of the Building Act.

Section 45A of the Building Act.

Guidance on product substitution and variations with examples is available on MBIE's website, Building Performance "Product substitutions and variations" https://www.building.govt.nz/projects-and-consents/build-to-the-consent/making-changes-to-your-plans/product-substitution-and-variations/.

Section 362F of the Building Act and clause 6 of the Building (Residential Consumer Rights and Remedies) Regulations 2014, available at:

https://www.legislation.govt.nz/regulation/public/2014/0361/latest/DLM6322532.html.

Under s 362B of the Building Act "building work" does not include design work for purposes of the implied warranties.

Section 362I of the Building Act.

- 4.33 The Building Act provides for a range of remedies against builders and on-sellers if there is a breach of the implied warranties. This includes requiring the repair of or replacement of defective materials, contract cancellation, damages for any loss or damage resulting from the breach, and compensation for any reduction in value of the product of the building work below the price paid or payable. 189
- 4.34 The Building Act also sets out certain principles that must be applied when performing functions or duties, or exercising powers in achieving the purpose of the Building Act. These include:
 - 4.34.1 that the building is durable for its intended use; 190
 - 4.34.2 the costs of a building (including maintenance) over the whole of its life; ¹⁹¹
 - 4.34.3 the importance of standards of building design and construction in achieving compliance with the Building Code;¹⁹² and
 - 4.34.4 the importance of allowing for continuing innovation in methods of building design and construction. 193
- 4.35 Importantly, along with the implied warranties discussed above, the Building Act also provides for:
 - 4.35.1 the ways in which compliance with the Building Code is established;
 - 4.35.2 the process for the issuing of Acceptable Solutions or Verification Methods by MBIE for use in establishing compliance with the Building Code, which when included in designs and plans must be accepted by BCAs;¹⁹⁴
 - 4.35.3 the appointment of a product certification accreditation body and the accreditation of product certification bodies;
 - 4.35.4 a process for the certification of building methods or products for use in establishing compliance with the Building Code;
 - 4.35.5 the issuing of a warning or the banning of a building product or method if it has resulted in, or is likely to result in, a building or building work failing to comply with the Building Code;¹⁹⁵ and
 - 4.35.6 the accreditation and registration of BCAs.

Sections 362L, 362M and 362N of the Building Act.

Section 4(2)(c) of the Building Act.

Section 4(2)(e) of the Building Act.

Section 4(2)(f) of the Building Act.

Section 4(2)(g) of the Building Act.

Section 29 of the Building Act.

To date, MBIE has issued one warning (for loop bars in April 2018) and one ban (for foil insulation in July 2016).

4.36 Under the Building Act:

- 4.36.1 all building work must comply with the Building Code (to the extent required by the Building Act), whether or not a building consent is required;¹⁹⁶
- 4.36.2 building work is not required to achieve performance criteria that are additional to, or more restrictive than, the performance criteria prescribed in the Building Code;¹⁹⁷
- 4.36.3 Acceptable Solutions or Verification Methods are not the only means of complying with the Building Code (although, regulations can be made under the Building Act that require Acceptable Solutions or Verification Methods, or both, to be used to comply);^{198, 199}
- 4.36.4 a BCA must grant a building consent if it is satisfied on reasonable grounds that the provisions of the Building Code would be met if the building work was properly completed in accordance with the plans and specifications that accompanied the application;²⁰⁰
- 4.36.5 a BCA must issue a code compliance certificate if it is satisfied, on reasonable grounds, that the building work complies with the building consent; and
 - 4.36.5.1 in a case where a compliance schedule is required as a result of the building work, the specified systems in the building are capable of performing to the performance criteria set out in the building consent; or
 - 4.36.5.2 in a case where an amendment to an existing compliance schedule is required as a result of the building work, the specified systems that are being altered in, or added to, the building in the course of the building work are capable of performing to the performance criteria set out in the building consent.²⁰¹

The joint and several liability rule

4.37 New Zealand has a joint and several liability rule that applies to both residential and commercial building construction. Unlike many other countries, New Zealand does not have a public or private building insurance scheme.

Section 17 of the Building Act.

Section 18 of the Building Act.

Section 23 of the Building Act.

Section 20 of the Building Act. Although this power exists, no such regulations have been made as yet and the circumstances when such a regulation could be made would be limited in practice.

Section 49(1) of the Building Act.

Section 94(1) of the Building Act.

- 4.38 Under the liability rule, BCAs that provide a consent are jointly and severally liable with other parties, such as building product manufacturers in the case of defective products, builders, designers, architects and subcontractors, in the event that they are found to be negligent in carrying out their role.
- 4.39 Because liability is joint and several, if one or more of the parties found to have been negligent is not able to contribute their share of the loss, the other parties found to have been negligent have to contribute to the defaulting parties' shares as well as bear their own share of the loss.
- 4.40 Since BCAs are often the "last person standing" because they cannot become insolvent or go out of business, they have tended to carry a significant share of the costs of settlements in the past.

Key elements of the Building Code

- 4.41 The Building Code contains compulsory rules for all new building work.
- As noted above, it sets out the performance criteria that building work must meet, but does not prescribe how work should be done and contains no prescriptive requirements stipulating that certain products, brands or designs must be used. Instead, it states how completed building work and its parts must perform. The Building Code often uses qualitative words or phrases to set performance levels for building work. Examples of the words used are "adequate", "sufficient", "low probability" and "adequate combination".
- 4.43 In essence, the Building Code is a performance standard for building work and not building products. A product only complies (or will contribute to compliance) when used in a particular use such as a defined scope of buildings and building work.
- 4.44 Relevantly for the purposes of our market study, the Building Code includes a wide range of technical clauses specifying the required performance in relation to matters such as stability (structure and durability), structural stability in the case of fire, moisture (surface water, external moisture and internal moisture), and hazardous building materials. Often compliance with these technical clauses is demonstrated by reference to a Standard.
- 4.45 Each technical Code clause has three levels that describe the requirements:
 - 4.45.1 Objective outcomes the building must achieve;
 - 4.45.2 Functional requirement functions the building must perform to meet the objective; and
 - 4.45.3 Performance the performance criteria the building must achieve.

- 4.46 As an example, Clause E2 of the Building Code stipulates the following:
 - 4.46.1 Objective the objective of this provision is to safeguard people from illness or injury that could result from external moisture entering the building.
 - 4.46.2 Functional requirement buildings must be constructed to provide adequate resistance to penetration by, and the accumulation of, moisture from the outside.
 - 4.46.3 Performance roofs and exterior walls must prevent the penetration of water that could cause undue dampness, damage to building elements, or both.²⁰²
- 4.47 By meeting the Performance criteria, the Objective and Functional requirements will be achieved.

Demonstrating compliance with the Building Code

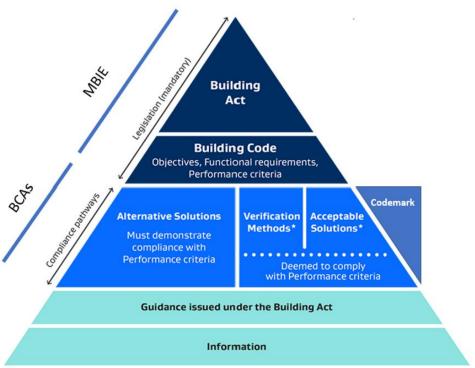
- 4.48 Where building work requires a building consent, the BCA assesses the plans and specifications before any building work starts, to ensure that the work will comply with the Building Code.
- 4.49 The BCA issues a building consent for the work if it is satisfied the work will meet the requirements of the Building Code.
- 4.50 Compliance with the Building Code can be demonstrated using various pathways.
- 4.51 Certain pathways must be accepted by BCAs as meeting the performance requirements of the Building Code while others must be demonstrated to the satisfaction of the BCA.
- 4.52 Apart from minor variations, compliance with the Building Code can only be demonstrated by one or more of compliance with an Acceptable Solution or Verification Method published by MBIE (which, in turn, may cite a Standard), by way of product certification, or by way of an Alternative Solution.^{203, 204}
- 4.53 The diagram below sets out the different routes to demonstrating compliance with the Building Code.

This is only one of seven performance criteria in this clause.

Minor variations under the Building Act are conceptually neutral as to the original design solution.

MBIE describes an Alternative Solution as all or part of a building design that demonstrates compliance with the Building Code, but differs completely or partially from the Acceptable Solutions or Verification Methods, Building Performance "Alternative solutions for compliance with the Building Code" https://www.building.govt.nz/building-code-compliance/how-the-building-code-works/different-ways-to-comply/alternative-solutions/.

Figure 4.1 Regulatory framework showing some ways to comply with the Building Code



* may include cited standards and information

Source: Ministry of Business, Innovation & Employment. 205

4.54 As discussed below, Acceptable Solutions and Verification Methods describe specific construction details (without referring to specific products), that if followed, will result in Code compliant building work. CodeMark typically certifies that a specific product will comply with the Building Code if used and installed in the specified way. 206

Compliance pathways that are deemed to comply with the Building Code

4.55 The current pathways that must be accepted by BCAs as meeting the performance requirements of the Building Code are Acceptable Solutions, Verification Methods and CodeMark. We discuss Alternative Solutions later in this chapter at paragraphs 4.107 to 4.115.

Building Performance "How the Building Code works" https://www.building.govt.nz/building-code-code-compliance/how-the-building-code-works/. We have based our diagram on the diagram published by MBIE, and added reference to CodeMark and lines to indicate the areas of responsibility of MBIE and BCAs.

While CodeMark can also extend to building systems, including methods of construction, it is more commonly used for specific products only.

- 4.56 Unless the Acceptable Solution or Verification Method needs to be declared urgently, or its effect is minor and will not adversely affect the substantial interests of any person, MBIE must publicly notify the Acceptable Solution or Verification Method proposal, invite submissions on the proposal and consider the submissions.²⁰⁷
- 4.57 There is at least one Acceptable Solution or Verification Method for compliance with each of the Building Code's clauses. For example, for clause B1 of the Building Code Structure there are three Acceptable Solutions and two Verification Methods.²⁰⁸
- 4.58 The Building Code handbook sets out which Acceptable Solutions and Verification Methods apply to different elements of a residential building.²⁰⁹
- 4.59 The Building Amendment Act 2021, discussed in paragraphs 4.248 to 4.252 below amended the Building Act to provide a further compliance pathway for manufacturers that are certified to produce modular building components that must be accepted by BCAs.

Acceptable Solutions

- 4.60 Acceptable Solutions do not reference specific product brands (eg, a JSC weatherboard), but are designed to accommodate commonly used building materials (eg, weatherboard cladding), systems and methods and give specific construction details for compliance with the Building Code. Standards can be incorporated into Acceptable Solutions with or without modifications. When Standards are incorporated into Acceptable Solutions, any products complying with the Standard have a clear compliance pathway to establish compliance with the Building Code. How standards are incorporated into Acceptable Solutions is discussed in paragraphs 4.77 to 4.89 below.
- 4.61 Acceptable Solutions show step-by-step building methods (for example, what insulation is needed in the wall of a house to comply with the energy-efficiency requirements of the Building Code).
- 4.62 Designs that comply with an Acceptable Solution must be accepted by a BCA as complying with the Building Code.

Ministry of Business, Innovation & Employment "Acceptable Solutions and Verification Methods – For New Zealand Building Code Clause – B1 Structure", available at:
https://www.building.govt.nz/assets/Uploads/building-code-compliance/b-stability/b1-structure/asvm/b1-structure-1st-edition-amendment-20.pdf.

²⁰⁷ Sections 29(2)(c), (d) and (e) and 29(5)(a) and (d).

Building Performance "Building Code Handbook", available at: https://www.building.govt.nz/building-code-and-handbook/.

- 4.63 Relevant information must be included with a consent application to demonstrate compliance with an Acceptable Solution. For example, technical evidence that the product being used complies with the performance measures in a Standard that has been incorporated into an Acceptable Solution. In practice, despite appearing to be a certain pathway, relying on an Acceptable Solution pathway can still involve a significant compliance burden, or delays. BCAs may require substantial evidence to be satisfied that a product meets a standard in the Acceptable Solution while residential building designs typically involves a mixture of Acceptable Solutions and Alternative Solutions.
- 4.64 For an example of an Acceptable Solution, see B1/AS1 Structure. 210

Verification Methods

- 4.65 Verification Methods are tests or calculation methods that show a way to comply with the Building Code.
- 4.66 Verification Methods can include:
 - 4.66.1 calculation methods: using recognised analytical methods and mathematical models;
 - 4.66.2 laboratory tests: using tests (sometimes to destruction) on prototype components and systems; or
 - 4.66.3 tests-in-situ: which may involve examination of plans and verification by test, where compliance with specified numbers, dimensions or locations is required (non-destructive tests, such as pipe pressure tests, are also included).
- 4.67 For an example of a Verification Method, see E2 External Moisture Verification Method E2/VM2.²¹¹

The role of Standards in Acceptable Solutions and Verification Methods

4.68 Compliance with Standards is not in itself a compliance pathway. However, MBIE's Building System Performance branch can incorporate them into Acceptable Solutions and Verification Methods and they can also be part of an Alternative Solution pathway. A Standard is a consensus-based technical document that sets a benchmark for how to do something that does not reference specific products.

Ministry of Business, Innovation & Employment "Acceptable Solutions and Verification Methods – For New Zealand Building Code Clause – B1 Structure", available at:

https://www.building.govt.nz/assets/Uploads/building-code-compliance/b-stability/b1-

structure/asvm/b1-structure-1st-edition-amendment-20.pdf.

Building Performance "E2 External Moisture – Verification Method E2/VM2", available at: https://www.building.govt.nz/assets/Uploads/building-code-compliance/e-moisture/e2-external-moisture-vm2-2nd-edition.pdf.

- 4.69 Standards NZ is responsible for managing the development of, and providing access to, Standards in New Zealand. It charges for Standards development and sells building Standards. It also provides free public access to building Standards that MBIE has sponsored using funds from the Building Levy.
- 4.70 The Building Act provides for Standards to be incorporated by reference into Acceptable Solutions and Verification Methods in whole, or in part and with modifications, additions, or variations.²¹²
- 4.71 Standards are usually developed via a request from an industry or other stakeholder. Anyone within New Zealand can request the initiation of a Standard update or development process if they can provide the necessary funding to Standards NZ.
- 4.72 The cost of accessing Standards can range from as little as \$5.50 to as much as \$550 where they are not publicly available. MBIE has sponsored more than 120 New Zealand Standards used in the Building Code system since 2019 to be publicly available. These Standards were selected because they were referenced in Acceptable Solutions and Verification Methods. MBIE's sponsorship involves paying for the Standards to be freely available, essentially reimbursing Standards NZ for the fees they would otherwise have received from persons accessing the Standards. MBIE might also separately fund the update or development of a Standard, as determined by the operating protocol it released last year. 214
- 4.73 Standards NZ comprises a management team and a Standards Approval Board, the members of which are appointed by the relevant Minister.
- 4.74 The management team does not hold subject matter expertise and its role is to manage the various processes from a logistical perspective. The Board comprises members with specific expertise and is responsible for approving the membership of Standards development committees and Standards that are developed by these committees where the committees reach consensus.
- 4.75 Standards are developed through a consensus-based process involving a committee of industry stakeholders and widespread consultation with interested parties.

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Section 405 of the Building Act.

The sponsored Standards are listed on MBIE's website, Building Performance "Building-related standards" https://www.standards.govt.nz/get-standards/sponsored-standards/building-related-standards.

Building Performance "Operating Protocol – Tier framework to support standards in the building code systems" https://www.building.govt.nz/building-code-compliance/how-the-building-code-works/standards/operating-protocol-tier-framework-to-support-standards-in-the-building-code-system/.

- 4.76 Standards NZ is charged with developing a committee for every Standards process, and in the case of building Standards this may include a member of staff from MBIE's Building System Performance branch. Standards NZ seeks to ensure the committee has a balanced representation of stakeholder interests and appropriate diversity of skills, knowledge and experience relevant to the Standard being developed. This is intended to avoid individual members having excessive influence. Participation in committees is on a voluntary basis and in the case of building-related Standards typically consists of up to 20 members, including nominees of a wide range of nominating organisations.²¹⁵ Potential members of committees are required to declare conflicts of interest.
- 4.77 When a building-related Standard is published or updated, MBIE's Building Systems Performance branch reviews it to determine whether it is suitable to be incorporated in an Acceptable Solution or Verification Method.
- 4.78 This assessment considers a number of criteria that focus on alignment to the Building Code, importantly including that adherence to the Standard will result in meeting the performance requirements of the part of the Building Code that the Acceptable Solution or Verification Method relates to.
- 4.79 The criteria used by MBIE apply to New Zealand and International Standards, including those developed jointly by Standards NZ and other International Standards bodies.
- 4.80 For building Standards developed internationally, with no input from New Zealand, there is no opportunity to ensure that their content meets MBIE's criteria. However, for International Standards to be referenced within Acceptable Solutions or Verification Methods MBIE considers that they should still comply with its criteria to the extent that this is practicable.²¹⁶
- 4.81 The primary trigger for MBIE referencing a Standard is where a Standard exists that meets the requirements and objectives it is seeking to achieve through the updating or creation of an Acceptable Solution or Verification Method. For example, this could be where Standards have been updated to reflect new building practices or knowledge, or where MBIE identifies a need to create a new compliance pathway. It then considers from a technical perspective whether the Standard is robust and workable. MBIE is then required to consult and give notice that it intends to incorporate the Standard by reference in the relevant Acceptable Solution or Verification Method.²¹⁷

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For example, the P3604 technical committee consisted of 19 nominating organisations and 21 individual nominees.

Building Performance "Operating Protocol – Referencing standards in the Building Code System"

https://www.building.govt.nz/building-code-compliance/how-the-building-code-system/#jumpto-criteria-to-support-decisions-on-referencing-a-standard-in-the-building-code-system.

Section 409 of the Building Act.

- 4.82 MBIE does not have a program of actively seeking International Standards to reference in Acceptable Solutions and Verification Methods. However, its Building System Performance branch may look to incorporate International Standards into Acceptable Solutions or Verification Methods if they become aware that such Standards are being used to support a particular building practice in New Zealand outside of the existing Acceptable Solutions or Verification Methods. Similar to New Zealand Standards, International Standards can also be cited in Acceptable Solutions or Verification Methods with or without modifications.
- 4.83 Approximately 2,365 International Standards are currently incorporated into the Building Code, Acceptable Solutions or Verification Methods. These include Standards that are a primary reference (ie, those directly referenced in the instrument) and a secondary reference (those referenced in a Standard that is a primary reference). Table 4.1 below sets out the Standards that were primary references in the Building Code, Acceptable Solutions or Verification Methods as at December 2021.

Table 4.1 Primary Standards referenced in Building Code documents

Origin	Number
Australian	55
British	60
European	6
German	2
International	36
Joint Australian/New Zealand	81
Joint British/New Zealand	6
New Zealand	88
United States	9

Source: Ministry of Business, Innovation & Employment. 218

4.84 The incorporation of these standards into the Building Code, Acceptable Solutions or Verification Methods has occurred over time. Further, as Mr Gardiner noted in his report, the raw numbers of International Standards in this list does not reflect any weighting of the importance or scale of them in relation to residential building products.²¹⁹

Ministry of Business, Innovation & Employment "List of standards referenced in Building Code document" (December 2021), [].

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [11].

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- 4.85 Where a person is relying on an Acceptable Solution or Verification Method, they must make reference to the specified version of any referenced Standards, and it is only this version that can be used to demonstrate compliance with the Building Code.
- 4.86 If a Standard is updated, the reference needs to be amended in the Acceptable Solution or Verification Method for the updated version to take legal effect through that Acceptable Solution or Verification Method.²²⁰ Under the Building Act this process also requires public consultation.²²¹
- 4.87 MBIE is informed by Standards NZ when building Standards are revised. However, it usually knows that these updates are being made because respective work programmes are shared. It also receives and collects feedback from people in the industry about which Standards should be revised and monitors this.
- 4.88 MBIE consults on proposals to update a selection of Acceptable Solutions or Verification Methods once a year and MBIE uses this process to check referenced Standards. If any referenced Standards within the annual selection of Acceptable Solutions or Verification Methods have been updated, MBIE will consider whether to reference the updated Standard. Interested parties provide feedback on both the need to reference particular Standards and the need to reference updates to already-referenced Standards.
- 4.89 There is a lag before any updated Standards can be applied, especially if MBIE has not identified the relevant Acceptable Solutions or Verification Methods as needing to go through the annual update process.
- 4.90 As discussed in paragraph 4.111 below and in Mr Gardiner's report, Standards can also be usefully referenced in Alternative Solutions when seeking to demonstrate compliance with the Building Code.²²²

Product certification

- 4.91 The Building Act also provides for voluntary product certification schemes as a way to show a building product or method meets the Building Code. The scheme in operation in New Zealand is called CodeMark, although the Building Act allows for multiple product certification schemes.
- 4.92 Under CodeMark, a building product or building method is evaluated to determine whether it complies with the Building Code. CodeMark certifies that a specific product will comply with the Building Code if used and installed in the specified way.
- 4.93 Products or methods with a CodeMark certificate must be accepted by BCAs as being compliant with the Building Code provided the product is used in accordance with the use and limitations stated on the CodeMark certificate.

Section 406 of the Building Act.

Section 409 of the Building Act.

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [9] and [34]-[35].

- 4.94 CodeMark is suitable for any building product but is considered particularly beneficial for suppliers of products that are innovative, new to the market or that would have serious consequences if they failed.
- 4.95 Section 261 of the Building Act provides MBIE with the power to appoint a person as a product certification accreditation body. 223 JASANZ has been appointed the product certification accreditation body for CodeMark. It is also the product certification accreditation body for CodeMark Australia. CodeMark Australia is run by the Australian Building Codes Board and assesses products against the Australian Building Code.
- 4.96 Under section 263 of the Building Act, the product certification accreditation body may accredit a person or body that meets certain conditions as a product certification body. An accredited product certification body must also be registered with MBIE before it can issue product certificates. There are currently four bodies registered in New Zealand, with one based in New Zealand (BRANZ) and the remaining three in Australia (Bureau Veritas, GlobalMark Pty Ltd, and SAI Global). 226
- 4.97 Any proprietor of a building product or building method that is intended to be used in New Zealand may then apply to a registered product certification body for certification of that building product or building method provided they are willing to fund the application.²²⁷ There are prescribed criteria and standards for certification that the building product or building method must meet to receive product certification.²²⁸
- 4.98 If the building product or system is found to meet CodeMark requirements, the product certification body will issue a CodeMark certificate. The certificate will state the intended use of the product and specify any installation instructions and conditions, including who should install the product.
- 4.99 The certified product must continue to be manufactured to the same standards and quality as those which were evaluated and certified. In order to keep the certificates valid, audits are carried out on an annual basis to monitor the products and their manufacturing process.²²⁹

The power is given to MBIE's chief executive.

Section 263 of the Building Act and regs 5-7 of the Building (Product Certification) Regulations 2022.

Sections 267A and 269 of the Building Act. The registration requirement came into force on 7 September 2022. Further requirements and the process for registration are set out in regs 8-11 of the Building (Product Certification) Regulations 2022.

By cl 10 of sch 1AA of the Building Act, all product certification bodies that were accredited as at 7 September 2022, when the relevant amendments made under the Building (Building Products and Methods, Modular Components, and Other Matters) Amendment Act 2021 came into force, are taken to be registered for a transitional period of six months until 7 March 2023.

Section 269(4) of the Building Act.

Section 269(1) of the Building Act and regs 12-14 of the Building (Product Certification) Regulations 2022

Section 270 of the Building Act.

- 4.100 When certification is granted, the product still goes through the building consent application process and the BCA will determine whether the proposed building work uses the CodeMark product according to the use and limitations of the certificate.
- 4.101 In practice CodeMark has been used for a relatively small number of products since its introduction in 2008 and there are currently only around 150 CodeMark certificates.²³⁰
- 4.102 BRANZ has advised that the time to complete the certification process is dependent on the amount of work needed and availability of staff to validate the information provided by the applicant to demonstrate compliance.²³¹ However, according to Mr Gardiner, product certification processes can take anywhere between four and eight months.²³²
- 4.103 Costs of obtaining a CodeMark certificate vary according to the product or system to which it applies, and the quality of supporting evidence provided for compliance. According to Mr Gardiner a minimum assessment fee is approximately \$20,000. These costs do not include the costs of independent testing to get the material ready for presentation to BRANZ in support of an application for certification, which Mr Gardiner notes can be as high as \$40,000. In addition, Mr Gardiner notes that there are annual costs of a minimum of \$3,000 to \$4,000 to cover ongoing audit costs as well as confirming there are no material changes to the Building Code system which impact on compliance of the product.²³³
- 4.104 BRANZ further advised that in its experience working with businesses seeking CodeMark certificates, the main challenge is obtaining the necessary information/evidence of conformity to demonstrate Building Code compliance.²³⁴
- 4.105 There is a second mechanism in the Building Act through which the advantages of product certification may be attained. Section 262(2) of the Act empowers MBIE to specify that certifications of building products or building methods provided by a person outside New Zealand are to be treated as product certifications. MBIE must be satisfied that these building products or building methods meet the same prescribed criteria and standards for certification as those considered by the registered product certification bodies.²³⁵

Building Performance "Product certificate register" https://www.building.govt.nz/building-code-compliance/product-assurance-and-certification-schemes/codemark/product-certificate-register/.

BRANZ "Submission on residential building supplies market study draft report" (1 September 2022) Annex at [14].

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [69].

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [68].

BRANZ "Submission on residential building supplies market study draft report" (1 September 2022) Annex at [17].

Section 262(3) of the Building Act.

4.106 However, this second mechanism has not, to date, been used: MBIE has not specified any overseas certifications of building products or building methods that are to be treated as product certifications.

Alternative Solutions for demonstrating compliance with the Building Code

- 4.107 Compliance with the performance requirements of the Building Code can also be demonstrated by way of an Alternative Solution where an Acceptable Solution or Verification Method cannot be used for the product, or where the proprietor of the product has not obtained a CodeMark. Construction of a building further typically involves a range of compliance pathways. There may be some of the design and products used in the design that have a CodeMark certificate, there may be some products which can use an Acceptable Solution, and there may be some products which are an Alternative Solution.
- 4.108 Many building projects, particularly renovations or upgrades to existing buildings, and more complex projects need to use Alternative Solutions. For example, a building owner may want something that looks different or performs better, is more cost effective, or overcomes a specific site problem.
- 4.109 An Alternative Solution can include a product, system or construction method that differs completely or partially from those given in the Acceptable Solutions or Verification Methods.
- 4.110 An Alternative Solution will usually require specific design and input from suitably qualified people, such as architects or engineers.
- 4.111 To obtain a building consent from a BCA there must be sufficient evidence to show that the performance criteria of all relevant clauses in the Building Code will be met. This involves reliance on evidence such as BRANZ appraisals, expert reports, proof of in-service history, calculations, and proof of comparability to compliance achieved by Acceptable Solution or Verification Method. 236
- 4.112 A BRANZ appraisal is an in-depth and independent evaluation of a building product or system to assess whether it meets all relevant Building Code performance requirements and is a technical opinion of a building product or system's fitness for purpose.

236 Guidance on how to provide sufficient evidence to show that the performance criteria of the relevant clauses in the Building Code will be met is available on MBIE's website, Building Performance "Alternative solutions for compliance with the Building Code" https://www.building.govt.nz/buildingcode-compliance/how-the-building-code-works/different-ways-to-comply/alternative-solutions. Guidance on options for demonstrating that building products meet the requirements of the Building Code is available on MBIE's website, Building Performance "Showing your products comply with the Building Code" https://www.building.govt.nz/building-code-compliance/product-assurance-andcertification-schemes.

- 4.113 According to BRANZ they are commonly used by BCAs as the basis for acceptance of products for use in building and construction on the basis of BRANZ's reputational competence and expertise.²³⁷
- 4.114 BRANZ has been issuing BRANZ appraisals since 1974 and in this time has issued over 1,000 BRANZ appraisals.²³⁸
- 4.115 According to BRANZ the time to complete the evaluation and related costs for an appraisal are dependent on the amount of work that is needed to validate the information provided by the applicant to demonstrate code compliance. On average BRANZ appraisals are both quicker and less costly than CodeMark certifications.²³⁹

Extent to which the building regulatory system may be impacting competition for key building supplies | Te whānuitanga o ngā pāpātanga o te pūnaha ture hanga whare ki te whakataetae mō ngā putunga hanga whare

- 4.116 This section considers the extent to which the building regulatory system may be impacting competition for key building supplies. It:
 - 4.116.1 describes themes derived from submissions we received, from our case studies, and from Mr Gardiner about the impact of the building regulatory system on competition; and
 - 4.116.2 explains our conclusion that the building regulatory system is affecting competition for key building supplies.
- 4.117 Regulations intended to improve certain outcomes from the operation of a market can impede other desirable outcomes. For example, in the context of the building sector, there is an inherent tension between regulations designed to ensure building products and services are quality assured and the objective of making it easy for participants to supply new products and services so as to promote competition.
- 4.118 Performance criteria for services and building materials can enable competition that meets the needs of buyers, particularly where it would otherwise be difficult for buyers to distinguish between the quality of materials and services supplied. Conversely, if performance criteria are unduly restrictive, efficient market entry by new competitive products may be deterred.
- 4.119 Appropriate quality assurance regulations may also result in lower costs of occupancy and maintenance over the lives of houses, while regulations promoting new entry could compromise building quality if low-quality products enter the market to the detriment of New Zealand's housing stock.

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BRANZ "Submission on residential building supplies market study draft report" (1 September 2022)
Annex at [55]-[56].

BRANZ "Submission on residential building supplies market study draft report" (1 September 2022)
Annex at [46].

^{239 [].}

- 4.120 We have drawn on a range of information collected during this study when assessing the extent to which the building regulatory system may be impacting competition for key building supplies. This includes regulatory materials, information obtained from relevant industry bodies, submissions received throughout this study, surveys we undertook and the report of Mr Gardiner of Building Confidence Ltd.²⁴⁰ We have summarised themes derived from submissions, our building regulatory system survey, Mr Gardiner's report, and the consultation conference in paragraphs 4.122 to 4.161 below. The case studies are discussed in paragraphs 4.162 to 4.203.
- 4.121 Further information on our survey of key elements of the building regulatory system is contained in Attachment F.

Themes from submitters and Mr John Gardiner on impediments to the entry and expansion of new building supplies

- 4.122 There was broad consensus from submitters that competition for the supply and acquisition of key building supplies is not working as well as it could if it was easier for building products to be introduced into the New Zealand market.
- 4.123 Submitters generally considered that the current building regulatory system had a negative impact on competition in key building supplies by limiting the products that were available. There was broad consensus that the building regulatory system was creating impediments to the entry and expansion of new building supplies at a system level.²⁴¹
- 4.124 Submitters also generally agreed with our preliminary findings on the causes of these impediments and the need to address them. They agreed on the need to take action to enable greater levels of competition and to remove or reduce the impediments to the entry and expansion of new building supplies which arise from the operation of the building regulatory system.
- 4.125 Many submitters also proposed potential remedies to address the impediments to competition.

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022). We instructed Mr Gardiner for his expertise and experience working both within the building regulatory system and as a consultant to suppliers seeking to navigate the system. We asked Mr Gardiner to identify, from his expertise and experience, any features that in his view make it difficult for suppliers of building products to navigate and use the building regulatory system in practice.

Castalia on behalf of Affordable Building Coalition "Submission on residential building supplies market study draft report" (1 September 2022) at 15; BRANZ "Submission on residential building supplies market study draft report" (1 September 2022) at [24]; Consumer NZ "Submission on residential building supplies market study draft report" (1 September 2022) at [2] and [3]; ITM "Submission on residential building supplies market study draft report" (2 September 2022) at [7]; Mitre 10 "Submission on residential building supplies market study draft report" (31 August 2022) at [5] and [6].

- 4.126 Submitters generally supported or were not opposed to our draft recommendations. A significant number noted that it was important to ensure that any proposed remedies were practicable and that they did not frustrate the core objectives of building safety and durability. For example, it was noted that the establishment of additional compliance pathways would be a highly resource intensive exercise and that product substitutions by minor variation would need to be considered carefully when the relevant key building supplies are used in a building system.²⁴²
- 4.127 Submitters identified various key themes in relation to the building regulatory system as the main contributors to impediments to competition for key building supplies.
- 4.128 These themes are often interrelated, and it is their combination when the building regulatory system is applied in practice, which results in impediments to competition for key building supplies by favouring products that are already well established in the market.
- 4.129 These key themes are discussed further below.

Complexity in the building regulatory system

- 4.130 A substantial number of submitters noted that there is inherent complexity in the building regulatory system which makes it hard for product suppliers to demonstrate compliance with the Building Code.²⁴³
- 4.131 In this regard, they noted that the performance requirements in the Building Code were too complex, restrictive, or lacking in clarity and that this often led to the specification of brands or incumbents' products by designers in building consent applications. Mr Gardiner made the same point, noting that the pathways to demonstrate compliance for building products are relatively simple in theory but complex in practical application.

BRANZ "Submission on residential building supplies market study draft report" (1 September 2022) at [35] and [41]-[43]; Fletcher Building "Submission on residential building supplies market study draft report" (1 September 2022) at [2.11]-[2.13].

Registered Master Builders Association "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 4, [16] and [54]; Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 13, 14, 17 and 23; H W Richardson Group "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [12]; NZ Metal Roofing Manufacturers Inc "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [49]; BRANZ "Submission on residential building supplies market study draft report" (1 September 2022) at [25] and [28]-[32]; Mike Greer and Tex Edwards "Submission on residential building supplies market study draft report" (1 September 2022) at [3.1]. This is also consistent with what we heard from hui participants about BCA behaving differently in different regions, Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 5.

- 4.132 Some submitters also considered that importers of building products lacked knowledge of the Building Code and related instruments and that this was exacerbated by a lack of guidance and resources to help product suppliers navigate the building and regulatory system. Some submitters made similar assertions about designers specifying products or design solutions based on what they have always done, because they are not aware of alternative products, or do not have the expertise to assess alternative products or design solutions.
- 4.133 Submitters generally agreed that making more information available at a central location would support competition from lesser-known products.

There are limited clear compliance pathways for many key building supplies

- 4.134 Many submitters noted that there were limited clear compliance pathways for new and innovative products which led to market participants preferring the familiar products of incumbents.
- 4.135 Submitters generally pointed to opportunities to recognise international product Standards and products that were already accepted for use in buildings overseas more readily to reduce reliance on the products of domestic incumbents.²⁴⁴
- 4.136 A key complaint from submitters was that current Acceptable Solutions and Verification Methods are over-reliant on the use of referenced NZ Standards to set performance criteria and that more use should be made of International Standards when developing Acceptable Solutions and Verification Methods.²⁴⁵ It was also argued that many of the current Standards used in Acceptable Solutions and Verification Methods are out of date and are biased in favour of incumbent suppliers and against imported products.
- 4.137 Some submitters further noted that there are Standards that are unique to New Zealand (for example, the Standard applying to the treatment of timber in New Zealand, which means that imported structural timber used in other countries must be treated before being used in New Zealand, effectively precluding economic importing of structural timber from other obvious source countries).²⁴⁶

Fletcher Building "Submission on regulatory and standards systems" (13 May 2022) at [4.1];

Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 14, 27 and 39; Frame and Truss Manufacturers Association "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [28]-[60]; Wood Processors & Manufacturers Association "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [54].

Bernard Jennings "Submission on residential building supplies market study draft report"

(10 August 2022) at [3]; ITM "Submission on residential building supplies market study draft report"

(13 September 2022) at [14]; Mike Greer and Tex Edwards "Submission on residential building supplies market study draft report" (1 September 2022) at [3.2]; Property Council of New Zealand "Submission on residential building supplies market study draft report" (31 August 2022) at [8]; Registered Master Builders Association "Submission on residential building supplies market study draft report" (1 September 2022) at 2 and 3.

- 4.138 In this regard, some submitters also noted that BCAs do not recognise alternative products that are being used overseas in similar environmental conditions, or overseas test results and Standards, and that there was a perceived exaggeration of the "unique" characteristics of building in New Zealand.²⁴⁷
- 4.139 Submitters also noted that there is an absence of Acceptable Solutions for some common products used in residential buildings, little practical guidance on what to do if a solution does not meet the specified requirements, and that Alternative Solutions are too complicated, time-consuming, and expensive.
- 4.140 Mr Gardiner held similar views, noting that:
 - 4.140.1 For building products, identifying the performance requirements expected of them in a particular intended use starts with the Standards referenced in Alternative Solutions and Verification Methods.
 - 4.140.2 The current Acceptable Solutions and Verification Methods are over-reliant on the use of referenced NZ Standards to set performance criteria, and the development of Acceptable Solutions and Verification Methods makes insufficient use of International Standards.
 - 4.140.3 There is a lack of product Standards referenced in Acceptable Solutions and Verification Methods with the range of product solutions available to the building sector having grown faster than the rate of referencing Standards in Acceptable Solutions. Many new or innovative products have no established performance benchmarks within the Code system, even though appropriate performance benchmarks may be established in other jurisdictions.

There are significant barriers to certification and appraisal of building products

4.141 Submitters generally pointed to the significant cost and burden of gaining product accreditation, particularly for new entrants, and the flow-on adverse consequences for competition in the markets for building supplies.²⁴⁸

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Property Council of New Zealand "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 4; Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [49]; Bunnings "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [11].

- 4.142 It was noted that the CodeMark process is time-consuming and expensive, taking up to 12 months of testing with ongoing re-accreditation and audit fees and that and BRANZ's existing work is not freely available but must be paid for.²⁴⁹
- 4.143 Submitters also noted that the current product certification scheme does not include recognised and competent international building product certification bodies who are currently certifying products overseas.²⁵⁰
- 4.144 A significant number of submitters supported changes to the product certification regime to facilitate product certification by international building product certification bodies as well as an expedited approvals process for 'low-risk' products, as well as more fundamental changes to the regime.²⁵¹
- 4.145 Mr Gardiner held similar views, noting that aspects of the current product certification are not cost effective, and the current scheme does not include recognised and competent international building product certification bodies.
- 4.146 We note, however, that BRANZ continues to offer these quality assurance options and consider them important services that support the building system. ²⁵²

Bunnings "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [30]; H W Richardson Group "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [49]; Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 39.

Fletcher Building "Submission on regulatory and standards systems" (13 May 2022) at [3.2]; Castalia on behalf of Affordable Building Coalition "Cross submission on residential building supplies market study draft report" (17 October 2022) at 7 and 8.

Fletcher Building "Submission on regulatory and standards systems" (13 May 2022) at [4.1].

In summarising the proceedings on the third day of the consultation conference we mistakenly indicated that BRANZ might not wish to continue to be in the product certifying business. BRANZ subsequently advised us that this was incorrect and that it was rather reflecting the significant effort this work involves and that international bodies might therefore be unwilling to take on a certification role for New Zealand. BRANZ "Cross-submission on residential building supplies market study draft report" (1 September 2022) at [13]-[17].

Familiarity bias

- 4.147 Submitters generally agreed that specifiers (architects, engineers, designers) and builders have familiarity bias (ie, they rely on products they know and trust) which makes entry and expansion of new building supplies difficult. This bias is often driven by concerns that new products may not be accepted by BCAs (using incumbents products makes consenting easier) and, in the case of builders, that they may not be able to claim against product warranties when products fail, and suppliers have exited.²⁵³
- 4.148 Submitters were also in general agreement that BCAs have a similar familiarity bias towards well-known or trusted products because this simplifies their evaluation and reduces liability risk (see the discussion below).²⁵⁴
- 4.149 Often products that are preferred by specifiers and builders and widely accepted by BCAs are referred to as 'tried and tested products'. For some this means a building product or system that is proven in its application over time or has been certified or appraised for Building Code compliance. However, some submitters advised that some products that have 'in-service' history or have been CodeMark certified or BRANZ appraised, are still not widely accepted by BCAs, specified by designers or selected for use by builders. Some refer to 'tried and tested products' when talking about incumbent products that are widely preferred by specifiers and builders and accepted by BCAs.
- 4.150 In this study we use the term 'familiar products' to refer to products that are the subject of the specifying, purchasing, and consenting biases in favour of incumbent products that we have observed.²⁵⁵

Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [12], [18], [30], [49], [56] and [56a]; Registered Master Builders Association "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [30], [55] and [56a]; Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 5, 39 and 40; Kiwi Infrastructure Limited "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [33] and [55]; Bunnings "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [56a] and [57].

Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 2, 5, 13, 14, 39 and 40; H W Richardson Group "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [12]; Property Council of New Zealand "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 4. This is also consistent with what we heard from hui participants, Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 4 and 6.

Combined Building Supplies Cooperative Limited (CBS) "Submission on residential building supplies market study draft report" (4 August 2022) at [1]; ITM "Submission on residential building supplies market study draft report" (2 September 2022) at [5a]; Mike Greer and Tex Edwards "Submission on residential building supplies market study draft report" (1 September 2022) at [3.1]; NZ Green Building Council "Submission on residential building supplies market study draft report" (1 September 2022) at [6]; Offsite NZ "Submission on residential building supplies market study draft report" (6 September 2022) at 1.

Liability and risk

- 4.151 The joint and several liability rule is discussed above at paragraphs 4.37 to 4.40. Submitters considered the allocation of risk between builders, designers, manufacturers, and BCAs (with BCAs attracting a large share of the practical risk of building and product failure) encourages conservative decision making by BCAs. They noted that this results in a preference for familiar building products and methods, and the specification of products by brand in consent applications.
- 4.152 In this regard, Mr Gardiner also noted his view that the current civil liability regime for building work makes BCAs risk averse and has arguably made them apply a higher legal standard than the 'reasonable grounds' test for considering applications for building consents set out in the Building Act. He further noted that BCAs do not make appropriate risk informed decisions when considering applications for building consents, and that a common default starting position they adopt is to assume that a product will fail and they will be held accountable, particularly through civil action finding them negligent.
- 4.153 Various submissions proposed measures to address this issue including the development of a "Guarantee and Insurance Product" and the capping of BCA liability.²⁵⁷
- 4.154 Submitters also identified liability and risk as a concern for specifiers and builders that incentivised them to prefer incumbents' products.

BCA behaviour and inconsistent decision making

4.155 Most submitters and Mr Gardiner considered that inconsistency of decision making between different BCAs (and even within BCAs) in relation to the application of the Building Code was a significant impediment to the adoption of new building products and building methods, because even if a product or method was accepted by one BCA it could still be rejected by another.²⁵⁸

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Fletcher Building "Submission on regulatory and standards systems" (13 May 2022) at [5.1].

Fletcher Building "Submission on regulatory and standards systems" (13 May 2022) at [5.3]; Castalia on behalf of Affordable Building Coalition "Submission on regulatory and standards systems" (18 May 2022) at 8.

Bernard Jennings "Submission on residential building supplies market study draft report"

(10 August 2022) at [1]; Fletcher Building "Submission on residential building supplies market study draft report" (1 September 2022) at [3.1]; ITM "Submission on residential building supplies market study draft report" (2 September 2022) at [12] and [13]; Mike Greer and Tex Edwards "Submission on residential building supplies market study draft report" (1 September 2022) at [2.1] and [2.2]; Registered Master Builders Association "Submission on residential building supplies market study draft report" (1 September 2022) at 4; Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 4-5.

4.156 Submitters generally attributed these inconsistencies to the highly fragmented building consent system with 67 BCAs, as well as a lack of an appropriate level of practical building knowledge, including in some instances knowledge about alternative products. A significant number of submitters supported the consolidation of the BCAs to promote greater consistency of decision making in the treatment of products and building techniques by BCAs.^{259, 260}

BCA behaviour in relation to product substitution and variations

- 4.157 A significant number of submitters raised concerns that substituting products after a consent was issued is time-consuming, costly, and that although a minor variation of the building consent may be possible this was subject to BCA discretion.²⁶¹
- 4.158 Some submitters suggested that BCAs require product specification by brand and did not allow product substitution or make this difficult, with the recent issues with plasterboard supply given as an example.²⁶²
- 4.159 Mr Gardiner raised the same issues, noting that a practice has developed of requiring products to be specified by brand in consent applications which makes product substitution after a consent is granted difficult, as the administrative burden associated with any post-consent product changes makes changing products difficult. He also noted that although MBIE had provided some helpful guidance on this (as well as the change to the Building Act to create the concept of minor variations) product substitution post-consent is still problematic as it provides an advantage to the products that the designer has specified in the consent even though there may be other products available that would comply.

We also heard that strong relationships between BCAs and builders from the outset of projects are critical and that some BCAs and Māori organisations are already making concerted progress to build strong relationships, with successful results. See paragraphs 3.19 to 3.24 above.

Elephant Plasterboard "Submission on residential building supplies market study draft report"
(7 September 2022) at [B]; National Māori Authority "Submission on residential building supplies market study draft report" (25 August 2022) at 4 and 5.

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]; Castalia on behalf of Affordable Building Coalition "Submission on regulatory and standards systems" (18 May 2022) at 7. This is consistent with what we heard from hui participants, Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 6.

Registered Master Builders Association "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 4, [16] and [54]; Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 14, 13, 17, 23; H W Richardson Group "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [12]; NZ Metal Roofing Manufacturers Inc "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [49]; Monopoly Watch NZ "Submission on regulatory and standards systems" (18 May 2022) at 5; Fletcher Building "Submission on regulatory and standards systems" (13 May 2022) at [6.2]. This is also consistent with what we heard from hui participants about BCA behaving differently in different regions, Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 5.

Incentives for new suppliers and advantages of incumbents

- 4.160 Some submitters noted that there is often a big risk, for small reward, for suppliers looking to enter the New Zealand market. This is said to be due to factors such as the time and cost involved in getting testing, compliance, approvals and market recognition for products in circumstances where brand specification is prevalent.²⁶³
- 4.161 They also observed that incumbent suppliers also have greater expertise in navigating the building regulatory system and their products are often well-known and likely to face significantly less scrutiny from BCAs.²⁶⁴

Observations from our case studies

- 4.162 Attachments A, B and C describe the observations from our case studies into plasterboard, structural timber and concrete (including cement).
- 4.163 Each attachment outlines in detail the Building Code clauses and cited standards applicable to the use of these three case study products in a residential building.
- 4.164 In the section below, we draw observations across these case study products.
- 4.165 We do not comment on whether the performance criteria applicable to these products are appropriate or necessary from a technical perspective. We recognise that the compliance pathways in place are designed to ensure that residential buildings in New Zealand are safe, healthy and durable. These are plainly important policy objectives of the Building Act and our observations are not intended to detract from that.
- 4.166 Our observations relate to how the performance criteria impact on competition and, in particular, how easy or difficult it may be for new competitors to enter and expand in the relevant markets.
- 4.167 We make three observations, relevant specifically to barriers to entry and expansion for competing products. These observations, which are consistent with the issues identified by submitters and Mr Gardiner, are discussed further below.

Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [49]; New Zealand Building Industry Federation "Cross submission on residential building supplies market study preliminary issues paper" (16 March 2022) at 2; Wood Processors & Manufacturers Association "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [54]; Bunnings "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [30], [33] and [49].

Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [51]; Kiwi Infrastructure "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [51].

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- 4.168 As described above, the Building Code is brand indifferent and performance based. Despite this, where a building product fits within a clear compliance pathway (ie, within an Acceptable Solution or Verification Method and cited Standard), those products appear to be used more readily, compared to competing products that do not fit within a similarly clear compliance pathway. Competing products face a longer path to establishing acceptance either through seeking CodeMark certification (at an individual cost) or as an Alternative Solution. The time and cost this entails can deter suppliers and can negatively impact competition between suppliers.
- 4.169 Where an Acceptable Solution cites a Standard, and that Standard has features that are unique to New Zealand and/or contains highly prescriptive input requirements, this can make it more difficult for suppliers of new products from overseas to enter and expand in the market, and prescription can limit opportunity for innovation. This can be contrasted with a Standard that prescribes product performance requirements and/or is aligned to at least some International Standards. Such standards more easily facilitate import competition and innovation, and better promote competition between suppliers.
- 4.170 Where products are specified by brand due to the compliance pathway (or the way it is applied in practice) this negatively impacts competition in the markets for supply of the relevant building product. This is because once the product is specified by brand in a consent application it significantly limits the scope for the product to be substituted after a building consent has been granted.
- 4.171 In the case of plasterboard, for example, the compliance pathway and practice, appear to result in mutually reinforcing specifying, purchasing, and consenting behaviours that strongly favour familiar products. This is particularly the case where the product is favoured by builders. The complex interaction of the elements of the building regulatory system, the way it is applied in practice, and the behaviours it incentivises, can make it difficult for suppliers of competing products to enter and expand in the market.²⁶⁵

Compliance pathways and ease of use

- 4.172 It is plainly of paramount importance that the products used in residential buildings are safe and durable. Acceptable Solutions and Verification Methods, which cite Standards, create clear compliance pathways for the types of building supplies MBIE has determined perform according to the safety and durability requirements of the Building Code.
- 4.173 While the Building Code does not preclude new or innovative products where these products exhibit the necessary performance characteristics, the relative ease of use for existing products, with a clear compliance pathway, appears to result in familiar products being favoured, and new or innovative products being used less readily.

We acknowledge the steps taken by MBIE, and the Taskforce it has established, to offer guidance around the different plasterboard products available in the New Zealand market.

- 4.174 Some key building supplies are manufactured domestically to meet the prescriptive requirements of a cited Standard. Based on our case study analysis, this appears to be the case for structural timber.
- 4.175 NZS 3640:2003 Chemical preservation of round and sawn timber is a New Zealand standard that specifies the chemical treatments which must be applied to timber products to ensure the products will, depending on species of timber and intended use, perform with adequate durability.
- 4.176 It is not imperative that all structural timber used in residential buildings is treated according to NZS 3640:2003. However, we observe that products are not as readily specified in residential building designs where they are not:
 - 4.176.1 manufactured in accordance with the precise chemical treatment specified in this Standard; or
 - 4.176.2 manufactured out of the species of timber contemplated by the standards.
- 4.177 Where a structural timber product has not been manufactured according to the requirements prescribed by *NZS 3640:2003*, the compliance pathway for that product will involve its assessment as an Alternative Solution. This pathway is relatively more burdensome, due to the assessment and information requirements of BCAs, in order to be persuaded that the product is safe and durable.
- 4.178 In this way a compliance pathway can make it relatively more difficult for suppliers of new products to enter and expand in the market. In the particular case of structural timber, this may be occurring where importers seek to supply a structural timber product manufactured from foreign species of timber, or chemically treated according to International Standards.
- 4.179 In light of this, we observe that compliance pathways that are structured around what already exists in a market, particularly to the extent that the compliance pathway relies on a New Zealand specific Standard, appear to have an adverse impact on competition and innovation.

Level of prescription

- 4.180 The relevant regulatory requirements for cement in *NZS 3122:2009* specify performance attributes and are aligned to the Standards in other countries such as Japan and Thailand.
- 4.181 There is a clear compliance pathway through an Acceptable Solution that facilitates import competition and innovation.
- 4.182 The Standards are not prescriptive (for example, as to formulation or inputs). What matters is whether the performance measures are met.

- 4.183 Switching and substitution are easy due to the performance attributes specified in the Standards. This also allows suppliers to innovate with the formulation of their products, for example, by substituting cementitious materials to achieve reductions in carbon emissions.
- 4.184 Ready-mix concrete is further generally viewed as a commodity and is generally not specified by brand (unless due to customer choice).
- 4.185 In contrast, the chemical treatment and timber species requirements of NZS 3640:2003 are highly prescriptive. The New Zealand specific Standard does not operate by setting performance thresholds for durability, rather it outlines the input requirements and processes that must be followed in order to ensure that adequate durability of the product is achieved.
- 4.186 While we acknowledge the building safety and durability considerations at play, our observation is that where a Standard operates to set performance-based thresholds, as opposed to incorporating Standards that are unique to New Zealand or highly prescriptive of inputs, this has a lower impact on competition in the markets for the supply of the relevant products.

Performance requirements necessitate brand specification

- 4.187 Where specification by brand is the practical outcome of the relevant compliance pathway, the building regulatory system has a more pronounced impact on competition in the markets for the relevant products.
- 4.188 Reasons for specification by brand can include:
 - 4.188.1 compatibility of specified products (for example, electrical wiring must be compatible with the type of insulation);
 - 4.188.2 different products have different performance characteristics (for example, structural plasterboard).
- 4.189 For plasterboard, the relevant Acceptable Solution anticipates wall linings providing structural bracing. This is uncommon in other markets.
- 4.190 There are alternative design methods, but these do not appear to be used often.
- 4.191 Winstone Wallboards has built a successful and well-regarded product and service offering. It is trusted for Code compliance, and well established for specification. It is easily consented. Purchasers like the delivery-to-site service and product support.
- 4.192 Plasterboard is commonly specified by brand. It is not clear whether designers do this by deliberate choice or to manage their risk, or whether BCAs require brand specification where the product is to be used for a specialist application (such as for structural bracing, sound-reduction or fire resistance) or in general as a matter of interpretation of the Building Act test for consent.

- 4.193 However, once the product is specified by brand in a consent application it significantly limits the scope for the product to be substituted after a building consent has been granted. Depending on the context, a minor variation of the building consent may be possible, and MBIE has issued both generalised guidance on product substitutions and, more recently in response to plasterboard shortages, product-specific guidance on product substitution of plasterboard. 266
- 4.194 Precise product specification by brand does not appear to occur for concrete or structural timber. As a result, the compliance pathways for concrete and structural timber do not appear to impact the markets for supply in the same way that, for example, the plasterboard compliance pathway does.
- 4.195 In the case of plasterboard, we observe that the manner in which the compliance pathway has come to be applied in practice appears to be one of several elements that contribute to mutually reinforcing specifying, purchasing, and consenting behaviours that strongly favour the product that is already well established in the market.
- 4.196 This mutually reinforcing interaction of the elements of the building regulatory system, the way they are applied in practice, and the behaviours they incentivise, appear to be making it difficult for suppliers of competing products to enter and expand in the market.
- 4.197 MBIE's recent measures directed at plasterboard substitution, through raising awareness about alternative building methods through peak architectural bodies, raising awareness about product alternatives, issuing guidance to BCAs on accepting plasterboard substitutions as minor variations, and looking at ways to potentially ease the assurance pathways for overseas-certified systems to be imported, are measures that better facilitate competition from plasterboard alternatives. A Government taskforce was also appointed to address plasterboard shortages, with a remit that includes looking at possible legislative and/or regulatory change, and possible changes to distribution.²⁶⁷

Ministry of Business, Innovation & Employment "Product substitution Plasterboard Guidance", available at: https://www.building.govt.nz/assets/Uploads/building-code-compliance/certificationsprogrammes/product-assurance/product-substitution-plasterboard-guidance.pdf.

Further information about the role of the taskforce is available at:

²⁶⁷ https://www.beehive.govt.nz/release/plasterboard-taskforce-set-ease-shortages.

4.198 Initiatives like the appointment of the Plasterboard Taskforce suggest that it is possible to respond to 'bottlenecks' in the building regulatory system using the range of regulatory and operational tools that are already available. He assures such as those adopted by the Plasterboard Taskforce could, where appropriate, be considered for a wider range of key building supplies to better support competition. For example, through the recently established Critical Materials Taskforce which is intended to monitor emerging supply chain risks and to provide guidance, advice, data and information to inform MBIE's Critical Materials and Products Work Programme. He appropriate to be provide guidance and products work Programme.

Summary of observations

- 4.199 Depending on the context, the combination of the elements of the building regulatory system, along with how they are applied in practice and the behaviours they incentivise, can make it difficult for suppliers of new or innovative products to enter and expand in the relevant market.
- 4.200 Generally speaking, where a product has a clear compliance pathway it appears that the product is likely to be more readily specified and used in residential building designs. Well-established products are much more likely to have clear compliance pathways through, or by analogy with, the Standards referenced in Acceptable Solutions and Verification Methods.
- 4.201 We acknowledge that there may well be technical reasons that necessitate the specifics of particular compliance pathways for building products, and their relative levels of prescription, from a building safety and durability perspective.
- 4.202 Our observation is that the impact of these compliance pathways, as barriers to entry and expansion for key building supplies, should nonetheless be given consideration when new compliance pathways are created or existing pathways are updated.
- 4.203 Further, where the compliance pathways either prescribe specific input treatments or requirements (as opposed to pure output or performance-based requirements), or necessitate brand specification to gain BCA consent, the compliance pathways can have a more marked impact on competition between different products in building supplies markets. In such circumstances, the compliance pathways appear to create barriers to the entry or expansion of new or innovative key building supplies.

Castalia on behalf of Affordable Building Coalition "Submission on residential building supplies market study draft report" (1 September 2022) at 5.

Hon Dr Megan Woods "Taskforce set up to protect construction industry from product shortages & delays" (24 November 2022) https://www.beehive.govt.nz/release/taskforce-set-protect-construction-industry-product-shortages-delays.

Potential measures for improving competition suggested by Mr Gardiner

- 4.204 Having provided his views and opinions to assist us to assess whether there are regulatory barriers to the entry or expansion of key building supplies and if so, what those barriers are, Mr Gardiner also suggested potential measures to address the practical difficulties he identified and to improve the processes for the introduction of new products. These fall into the following categories:
 - 4.204.1 Improving the Building Code system through providing greater clarity of the performance requirements for products, including less reliance on the use of referenced NZ Standards.
 - 4.204.2 Guidance and resources to help product suppliers navigate the system.
 - 4.204.3 Guidance to assist BCAs in making more risk informed decisions about products when used in building work.
 - 4.204.4 Improving the compliance system to facilitate specification of products in consents at a performance level.
 - 4.204.5 Ensuring the product certification scheme is effective and providing for other certification schemes.
 - 4.204.6 Actively monitoring the new product disclosure regime to ensure that it does not become a barrier to consents.
- 4.205 These potential measures are set out in more detail in paragraphs 125 to 130 of Mr Gardiner's report which was published alongside our draft report. They are also considered further in Chapter 10.

Our view that the building regulatory system is affecting competition for key building supplies

- 4.206 We consider that the building regulatory system is making it difficult for new building supplies to get the opportunity to compete against familiar products and consequently for competing suppliers to enter and expand their businesses. These difficulties also mean it is hard for competing suppliers to obtain the efficiency benefits that can accrue from operating at scale and increasing productive capacity. This reinforces the market position of established building supplies and methods and existing suppliers of these products.
- 4.207 The core objective of the Building Act is delivering safe, healthy and durable homes. While the Building Code is performance based and brand indifferent, and recognises the importance of innovation, in practice a range of features of the building regulatory system make it difficult for competing suppliers of key building supplies to enter the New Zealand market and expand their businesses.

- 4.208 The operation of the regulatory system does not in practice enable timely response to changing markets and innovations in building products. It continues to incentivise designers, builders, and BCAs to favour familiar building products over new or less familiar competing products.
- 4.209 Despite the flexibility that is available in the system to use and adopt new products (for example, through Alternative Solutions and product certification) wellestablished building products and methods are too difficult to challenge, even when the rival products can also deliver safe, healthy and durable homes, as it is too slow, costly and uncertain to get them accepted for general use.
- 4.210 This is largely due to the combined effect of:
 - 4.210.1 the way the building regulatory system is applied to building products; and
 - 4.210.2 the decision-making behaviours of designers, builders, BCAs and government agencies in response to and in applying the building regulatory system.
- 4.211 We recognise how critical it is that, where building products are used in building work for residential buildings, they contribute to the outcome of ensuring safe, healthy and durable residential buildings. We also recognise that there are likely to be important reasons for the specifics of the different compliance pathways, and their relative levels of prescription, from a building safety and durability perspective. However, we consider that more can be done to make it easier for suppliers of key building supplies to enter and expand their businesses in the New Zealand.
- 4.212 The Building Code and associated systems are complex to navigate. The Building Code uses qualitative words and phrases to set performance criteria for building work and, for building products, establishing what the qualitative words and phrases mean in practice involves starting with the Standards currently referenced in Acceptable Solutions and Verification Methods. It is those Standards that are generally used to establish the required performance criteria for products. These compliance pathways for building products (ie, through Acceptable Solutions and Verification Methods and referenced standards) are narrow and there are few 'streamlined' processes.²⁷⁰
- 4.213 These pathways have their origins in the national standards under the Building Act 1991 and, while they are not the only means of complying with the Building Code, they have become embedded as "how we build here". These compliance pathways have not been expanded to keep pace with contemporary building practices or the development of new products, despite the enabling nature of the regulatory framework. This has had the effect of limiting the potential for competition from alternative, new or innovative building supplies or methods of building.

²⁷⁰ John Gardiner "Practical issues with the building regulatory system for suppliers of building products — An assessment" (3 August 2022), at [8]-[9], [34] and [35].

- 4.214 The building regulatory system is sometimes unduly restrictive in terms of the allowable characteristics of products and does not enable timely response to changing markets and innovations in building products. It continues to incentivise designers, builders and BCAs to favour familiar building products over new or competing products.
- 4.215 Where a building product fits within an Acceptable Solution or Verification Method and cited standard, those products appear to be more readily specified and used in residential building designs compared to competing products that do not fit within a similarly clear compliance pathway. Familiar products are much more likely to have clear compliance pathways.
- 4.216 The opposite is also true, in that where a product's compliance pathway is relatively unclear it is less likely to be used in a residential building design and more likely to be a challenger to familiar products. These challenger products face a longer path to establishing acceptance, either through seeking CodeMark certification (at an individual cost) or as an Alternative Solution.
- 4.217 While anyone can fund the development of an NZ Standard and motivate for this to be included in an Acceptable Solutions or Verification Method, in practice, suppliers of new or innovative products have not sought to try this route given the time and cost.
- 4.218 While product certification is available through CodeMark this is also costly and timeconsuming, and the uptake remains relatively low. Since product certification relates to a particular product and use, the costs and inconvenience of having each product and associated use individually certified is often prohibitive.²⁷¹
- 4.219 There are a number of other factors that contribute to mutually reinforcing specifying, purchasing, and consenting behaviours that strongly favour familiar products that are already established in the market.
- 4.220 A building consent applicant seeking to establish compliance with the Building Code by way of an Alternative Solution must persuade the BCA that the proposed building work and products will meet the performance requirements of the Building Code. This typically requires substantial evidence since BCAs favour trusted and familiar products to de-risk potential liability. There is also a lack of clarity around what information needs to be provided in order to demonstrate Code compliance. There is further some perception that BCAs apply a threshold higher than the 'reasonable grounds' test set out in the Building Act for granting consents.

²⁷¹ See "Knauf's concerns regarding product approval processes" set out in Ministry of Business, Innovation & Employment "Residential Construction Market Study – Options paper" (6 November 2013) at 17, available at: https://www.interest.co.nz/sites/default/files/residential-construction-sector-optionspaper.pdf.

- 4.221 There are 67 BCAs nationally. Even if an applicant successfully persuades one BCA to consent a product, BCAs in other regions can take different interpretations and stances. While accreditation of BCAs was designed to help with BCA performance and consistency, these issues have not yet been resolved and different BCAs still often require different levels of product assurance before approving a particular product or process for use within a design.
- 4.222 The behaviours of designers, builders and BCAs appear strongly self-reinforcing. Designers and builders anticipate BCA responses to new products. They take these expected responses into account when specifying and purchasing key building supplies and generally choose the path of least resistance, given the significant time and additional costs associated with delays in the consenting process. The need to complete jobs on time and with least delay and additional cost generally prevails over any desire to use new or innovative products.
- 4.223 While this does not appear to be required by the Building Act or the Building Code, the practice has also developed of designers specifying products by brand in building plans and consent applications. Once the product is specified by brand in a consent application it significantly limits the scope for the product to be substituted at a later time, after a building consent has been granted. Depending on the context, a minor variation of the building consent may be possible, and MBIE has issued both generalised and product-specific guidance on product substitutions. However, the process for seeking substitutions is likely to add time, cost and complexity to a build which incentivises builder to continue to use the specified brand.²⁷²
- 4.224 The Building Code and associated system are also complex for product suppliers, designers, builders and BCAs to navigate. While some information is available, such as the standards sponsored by MBIE, there is no centralised repository for product information, accessible to product supplies, designers, builders and BCAs. To the extent there is sharing of this information between BCAs this appears to be relatively ad hoc and informal. This means that it can be difficult for parties to find useful information about new or innovative products that will help them to assess whether products would be compliant with the Building Code when used in a particular way. This is exacerbated by the small scale of many participants in the building system, meaning that they are less likely to have resources to devote to satisfying themselves of the suitability of unfamiliar products.
- 4.225 Given the Government's position and the previous considerations of these matters discussed below, and the lack of any clearly better alternative, we have not made specific findings on the impact of the liability regime on competition, or changes to risk, liability, and insurance settings.
- 4.226 We consider that there are a range of potential measures that can be used to address regulatory barriers to entry and expansion in order to enhance competition. These are discussed in Chapter 10.

This view is supported by the analysis and information discussed at paragraphs 5.35 to 5.40 below.

Building system law reforms | Whakahoutanga ture pūnaha hanga whare

- 4.227 Assessments of policy settings and the building systems legislative framework have been ongoing in some form since the Building Act 2004 reforms were fully implemented in around 2010.²⁷³
- 4.228 A number of initiatives are aimed at enhancing the operation of the building regulatory system. Our study into factors affecting competition for key building is complementary to current initiatives being led by MBIE. As we note below, several issues identified by MBIE are similar to those raised in our study and we make recommendations in relation to them in Chapter 10. We describe MBIE's current work and work that has preceded it in more detail below.

The Law Commission review and MBIE's market study

- 4.229 The Law Commission commenced a review of the joint and several liability settings (including the operation of joint and several liability in the building and construction sector) in 2011.²⁷⁴ The Law Commission's Final Report in 2014 recommended retaining the rule of joint and several liability, but proposed caps on local authority liabilities from future residential building consents to limit the effects from BCAs' structural exposure to excessive or deep pocket liability.²⁷⁵ The Government accepted the Law Commission's recommendation to retain joint and several liability and requested MBIE to carry out further work on the recommendations affecting the building sector.²⁷⁶
- 4.230 MBIE also commenced a Residential Construction Sector Market Study, in 2013.
- 4.231 As part of this study, MBIE published an options paper describing the barriers to competitive and productive outcomes in the residential construction sector in 2013.²⁷⁷ The issues identified in MBIE's options paper largely correspond with issues with the building regulatory system that we identified.

nzlc_r132.pdf.

The Department of Building and Housing also completed a review of the Building Code under s 451 of the Building Act in November 2007. This review considered the extent to which the Code complied with and met the requirements of the Act and the extent to which it provided clear guidance on the performance standards for building. New Zealand Department of Building and Housing "Building for the 21st century: report on the review of the Building Code" (November 2007), available at: https://ndhadeliver.natlib.govt.nz/delivery/DeliveryManagerServlet?dps pid=IE2354147.

The application of the rule in New Zealand was in focus in the building and construction sector due to the leaky buildings crisis.

Te Aka Matua o te Ture, Law Commission "Liability of Multiple Defendants" (June 2014) at [9] and [15][17], available at: https://www.lawcom.govt.nz/our-projects/joint-and-several-liability?id=916.

[&]quot;Government response to Law Commission Report Liability of Multiple Defendants" (November 2014), available at:

https://www.lawcom.govt.nz/sites/default/files/governmentResponseAttachments/govt_response_to

Ministry of Business, Innovation & Employment "Residential Construction Market Study – Options paper" (6 November 2013), available at: https://www.interest.co.nz/sites/default/files/residential-construction-sector-options-paper.pdf.

- 4.232 The five key issues relating to the building regulatory system that were identified in MBIE's paper included the following matters:
 - 4.232.1 Complexity and inaccessibility of Alternative Solutions The complexity of the product assurance system for demonstrating Code compliance may act as a barrier to new products or systems getting to market. There are also concerns that decision-making processes and risk aversion in relation to product assurance may reinforce the position of incumbents in the industry.
 - 4.232.2 Specification of products by brand Specification by designers of particular brands of product in designs acts as a barrier to later substitution of equivalent products that might be cheaper or more effective. This reinforces the use of familiar products.
 - 4.232.3 *Risk-averse behaviour* Risk-averse behaviour underlies decisions about consenting. Moreover, liability risks throughout the industry incentivise conservatism and this may act as a barrier to getting products accepted for use (or selected for use in the first instance).
 - 4.232.4 Limited availability of Acceptable Solutions Acceptable Solutions are 'deemed to comply' with the Building Code. They often rely on citation of complex technical Verification Methods, which are not always available in relation to innovative new materials or processes or new market entrants. This could act as a barrier to entry.
 - 4.232.5 Inefficient and inconsistent consenting behaviour Slow and unpredictable consenting procedures across BCAs introduce delays to construction and make it difficult to plan construction projects. This particularly affects larger builders looking to realise economies of scale through improved planning and management.
- 4.233 The Law Commission's Final Report in 2014 and MBIE's Market Study prompted a range of initiatives, leading to the Government launching consultation on a Building Legislative Reform Programme in April 2019, and an end-to-end review of the building consent system in July 2022 led by MBIE (Consent Review).
- 4.234 This programme of work includes consideration of aspects of risk and liability settings and measures that respond in part to issues with the building regulatory system outlined in the MBIE's options paper.

Building Legislative Reform Programme

4.235 In April 2019, MBIE released the Building System Legislative Reform Programme discussion paper for public consultation. The proposals in the discussion paper aimed to lift the quality of building work and deliver fairer outcomes to parties when things go wrong. MBIE received 470 submissions.

- 4.236 Cabinet policy decisions in September 2019 subsequently divided the Building System Legislative Reform Programme into three phases of work:
 - 4.236.1 Phase One of the reforms would focus on new building laws that aim to support housing supply and affordability by supporting the use of new, innovative and efficient building methods.
 - 4.236.2 Phase Two would focus on occupational regulation to lift the performance of all building professionals and tradespeople and improve confidence and accountability in the sector.
 - 4.236.3 Phase Three would explore alternative options, including non-regulatory approaches, to address issues with risk, insurance and liability in the building system.²⁷⁸
- 4.237 The Building System Legislative Reform Programme remains ongoing and, most recently, as noted below, in July 2022 MBIE announced that it will be conducting a first-principles review of all elements of the building consent system.
- 4.238 As explained on MBIE's website, the current building consent system originates from a system first established in 1991 and while incremental changes have been made to the Building Act there has not been a full review of the current building regulatory system since the Building Act was introduced in 2004.²⁷⁹

Building (Building Products and Methods, Modular Components, and Other Matters)
Amendment Act 2021

- 4.239 As part of Phase One of the Building System Legislative Reform Programme, the Building Amendment Act 2021 was passed in June 2021.
- 4.240 Key changes introduced by the Amendment Act include:
 - 4.240.1 Minimum information requirements Part 4B of the Act: mandating minimum information requirements for building products, to support designers and builders to choose the right products and use them in the way intended, and to support more efficient BCA decision making;
 - 4.240.2 Modular components scheme subpart 7A of Part 3 of the Act: establishing a streamlined framework for consenting structures built offsite/prefabrication (Modular Component Manufacturer Scheme); and

Ministry of Business, Innovation & Employment "Cabinet paper – Lifting the Efficiency and Quality of the Building System: Overview" (11 October 2019), available at:

https://www.mbie.govt.nz/dmsdocument/7022-lifting-the-efficiency-and-quality-of-the-building-system-overview-paper-a-minute-of-decision-proactiverelease-pdf.

Building Performance "Building System Reforms – Background" https://www.building.govt.nz/getting-started/building-system-reforms/.

- 4.240.3 Strengthening the CodeMark framework subpart 7 of the Act: strengthening the CodeMark framework to improve trust and confidence in the scheme by introducing offences and giving MBIE the power of suspension/revocation where there is non-compliance. The changes also introduce registration of product certification bodies and product certificates.
- 4.241 We discuss each of these further below.
- 4.242 The regulations to support the implementation of these changes were made on 7 June 2022. The regulations relating to the Modular Component Manufacturer scheme and CodeMark commenced on 7 September 2022 and the minimum information requirements will commence on 11 December 2023.²⁸⁰

Minimum information requirements – Part 4B of the Act

- 4.243 There is an increasing range and complexity of building products and methods available in New Zealand and this means BCAs frequently need to request additional information about products to verify compliance with the Building Code.
- 4.244 Provision of incomplete or inadequate information to a BCA can create costly delays for building owners.
- 4.245 In order to improve the efficiency of BCA decision making, the Building Act and accompanying regulations which will become operative in December 2023 specify the minimum information that must be publicly available about any building product.
- 4.246 We understand that the regulations are intended to make it easier for designers, builders and homeowners to decide which products are right for the job, use them as intended, and make decisions about alternative products where there are product shortages.
- 4.247 We understand that they are also intended to help BCAs with more efficient consenting, as they will have the right information readily available to check that building products included in plans and specifications meet the applicable Building Code performance requirements.²⁸¹

Building (Product Certification) Regulations 2022 (SL 2022/172), available at: https://legislation.govt.nz/regulation/public/2022/0172/latest/LMS698274.html?src=qs; Building (Modular Component Manufacturer Scheme) Regulations 2022 (SL 2022/171), available at: https://legislation.govt.nz/regulation/public/2022/0171/latest/LMS697926.html?src=qs; Building (Infringement Offences, Fees, and Forms) Amendment Regulations 2022 (SL 2022/173), available at: https://legislation.govt.nz/regulation/public/2022/0173/latest/LMS697634.html?src=qs; Building (Forms) Amendment Regulations 2022 (SL 2022/175), available at: https://legislation.govt.nz/regulation/public/2022/0175/latest/LMS697655.html?src=qs.

Ministry of Business, Innovation & Employment "New laws will support housing supply and improve building product information" (8 June 2022) https://www.mbie.govt.nz/about/news/new-laws-will-support-housing-supply-and-improve-building-product-information/.

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Modular components scheme – subpart 7A of Part 3 of the Act

- 4.248 The Amendment Act also establishes a new voluntary manufacturer certification scheme for Modular Component Manufacturers (MCMs) enabling MCMs to be certified to produce modular building components within a defined scope of practice. Those components will be deemed to comply with the Building Code. MCMs will be able to apply for design and manufacture certification or manufacture certification only. Modular components under the scheme can range from prefabricated frames and panels to volumetric structures, to whole buildings.²⁸²
- 4.249 A certified manufacturer will also need to be registered by MBIE and comply with the requirements of that registration which include a fit and proper person test and adequate means test.
- 4.250 MBIE's 2019 consultation process revealed that the existing legal framework was not fit-for-purpose for MCMs as it often resulted in consenting/approval duplication.
- 4.251 We understand that the new scheme is intended to give BCAs confidence that any construction by a certified MCM is compliant with the Building Code. It means that BCAs will be able to focus their assessment and inspections on issues not covered by the certification such as site works, foundations, plumbing, and connections to services.
- 4.252 Our understanding is that the new MCM regime will enable innovation in building methods while also offering assurance of quality construction in a controlled environment for those looking to utilise modular components in their residential building.

Strengthening the CodeMark framework – subpart 7 of the Act

- 4.253 As described above, CodeMark is a voluntary building product certification scheme. BCAs must accept that building products with a CodeMark certificate comply with the Building Code if they are installed correctly (ie, according to the use and limitations of the certificate). 283
- 4.254 The Amendment Act and accompanying regulations improve MBIE's ability to oversee CodeMark certification by:
 - 4.254.1 introducing registration requirements for product certification bodies and product certificates which include a fit and proper person test;
 - 4.254.2 giving MBIE the power to audit, and if necessary suspend or revoke the status of non-compliant Certificate Holders or Product Certification Bodies; and
 - 4.254.3 creating new offences for false claims about CodeMark certification.

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Regulations 8 to 10.

All building work in New Zealand must comply with the Building Code, even if it doesn't require a building consent.

Phases Two and Three of the Building System Legislative Reform Programme

4.255 The second phase of the Building System Legislative Reform Programme will focus on occupational regulation, including the Licensed Building Practitioners (LBP) scheme, the plumbers, gasfitters, and drainlayers scheme and the regulation of engineers.²⁸⁴

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- 4.255.1 A strengthened LBP scheme will aim to ensure that builders have the right skills, knowledge, experience and behaviours to do quality building work, and increase accountability when LBPs do not meet the standards expected of them.
- 4.255.2 A statutory review of the Plumbers, Gasfitters, and Drainlayers Act 2006 was completed in March 2021. The review found that the Act is generally working well, and made 19 recommendations to improve how the regulatory regime operates.
- 4.255.3 Strengthening the regulation of engineers will aim to ensure that engineers provide engineering services with reasonable care and skill, operate within their areas and level of competence, are held to account for substandard work or poor conduct and people have confidence in the engineering profession.
- 4.256 Phase Three of the Building System Legislative Reform Programme has recently been updated. MBIE now intends that the third phase of reforms will aim to ensure consumer protection measures are adequately protecting homeowners.
- 4.257 MBIE will consider whether changes need to be made to enable homeowners to make informed decisions, improve industry accountability and reduce the risk that homeowners are left exposed when things go wrong.

Review of the building consent system

- 4.258 On 21 July 2022 MBIE commenced consultation on a review of the building consent system (Consent Review). 285
- 4.259 The aim of the Consent Review is to modernise the system to provide assurance to building owners and users that building work will be done right the first time, thereby ensuring that buildings are well-made, healthy, durable and safe.
- 4.260 The Consent Review is a first-principles review of all elements of the building consent system, starting from the point at which buildings are procured and designed. These elements are identified by MBIE as:
 - 4.260.1 institutions how the regulatory regime is structured;

Building Performance "Building System Reforms – Background" https://www.building.govt.nz/getting-started/building-law-reforms/background-to-the-building-law-reforms/#jumpto-phase-two.

Ministry of Business, Innovation & Employment "Issues Discussion Document – Review of the Building Consent System" (July 2022), available at: https://www.mbie.govt.nz/dmsdocument/22845-issues-discussion-document-review-of-the-building-consent-system.

- 4.260.2 practice how regulation is implemented; and
- 4.260.3 system management how the regulatory system is managed.
- 4.261 MBIE consulted on the role of government in the building consent system, the desirable outcomes from the system and an initial assessment of the key issues that are barriers to achieving those outcomes. The discussion document identifies the following systemic and overlapping issues in the building consent system:
 - 4.261.1 Roles, responsibilities and accountability roles and responsibilities across the system are not always well understood, accepted, applied or consistently enforced. There is sometimes an over-reliance on BCAs to provide assurance of compliance with the Building Code.
 - 4.261.2 **Capability and capacity** BCAs face capacity and capability constraints in dealing with an increased volume and complexity of building work. Sector workforce capacity and capability constraints can also undermine the performance of the system.
 - 4.261.3 **System agility** all consents go through the same basic process, which is not always responsive to the level of risk, complexity of the building work, or type of project. The current system does not always deal well with new or innovative practices or products, or the design-and-build approach. Nor is it sufficiently responsive to the building needs and aspirations of Māori.
 - 4.261.4 **Performance monitoring and system oversight** the performance of the system is insufficiently monitored and information flows are poor. MBIE is not yet the strong central regulator that was contemplated in the original system design.
 - 4.261.5 **Fragmented implementation** the processing of building consent applications is devolved to TAs (who are BCAs), which has led to variability and unpredictability in the consent process and its outcomes. This fragmentation adds to the overall costs of the system due to variable processes, tools and functions being implemented across BCAs, and difficulties maintaining a professional workforce. Projects requiring both building and resource consents may also face inefficiencies and additional costs.
- 4.262 Of these five issues identified, there appear to be two primary areas of intersection with this study:
 - 4.262.1 **System agility**, where MBIE acknowledges that the "current system does not deal well with new or innovative practices or products".
 - 4.262.2 **Fragmented implementation,** where MBIE notes that "variability and unpredictability for people navigating the consent process" adds to the "overall costs of the system through duplication of processes, tools and functions across building consent authorities".

4.263 We also note that the Consent Review discussion paper identifies a range of feedback about the consent system that is similar to themes identified by submitters and Mr Gardiner in our study. There are therefore complementarities between the areas of focus for the Consent Review and our market study. A number of initiatives targeted in the Consent Review objectives may also improve competition, and this study and a number of our recommendations may similarly help to achieve the objectives of the Consent Review.

Liability and insurance

- 4.264 MBIE commissioned an analysis of court cases involving building defect disputes between 2008 and 2018 to obtain a picture of the financial risks faced by BCAs during that period. The research found that BCAs paid out an estimated \$1 billion for the period 2008-2018. This includes court-ordered and out of court settlements. About \$332 million of the total amount paid covered the costs of defects incurred by other parties who were unavailable to pay their share of the claims (eg, insolvent).²⁸⁶
- 4.265 BCAs generally manage their risks by requiring detailed plans and specifications, (including the specification of the systems and products that will be used in the building) for building consent applications and carrying out multiple and detailed inspections.²⁸⁷
- 4.266 The Consent Review discussion document expressly notes that the joint and several liability rule is out of scope for the Consent Review.²⁸⁸
- 4.267 Alongside the Consent Review discussion document, MBIE released a policy position statement *Risk, Liability and Insurance in the Building Sector* (Position Statement) which sets out the Government's position on risk, liability and insurance matters and the case for a whole-of-system approach to risk and liability in the building and construction sector.²⁸⁹

Ministry of Business, Innovation & Employment "Building legislative reform – Discussion paper" (April 2019) at 130, available at: https://www.mbie.govt.nz/dmsdocument/5009-building-system-legislative-reform-discussion-paper; Preston Davies & Linda Tran "Liability outcomes in the building sector – glimpses from available data" (13 November 2018), available at: https://www.mbie.govt.nz/dmsdocument/4960-liability-outcomes-in-building-sector.

For example, Wellington City Council – Me Heke Ki Poneke "Supporting documents for a building consent application" https://wellington.govt.nz/property-rates-and-building/building-and-resource-consents/building-consents/applying-for-a-building-consent/supporting-documents-for-a-building-consent-application.

Ministry of Business, Innovation & Employment "Issues Discussion Document – Review of the Building Consent System" (July 2022) at 15, available at: https://www.mbie.govt.nz/dmsdocument/22845-issues-discussion-document-review-of-the-building-consent-system.

Ministry of Business, Innovation & Employment "Risk, Liability and Insurance in the building Sector – Policy Position Statement" (July 2022), available at: https://www.mbie.govt.nz/dmsdocument/22842-risk-liability-and-insurance-in-the-building-sector-policy-position-statement.

- 4.268 The Position Statement expressly acknowledges that the joint and several liability rule, in the building sector, means that some parties responsible for building work might bear more of the cost if others responsible are absent.
- 4.269 The Position Statement notes that the Law Commission has twice considered whether the joint and several liability rule remains appropriate in the New Zealand context and that its last review, completed in 2014, recommended that the joint and several liability rule remain.
- 4.270 MBIE notes that the Law Commission reviewed the implications of the liability rules for economic efficiency and found no sound evidence that proportionate liability can better incentivise efficient behaviour or outcomes. MBIE goes on to identify that:
 - 4.270.1 "a range of other factors combine to cause risk aversion" and states that the Government is working to address these via the ongoing Building Act reform;
 - 4.270.2 there is "little evidence to suggest the liability regime alone drives building consent authority behaviour"; and
 - 4.270.3 joint and several liability provides the best assurance that the homeowner will be compensated.
- 4.271 The Position Statement also acknowledges that a viable insurance market for building defects in New Zealand has not developed and that this raises the policy question as to the Government's role (if any) in developing and supporting a warranty insurance scheme.
- 4.272 Ultimately, MBIE concluded that there is currently only a "weak case" for establishing a publicly provided insurance scheme for building defects. However, the Position Statement notes it is possible that this situation could change in the future if the policy problem becomes clearer. MBIE's discussion document further notes that an evaluation of the consumer protection measures under the Building Act is underway, and may contribute to establishing a case for a publicly provided insurance scheme.
- 4.273 In this study a significant number of submitters identified the allocation of risk between builders, designers, manufacturers, and BCAs as a key driver of the preference for familiar building products and methods, and the specification of products by brand in consent applications. We agree with submitters that current liability, risk and insurance settings may be an impediment to competition if they cause risk-averse behaviour by BCAs (and potentially other participants in the system) that restricts the approval and adoption of new or innovative competing products.

- 4.274 The Government's Building System Legislative Reform Programme is taking a whole-of-system approach to risk and liability in the sector focused on ensuring inputs into the building process are high quality, rather than focusing on liability and culpability when things go wrong. The joint and several liability rule is out of scope for the Consent Review as noted above. Nevertheless, work in each phase of the Programme the Consent Review, review of occupational regulation, and the evaluation of consumer protection measures may produce additional information relevant to risk, liability and insurance settings, including whether any alternative arrangements could lead to clearly better outcomes for consumers.
- 4.275 Given the previous consideration of these matters, the Position Statement, the ongoing work of the Reform Programme, and the lack of any clearly better alternatives, we have not focused in this study on the nature of liability faced by BCAs or its impact on competition.

Building for Climate Change

- 4.276 The BfCC programme is a long-term work programme run by MBIE to reduce emissions from constructing and operating buildings, and to make sure our buildings are prepared for the future effects of climate change.
- 4.277 Further details on this are set out in Chapter 9.

Chapter 5 How building supplies are specified and purchased | Tikanga tautuhi me te hoko putunga hanga whare

Summary of findings

- Designers often make the final choices of key building supplies to be used in residential builds, but a range of people can have input and influence. For example, engineers, builders, quantity surveyors, clients (including homeowners) and/or product suppliers may be involved when specifying building supplies.
- The most important factor designers consider when specifying building supplies are the ability for the product to be approved by Building Consent Authorities (BCAs), along with product durability and suitability within the design, and whether the product has been used before and is reliable.
- Designers and builders generally use familiar products because:
 - A clear compliance pathway to approval by BCAs provides less uncertainty around likely project timings and cost.
 - They are seen as proven to perform in residential buildings in New Zealand, not just as products but as part of the designed system. This is important because product failure can have liability implications for designers, builders and/or BCAs.
- Certain key building supplies are often specified by brand in building plans and
 consent applications. For example, plasterboard and cladding are commonly specified
 by brand. A number of stakeholders explained that many BCAs have adopted a strict
 interpretation of the consent test in the Building Act and require specification by
 brand. Brands can also be specified when designers favour particular brands (for
 example, because they are familiar).
- Designers drive builders' choices of key building supplies by what is specified in the plans. Builders do not usually use alternative supplies to those specified because of the administrative effort, uncertainty and potential delay associated with seeking a variation to the building consent.
- These mutually reinforcing preferences for familiar products from multiple decision makers across the industry increases barriers to entry and expansion for new suppliers. Suppliers of new products face significant barriers to establishing compliance with multiple BCAs and report that BCA approaches and decisions are often inconsistent.
- Builders largely purchase key building supplies from major merchants. Choices between merchants are based on relationships with the merchants, availability of the product and price. There are a range of purchasing patterns, but builders often test the market by seeking quotes from several merchants and switch between merchants when prices, availability or terms are preferable.

Introduction | Kupu whakataki

- 5.1 This chapter discusses the factors that influence which key building supplies are specified and purchased. We consider the incentives, preferences and potential biases of parties involved in selecting building supplies for residential building projects.
- 5.2 The topics covered are:
 - 5.2.1 how we gathered information on specification and purchasing behaviour;
 - 5.2.2 how building supplies are specified and selected; and
 - 5.2.3 how builders choose where to purchase building supplies.

How we gathered information on specification and purchasing behaviour | Tikanga kohikohi mōhiohio mō ngā tautuhinga me te whanonga hook

- 5.3 We have relied on information gathered in a range of ways and from a range of sources to reach the findings discussed in this chapter.
- 5.4 One source was a survey of specifiers and builders (our specifier survey). Our specifier survey sought views on the factors that influence the decisions about which key building supplies are specified and purchased for residential building work. The survey enabled us to seek the views of a range of industry participants and identify common themes.
- 5.5 We received 105 responses to our specifier survey. The respondents included:
 - 5.5.1 builders who source building supplies for the build stage and/or have some input into the products specified in plans; and
 - 5.5.2 specifiers of building supplies at the design stage.
- 5.6 Respondents to our specifier survey were of various sizes, as measured by the number of employees and time spent in the industry.
- 5.7 Other key sources of information we have relied on are described below:
 - 5.7.1 We held meetings with a number of stakeholders including specifiers, builders and trade associations. The meetings were held with those we contacted to seek views, and some who proactively contacted us. We also held meetings with some respondents to our specifier survey to seek further details regarding comments made in response to the survey.
 - 5.7.2 Information provided by merchants and suppliers regarding research into customer and specifier behaviour, in response to our information requests.
 - 5.7.3 Submissions we received in response to our preliminary issues paper and our draft report.

- 5.7.4 Discussion at our hui and consultation conference, and input from post-conference cross-submissions.
- 5.8 Further information about our specifier survey is contained in Attachment E.

How key building supplies are specified and selected | Tikanga tautuhi me te tīpako putunga hanga whare

- 5.9 This section discusses how building supplies are specified and selected for use. It notes that:
 - 5.9.1 designers often make the final choices of building supplies;
 - 5.9.2 designers often favour familiar products when specifying building supplies;
 - 5.9.3 designers face costs and risks when switching to new products;
 - 5.9.4 certain key building supplies are often specified by brand in building plans and consent applications;
 - 5.9.5 while information on building products is available from a range of sources, there is no central repository; and
 - 5.9.6 the extent to which designers constrain builders to use certain products varies by builder type.

Designers often make the final choices of key building supplies

- 5.10 All residential housing projects which include restricted building work require a licensed building practitioner (LBP) to do or supervise the design work.²⁹⁰ Restricted building work is work that is critical to make a home structurally sound and weathertight.
- 5.11 Designers comprise:
 - 5.11.1 architects;
 - 5.11.2 architectural designers;
 - 5.11.3 draughtspersons;
 - 5.11.4 engineers; and
 - 5.11.5 building companies with available design expertise.

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Building Performance "Choosing a designer or architect" https://www.building.govt.nz/projects-and-consents/planning-a-successful-build/scope-and-design/choosing-the-right-people-for-your-type-of-building-work/choosing-a-designer-or-architect-for-your-building-project/.

- 5.12 Designers prepare plans and specifications for building work or give advice about the compliance of building work with the Building Code. They are responsible for ensuring the plans and specifications are sufficient to result in the building work complying with the Building Code if the building work was properly completed in accordance with the plans and specifications or advice.²⁹¹
- 5.13 Designers can be contracted for a specific purpose (eg, the design only), or for the whole project (from design through to completion of the build). Designers interact with many of the other parties involved in a project.
- 5.14 Members of the Registered Architects Board are classified automatically as LBPs but also have a duty to comply with a number of rules and regulations including the Registered Architects Rules. The Rules go to ensuring registered architects are brand indifferent, and include duties to exercise unprejudiced and unbiased professional judgement and not to accept inducements that would create a conflict of interest.²⁹² LBPs must follow a Code of Ethics.²⁹³
- 5.15 Our survey and stakeholder meetings indicated that designers often make the final decisions on specification of key building supplies. However, a number of people can have input and influence.
- 5.16 Figure 5.1 below shows who usually makes the final decision on what key building supplies to use, based on responses to our specifier survey.

Rules 48 and 56 of the Registered Architects Rules 2006, available at:

https://www.legislation.govt.nz/regulation/public/2006/0161/latest/DLM388426.html.

Section 14D of the Building Act 2004.

The Code of Ethics was introduced on 26 October 2021 and came into force on 25 October 2022, Building (Code of Ethics for Licensed Building Practitioners) Order 2021, available at: https://www.legislation.govt.nz/regulation/public/2021/0335/latest/LMS573729.html.

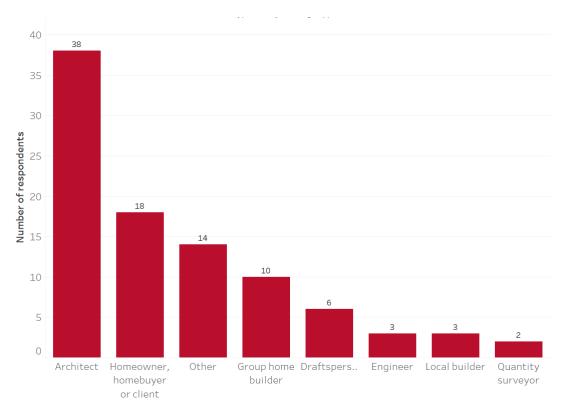


Figure 5.1 Who usually makes the final decision on types of key building supplies to use

Source: Commerce Commission analysis of responses to our specifier survey, n=94.²⁹⁴

- 5.17 Input can come from engineers, builders, quantity surveyors and/or clients (including homeowners) to different degrees depending on the nature of the project. For example, a homeowner may be highly involved with the building supplies specified in a bespoke, environmentally friendly development because of the requirements for the specific building supplies and their input into the overall design. On the other hand, group home builders (GHBs) tend to have a suite of standard designs to be built from a set of products they have chosen based on their own product and supplier criteria which are subject to periodic tender rather than project-by-project decisions.
- 5.18 Suppliers also influence decisions about which products are specified. They can provide product information, proof of past use and acceptance by BCAs and technical advice such as detailed installation information and calculations to assist with the consent process.
- 5.19 Suppliers see designers as key to getting products specified and seek to influence specification decisions by providing information to designers and by making the process as easy as possible for them.²⁹⁵

Responses to question: "For the residential projects you work on and for the key building supplies used, who usually makes the final decisions on the types of key building supplies to use?"
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295 [].

Designers often favour familiar products when specifying key building supplies

- 5.20 There are a number of factors that are typically considered by designers when specifying building supplies. They include considerations such as product durability and suitability within the design.
- 5.21 However, we heard from a range of stakeholders that the most important factors to be considered at specification stage are that the product:
 - 5.21.1 is likely to be accepted by BCAs;
 - 5.21.2 meets the Building Code; and
 - 5.21.3 has been used before and is reliable.
- 5.22 Products meeting these criteria are often referred to as 'tried and tested' products. We noted in Chapter 4 that in this study we refer to them as 'familiar products'.
- 5.23 The preference for familiar products appears to be an enduring theme in the industry. For example, MBIE's 2013 study found "...a bias towards the continued use of 'tried and true' brands, products, methods and systems". 296
- 5.24 As discussed in Chapter 4, this was highlighted as a theme in submissions and our survey on the regulatory and standards system. For example, we were told that "(b)ecause councils favour familiar materials used in familiar ways, architects and engineers prefer to set plans that use familiar materials in familiar ways. It makes consenting easier".²⁹⁷
- 5.25 The factors likely to influence acceptance of a product by BCAs include:
 - 5.25.1 the product being BRANZ appraised;²⁹⁸
 - 5.25.2 the product meeting the performance criteria; and
 - 5.25.3 the supplier providing sufficient product information, including installation instructions.²⁹⁹
- 5.26 This preference can make it harder for new or innovative products to enter or expand to compete with familiar products.

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Ministry of Business, Innovation & Employment "Residential Construction Sector Market Study Options Paper (6 November 2013) at 8, available at: https://www.interest.co.nz/sites/default/files/residential-construction-sector-options-paper.pdf.

The New Zealand Initiative "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [3.10].

²⁹⁸ [].

Designers face costs and risks when switching to new products

- 5.27 Stakeholders described a number of costs and risks associated with designers switching to new products:
 - 5.27.1 **Risk and liability**. Unfamiliarity with a product and the risk of product failure could lead to financial implications for designers later on.
 - 5.27.2 **BCA preferences.** Across different BCAs, and sometimes within the same BCA, stakeholders observe differing requests for information and differing familiarity with the products involved, and a level of reluctance to approve the use of products that BCAs are not familiar with. This is colloquially referred to as "BCA risk aversion" and has led to designers sticking to familiar building products and designs in order to avoid potential delay and cost to a project.
 - 5.27.3 Time and cost of researching new products. Sufficient information is needed to consider using a new product, including but not limited to, technical and installation information, proof of performance, the likely cost to purchase the product and whether professional indemnity insurance covers its use. Acquiring and digesting the necessary level of information both before and during a project may add time and cost.
 - 5.27.4 **Consenting delays**. Any potential delay in the consenting process, for example, BCA unfamiliarity with a product, can cause issues for the timing and cost of the project.
- 5.28 These switching costs can strengthen the preference for familiar products. In turn, this can make it hard for new or innovative products to provide a viable competitive alternative.

Certain key building supplies are often specified by brand

- 5.29 Some key building supplies are specified generically where it can be shown they can meet the Building Code. Examples include timber and ready-mix concrete.
- 5.30 Other key building supplies are often specified by brand. Although views are mixed, some stakeholders have noted generic specification is not allowed by many BCAs that have adopted a strict interpretation of the consent test in the Building Act and require that certain building supplies be specified by brand.^{300, 301}

301 [].

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John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [72].

- 5.31 Specifications in plans need to be prescriptive when, for example, the product or system is a structural component of the building. BCAs will check the product information to see whether the structural component is met and how this fits alongside other components in the design. Further, "...routinely BCAs require additional information (to be satisfied on reasonable grounds) to support the application and how it demonstrates compliance with the Building Code clauses (for example, peer reviews, shop drawings, specific product and system details) before issuing a building consent...". 302
- 5.32 It is not clear currently whether, under the Buildings (Forms) Regulations, a designer can specify in a building consent application more than one building product for a particular use.³⁰³ Submitters have said that the position is unclear and some BCA guidance and materials tend to invite a system or product to be specified.³⁰⁴ The current position is best summarised as:
 - 5.32.1 It is not obvious that designers, if specifying a building product by brand, may specify one or more alternatives; and
 - 5.32.2 Designers' practice is overwhelmingly not to specify more than one.
- 5.33 The key building supplies that are most frequently specified by brand are used in internal walls (including plasterboard), external walls (including cladding) and roofing material. Specifiers responding to our survey, and participants at our hui confirmed this.³⁰⁵ Figure 5.2 below shows the categories of key building supplies which are most specified by brand.

^{302 [}

Building (Forms) Regulations 2004.

Wellington City Council – Me Heke Ki Poneke "Supporting documents for a building consent application" https://wellington.govt.nz/property-rates-and-building/building-and-resource-consents/building-consents/building-consent-application.

Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 6.

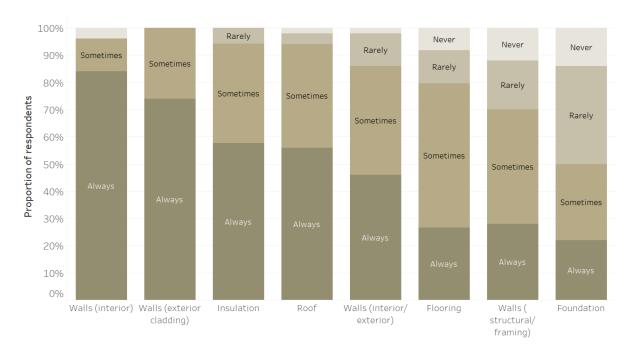


Figure 5.2 Specification by brand for key building supplies

Source: Commerce Commission analysis of responses to our specifier survey, n=52. 306

- 5.34 Other reasons given by designers for specifying by brand include:
 - 5.34.1 previous use of a product and comfort with its use within the current design based on an assessment of the information available; and
 - 5.34.2 not all designers are independent designers; for example, some work from specific plans created by a GHB which has pre-selected many of the building supplies.
- 5.35 Specification by brand can cause some issues during the build process, especially if a different product may be required for reasons such as price increases or lack of availability.

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Responses to question: "Which key building supplies are commonly specified by brand?" [].

5.36 Respondents to our specifier survey indicated that altering the plans once building consent has been granted is often difficult. Stakeholders, during interviews, noted that a minor variation is often relatively uncomplicated but this depends on the product being substituted. MBIE has published guidance relating to minor variations with recommendations for builders, project managers, designers and BCAs. 307 Elephant Plasterboard noted that:³⁰⁸

> Builders can deviate from the specific brand, however currently this still requires, at the very least a Minor Variation form signed to satisfy council that the owner or 'authorised agent' has approved the change in brand for some suppliers. This disincentivises the builder from substituting, as it creates more paperwork for little gain.

- 5.37 MBIE has published product-specific guidance on plasterboard substitutions.³⁰⁹ This appears to have assisted with plasterboard substitutions. However, this experience suggests the general guidance may need to be improved or could be supplemented to assist with substitution of other key building supplies.
- 5.38 For more substantive changes, if a different product is required, then designers must agree to an amendment to the plans (with amended calculations, for example, if appropriate). In either instance a BCA must then decide whether the change and an amendment to the consent is acceptable.
- This process is uncertain because BCAs' approaches often vary when interpreting 5.39 what meets the definition of a minor variation. If the substitution is not considered a minor variation it means the full consent application may need to be resubmitted.³¹⁰
- 5.40 Many designers try to avoid going down this route because of the potential risks.³¹¹ These include delay to the build and addition of time, cost and complexity due to prolonged interaction with a BCA and, in some cases, potential liability for using an alternative product.
- 5.41 The tendency to specify products by brand raises the costs of switching to alternative products. In turn, this may make it harder for alternative products to compete effectively.

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³⁰⁷ Building Performance "What is a minor variation?" https://www.building.govt.nz/projects-andconsents/build-to-the-consent/making-changes-to-your-plans/minor-variations-guidance/what-is-aminor-variation/.

³⁰⁸ Elephant Plasterboard "Submission on residential building supplies market study draft report" (7 September 2022) at 2.

Building Performance "Substituting plasterboard – guidance for building consent authorities" https://www.building.govt.nz/assets/Uploads/building-code-compliance/certificationsprogrammes/product-assurance/product-substitution-plasterboard-guidance.pdf.

Information for designers about building products is available from a range of sources

5.42 Most designers said that information about building products is available from suppliers, certification and appraisal organisations, contained within specification system product libraries, or available from others in the industry. However, relevant information about familiar products tends to be most widely available and this leads them to being more frequently specified.

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- 5.43 Some product specification systems overcome information difficulties to some extent by providing databases of building products and product information for selection by designers. They offer a variety of free and paid subscriptions to users, depending on how many products are to be listed by supplier and what product libraries are needed by designers.³¹²
- 5.44 Choices of product can be influenced by what is in the system, although this is not critical and information can be found elsewhere.³¹³
- 5.45 Some designers indicated that technical information (both in specification systems and elsewhere) is often mixed with marketing information and compliance and product assurance information is sometimes limited.³¹⁴
- 5.46 It can be difficult to find information about new or innovative products and when that information is not readily available then familiar products are more frequently specified.
- 5.47 There is currently no one centralised repository for product information, accessible to designers, builders and BCAs. The Building (Building Products and Methods, Modular Components, and Other Matters) Amendment Act 2021 has introduced mandatory product information disclosure requirements, in order to improve the ease and efficiency of BCA decision making, which comes into force in December 2023.³¹⁵
- 5.48 While this will require suppliers to provide product information, there is no requirement for this information to be centrally located. This means this information may not necessarily be readily accessible.

information/#:~:text=New%20building%20product%20information%20requirements,how%20they%20s hould%20be%20used.

There are a number of specification systems used by designers such as Productspec and Masterspec.

Masterspec, for example, is "...the system over 70% or architects and designers use" and lists over 1,000 suppliers with over 8,300 products as at 11 October 2022, miproducts "The National Product Database" https://miproducts.co.nz/.

^{313 [].} 314 [].

Date of Assent was 7 June 2021, Ministry of Business, Innovation & Employment "New laws will support housing supply and improve building product information" (8 June 2022)

https://www.mbie.govt.nz/about/news/new-laws-will-support-housing-supply-and-improve-building-product-

5.49 Better access to product information may better facilitate competition by reducing the costs of gaining information about new or innovative products. The importance of access to information about key building supplies was largely supported in submissions on our draft report and highlighted at the consultation conference. There were also a number of suggestions as to how this may be achieved, including things to consider when contemplating the design and implementation of a national system to share information about building products.

The extent to which designers constrain builders to use certain products varies by builder type

- 5.50 GHBs often control their own specifications and purchases of the products for their projects, either in-house or by direction to designers. They are not constrained in their choices except to the extent that the products they have selected must be available for use in their standard designs. Products are usually selected by the application of company selection criteria, although clients can request different products.³¹⁹
- 5.51 Designers of homes built by SME builders generally have the final say on which products are specified. SME builders advise that they have some input into decisions but designers make the specification and usually any later substitutions.³²⁰

 Therefore, SME builders are largely constrained by the products that are specified in the building consent plans or those agreed to be substituted.³²¹
- 5.52 However, some SME builders specialise in specific types of projects, for example, luxury or environmentally friendly developments. For these types of projects, builders, their clients and/or engineers can have more input into specification because the requirements of the project can be different.³²²

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New Zealand Construction Industry Council "Submission on residential building supplies market study draft report" (1 September 2022) at 2; BRANZ "Submission on residential building supplies market study draft report" (1 September 2022) at [54].

Residential building supplies market study – Day 1 transcript of consultation conference (27 September 2022) at [2962]-[2983], [2987]-[3017] and [3588]-[3596].

Residential building supplies market study – Day 1 transcript of consultation conference (27 September 2022) at [3053]-[3151] and [3230]-[3252].

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Sometimes builders may substitute a product by way of minor variation without going back to the designer.

This is consistent with what we heard at the hui, Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 3.

^{322 [}

How builders choose where to purchase key building supplies | Tikanga whiriwhiri wāhi hei hoko i ngā tino putunga hanga whare

- 5.53 This section discusses how builders choose where to purchase building supplies. It notes that:
 - 5.53.1 there is a range of different types of builders, reflecting the variety of building projects;
 - 5.53.2 availability and price are typically the most important factors when builders purchase building supplies;
 - 5.53.3 builders do not tend to import key building supplies;
 - 5.53.4 many builders test the market by seeking quotes from multiple merchants;
 - 5.53.5 builders face a range of costs of switching to new products;
 - 5.53.6 builders obtain information on building supplies from a range of sources;
 - 5.53.7 builders face a number of potential costs when switching merchants;
 - 5.53.8 builders have traditionally offered fixed price contracts but this is now less common; and
 - 5.53.9 Kāinga Ora has national supply agreements and supplier panels.

There is a range of different types of builders, reflecting the variety of building projects

- 5.54 A variety of projects are undertaken by builders. These range from homes built for large-scale developments through to bespoke projects where the focus is on environmentally friendly design for a specific site. The demands of homeowners can therefore be very different.
- 5.55 The types of builders also vary. Kāinga Ora facilitates the building and upkeep of thousands of state homes nationally, along with GHBs which also compete for business on a nationwide basis. Other GHBs compete on a more regionalised basis. SME builders generally compete at a local level in regions across the country. The way builders purchase building supplies is therefore determined by the size and needs of their business.

Availability and price are typically the most important factors when considering where to purchase building supplies

The survey and interviews indicate the most important factors considered when deciding where to purchase are availability and price. Other important factors include having a good relationship with a supplier built up over time, the suitability of products on offer, the service including delivery being in full and on time and product warranties. Supply terms, including rebates and other discounts from a supplier were not the most important factors when choosing where to purchase building supplies.

5.57 Figure 5.3 below shows responses to our specifier survey question regarding factors considered when deciding where to purchase key building supplies.

45 41 40 35 Number of responses 30 25 20 15 10 5 0 Specialist Price Product Trade Product Location Personal Rebates. Product No other Other availability account with warranty relationship discounts services (eg, information choice of supplier/ and/or after-sales supplier merchant loyalty support) henefits

Figure 5.3 Factors considered when deciding where to purchase key building supplies

Source: Commerce Commission analysis of responses to our specifier survey. 323

Most supplies are purchased from merchants

- 5.58 Most builders, regardless of size, purchase supplies from one of the five major merchants. Relatively few key building supplies are widely available direct from suppliers, though concrete and windows, for example, are often supplied directly.
- 5.59 Some GHBs also have agreements with suppliers which provide for benefits such as volume-based rebates, payments for administrative support services or marketing. Where this occurs, we understand that the key building supplies are usually still sourced and purchased through a merchant.
- 5.60 An agreement with a supplier is often national and any benefits paid to the GHB by the supplier are separate to any benefits received through an agreement between the GHB and a merchant. We understand these agreements enable the supplier and GHB to make cost savings based on the likely volumes supplied.
- 5.61 This means competition to supply builders with key building supplies appears to largely be between the major merchants. The extent of this competition is discussed in Chapter 7.

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Responses to question: "What is important to your business when deciding where to purchase key building supplies?" [].

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Builders do not tend to import key building supplies

- 5.62 Importation of key building supplies by builders is not currently widespread but there were a wide range of views about its feasibility, depending on the type of product. Many we spoke with during interviews have dismissed it or never considered importing building supplies. 326
- 5.63 The key factor limiting the import and use of key building supplies is the potential liability associated with the use of products that are not familiar in New Zealand. Closely related to this is regulatory concern (ie, hesitancy because a BCA may not issue consent for use of the imported building supplies). Some stakeholders indicated that the financial benefit is uncertain once all of the likely costs to bring to site are considered, while others noted logistical challenges such as certainty around delivery times.
- 5.64 Additional challenges, as is the case for all new products, included persuading designers and merchants the supply is suitable for specification, use and stocking and that the product is better or at least equivalent to current products.
- 5.65 These challenges, and the perceived regulatory concerns, may make it harder for imported products to act as a viable competitor to domestically manufactured products. Chapter 6 further discusses how the viability of importing key building supplies can vary.

Many builders test the market by seeking quotes from multiple merchants

- 5.66 There are a range of methods that builders use for procurement. Builder practices vary across the industry:
 - 5.66.1 Some have longstanding agreements with a single merchant and negotiate the terms from time-to-time or for a fixed period either near to (or at) the end of the fixed term, or by the builder benchmarking against other merchants at a certain stage if there is no fixed term (eg, once a year). Comparisons with other merchants are made particularly around price and service. Most agreements are not exclusive;
 - 5.66.2 Some tender for business from multiple merchants to cover a fixed term and choose one as a supplier for that term;

[&]quot;Leading building firm Naylor Love's chief executive Rick Herd, who was a member of the ministerial taskforce set up to address the shortage, said demand had also eased. 'Yes, Fletchers has upped their game a little bit in regard to production, but there had also been a bit of downturn in market demand, which I think has been very helpful.' He said imports of substitute products had been helpful, but it had not been a game changer", Radio NZ "Signs plasterboard supply problems could be easing" (10 October 2022) https://www.rnz.co.nz/news/national/476393/signs-plasterboard-supply-problems-could-be-easing.

To import building supplies, builders may need to become vertically integrated and compete with existing building product suppliers.

^{327 [].} 328 []. 329 [].

- 5.66.3 Some seek quotes from multiple merchants and choose multiple merchants, for example, to cover geographic locations where one merchant does not have a presence, or to cover a fixed term;
- 5.66.4 Some tender from a range of merchants per project and choose either one or a number of merchants for the duration of the specific project; and
- 5.66.5 Some, largely SME builders, seek supplies off-the-shelf on a project-by-project basis.
- 5.67 Many builders test the market by seeking quotes from merchants that they do not currently use. Switching does occur and the most important factors in deciding to switch supplier are product availability and price.
- 5.68 The recent issues relating to availability of some building products has had a number of effects on choice of supplier. This has stopped some builders from switching because their current merchant has guaranteed supply. However, others now use multiple merchants because some merchants cannot supply them with certain products.
- 5.69 Builders exerting pressure on merchants by testing the market, and switching, is likely to incentivise merchants to compete to win customers. This is consistent with our finding that competition between merchants appears to be working relatively well at the national level. This is discussed further in Chapter 7.

Builders face a range of costs of switching to new products

- 5.70 There are a number of potential costs involved for a builder who wishes to switch to a new product.
- 5.71 In the pre-consent stage:
 - 5.71.1 Time and cost of researching new products. Builders will generally require sufficient information to consider using a new product, including but not limited to, technical and installation information and proof of performance to satisfy a BCA. To acquire and digest the necessary level of information both before and during a project may add time and cost, as will lengthy discussions with BCAs.
 - 5.71.2 **Product availability**. If a builder identifies a new product to use they must first be satisfied that the product will be available to install within the project timeframes. Any difficulties relating to reliability of supply could end up delaying the build.³³⁰

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5.72 In the post-consent stage:

- 5.72.1 **Financial cost of replacement product**. If a product is specified by brand a builder will have to install this product to gain consent. If a different product is installed without agreement from a designer and subsequently consent is not granted, the cost may fall to the builder to replace the product.
- 5.72.2 **Risk and liability**. If a different product is used with agreement from a designer and BCA the builder may still face some liability if the product later fails. This could be due to issues such as installation not being in accordance with the manufacturers' guidelines. For example, "[a]s builders are often the first point of call when a project does go wrong, builders need assurity that the products they are using will work...". 331
- 5.72.3 **Product cost.** Many builders have noted that new products can cost more. Often products that are not yet supplied at a large scale in New Zealand may be more expensive, for example, those which offer greater insulation properties.

Builders obtain information about building supplies from a range of sources

- 5.73 Builders obtain information about products from product suppliers, doing their own research, from merchants and sometimes discussion with clients who have an interest in certain product(s).
- 5.74 Product information for builders about familiar products is reportedly not difficult to come by, especially from suppliers. However, information about new products is more difficult to find; often relating to installation, whether the product is tested in New Zealand conditions, and whether there is any support available in New Zealand (for example, replacement product or technical support).³³²

Builders face a number of potential costs of switching merchants

- 5.75 Builders must consider a number of potential financial and relationship costs before switching merchants.
- 5.76 As noted above, one of the most important factors to consider when choosing a merchant is product availability. This is also one of the primary reasons for switching merchants, especially when, as at present, there is less availability of some products. Switching merchants without consistently available product could be costly because it could delay projects.

332 [].

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Registered Master Builders Association "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 4.

- 5.77 Other potential financial costs include loss of rebates or other benefits from a supplier. Builders of different sizes have expressed different opinions in this respect; some (mainly SME builders) have no costs in this regard while some (mainly GHBs) will consider this more carefully as rebates, for example, could provide financial support for the business.
- 5.78 Some builders consider that a long-term relationship of trust with a merchant is important.³³³ In their view this facilitates the supply of familiar, available products, delivered on site, on time and with the opportunity to rectify any issues. Some have expressed the view that switching merchants could be risky because the relationship with a new merchant has not yet developed.

Builders have traditionally offered fixed price contracts, but this is now less common

- 5.79 Traditionally, many builders offered fixed price contracts for projects. That is, the builder and client agreed a fixed price for the work including all building supplies. Some contracts contained clauses allowing for fluctuations in materials costs, for example. However, fixed price contracts are less common now because builders are facing regular cost increases for building supplies due to issues such as materials shortages and increases in suppliers' costs.
- 5.80 Many builders have expressed the view that materials costs are important to them and to homeowners because they have to complete a job within the necessary budget and want to compete against other builders. Other builders have expressed the view that low prices for building supplies is less important because they are seeking a specific look or performance, for example. This depends upon the nature of the project.

Kāinga Ora has national supply agreements and supplier panels

- 5.81 Kāinga Ora is involved in building residential housing on a large scale in the following ways:
 - 5.81.1 redeveloping existing homes;
 - 5.81.2 buying existing homes;
 - 5.81.3 building new homes; and
 - 5.81.4 maintenance of existing homes.
- In the financial year 2021/2022 Kāinga Ora delivered 1,815 newly built homes with a net increase in public and supported housing of 1,340 dwellings. The net result takes the accumulated total to 5,500 (47%) against the target of 11,780 additional homes by the end of the 2024 financial year.³³⁴

333 []. 334 [].

- 5.83 To achieve this target, Kāinga Ora has detailed its strategy via 'Building Momentum'. Building Momentum is a multi-year initiative which seeks to increase the number of state homes and improve the efficiency and effectiveness of residential construction in New Zealand.³³⁵
- 5.84 There are a number of ways Kāinga Ora seeks to implement this strategy, including via:
 - 5.84.1 innovation including offsite manufacturing which is discussed in Chapter 9;
 - 5.84.2 partnerships to use the size and certainty of the pipeline of work to help stakeholders grow;
 - 5.84.3 sustainability; and
 - 5.84.4 design standardisation and quality.³³⁶
- 5.85 Kāinga Ora has a number of supplier panels which are subject to regular review. They consist of businesses which carry out a range of works and services including residential building and maintenance (construction and maintenance partners) and design work (design partners).³³⁷
- 5.86 Currently, Kāinga Ora has 12 National Supply Agreements (NSAs) with suppliers. 338
 These agreements cover the supply of materials and are made following a tender process. NSAs are regularly reviewed and re-tendered every four years. Maintenance partners are required to use material specified under the NSAs. Design and building partners are not obliged to specify or purchase products covered by NSAs, but all products specified and purchased must meet Kāinga Ora's requirements.
- 5.87 Considerations for building products which are important to Kāinga Ora include:
 - 5.87.1 adherence to performance-based requirements that can be applied to the design, construction and maintenance including Kāinga Housing Standard: Design M-255 for new builds;
 - 5.87.2 the product meets the requirements of the Building Code;
 - 5.87.3 considering tenants' needs (eg, it will contribute to a healthy home and Kāinga Ora as a long-term asset owner); and

Kāinga Ora "Existing Kāinga Ora Sourcing Arrangements" https://kaingaora.govt.nz/working-with-us/procurement-supplying-goods-and-services-to-us/existing-kainga-ora-sourcing-arrangements/.

Kāinga Ora "Building Momentum – Our construction plan for future homes", available at: https://kaingaora.govt.nz/assets/Working-with-us/KO143-Construction-Plan-2020-AW-v5.pdf.

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Kāinga Ora "Existing Kāinga Ora Sourcing Arrangements" https://kaingaora.govt.nz/working-with-us/procurement-supplying-goods-and-services-to-us/existing-kainga-ora-sourcing-arrangements/.

- 5.87.4 the product meets environmental standards (eg, the 6 Homestar standard is one of the requirements additional to the Building Code and applies to all new build projects).³³⁹
- 5.88 Kāinga Ora often considers new or innovative products. This is done by developing designs, testing the market for availability of relevant products and conducting pilot schemes. Kāinga Ora teams also collaborate with Scion, BRANZ, Callaghan Innovation and other industry leaders regarding new technologies, processes and products. These types of products go towards meeting the Homestar standard or the goal of decarbonising homes, for example. This means Kāinga Ora may be more inclined to adopt new or innovate products than other designers or builders.
- 5.89 Due to the size and scale of its housing programme and partnerships, Kāinga Ora is a significant direct and indirect purchaser of key building supplies. It is also well-placed to encourage and enable sector innovation, including in construction materials and building products through:
 - 5.89.1 its use of offsite manufacturing;
 - 5.89.2 its identification and assessment of alternative materials, such as 'green' building supplies;
 - 5.89.3 the adoption and application of standards such as Homestar 6 for new builds and Healthy Homes; and
 - 5.89.4 collaboration with the sector to explore new technologies and processes.
- 5.90 We consider that Kāinga Ora's OSM strategy is likely to offer pipeline support for the OSM industry. However, providing certainty and long-term visibility for build partners in relation to Kāinga Ora OSM demand remains a key challenge. Kāinga Ora advises that it expects its migration to a system-wide house delivery methodology, which it is in the process of implementing, and multi-year pipeline of work opportunities to assist with this.

Kāinga Ora "Innovation" https://kaingaora.govt.nz/developments-and-programmes/innovation/.

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Homestar is an independent rating tool to evaluate homes in terms of their warmth, health and sustainability, energy and water efficiency qualities. It is run by the New Zealand Green Building Council and was launched in 2010.

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Chapter 6 Competition between suppliers and the impact of vertical integration | Te whakataetae i waenga i ngā kaituku putunga me te pāpātanga o te kōmitimiti poutū

Summary of findings

- Overall, competition between suppliers is more limited than at other stages of the supply chain. Competition could be stronger for some key building supplies.
- When competition between suppliers works well, purchasers have more choice over key building supplies and lower prices. This leads to better outcomes for builders and homeowners.
- Each category of key building supplies has its own set of suppliers and unique circumstances which lead to differences in conditions of entry and expansion.
 Distribution models vary, with some key building supplies mainly distributed through merchants, others mainly sold direct to builders while others are a combination of both.
- The supply of many key building supplies is persistently highly concentrated in New Zealand. Some categories of key building supplies (for example, plasterboard and fibre cement) have only one or two main suppliers. However, concentration in supply of some key building products has fallen in recent years.
- Competition between suppliers is stronger if decision makers can substitute between their products more easily. While the substitutability of key building supplies is determined by a range of factors, some factors create avoidable barriers to substitution and therefore limit competition.
- High structural barriers to entry and expansion protect the market shares of incumbent suppliers. There are generally high sunk costs and scale economies associated with manufacturing key building supplies, and the viability of importing varies between supplies. Further, New Zealand's small size and demand uncertainties make it challenging for domestic manufacturers to reach efficient scale, and less attractive for entrepreneurs to import products here.
- Some suppliers that primarily distribute their products through large merchants face a degree of countervailing power. However, merchants have limited ability to exercise countervailing power when there is only one (or few) main supplier(s) in a category or when suppliers can sell directly to the more fragmented construction level. Supplier-to-merchant rebates may also increase the cost to merchants of switching between suppliers and weaken their incentives to use countervailing power to drive competition between suppliers. Builders do not generally have strong countervailing power when dealing directly with suppliers.
- Two of the five major merchants are vertically integrated with suppliers across several categories. In our view, there is no evidence that this industry structure normally has a material adverse effect on competition at either the supplier level or the merchant level. However, this firm structure likely provides a competitive advantage to vertically integrated suppliers and merchants, and potentially creates opportunities for certain strategies, or types of conduct, that can reduce competition.

Introduction | Kupu whakataki

- 6.1 This chapter discusses who the different suppliers of key building supplies are, the key building supplies they provide, and what competition they face in doing so.
- 6.2 We begin the chapter with an overview of suppliers, including the categories of key building supplies within which they compete. The remaining sections discuss the following factors relevant to our assessment of factors affecting competition between suppliers:
 - 6.2.1 concentration among suppliers of key building supplies;
 - 6.2.2 demand substitutability between key building supplies;
 - 6.2.3 structural conditions of entry and expansion for suppliers;
 - 6.2.4 countervailing power of merchants and builders; and
 - 6.2.5 the impact of vertical integration.
- 6.3 The final section of the chapter discusses the impact of vertical integration on merchant competition as well as supplier competition. Chapter 7 contains a more detailed discussion of factors other than vertical integration that affect competition between merchants.
- Other factors affecting competition between suppliers are discussed in more detail in other chapters:
 - 6.4.1 Chapter 4 explores how features of the New Zealand building regulatory systems can create barriers to entry and expansion for market participants, including suppliers.
 - 6.4.2 Chapter 5 explores how building supplies are specified and purchased, including how this process can favour incumbent suppliers.
 - 6.4.3 Chapter 8 explores the nature of arrangements between suppliers and merchants, including how rebates and other vertical arrangements can raise barriers to entry and expansion by suppliers in highly concentrated markets.
 - 6.4.4 Chapter 9 explores how innovation, standardisation, and building for climate change has the potential to influence competition between suppliers, including the challenges faced by suppliers trying to bring new products or approaches to market.
- 6.5 This chapter refers to findings in those other chapters where related and, in some cases, builds on them to draw out their implications for competition between suppliers.

Overview of suppliers of key building supplies | Tirohanga whānui ki ngā kaituku putunga hanga whare

- 6.6 Suppliers, as we define them, are domestic manufacturers and importers of key building supplies. They are upstream in the supply chain from merchants and other distributors, and some sell directly to builders.³⁴²
- 6.7 In this section, we set out relevant observations about suppliers of key building supplies and our approach to assessing competition between them.

We assess competition between suppliers at a key building supply category level

- 6.8 Suppliers do not compete with each other across the whole building supply sector. They typically deal with a narrower range of key building supplies than, for example, a merchant or a builder. It would not be accurate to treat a structural timber supplier as being in competition with an insulation supplier, even if both supply to the same distributor.
- 6.9 Therefore, to assess competition between suppliers, we have defined and described 18 categories of key building supplies, which we refer to as KBS categories. These are shown in Table 6.1 below.

Table 6.1 **Key building supply categories**

KBS category	Description	Types/varieties included (not exhaustive)
Cement	A binder substance that is a key input into ready-mix concrete and other concrete products.	Bulk cementBagged cement
Concrete	A strong composite material made from coarse and fine aggregates (eg, sand and gravel), water, cement, and additives. Commonly used in foundations and flooring.	 Ready-mix concrete Pre-mixed bagged concrete Concrete walls (also known as tilt-slabs)
Doors and windows	Materials that comprise the doors and windows of a building.	Doors and door joineryWindows and window joinery
Engineered timber	A strong composite material made from wood and adhesives. It typically fulfils a structural function and includes both framing products and heavier beam products.	 Laminated veneer lumber (LVL) Cross-laminated timber (CLT) Glued laminated timber (glulam)
Fibre cement	A durable composite material made from fibre- reinforced cement. Commonly used for exterior cladding.	 Fibre cement weatherboard Fibre cement sheets/panels Fibre cement interior lining
Insulation	A material that traps air in still layers to achieve thermal management in homes.	 Glass wool insulation (also known as fibreglass) Polyester insulation Polystyrene insulation
Masonry	Bricks and blocks used for cladding and/or structural purposes.	Concrete bricks and blocksClay bricks

We refer to this as direct supply. Direct supply occurs when suppliers bypass the distribution level and supply directly to the construction level (or to other suppliers in the case of input products like cement).

KBS category	Description	Types/varieties included (not exhaustive)
Other boards and panels	Board and panel products, not elsewhere specified, generally used in flooring or interior walls. Includes many engineered wood products.	 Particleboard Medium-density fibreboard (MDF) Oriented strand board (OSB)
Other cladding	Exterior cladding products not elsewhere specified.	PVC claddingAluminium claddingPanelised cladding systems
Other timber	Sawn timber products not elsewhere specified. Can be used in foundation, flooring, roof, and interior walls.	Non-structural timberAppearance timberTimber mouldings
Plasterboard	An interior drywall lining consisting of two paperboards that sandwich gypsum.	Standard boardPerformance boardPlasterboard compounds
Plywood	An engineered wood board product made by gluing together thin layers of wood veneer.	Plywood flooringPlywood interior liningPlywood cladding
Roofing	Materials that comprise the roof of a building.	 Longrun/metal roofing Roofing tiles Roof flashings Roof vents
Steel framing	Steel products that can be used for structural framing in residential building.	Light gauge framingSteel studsSteel beams
Steel reinforcing	Steel products used in conjunction with concrete foundations to supplement the tensile strength of a building.	Steel reinforcing meshSteel reinforcing barReinforcing steel rods
Structural timber	Sawn timber products that can be used for structural framing in residential building.	Radiata PineDouglas FirOther species
Timber cladding	Timber products that can be used for exterior cladding in residential building.	Timber weatherboardTimber panel cladding
Wet area lining	Water-resistant interior lining products that can be used in wet areas (eg, kitchens and bathrooms).	 Wet area plasterboard High-pressure laminate panels Fibre cement wet lining

Source: Commission review of BRANZ (2020), Trends in materials used in new houses; Deloitte Access Economics (2018), Cost of residential housing development; BRANZ (2008), New house price modelling.³⁴³

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BRANZ "Trends in materials used in new houses" (July 2020), available at:

https://d39d3mj7qio96p.cloudfront.net/media/documents/BRANZ RN Physical characteristics 1.pdf;

Deloitte Access Economics "Cost of residential housing development: A focus on building materials" (December 2018), available at:

https://www2.deloitte.com/content/dam/Deloitte/nz/Documents/Economics/nz-en-DAE-Fletcher-cost-of-residential-housing-development.pdf; BRANZ "New house price modelling" (2008), available at: https://d39d3mj7qio96p.cloudfront.net/media/documents/SR196 New house price modelling.pdf.

- 6.10 These KBS categories reflect the in-scope building supplies set out in Chapter 1 (or groupings of these in-scope supplies). Each KBS category generally has its own set of suppliers and competition dynamics. The rest of the section describes these and identifies some high-level differences between KBS categories.
- 6.11 We have not conducted a formal market definition analysis in defining these KBS categories. Our categorisation process involved synthesising and aggregating the product hierarchy systems of several building supply merchants. This carries some methodological limitations:
 - 6.11.1 In some cases, suppliers in different KBS categories might compete, directly or indirectly, due to product substitution occurring between the categories. For example, plywood suppliers are likely to compete to some extent with suppliers of other board and panel products.
 - 6.11.2 On the other hand, some KBS categories may contain substantially different sets of products whose suppliers do not compete with each other. For example, suppliers of window glazing may not compete with suppliers of window joinery.
 - 6.11.3 Some in-scope key building supplies may not be included in a KBS category at all, especially those that are not commonly sold through merchants.
- 6.12 We also note that, although the major suppliers in most KBS categories operate nationally, in some cases it may be more appropriate to assess competition on a regional basis.
- Our objective in defining KBS categories is not to conduct detailed competition assessments of each one, but rather to enable observations to be made about competition between suppliers of key building supplies. For more detailed assessments of industry structure and competition between suppliers at a key building supply level, see our case studies at Attachments A, B and C.

Most suppliers operate within a small selection of key building supply categories

- 6.14 There are many suppliers of key building supplies. Most supply products within a single KBS category or a small number of related KBS categories. No suppliers are active across the whole building supply sector, though some are connected more broadly by ownership.
- 6.15 The two main ownership groups active in the sector are Fletcher Building and Carter Holt Harvey (CHH) Group. Throughout this chapter, we use teal and brown colour coding respectively to indicate suppliers that are part of these groups. Table 6.5 later in the chapter provides a complete list of the relevant suppliers within these ownership groups.
- 6.16 Some suppliers are also particularly influential across the sector due to their size, their market share, and/or the relative importance of their category to residential building.

- 6.17 Table 6.2 below sets out the 25 largest suppliers according to the total value of their sales of key building supplies to the five major building supply merchants in the year ended 30 June 2021, arranged in alphabetical order.³⁴⁴ It also indicates where suppliers are part of a broader ownership group using the colour coding described above.
- 6.18 Considering only sales to merchants understates the size of suppliers that make a lot of direct sales, so these suppliers are less likely to appear in Table 6.2. Table 6.3 below has details of which KBS categories are likely to have a lot of direct sales.

Table 6.2 Top 25 suppliers by value of key building supply sales to the five major building supply merchants (year ended 30 June 2021), in alphabetical order

Supplier name	Main KBS categories ³⁴⁵	Ownership group
BBI Wood Products	Plywood	
CHH Futurebuild	Engineered timber	CHH Group
CHH Plywood	Plywood	CHH Group
CHH Woodproducts	Structural timber, other timber	CHH Group
Claymark	Other timber, timber cladding	
Firth Concrete	Concrete, masonry	Fletcher Building
Fletcher Reinforcing	Steel reinforcing	Fletcher Building
Herman Pacific	Timber cladding, other timber	
Hume Pine	Other timber, timber cladding	
I.P.L. Plywood Manufacturers	Plywood	
James Hardie	Fibre cement, other cladding, wet area lining	
Kiwi Lumber	Structural timber	
Knauf Insulation	Insulation	
Laminex	Other boards/panels, wet area lining	Fletcher Building
Max Birt Sawmills	Structural timber, other timber	
McAlpines (incl. South Pine)	Structural timber	
New Zealand Wood Products	Plywood, engineered timber	
Niagara	Timber cladding, other timber	
Prowood	Engineered timber	
Red Stag Timber	Structural timber, other timber	
Southern Pine Products	Other timber, timber cladding	

The five major building supply merchants are PlaceMakers, Carters, ITM, Bunnings, and Mitre 10. Here, key building supplies includes only those that fall within KBS categories (which we expect to be the vast majority of in-scope key building supplies).

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KBS categories that have a lot of direct sales (and the suppliers active in these categories) are likely to be underrepresented in this table.

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Supplier name	Main KBS categories ³⁴⁵	Ownership group
Summit Steel & Wire	Steel reinforcing	
Tasman Insulation	Insulation	Fletcher Building
United Steel	Steel reinforcing	
Winstone Wallboards	Plasterboard, wet area lining	Fletcher Building

Source: Commerce Commission analysis of data collected from major building supply merchants. 346

The number and nature of suppliers varies between key building supply categories

- 6.19 The set of suppliers and the composition of shares of supply varies between KBS categories. Therefore, the overall level of concentration also differs between KBS categories.
 - 6.19.1 For example, we have identified two KBS categories where a large share of supply is accounted for by only one supplier: plasterboard (Winstone Wallboards) and fibre cement (James Hardie).
 - 6.19.2 On the other hand, some KBS categories (eg, insulation and timber cladding) appear to have at least five notable suppliers in New Zealand. 347
 - 6.19.3 See Table 6.4 below for a full overview of concentration in each KBS category, including the number of notable suppliers in each.
- 6.20 Suppliers can be domestic manufacturers or importers (and some are both). The prevalence of imports varies significantly between KBS categories. Some are primarily manufactured domestically (eg, structural timber, concrete), while some are mostly imported (eg, fibre cement) and some include a mix of both (eg, cement, insulation).
- 6.21 We discuss the viability of imports, and how it can vary between key building supplies, later in this chapter as part of our discussion of structural conditions of entry and expansion for suppliers.
- 6.22 The prevalence of direct supply also differs between KBS categories. Direct supply is more common where there is limited scope for distributors to add value to the supply chain and/or where the characteristics of a product are not suitable for being stocked by merchants and other distributors.
- 6.23 For example, our concrete case study found that ready-mix concrete is too bulky and perishable to be physically stocked by merchants. It also found that cement, due to its nature as an input product, is most suited to being supplied in bulk directly to concrete manufacturers.

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We define a notable supplier as one that accounts for at least a 5% share of supply.

6.24 Table 6.3 below sets out the 18 KBS categories according to their typical distribution model.

Table 6.3 Key building supply categories by typical distribution model

Primarily distributed through merchants and other retailers	Commonly supplied directly to the construction level or to other suppliers	
Engineered timber	Cement	
Fibre cement	Concrete	
Insulation	Doors and windows	
Masonry	Roofing	
Other boards/panels	Steel framing	
Other cladding	Steel reinforcing	
Other timber		
Plasterboard		
Plywood		
Structural timber		
Timber cladding		
Wet area lining		

Source: Commerce Commission analysis of information collected from market participants. 348

Concentration among suppliers of key building supplies | Te whakatōpūtanga o ngā kaituku i ngā tino putunga hanga whare

- 6.25 Concentration is often used as an indicator of the intensity of competition.³⁴⁹ An industry or market is considered to be more concentrated if relatively few suppliers control a large share of supply.
- 6.26 In this section we discuss concentration at the supplier level and how it varies for different key building supplies.
- 6.27 Our assessment is that:
 - 6.27.1 plasterboard and fibre cement are particularly highly concentrated at the supplier level;
 - 6.27.2 supplier concentration for some KBS categories appears to be declining over time; and

³⁴⁸ []; []; Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 4-5.

OECD "Market concentration" https://www.oecd.org/competition/market-concentration.htm.

- 6.27.3 otherwise, there is a relatively high and stable level of supplier concentration among KBS categories.
- 6.28 We start with a general discussion of what we can and cannot interpret from the existence of high concentration at the supplier level. Next, we present the results of our concentration analysis, which focuses on suppliers' share of supply to merchants. The remainder of this section discusses each of the above findings in more detail.

High concentration can indicate a lack of competition between suppliers but it is not determinative on its own

- 6.29 High concentration can be the outcome of suppliers gaining market share by offering the best price or quality product and competing to maintain that position against the threat of new entry and expansion.
- 6.30 In some situations, even if concentration is persistently high, it is possible that suppliers are constrained by other factors. This generally requires the presence of other significant sources of supply or the credible threat of low-risk entry.
- 6.31 However, high concentration can also indicate weak competition, particularly when high concentration persists over a long period. It can be a result of potential rivals being prevented from competing effectively due to high barriers to entry or expansion in the market, which enables incumbents to set higher prices or to reduce the quality of goods or services without the threat of losing many customers to a competitor (unilateral market power).
- 6.32 Concentration can have other consequences beyond the risk of excluding potential rivals. For example:
 - 6.32.1 concentrated markets are more vulnerable to coordination between suppliers, all else held equal; and
 - 6.32.2 concentrated markets can be less resilient to demand shocks and uncertainty.³⁵⁰

Share of supply to merchants analysis

6.33 The first step in our assessment of concentration is to estimate suppliers' share of supply to merchants (SSM) for each KBS category. We have done this using data on the purchases of the five major merchants – PlaceMakers, Carters, ITM, Bunnings, and Mitre 10 – over a five-year period, with a focus on the year ended 30 June 2021 (FY21).³⁵¹

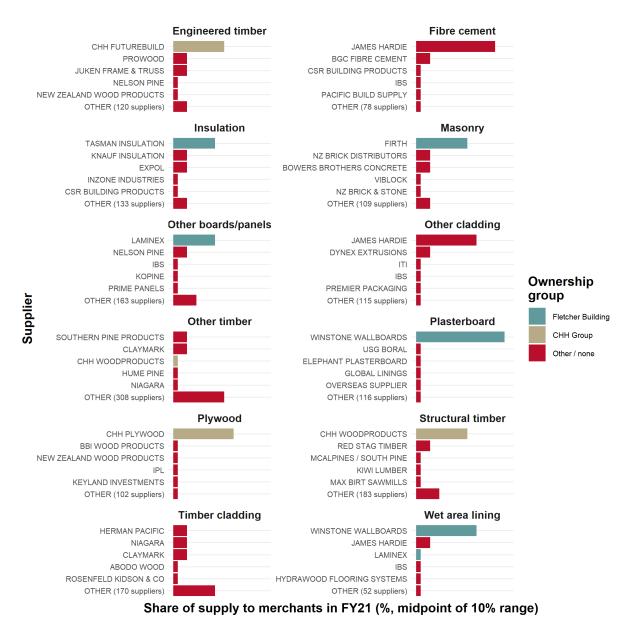
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Andrea Coscelli & Gavin Thompson "Competition & Markets Authority: Economics working paper –
Resilience and Competition Policy", available at:
https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/10
64924/Resilience and competition policy - AC.pdf.

FY21 was the most recent complete financial year at the time we collected the data.

- 6.34 The SSM is a percentage figure that represents the proportion of merchant purchases that each supplier accounted for (per financial year and KBS category). It can be interpreted similarly to a market share percentage, but there are some data limitations:
 - 6.34.1 The five major merchants are significant purchasers of key building supplies, but they are not the only purchasers. In most cases, suppliers do not solely compete to supply these merchants, and therefore our SSM measure only provides a window into the wider markets in which these suppliers compete.
 - 6.34.2 In particular, our lack of data for direct sales gives us low visibility of the six KBS categories that are typically sold directly. Therefore, we only present SSM results for the 12 KBS categories that are primarily distributed through merchants and other retailers (whose purchasing behaviour we expect can be approximated well by the five major merchants, though this may not always be the case). These are the 12 KBS categories in the left-hand column of Table 6.3.
 - As noted above, the KBS categories were constructed by synthesising and aggregating the product hierarchy systems of the merchants. While consistency was prioritised, there is inevitably some imprecision and overlap which has the potential to distort supplier SSMs. Further, the KBS categories are likely to include some accessory and auxiliary products which may inflate the number of small suppliers in each KBS category and deflate the SSMs of suppliers who do not provide these products.
- 6.35 Figure 6.1 below presents supplier SSMs for each of the 12 KBS categories that are primarily distributed through merchants and other retailers. We place each SSM in a 10 percent range, and present the midpoint of that range in Figure 6.1 below.

Figure 6.1 Suppliers' share of supply to merchants by key building supply category, year ended 30 June 2021



Source: Commerce Commission analysis of building supply merchant purchasing data. 352

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- 6.36 We have used our SSM estimates as proxies for market shares to calculate three indicators of concentration:
 - 6.36.1 The 3-firm concentration ratio (CR3) is the sum of the three highest supplier SSMs. It indicates the proportion of total category value held by the three largest suppliers. A higher CR3 reflects a more concentrated market. We have used 70% or above as an indicator of high concentration for the purpose of our analysis (it can range from close to 0% to 100%). 353
 - 6.36.2 The Herfindahl-Hirschman Index (HHI) is the sum of the squares of all supplier SSMs. A higher HHI reflects a more concentrated market, with 2,500 or above typically indicating high concentration (it can range from close to 0 to 10,000). Unlike CR3, HHI includes all suppliers and places greater weight on individual suppliers' sizes. It would describe a market with one large supplier and two small ones as more concentrated than a market with three equally sized suppliers, whereas this distinction would not be captured by CR3.
 - 6.36.3 Lastly, the number of suppliers with at least 5% share of supply to merchants provides a simple overview of how many notable suppliers are active in each category. We consider that three or fewer notable suppliers may indicate that the category is more likely to be highly concentrated.
- 6.37 Table 6.4 below presents these concentration indicators for each KBS category in FY21. The categories are ordered from most to least concentrated based on our estimate of HHI. Indicators are shaded orange if they exceed the concentration thresholds outlined above.

Commerce Commission "Mergers and acquisitions Guidelines" (May 2022), available at: https://comcom.govt.nz/ data/assets/pdf_file/0020/91019/Mergers-and-acquisitions-Guidelines-May-2022.pdf.

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The United States Department of Justice "Herfindahl-Hirschman Index" https://www.justice.gov/atr/herfindahl-hirschman-index.

Table 6.4 Summary of concentration indicators (according to share of supply to merchants analysis), year ended 30 June 2021

	Concentration indicators (calculated using SSM)		(calculated		
KBS category	3-firm concentration ratio (CR3, %)	Herfindahl- Hirschman Index (HHI)	# of suppliers with at least 5% share	#1 supplier ³⁵⁵	
Plasterboard	98	9,271	1	Winstone Wallboards	
Fibre cement	97	7,283	2	James Hardie	
Wet area lining	93	4,926	3	Winstone Wallboards	
Other cladding	87	4,667	2	James Hardie	
Plywood	80	3,991	4	CHH Plywood	
Engineered timber	80	3,379	3	CHH Futurebuild	
Masonry	77	3,271	5	Firth Concrete	
Structural timber	74	2,944	3	CHH Woodproducts	
Insulation	73	2,366	5	Tasman Insulation	
Other boards/panels	62	2,164	5	Laminex	
Timber cladding	42.7	901	6	Herman Pacific	
Other timber	34.7	653	6	Southern Pine Products	

Source: Commerce Commission analysis of building supply merchant purchasing data. 356

6.38 The remainder of this section discusses our interpretation of these concentration measures.

Plasterboard and fibre cement are particularly highly concentrated at the supplier level

6.39 Plasterboard is the most concentrated KBS category at the supplier level regardless of concentration indicator used. The sole notable supplier, Winstone Wallboards (WWB), has a very high SSM which drives very high concentration ratios, particularly the HHI. Moreover, sales through merchants are likely to represent a significant proportion of overall plasterboard sales in New Zealand.³⁵⁷

Business units of Fletcher Building are shaded in teal; business units of CHH Group are shaded in brown.

CR3 figures are rounded to the nearest whole percentage point, whilst HHI figures are rounded to the nearest whole number. We note that market shares presented here are sourced from one data source, and therefore may not be identical to market shares presented elsewhere in this report, [].

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- 6.40 This high concentration reflects and perpetuates a lack of effective competition between plasterboard suppliers. WWB's high share of supply provides it with a significant incumbency advantage including the scale economies it is able to achieve as a supplier. It also benefits from network effects which arise when a product or service becomes more valuable the more users it attracts. Its GIB products are embedded in the building regulatory systems as a preferred product and are commonly specified by brand in building plans. Currently, it does not face material competitive constraint from any other supplier. 358
- 6.41 Fibre cement is also very highly concentrated at the supplier level. One supplier, James Hardie, has a very large share of supply to merchants. The second and third largest suppliers, BGC Fibre Cement and CSR Building Products, have much smaller shares.
- 6.42 We understand James Hardie benefits from a similar incumbency advantage to WWB in terms of achieving significant scale economies and having its products ingrained in regulatory systems, specifier choices, and building plans. It does appear to face more competitive constraint than WWB, both from BGC Fibre Cement and from suppliers of other cladding products (eg, timber cladding). We discuss this further in the following subsection.
- 6.43 Wet area lining is the third-most concentrated KBS category at the supplier level. This is a category where WWB's wet area plasterboard products appear to compete with James Hardie's fibre cement wet lining products. Further, this is the only KBS category where we observe two Fletcher Building business units (WWB and Laminex) among the main suppliers.
- 6.44 Many other KBS categories are also highly concentrated, though to a lesser extent than plasterboard and fibre cement. This is shown most effectively by the HHI measure and illustrated in Figure 6.2 below which presents bar charts of our SSMbased concentration indicators (again for FY21).

Figure 6.1 above includes the top five suppliers of plasterboard to the major merchants. The 'overseas supplier' is likely to be ProRoc, which supplies plasterboard to Bunnings. Except for WWB, they all have very small shares of supply to merchants. We do not consider these suppliers pose a material

competitive constraint on WWB, although we note that recent GIB shortages have given these suppliers (and others) opportunity to grow their market presence.

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KBS categories by CR3 **KBS** categories by HHI Plasterboard Plasterboard Fibre cement Fibre cement Wet area lining Wet area lining Other cladding Other cladding KBS category KBS category Engineered timber Engineered timber Structural timber Structural timber Insulation Other boards/panels Other boards/panels Timber cladding Timber cladding Other timber 100 5 000 10.000 3-firm concentration ratio (%) Herfindahl-Hirschman Index

Figure 6.2 Select concentration indicators by key building supply category, year ended 30 June 2021

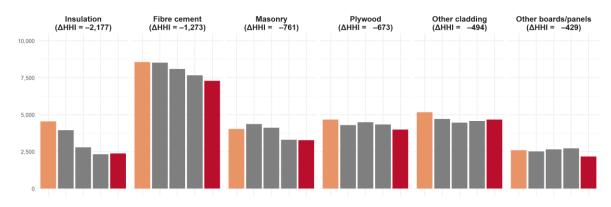
Source: Commerce Commission analysis of building supply merchant purchasing data.³⁵⁹

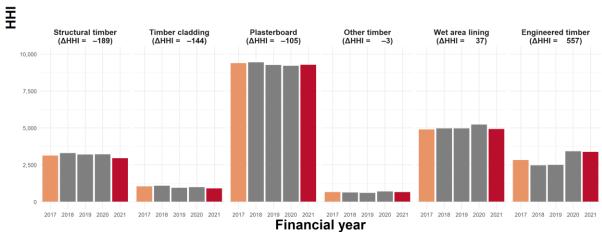
Supplier concentration for some key building supply categories appear to be declining over time

6.45 High concentration may be more indicative of weak competition if it persists over time. Figure 6.3 below shows the HHI of each KBS category across the five-year period FY17-FY21. It also shows the change in HHI (Δ HHI) from FY17 to FY21. A negative Δ HHI indicates a fall in concentration, whereas a positive Δ HHI indicates an increase in concentration. We used the HHI measure because it is more likely to detect small movements in market shares over time than CR3, particularly in highly concentrated markets.

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Figure 6.3 Concentration of key building supply categories over time according to HHI (ordered by ΔHHI, the total HHI decrease between FY17 and FY21)





Source: Commerce Commission analysis of building supply merchant purchasing data.³⁶⁰

- 6.46 Some of the changes in HHI are small and do not suggest a material change in concentration over the period FY17-FY21.
- 6.47 However, our analysis suggests that concentration has fallen in some KBS categories. There has been a marked decrease in concentration in the insulation KBS category between FY17 and FY21 according to HHI.³⁶¹

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- 6.48 Fibre cement also appears to have seen a marked decrease in supplier concentration between FY17 and FY21, although it remains highly concentrated. The fact that rival suppliers were able to expand SSM in the supply of fibre cement, but not in the supply of plasterboard, provides an interesting point of comparison between the two KBS categories.
 - 6.48.1 This may be because fibre cement products can be easier to substitute than plasterboard (even when specified by brand in building plans).³⁶²
 - 6.48.2 However, it has also been suggested that it continues to be very difficult to win market share off James Hardie because of its entrenchment in the regulatory system and in the preferences of decision makers.³⁶³
- 6.49 We also considered movements in individual suppliers' SSM over time.³⁶⁴ A gradual decline in the SSM of an incumbent with a very high share of supply can create a more pronounced HHI effect because of the category's extremely high concentration. We also observed that SSMs in other concentrated categories (aside from insulation) were relatively stable, although engineered timber stood out for its recent increase in the SSM of the main supplier.

Otherwise, there is a generally high and stable level of supplier concentration among key building supply categories

- 6.50 In addition to the very high concentration in plasterboard and fibre cement, we observe a generally high degree of supplier concentration across the 12 KBS categories that are primarily distributed through merchants. Referring back to Table 6.4:
 - 6.50.1 9 out of 12 KBS categories have a 3-firm concentration ratio above 70%;
 - 6.50.2 8 out of 12 KBS categories have an HHI above 2,500; and
 - 6.50.3 6 out of 12 KBS categories have three or fewer suppliers with at least 5% SSM.
- 6.51 This appears to be a somewhat stable situation. Aside from the two KBS categories we identified in the previous subsection (insulation and fibre cement), we generally observed limited movement in concentration indicators and individual supplier SSM over the last five years. However, this is a relatively narrow window of time over which to make such an observation.

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- 6.52 We also observed indications of high concentration in some of the categories that were not included in our merchant data analysis because they are commonly supplied directly to the construction level:
 - 6.52.1 Our concrete case study found that the supply of cement is highly concentrated with two large suppliers (Golden Bay Cement and Holcim) supplying between 75% and 95% of the bulk cement market. As set out in Attachment C, Golden Bay Cement's share has remained relatively constant over the past decade but a third supplier, HR Cement, entered the market in 2012 and now supplies between 5% and 10% of the market.
 - 6.52.2 We received submissions suggesting that steel reinforcing and steel coil (an input into steel roofing) are concentrated at the supplier level. 365
- 6.53 The rest of this chapter discusses some potential causes of the generally high supplier concentration we have observed.

Demand substitutability between key building supplies | Te whakakapia o te hiahia i waenga i ngā tino putunga hanga whare

- 6.54 In this section we discuss the extent to which decision makers (ie, builders, specifiers, and end users) can and do substitute between key building supplies and what this tells us about competition between suppliers.
- 6.55 Our findings are that:
 - 6.55.1 the substitutability of key building supplies falls along a spectrum ranging from direct to indirect;
 - 6.55.2 suppliers compete more closely if decision makers can substitute between their products more easily; and
 - 6.55.3 specification by brand can have a dampening impact on competition between suppliers.
- 6.56 The remainder of this section discusses each of the above findings in detail.

365 Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 29.1; HW Richardson Group Ltd "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 6; Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 23; New Zealand Metal Roofing Manufacturers Association "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 3.

The substitutability of key building supplies falls along a spectrum ranging from direct to indirect

- 6.57 There are different degrees to which key building supplies are substitutes for one another. At a high level, we define two key types of substitution:
 - 6.57.1 two products (or groups of products) are <u>direct substitutes</u> if substitution is viable after building plans have been finalised;
 - 6.57.2 two products (or groups of products) are <u>indirect substitutes</u> if substitution is viable during the planning stage but would be expensive or time-consuming once plans have been finalised (eg, because of the need to reapply for consent and/or change other aspects of the building design).
- 6.58 An example of indirect substitutes might be timber framing and steel framing. While they both fulfil a framing functionality in residential construction, the decision to use one or the other is an important engineering decision with flow-on effects for the rest of the building design and cannot easily be modified after plans have been finalised.³⁶⁶
- 6.59 An example of direct substitutes might be two brands of ready-mix concrete. While there may be some differences in the attributes of products produced by different ready-mix suppliers, in general we would expect they can be easily substituted at any stage of the building process.³⁶⁷
- 6.60 Most instances of substitution between building supplies fall somewhere along the spectrum between direct and indirect. For example:³⁶⁸
 - 6.60.1 We have heard that different insulation products are generally substitutable after building plans have been finalised but that this can be limited by installers' preferences or capability to work between products.³⁶⁹
 - 6.60.2 We have heard that different types of engineered wood board products (eg, plywood, medium-density fibreboard, particleboard) are directly substitutable in most cases, but less so when the products are being used for structural applications such as flooring.
 - 6.60.3 As set out in Attachment B, we consider structural timber framing and laminated veneer lumber (LVL) framing to be direct substitutes because the regulatory system allows LVL to be used as framing when structural grade timber (eg, SG8) is specified in building plans. However, LVL cannot be assigned a structural grade itself which may create behavioural barriers to substitution.

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367	See Attachment C.	
368	[];[
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- One of our aims in constructing KBS categories was to group substitutable products together. Substitution *within* KBS categories is more likely to resemble direct substitution, while substitution *between* KBS categories (to the extent it occurs) is more likely to resemble indirect substitution. However, this is a broad guideline and not a strict rule.
- 6.62 Chapter 5 sets out how building supplies are specified and purchased, including the various factors that can limit substitution between products. The rest of this section discusses what the directness of substitution tells us about competition between suppliers.

Suppliers compete more closely if decision makers can substitute between their products more easily

- 6.63 Suppliers of direct substitutes are likely to compete more closely (all else held equal) because there are low costs to switching between them at all stages of the build. This means decision makers can respond quickly to changes in the price, quality, and availability of the products.
- 6.64 Suppliers of indirect substitutes may provide some competitive constraint on each other, but high switching costs for builders mean the majority of switching decisions are made by designers. We consider designers are less likely than builders to be responsive to short-term competitive conditions for the supply of a product, therefore lowering the potential for these conditions to motivate substitution at the planning stage, because they are less influenced by the final consumer. Moreover, built-in preferences, building styles, and features of the regulatory system can reduce the chance of substitution occurring at all.
- 6.65 A supplier may be able to take steps to reduce the direct substitutability of its products and create strategic barriers for otherwise closely competing suppliers.
- 6.66 For example, suppliers may design product systems around a particular product which can have a tying effect. Product systems are groups of products that work together to achieve a particular function in the build. They are often specified and consented as a collective, and can become ingrained in the building regulatory systems and in the preferences of specifiers and BCAs.³⁷⁰
- 6.67 We understand that both Winstone Wallboards and James Hardie commonly design systems around their core plasterboard and fibre cement products respectively, and that this raises barriers for suppliers who may be able to compete effectively with the core products but not with the wider systems.³⁷¹

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Bunnings "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 9; Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 30.

6.68 Product systems can reduce the ability of a competing product to act as a direct substitute, especially when individual elements of the system cannot be swapped out for other suppliers' products.

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6.69 However, we also acknowledge that product systems can offer benefits to consumers in terms of price, quality, and overall efficiency, and that (because the regulatory system is geared towards installed building work rather than building products) it is not likely to be practical to facilitate increased substitution of products within systems.³⁷²

Specification by brand can have a dampening impact on competition between suppliers

- 6.70 As set out in Chapter 5, specification of building products by brand (as opposed to generic functionality or performance characteristics) is a relatively common practice. This can have the effect of reducing competing products to indirect substitutes when they may otherwise be directly substitutable for the specified product.
- 6.71 In our view, specification by brand is a significant avoidable impediment to the substitutability of building supplies.³⁷³ It can significantly dampen competition between suppliers and protect incumbents from entry and expansion.
- 6.72 Our three case studies provide a useful comparison of the effects of specification by brand on competition between suppliers.
- 6.73 Winstone Wallboards' GIB plasterboard products are commonly specified by brand in building plans. This is an outcome of several factors, including:
 - 6.73.1 New Zealand's structural bracing requirements, which mean plasterboard is commonly used for bracing (unlike many other jurisdictions) and which mean councils often require a brand to be specified at the consenting stage;
 - 6.73.2 the integration of GIB products into plasterboard systems;
 - 6.73.3 additional services provided by Winstone Wallboards (eg, free technical advice and bracing calculators); and
 - 6.73.4 network effects arising from widespread familiarity with GIB.
- 6.74 The specification of GIB in building plans makes it significantly more difficult for suppliers to position alternative plasterboard products as direct substitutes and is one of the drivers of persistent high supplier concentration in the plasterboard market.

New Zealand Building Industry Federation "Submission on residential building supplies market study draft report" (1 September 2022) at [2.11]-[2.12]; Fletcher Building "Submission on residential building supplies market study draft report" (1 September 2022) at [2.12]-[2.13].

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By 'avoidable', we mean it is an impediment that can be overcome, as opposed to natural impediments to substitutability such as major technical differences between products.

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- 6.75 On the other hand, structural timber is typically specified by structural grade (eg, SG8) in building plans. Structural grade is a mostly performance-based measure, defined by New Zealand's standards system, which allows designers to specify structural timber in building plans without reference to a particular brand.³⁷⁴
- 6.76 This makes it more straightforward for decision makers to switch between different brands of structural timber, which increases the intensity of competition between structural timber suppliers.
- 6.77 This is an important reason why competition between structural timber suppliers is more effective than competition between plasterboard suppliers, in normal times when domestic supply is sufficient to meet domestic demand.
- 6.78 As noted above, we consider different brands of ready-mix concrete should be directly substitutable due to the relatively homogenous nature of the product. Our concrete case study found that ready-mix concrete is not usually specified by brand in building plans. However, we heard that RibRaft (a trademarked Firth concrete foundation system) is sometimes specified in building plans and this can make it difficult for other suppliers to compete for those particular jobs.³⁷⁵
- 6.79 See Attachments A, B and C for our full case studies into plasterboard, structural timber, and concrete respectively.

Structural conditions of entry and expansion for suppliers | Tikanga hanganga whakauru, whakawhānui hoki mā ngā kaituku

- 6.80 Competition between suppliers can still work effectively in a concentrated market if barriers to entry are low enough. On the other hand, barriers to entry can contribute to and reinforce supplier concentration, ultimately weakening competition between suppliers.
- 6.81 In this section we discuss the structural conditions of entry and expansion for suppliers of key building supplies. These are the conditions that are generally determined by external factors such as the size of the market and the technologies, resources or inputs a business would need to enter or expand. These include economies of scale and scope, customer switching costs, network effects and the sunk costs of entry.

While structural timber is not specified by brand, the structural grading standards may still make it harder for imports and innovative forms of engineered timber framing to compete. The regulatory system also sets durability requirements that may preclude import competition. We discuss this further in Attachment B.

³⁷⁵ See Attachment C.

- 6.82 There are other types of conditions of entry and expansion. For example, strategic conditions which arise where incumbent firms take action to discourage prospective entrants and expansion. Regulatory conditions (which we generally treat separately from structural conditions though they are technically a subset) include, for example, regulations governing standards and quality, and intellectual property rights such as patent protection. We touch on these conditions in the rest of this chapter, but they are primarily addressed in other chapters.
- 6.83 In respect of structural conditions, our assessment is that:
 - 6.83.1 there are often high sunk costs and scale economies associated with domestic manufacturing;
 - 6.83.2 the variable nature of New Zealand's construction sector can create demand uncertainty; and
 - 6.83.3 the viability of importing can vary between key building supplies.
- 6.84 The remainder of this section discusses each of our three main findings in detail.

There are often high sunk costs and scale economies associated with domestic manufacturing

- 6.85 Building, operating, and maintaining manufacturing facilities for KBS usually requires substantial capital investment. A large customer base is often needed to achieve the economies of scale that would justify such investment. So New Zealand's small size and lack of export efficiencies can make it challenging for domestic manufacturers to reach efficient scale.
- These structural barriers to the entry and expansion of domestic manufacturers limit the number of large manufacturers of KBS that can sustainably operate in New Zealand. We have heard this is the case for many KBS, including plasterboard, structural timber, cement, insulation, and steel roll-forming (an input into steel framing and steel roofing).³⁷⁶

The variable nature of demand in New Zealand's construction sector can create uncertainty

6.87 Demand for key building supplies depends on overall residential building activity. As set out in Chapter 2, residential building activity tends to rise and fall over time. This leads to variability in demand for KBS over time.

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See Attachments A, B and C. Also: Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 30-31; Roofing Association of New Zealand "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 3.

6.88 The uncertainty arising from variable demand for key building supplies creates risk for suppliers when making decisions about entering a market and/or investing in capacity. This tends to impede entry and expansion, especially when there are high sunk capital costs associated with these decisions. Smaller suppliers can be especially exposed to downturns in demand.

The viability of importing can vary between key building supplies

- 6.89 Imports can reduce supplier concentration where the New Zealand market only supports a limited number of domestic manufacturers of a KBS. For example:
 - 6.89.1 Holcim imports cement from Japan to compete with the major domestic manufacturer, Golden Bay Cement. As we discuss in Attachment C, the New Zealand market is likely to support only one domestic manufacturer (Holcim closed its domestic manufacturing facilities in 2016) but an import model can also achieve scale efficiency.
 - 6.89.2 Knauf Insulation, the second largest supplier of insulation to merchants, is an importer. It has manufacturing facilities in Europe, Asia, and North America.³⁷⁷
 - 6.89.3 We also understand that the majority of fibre cement available in New Zealand is imported, with no significant fibre cement manufacturers operating in New Zealand.
- 6.90 However, not all building supplies support import competition. The viability of importing can vary between building supplies due to product characteristics (eg, the size and weight of products making freight costs prohibitive) or market characteristics (eg, regulatory requirements preventing imported products from being approved in consents).
- 6.91 For example, structural timber is primarily a domestic commodity with very little imported from overseas. As we discuss in Attachment B, a range of factors reduce the viability of importing structural timber including limited available capacity on the global market (due to demand from other countries), volatility of international prices, and New Zealand's unique building regulatory system.
- 6.92 Ready-mix concrete is an example of a key building supply that cannot be imported from overseas. New Zealand standards typically require ready-mix concrete to be poured within 90 minutes of manufacture, which means manufacturers typically need to be within a 30km radius of customers. Even beyond this requirement, high freight costs lead to highly localised ready-mix concrete markets.³⁷⁸

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Knauf Insulation "Knauf Insulation is present in more than 40 countries" https://www.knaufinsulation.co.nz/who-we-are/about-us/our-locations.

See Attachment C.

- 6.93 New Zealand's small size, and its distance from other markets and overseas manufacturing facilities, makes the import of international products relatively less attractive in general. Even when imports are viable, there may be scale economies associated with distribution and logistics, with New Zealand's small customer base only allowing a small number of importers to reach efficient scale. This can present a structural barrier to imports.
- 6.94 In summary, import competition can sometimes constrain domestic manufacturers of key building supplies, but it is not guaranteed to do so. It can also be unpredictable due to volatility of international prices and supply levels, as well as exchange rates and freight costs.
- 6.95 Some submitters have commented on the perceived benefits to New Zealand of domestic rather than import supply for some key building supplies, including in relation to supply chain resilience.³⁷⁹ We have considered supply chain resilience more generally when exploring the extent to which competition is working well and consider that competition on the merits between domestic supply and imports is generally likely to be the best way to promote resilient supply.

Countervailing power of merchants and builders | Mana ātete o ngā kaihoko me ngā kaihanga

- 6.96 In this section we discuss the countervailing power of merchants and builders. Countervailing power exists when a customer can substantially influence commercial negotiations, including the price it pays. In moderately concentrated markets, the ability of customers such as merchants and builders to exert countervailing power with suppliers can sometimes support competition and constrain suppliers.
- 6.97 Our assessment is that:
 - 6.97.1 the countervailing power of merchants can intensify competition for KBS unless supplier concentration is too high;
 - 6.97.2 supplier-to-merchant rebates and other volume-based arrangements may increase switching costs and weaken merchants' incentives to use countervailing power; and
 - 6.97.3 builders are less likely to have countervailing power than merchants in their dealings with suppliers of key building supplies.
- 6.98 The remainder of this section discusses each of the above findings in detail.

379 National Association of Steel Framed Housing Inc (NASH) "Submission on residential building supplies market study draft report" (1 September 2022) at 2; Fletcher Building "Submission on residential building supplies market study draft report" (1 September 2022) at [3.6].

The countervailing power of merchants can intensify competition for key building supplies unless supplier concentration is too high

- 6.99 Many suppliers distribute their products through merchants. These suppliers compete with suppliers of similar products to have their products stocked on shelves, including by the five major national merchants who are likely to comprise a large proportion of total purchases from these suppliers.
- 6.100 Building supply merchants have sophisticated centralised procurement processes. We have been told it is common for them to renegotiate contracts and test the market regularly (including through requests for proposals) to ensure they are receiving favourable supply terms. They appear to procure from several suppliers in each category, operating 'tier systems' (eg, primary and secondary suppliers) and deliberately purchasing volume from small suppliers to exert competitive constraint on large ones.³⁸⁰ Overall, we consider that the size, sophistication, and purchasing volumes of the major national merchants is likely to give them a degree of countervailing power with suppliers and, all else held equal, intensify competition between suppliers.
- 6.101 For example, our structural timber case study found that structural timber distributors are generally aware of market pricing and are willing to put pressure on suppliers if their pricing is not in line with competitors, including by switching volume to other suppliers and holding requests for proposals (RFPs) to extract competitive pricing. Further, we found that their ability to do so is supported by their size and sophistication. This provides a competitive constraint in a market with relatively high supplier concentration.
- 6.102 However, there are limits to merchant countervailing power. For example, merchants have little countervailing power when there is only one major supplier to negotiate with in a category (eg, plasterboard and fibre cement). Merchants ultimately need to stock every category to provide a complete offering to their own customers, so in these cases they have no option other than to deal with the sole supplier.³⁸¹

Supplier-to-merchant rebates and other volume-based arrangements may increase suppliers' switching costs and weaken incentives to use countervailing power

- 6.103 Volume-based incentives, as we define them, are contractual terms that reward purchasers for buying a certain volume of product from a supplier (or that require them to do so).
- 6.104 It is reasonably common for agreements between suppliers and merchants to include volume-based incentives. For example, tiered volume rebates, minimum order agreements, and merchant preferred supplier arrangements.

380	[1; [];
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Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 27.

- 6.105 Volume-based incentives, including rebates, may provide more surety to suppliers about sales volumes. They may also allow suppliers to pass along the efficiencies achieved by supplying a significant volume to a single merchant customer.
- 6.106 However, volume-based incentives can increase the cost to merchants of switching between suppliers when switching would cause the merchant to miss out on a certain reward. Chapter 8 discusses agreements between suppliers and merchants in detail, including volume-based incentives and their implications for competition between suppliers.
- 6.107 Volume-based rebates such as the quantity-forcing rebates discussed in Chapter 8 can make it less likely that merchants will switch significant volumes to alternative suppliers. All else held equal, we would expect these types of arrangements to result in each merchant using fewer suppliers thus weakening the effect that merchant's countervailing power may otherwise have in promoting competition between suppliers.
- 6.108 By reducing the total volume that merchants might be willing to shift to another supplier, quantity-forcing rebates can also make it harder for other suppliers to enter and expand.
- 6.109 For some key building supplies, merchants may be able to use their countervailing power to negotiate more favourable and less restrictive contractual terms. However, as noted above, this is less likely to be the case when there is only one major supplier to negotiate with, as is the case for plasterboard and fibre cement. In our view, this is where volume-based incentives are most likely to cause competitive harm.

Builders are less likely to have significant countervailing power

- 6.110 Some suppliers sell their products directly to builders and offsite manufacturers who operate at the construction level of the supply chain as set out in Chapter 2. This is the most common distribution model for six of the 18 KBS categories we have identified.
- 6.111 As set out in Chapter 2, the construction level of the New Zealand residential building supply chain is more fragmented than the distribution level. Therefore, we would not expect any purchaser (or small group of purchasers) who buys direct from a supplier to account for a significant proportion of that suppliers' sales.
- 6.112 We consider it unlikely that any direct supplier of key building supplies is significantly constrained by the countervailing power of individual builders. For example, our case study of ready-mix concrete (which is commonly sold direct) did not find countervailing power to be a major influence on competition.

6.113 Moreover, we have heard that suppliers who typically distribute through merchants, but have the ability to sell directly to the construction level (or through other channels), can use this ability to constrain the buying power of merchants.³⁸²

The impact of vertical integration on supplier and merchant competition | Te pāpātanga o te kōmitimiti poutū ki te whakataetae i waenga i ngā kaituku me ngā kaihoko

- 6.114 In this section we discuss the extent of vertical integration and its impact on competition.
- 6.115 Businesses that are vertically integrated operate at several different levels of the supply chain. For example, a single business might include a supplier and a merchant, or a merchant and a construction business, or a supplier and a merchant and a construction business. We have focused on supplier and merchant levels of the supply chain but also consider the effects of vertical integration involving the construction level.
- 6.116 There are many sectors with vertically integrated businesses. Their presence alone does not indicate that competition is not working well. Indeed, vertical integration can generate efficiencies and lower costs.
- 6.117 It can also limit competition if it enables the integrated business to prevent or limit competition at any of the levels of the supply chain in which it operates.
- 6.118 For example, an integrated business operating at the supplier and merchant level may:
 - 6.118.1 refuse, as a supplier, to supply products to merchants that compete with its related merchants, or only agree to supply to them on less favourable terms. This can result in what is known as input foreclosure and can damage competition at the merchant level of the supply chain;
 - 6.118.2 refuse, as a merchant, to stock products supplied by suppliers which compete with its related supply business. This can result in what is known as customer foreclosure, harming competition at the supplier level of the supply chain;
 - 6.118.3 inappropriately share commercially sensitive information acquired at one level of the supply chain with a related business at another level of the supply chain and distort competition between suppliers or between merchants (internal information sharing); or

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Bunnings "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 7.

- 6.118.4 structure pricing across related business units operating at different levels of the supply chain in a way that reduces competition, including through margin squeeze or cross-subsidisation.
- 6.119 We discuss each of these issues in more detail below. In our view:
 - 6.119.1 Vertically integrated businesses may benefit from the competitive advantage afforded by strong relationships and stability of demand and supply from their own related suppliers and merchants.
 - 6.119.2 However, vertical integration does not appear to be making it difficult for non-vertically integrated suppliers to access distribution channels to compete. There are a number of non-vertically integrated merchant and other distribution options available to them and while related merchants may favour the products of a vertically integrated supplier, they also often stock competing products.
 - 6.119.3 Outside of recent supply shortages where vertical integration has benefitted some merchants, non-vertically integrated merchants do not appear to struggle to access products.
 - 6.119.4 It does not appear that internal information sharing, margin squeeze, or cross-subsidisation, are strategies are being used by vertically integrated businesses to reduce competition.
 - 6.119.5 Overall, vertical integration does not normally appear to have a material adverse effect on competition at either the supplier level or the merchant level.
- 6.120 The remainder of this section provides a detailed discussion of the above topics under the following headings:
 - 6.120.1 the extent of vertical integration in the building supply sector;
 - 6.120.2 the risk of customer foreclosure;
 - 6.120.3 the risk of input foreclosure; and
 - 6.120.4 other ways in which vertical integration could affect competition.

The extent of vertical integration in the building supply sector

- 6.121 This subsection discusses the current extent of vertical integration in the building supply sector, and the potential for it to grow in future. It notes that:
 - 6.121.1 there are two major vertically integrated businesses operating in the building supply sector; and
 - 6.121.2 acquisitions involving multiple levels of the supply chain have the potential to entrench vertical integration.

There are two major vertically integrated businesses operating in the building supply sector

6.122 The building supply merchants PlaceMakers and Carters are integrated with a range of suppliers through their ownership by Fletcher Building and the CHH Group respectively. Table 6.5 below sets out these ownership groups, their business units, and the KBS categories they are active in.

Table 6.5 Vertical integration between suppliers and merchants

Ownership group	Business unit	Main KBS categories/areas of activity
	Altus (50% owned by Fletcher Building) ³⁸³	Doors and windows
	Dimond Roofing	Roofing
	Firth Concrete	Concrete, masonry
	Fletcher Reinforcing	Steel reinforcing
51 . 1 . 5 . 11	Golden Bay Cement	Cement
Fletcher Building	Laminex	Other boards/panels, wet area lining
	Pacific Coilcoaters	Roofing
	Tasman Insulation	Insulation
	Winstone Wallboards	Plasterboard, wet area lining
	PlaceMakers	General building supply merchant Frame and truss manufacturer
	CHH Futurebuild	Engineered timber
	CHH Plywood	Plywood
CHH Group	CHH Woodproducts	Structural timber, other timber
	Carters	General building supply merchant Frame and truss manufacturer

Source: Commerce Commission analysis of data collected from major building supply merchants. 384

- 6.123 Vertically integrated suppliers cover almost every KBS category. Further, many of them are major suppliers in their category. For example, in eight out of 12 of the KBS categories that are typically distributed through merchants, the leading supplier is vertically integrated with either PlaceMakers or Carters (see Table 6.4 above).
- 6.124 As noted in Chapter 2, Fletcher Building is also active at the construction level through Fletcher Living and Clever Core. CHH Group is only active at the supplier and merchant levels.

³⁸³ [].

- 6.125 Fletcher Building and CHH Group have referred to benefits of vertical integration, including:
 - 6.125.1 economies of scale, efficiencies, and lower costs for consumers;³⁸⁵
 - 6.125.2 the ability to invest in greater supply capacity, reflecting confidence in having the required customers to justify that increased capacity;³⁸⁶ and
 - 6.125.3 enhanced opportunities for innovative technologies (eg, the introduction of new products or improvements to existing products) to be identified and trialled and, if successful, deployed more widely across the market.³⁸⁷
- 6.126 We have also received submissions suggesting that more downstream vertical integration could be pro-competitive. Castalia on behalf of the Affordable Building Coalition submitted that vertically integrated house assembly firms, which are relatively common overseas and operate across the distribution and construction levels (as well as being involved with specification), might be better positioned than existing construction firms to negotiate with suppliers and drive down costs for consumers of 'economy class' housing.³⁸⁸
- 6.127 However, as noted above, vertical integration can limit competition if it enables the integrated business to prevent or limit competition at any of the levels of the supply chain in which it operates. We discuss this further below.

Acquisitions involving multiple levels of the supply chain have the potential to entrench vertical integration

- 6.128 Our findings are based on the current level of vertical integration in the sector and its observable effects. However, competitive dynamics could differ if the proportion of vertically integrated to non-vertically integrated businesses changed over time.
- 6.129 The effect on competition of increased vertical integration is a factor considered in any merger involving the acquisition of a business at one level of the supply chain by a business at another level of the supply chain.

Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [37.2].

Carter Holt Harvey "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [7].

Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [37.3].

Castalia on behalf of Affordable Building Coalition "Submission on residential building supplies market study draft report" (1 September 2022) at 9-10; Castalia on behalf of Affordable Building Coalition "Cross submission on residential building supplies market study draft report" (17 October 2022) at 10-12.

- 6.130 However, a potential risk is that a vertically integrated business could make one or more small acquisitions that do not individually raise competition concerns but have the effect of entrenching its vertical integration and the resulting competitive advantages. These are known as creeping acquisitions. 389 ITM raised this risk at our consultation conference and in cross-submissions and provided the example of CHH acquiring a series of small sawmills in Northland. 390
- 6.131 We are aware of the potential competition issues associated with creeping acquisitions and that in some competition regimes they have been addressed by express legislative amendment. Our functions and powers under the Commerce Act include the ability to assess business acquisitions for their effect or likely effect on competition in relevant markets, and whether they appear likely to substantially lessen competition (or have substantially lessened competition, in the case of a non-notified and completed transaction).

The risk of customer foreclosure

- 6.132 This subsection discusses the risk that vertical integration makes it difficult for suppliers to compete by accessing distribution channels and merchants to sell their products. It notes that:
 - 6.132.1 there are non-vertically integrated merchants and other distribution options available;
 - 6.132.2 vertically integrated merchants often stock competitor products but may favour their own; and
 - 6.132.3 the risk of customer foreclosure does not appear to be a significant factor affecting competition between suppliers.

There are non-vertically integrated merchants and other distribution options available

- 6.133 As set out earlier in this chapter, the five major national merchants, including PlaceMakers and Carters, account for a large proportion of total purchases of products in the 12 KBS categories that are typically distributed through merchants.
- 6.134 The ability to access merchant channels, and in particular the five major national merchants, is critical for suppliers to enter and expand in these KBS categories.

Creeping acquisitions can occur when a firm acquires several entities over a period of time, with the lessening of competition only occurring when the acquisitions are considered collectively. They can also occur when a firm with market power makes a small acquisition that increases its market power, even if the increment would not normally raise competition concerns.

ITM "Cross submission on residential building supplies market study draft report" (14 October 2022) at [23]-[28]; Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [1044]-[1064].

- 6.135 Vertical integration between suppliers and merchants can impact competition between suppliers and offer a significant advantage to those that are vertically integrated, particularly during times of low demand or in regions with more limited distribution options.
- 6.136 Vertical integration could impact competition between suppliers if PlaceMakers or Carters have the ability and incentive to use their positions at the merchant level to make it difficult for competing (ie, non-vertically integrated) suppliers to access distribution channels. This is called customer foreclosure.
- 6.137 PlaceMakers and Carters are both major purchasers of key building supplies.

 However, there are a range of other non-vertically integrated distribution options available to suppliers. This reduces the risk of targeted nationwide customer foreclosure.
- 6.138 For example, any supplier that either of these merchants refused to stock would still have a range of distribution options including the other four major merchants.

 Further, there is no category in which both PlaceMakers and Carters are vertically integrated (and so might both be incentivised to attempt customer foreclosure).

Vertically integrated merchants often stock competitor products but may favour their own

- 6.139 PlaceMakers and Carters have both told us that they prefer to use multiple suppliers in each category. 391 As such, they often stock competitor products along with those of their vertically integrated suppliers. For example:
 - 6.139.1 PlaceMakers stocks Nelson Pine's medium-density fibreboard (MDF) panel products as well as Laminex's, and Expol's insulation products as well as Tasman Insulation's.³⁹²
 - 6.139.2 Carters stocks BBI's plywood products as well as CHH Plywood's, and Prowood's engineered timber products as well as CHH Futurebuild's.
- 6.140 However, there are some exceptions to this. For example, our structural timber case study found that Carters procures nearly all of its structural timber from CHH Woodproducts. This built-in demand gives CHH Woodproducts a significant advantage over other structural timber suppliers (for whom stability of demand can be a major risk and barrier to entry/expansion).

391 []; []. 392 [6.141 Vertically integrated merchants may also have an incentive to promote the products of related suppliers, even if they stock others. For example, submissions suggested that PlaceMakers has previously tended to steer large commercial customers towards using GIB, which has made it difficult for Elephant Plasterboard to win the business of those customers.³⁹³

The risk of customer foreclosure does not appear to be a significant factor affecting competition between suppliers

- 6.142 In summary, the evidence suggests that vertically integrated suppliers are likely to have a competitive advantage over non-vertically integrated suppliers, all else held equal. Non-vertically integrated suppliers have raised some concerns about their ability to have their products stocked by merchants, which is a risk that a vertically integrated supplier would likely be insulated from. Further, this competitive advantage may be especially pronounced during times of low demand or in regions with more limited distribution options.
- 6.143 However, due to the wide range of non-vertically integrated distribution options that remain available, non-vertically integrated suppliers currently appear to be able to compete with vertically integrated suppliers. Even in markets where this is not the case (eg, plasterboard), the risk of customer foreclosure does not appear to be a key factor affecting competition.

The risk of input foreclosure

- 6.144 This subsection discusses the risk that a vertically integrated business refuses to supply products to competing merchants, or supplies them on less favourable terms. It notes that:
 - 6.144.1 there is a risk of non-vertically integrated merchants being unable to access key building supplies from vertically integrated suppliers;
 - 6.144.2 certain types of allocation policies during supply shortages can benefit vertically integrated merchants; and
 - 6.144.3 outside of supply shortages, the risk of input foreclosure does not normally appear to be a significant factor affecting competition between merchants.

There is a risk of non-vertically integrated merchants being unable to access key building supplies

6.145 Vertical integration could potentially make it harder for non-vertically integrated merchants to compete if they are unable to secure access to key building supplies. For example, there is a risk that Fletcher Building or CHH Group could seek to limit competition from other merchants by restricting supply to them of key inputs such as plasterboard and structural timber, or supplying them on less favourable terms.

Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [734]-[753].

6.146 The risk of input foreclosure is higher when a vertically integrated supplier has a large share of supply. For this reason, there is a heightened risk of input foreclosure in the eight KBS categories where the leading supplier is vertically integrated.

Certain types of allocation policies during supply shortages can benefit vertically integrated merchants

- 6.147 During recent supply shortages, allocation policies were put in place for plasterboard and structural timber supplied by Winstone Wallboards and CHH Woodproducts respectively.³⁹⁴ We understand that some of Fletcher Building's other business units, and some non-vertically integrated suppliers, also implemented allocation policies for products subject to supply shortages.³⁹⁵
- 6.148 We understand that the policies utilised by Fletcher Building allocated product between merchants proportionally based on recent purchasing history. As discussed in Attachment A in the case of plasterboard, this does not appear to favour PlaceMakers over other merchants. Similarly, we understand that James Hardie's allocations of fibre cement products did not favour any particular merchant.³⁹⁶
- 6.149 However, during the recent shortage, we are aware that Carters has benefitted from being guaranteed structural timber supply from CHH Woodproducts, and that CHH Woodproducts did not include some of Carters' main competitors in its timber allocations. Given CHH Woodproducts is a large supplier of structural timber in New Zealand, this significantly limits the pool of potential supply sources for those merchants.
- 6.150 CHH has explained that it decided to fulfil delivery orders to customers that had purchase commitments with it. Customers that had not provided a purchase commitment were not included in its timber allocations during the shortage. The two customers that had provided purchase commitments (Carters and PlaceMakers) continued to receive supply. 398

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For example, Winstone Wallboards "GIB plasterboard customer allocation process overview", available at: https://www.gib.co.nz/assets/Uploads/GIB-Flow-Chart-Allocation-Process-0422.pdf; Carter Holt Harvey "Cross submission on residential building supplies market study draft report" (13 October 2022) at [20]-[21], [24]-[25].

For example, Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [581]-[607]; []; [].

Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [581]-[607].

For example: NZ Herald "Housing: Carter Holt Harvey cuts timber supplies to Mitre 10, Bunnings, ITM" (27 March 2021), available at: https://www.nzherald.co.nz/business/housing-carter-holt-harvey-cuts-timber-supplies-to-mitre-10-bunnings-itm/P3T6DQ2PBT4JDZ64AAF26WIRU4; Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [536]-[671]; []; [].

Carter Holt Harvey "Cross submission on residential building supplies market study draft report" (13 October 2022) at [20]-[21], [24]-[25]; [].

- 6.151 Due to the shortage, we understand that the merchants that were not included in CHH's allocations found it difficult to replace the lost volumes that they had previously purchased from CHH.³⁹⁹ This appears to have affected competition between merchants in the short term.
- 6.152 Affected merchants told us that, due to being unable to satisfy structural timber orders, in some cases:⁴⁰⁰
 - 6.152.1 they have lost customers (including for products other than structural timber);
 - 6.152.2 they have suffered reputational damage; and
 - 6.152.3 that sales representatives at certain competing merchants capitalised on the opportunity to inform customers that they could guarantee supply when other merchants could not.
- 6.153 The extent to which these effects may persist in the long term, now that demand and available supply appear to be returning to a more normal balance, is unclear.
- 6.154 In our view, it does not appear that CHH gave or intended to give preferential treatment to vertically integrated merchants. While CHH's approach differs from other suppliers that offered pro-rata allocations based on recent purchasing history, CHH appears to have taken a justifiable commercial decision to prioritise its contractual commitments in the face of limited supply.
- 6.155 However, suppliers of key building supplies should, in times of supply constraint, be mindful that their decisions on the allocation of available supply have the potential to affect competition. In some circumstances, allocation models that have significant non-transitory effects on competition risk breaching Part 2 of the Commerce Act. We consider that, all else held equal, a pro-rata allocation model based on recent purchasing history carries a lower risk than a model that does not include some existing customers.
- 6.156 We retain the ability to investigate any conduct of this nature if there is reason to believe that it may breach the Commerce Act. We encourage any supplier deploying, or considering deploying, similar allocation models in times of supply shortages to review them for compliance with sections 27 and 36 of the Commerce Act.

399	[]; [].	
400	[]; []; [].

Outside of supply shortages, the risk of input foreclosure does not normally appear to be a significant factor affecting competition between merchants

- 6.157 ITM, Mitre 10, and Bunnings acknowledged that vertical integration is not necessary to compete in the sector. However, they stated that vertical integration may provide a competitive advantage in some situations.⁴⁰¹
- 6.158 With the exception of CHH's approach to structural timber allocation during recent supply shortages, we have not seen evidence of non-vertically integrated merchants having difficulty accessing inputs from vertically integrated suppliers.
- 6.159 In summary, we generally observe competition between merchants to be working relatively well at the national level as set out in Chapter 7. Any ongoing challenges faced by merchants obtaining access to supplies do not appear to be attributable to the vertical integration of suppliers and competing merchants.

Other ways in which vertical integration could affect competition

- 6.160 Vertically integrated businesses can also employ strategies to advantage their own business units and reduce competition between suppliers and/or between merchants through:
 - 6.160.1 internal information sharing; and/or
 - 6.160.2 pricing strategies such as margin squeeze and cross-subsidisation.
- 6.161 These strategies do not appear to be employed in the supply of key building supplies. Nevertheless, we discuss below the potential for them to provide a competitive advantage to a vertically integrated firm.

Internal information sharing

- 6.162 Vertically integrated businesses can benefit from internal information sharing.
- 6.163 While internal information sharing can better enable efficient use of resources and planning within a vertically integrated business, it can also reduce competition.
- 6.164 First, as with other advantages from vertical integration, having access to information relating to multiple levels of the supply chain can create such a significant competitive advantage that it may make it difficult for other firms to operate as efficiently as the vertically integrated firm at some levels of the supply chain.

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Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [161]-[164]; Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 29; Bunnings "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 7.

- 6.165 Second, a merchant that is vertically integrated with a supplier may share with them information about pricing strategies of competing suppliers, enabling the vertically integrated supplier to utilise that information for their own competitive advantage for example, in preparing a bid.
- 6.166 While some submitters expressed concerns about information sharing within competing vertically integrated businesses, we were not provided with specific evidence of this having likely occurred.⁴⁰²
- 6.167 We also consider that internal information sharing protocols are likely to protect against the risk of this occurring.⁴⁰³
- 6.168 We have not seen any evidence to suggest that internal information sharing is currently a factor affecting competition between vertically integrated business and competing suppliers and merchants. While we acknowledge the theoretical risk, it does not warrant making recommendations for change or initiating an investigation under the Commerce Act.

Margin squeeze

- 6.169 A margin squeeze (or price squeeze) can occur if a vertically integrated supplier sets prices in a way that reduces the margin available to merchants that compete with its own related merchant, making it more difficult for them to profitably operate at the merchant level.
- 6.170 For example, a supplier with market power could charge a lower price to its own vertically integrated merchant than it charges to competing merchants. This could affect competition between merchants as it would give the vertically integrated merchant a cost advantage over its competitors.
- 6.171 This has the potential to prevent efficient competitors at the merchant level from competing on merits with the vertically integrated merchant, or to prevent competing merchants from gaining sufficient size and scale to achieve an equal footing with existing participants in the market.

[]. In certain situations sharing bidding information of this nature would breach the cartel prohibition set out in the Commerce Act, [

], Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [936]-[953]; []; and [

At our consultation conference, Elephant Plasterboard raised concerns that its private tender bids may have previously been shared with Winstone Wallboards by PlaceMakers, allowing Winstone Wallboards to undercut them. Fletcher Building responded "We are alive to the risk and we manage it well", Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [844]-[865] and [878]-[879].

6.172 While one submitter reported an instance of margin squeeze by a vertically integrated supplier, we have not received sufficient evidence to conclude that margin squeezing is occurring on an ongoing and systemic basis, or whether this instance would likely be sufficient to affect competition. 404, 405

Cross-subsidisation

- 6.173 Vertically integrated businesses can organise their prices and costs in a way that allows them to maximise profits, which sometimes involves funding low prices at one level of the supply chain by setting high prices at another level. This is called cross-subsidisation.
- 6.174 Cross-subsidisation can generate efficiencies and be pro-competitive to the extent it allows the vertically integrated business to price competitively at each level of the supply chain.
- 6.175 However, cross-subsidisation can affect competition if a business unit cross-subsidises another business unit to help them gain or defend market power. It can also reduce competition if it protects a less efficient or less profitable business unit, when that business unit would otherwise be outcompeted by non-vertically integrated competitors and forced to exit the market.
- 6.176 On the basis of current evidence, it does not appear that cross-subsidisation is affecting competition in the building supply sector. However, we note that the ability to cross-subsidise remains a competitive advantage afforded to vertically integrated businesses that can lead to both efficiencies and market power.

At our consultation conference, ITM mentioned concern about the risk of margin squeezing by vertically integrated competitors, particularly in relation to structural timber / frame and truss, and said they are aware of one example of losing an ongoing customer because a vertically integrated merchant was able to bid below ITM's cost price.

l], Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [165]-[208];

In its cross submission, CHH asserted that it ensures "pricing fairness" between Carters and other third-party customers, and [], Carter Holt Harvey "Cross submission on residential building supplies market study draft report" (13 October 2022) at [19].

At our consultation conference, Monopoly Watch suggested that Fletcher Building will sometimes make losses at the construction level in order to cross-subsidise and protect dominance at the supplier and merchant level. Fletcher Building said its construction business operates on an independent stand-alone basis, Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [274]-[298] and [382]-[406].

Chapter 7 Competition between merchants | Te whakataetae i waenga i ngā kaihoko

Summary of findings

- Competition between building supplies merchants appears to be working relatively well
 at the national level, but we have identified some factors that may be limiting
 competition.
- Five major building supplies merchants (PlaceMakers, Carters, ITM, Mitre 10 and Bunnings) compete nationwide to provide the bulk of supplies for residential building in New Zealand. There is also a fringe of other competing distributors including BuildLink, a range of specialist and online merchants, and direct supply to builders from some product manufacturers or installers.
- Merchants compete to supply trade customers at two main geographic levels.
 - O Competition for national customers (eg, GHBs). PlaceMakers, Carters and ITM are the three main competitors for national customers. Mitre 10 and Bunnings may compete for some of these customers, but appear to be more focused on smaller local builders and the retail DIY market.
 - Competition for regional customers, which are primarily SME builders operating locally.
- Shares of supply for the major merchants, calculated based on sales of key building supplies to trade customers, have been changing over time. The data we have received indicates that the largest merchant (PlaceMakers) has lost national market share over the past five years. This suggests there is some competitive tension between building supplies merchants.
- However, the number of competing merchants varies between regions, and concentration has been increasing in some regions. There tend to be fewer competing merchants in less populated regions, reflecting the smaller customer bases in these areas.
 In some locations there are only one or two major building supplies merchants.
- We have observed some factors which may be preventing competition at the merchant level from working more effectively, including merchants lodging covenants on land and entering into exclusive leases with landlords.
 - o In addition to land use restrictions under planning laws, land covenants and exclusive leases can limit other merchants' ability to access suitable sites to open stores.
 - We are also aware of examples where merchants are benefitting from covenants on land zoned for residential development, or similar clauses in sale and purchase agreements, which give them preferential rights to supply building materials for houses to be built.
- As discussed in Chapter 6, there is a risk of vertically integrated operators supplying key building supplies to their own merchant businesses ahead of competing merchants. However, outside of the recent supply shortages, we have not seen evidence of nonvertically integrated merchants having difficulty accessing inputs from vertically integrated suppliers. Therefore, vertical integration does not normally appear to be a significant factor affecting competition between merchants.

Introduction | Kupu whakataki

- 7.1 This chapter discusses competition at the merchant level. It explores the extent of competition in the distribution of key building supplies.
- 7.2 The topics covered are:
 - 7.2.1 an overview of New Zealand's building supplies merchants;
 - 7.2.2 the degree of concentration at the merchant level;
 - 7.2.3 conditions of entry and expansion for merchants; and
 - 7.2.4 the impact of vertical integration on competition between merchants.
- 7.3 Rebates from merchants to builders and merchant loyalty schemes are discussed separately in Chapter 8.

Overview of New Zealand's building supplies merchants | Tirohanga whānui ki ā Aotearoa kaihoko putunga hanga whare

- 7.4 This section provides an overview of New Zealand's building supplies merchants. It notes that:
 - 7.4.1 five major merchants compete to distribute key building supplies;
 - 7.4.2 other distributors also provide key building supplies;
 - 7.4.3 competition between merchants occurs at national and regional levels; and
 - 7.4.4 merchants supply the products specified in building plans, but also seek to differentiate themselves through the range they offer.

Five major merchants compete to distribute key building supplies

7.5 Merchants are intermediaries who purchase building supplies from suppliers and sell them to builders and retail/DIY customers. 407 The key functions merchants provide are warehousing of a wide range of products in convenient locations and managing delivery of materials to building sites.

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As discussed in Chapter 2, there is a wide range of different business models for builders, including SME builders and nationwide GHBs.

7.6 There are five major national building supplies merchants in New Zealand: PlaceMakers, Carters, ITM, Mitre 10 and Bunnings. The major merchants typically stock all categories of key (and other) building supplies, with the breadth of their range dependent on the size and location of each store. A brief overview of the five major merchants is included in Table 7.1 below.

Table 7.1 Overview of the five major merchants

Merchant	Description of business
PlaceMakers	PlaceMakers is the merchant business of Fletcher Building Group and is operated by Fletcher Distribution Limited. PlaceMakers supplies mainly to trade customers. It has 59 stores throughout NZ.
ITM	ITM is a co-operative of building supplies merchants. It was founded in 1991 by local timber suppliers/mills seeking alternative distribution. ITM supplies mainly to trade customers. It has 97 stores throughout NZ.
Carters	Carters is the merchant business of Carter Holt Harvey Limited, which includes CHH Woodproducts (the largest producer of structural timber in NZ). Carters supplies mainly to trade customers. It has 71 stores throughout NZ.
Bunnings	Bunnings is owned by Wesfarmers Limited. Bunnings supplies mainly to the DIY market segment and to smaller builders. It has 52 stores throughout NZ.
Mitre 10	Mitre 10 is a co-operative of building supplies merchants. Mitre 10 supplies mainly to the DIY market segment and to smaller builders. There are 82 stores operating under the Mitre 10 brand throughout NZ.

Note: This table includes the number of merchant stores which sold key building supplies during 2021.

Source: Commerce Commission analysis of information provided by the major building supplies merchants.⁴⁰⁹

- 7.7 Each of the five major merchants has stores throughout New Zealand. Figure 7.1 and Figure 7.2 below show the location of major merchant stores which sold key building supplies during 2021, for the North Island and South Island respectively. 410 Although merchant presence varies by region, all five major merchants typically have one or more stores in each of the main metropolitan areas.
- 7.8 Attachment G includes additional maps showing the locations of the major merchants' stores in Auckland, Wellington, Christchurch and Dunedin.

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Merchants' ranges extend beyond 'key building supplies' as defined by the terms of reference for the study. They include, for example, plumbing and electrical supplies, decorative ranges, kitchen and bathroom fittings. The merchants also supply commercial (as well as residential) trade customers and retail customers.

^{409 []}

These maps do not capture new store openings or closures during 2022, or Fletcher Distribution Limited's acquisition of Tumu Merchants Limited.

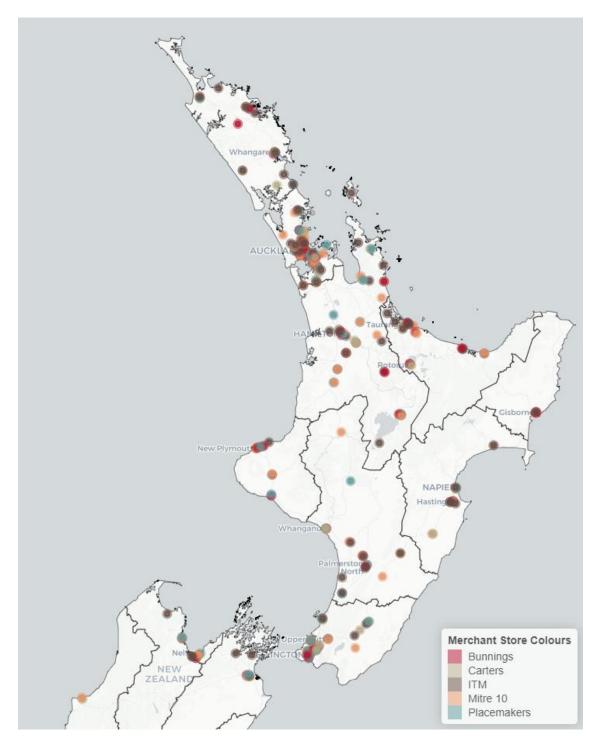


Figure 7.1 Merchant store locations – North Island (2021)

Note: In areas with multiple stores in close proximity, the markers may overlap and hide some store locations.

Source: Commerce Commission analysis of information provided by the major building supplies merchants.⁴¹¹

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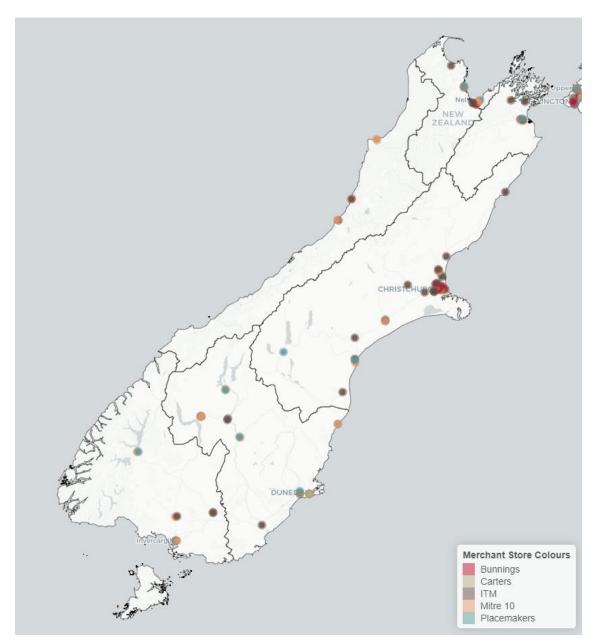


Figure 7.2 Merchant store locations – South Island (2021)

Note: In areas with multiple stores in close proximity, the markers may overlap and hide some store locations.

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Source: Commerce Commission analysis of information provided by the major building supplies merchants. 412

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Other distributors also provide key building supplies

7.9 In addition to the major merchants, there are a range of other businesses that also distribute key building supplies to builders. These other distributors include:

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- 7.9.1 BuildLink;
- 7.9.2 specialist and online merchants; and
- 7.9.3 direct supply by manufacturers and/or installers of certain products.
- 7.10 We have not focused on these other distributors in this study, given the majority of sales of most key building supplies appear to be made through the five major merchants.⁴¹³
- 7.11 BuildLink is a sixth national building supplies merchant, but is smaller than the five major merchants. BuildLink is a co-operative of building merchants which sells mainly to small-to-medium sized trade customers. It has 40 stores throughout New Zealand. 414
- 7.12 Specialist merchants are smaller merchants or retailers who are either based in a certain location or supply a certain product line. For example, these specialist providers include Woodmart, Harts Fasteners, Rosenfeld Kidson, BBS Timbers, Herman Pacific, South Pacific Timber, JA Building Supplies and ITI Timspec. There are also merchants such as Trade Direct which have a significant online presence.
- 7.13 Some manufacturers also directly supply their products to builders. This appears to be particularly focused around product categories such as ready-mix concrete, window joinery and steel. There are also specialist installers for some products, such as insulation and roofing.

Competition between merchants occurs at national and regional levels

- 7.14 Merchants compete to supply trade customers at two main geographic levels:
 - 7.14.1 Competition for national customers (eg, GHBs and Kāinga Ora). These customers typically negotiate terms of supply with merchants on a national or multi-regional basis.

For example, 82% of respondents to our builder/specifier survey indicated that they purchase most of their key building supplies through the major merchants,

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Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [4.2(a)]; Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 4-5.

BuildLink "Find a Store" https://buildlink.co.nz/find-a-store/.

Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 31 and 33; Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 5.

- 7.14.2 Competition for regional customers (eg, SME builders). These smaller customers typically negotiate terms of supply with merchants at a local or regional level.
- 7.15 Competition for large national customers appears strongest between PlaceMakers, Carters and ITM, although Mitre 10 and Bunnings also compete for some of these customers. 417 We understand that PlaceMakers, Carters and ITM have the largest shares of supply for national customers. 418 Mitre 10 and Bunnings supply trade customers, but appear to be more focused on SME builders and the retail DIY market. 419
- 7.16 It appears that many residential building jobs are quoted, and trade customers often 'shop around' multiple merchants for the best price and terms. 420 We understand that:
 - 7.16.1 national customers such as GHBs tend to test the market periodically through tenders or RFPs;⁴²¹ and
 - 7.16.2 SME builders may have a preferred merchant, but also tend to have accounts with other merchants (which they may use where there is better pricing or product availability).⁴²²

Monopoly Watch New Zealand (MWNZ) submitted the view that "Bunnings and Mitre 10 are mainly small scale and DIY, with a largely different sales mix to the commodity / Market structure driven Carters and PlaceMakers." MWNZ "Submission on residential building supplies market study draft report" (1 September 2022) at 5.

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419 []; [].

Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [46.5]; Carter Holt Harvey "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 5; Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 2. In addition, 83% of respondents to our builder/specifier survey indicated that they either "sometimes" (33%), "often" (28%), or "always" (22%) seek quotes from different suppliers or merchants before deciding which one to purchase from,

422 []; [].

7.17 The size and scale of purchasers is a material factor in securing the best prices for key building supplies. Data provided by the five major merchants shows that merchants generally achieve lower profit margins when supplying larger customers. ⁴²³ This is expected, due to the greater volume of building materials purchased by larger builders.

Merchants supply the products specified in building plans, but also seek to differentiate themselves through the range they offer

- 7.18 There is a distinction between whether a merchant stocks a product, or provides indent supply. Stocking means that the merchant holds the product at its stores, ready for sale. Indent supply means that a merchant supplies the product on request, but does not hold stock.
- 7.19 Although merchants will generally supply any product their customers want, they stock a more limited range. The products merchants stock are typically familiar, certified or appraised, and have a clear Building Code compliance pathway. This is because these are the products most commonly required by builders, for example, because they are specified in building plans.⁴²⁴
- 7.20 Factors affecting competition at the supplier level can flow through to reduced range at the merchant level. For example, merchant stocking decisions can be affected by any barriers to entry or expansion for suppliers associated with the building regulatory system, or the approach to specifying products in building plans.
- 7.21 We understand that merchants generally prefer to have several suppliers for each product category. This is because:⁴²⁵
 - 7.21.1 there is the potential for individual suppliers to experience supply disruptions, and having several suppliers provides some supply chain resilience; and
 - 7.21.2 having several suppliers, rather than one or two, creates competitive pressure.

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See Chapter 5 for further discussion. As discussed in Chapter 8, we understand that having products stocked by merchants in sufficient quantities is important for smaller suppliers to get established in the market.

For example, [].

- 7.22 Some merchants seek to differentiate their offer by supporting new entrant suppliers. For example, Mitre 10 actively assisted Bradford Gold insulation (supplied by CSR) to maintain and expand its presence in the New Zealand market. ⁴²⁶ This may also help create competitive pressure, as noted in paragraph 7.21.2 above.
- 7.23 Competition between merchants for sales of some products appears more intense than others. This may reflect merchant stocking decisions for example, competition for supply of a particular product may be greater if it is stocked by all merchants. A merchant referred to the potential to make greater margins on products which are not front of mind for their customers.⁴²⁷
- 7.24 Data supplied by the five major merchants suggests that merchant gross profit margins for key building supplies can vary significantly between product categories, and between merchants for the same product category. 428 We have not undertaken a detailed analysis of margins and profitability.

Degree of concentration at the merchant level | Tirohanga whānui ki ā Aotearoa kaihoko putunga hanga whare

- 7.25 This section discusses merchant market shares and the degree of concentration at the national and regional levels.⁴²⁹ It notes that:
 - 7.25.1 there have been changes in national market shares over time, with PlaceMakers (in particular) losing share over the last five years; and
 - 7.25.2 the degree of concentration varies between regions.
- 7.26 Although we have not formally defined a market as part of this study, we refer to our estimations as market shares in the analysis below. Our analysis of market shares and concentration is based on data provided by the major merchants and is subject to the following methodological limitations:
 - 7.26.1 Our analysis of market shares and concentration only includes the five major merchants, so some values may be overestimated.

[

An industry or market is considered to be more concentrated if relatively few suppliers control a large share of supply. The most extreme example of concentration is where a single supplier controls all the supply (ie, a monopoly).

Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 26.

^{].} ⁴²⁷ []. ⁴²⁸ []

- 7.26.2 We have calculated market shares based on sales of key building supplies to trade customers (ie, retail sales to DIY customers are excluded for Bunnings and Mitre 10).⁴³⁰
- 7.26.3 Our analysis does not account for differences in customer segments (eg, national customers vs SME builders). National market shares have been calculated by aggregating store-level sales.

There have been changes in national market shares over time, with PlaceMakers losing share

7.27 PlaceMakers currently has the largest share of sales of key building supplies. In 2021, PlaceMakers had a market share between 25% and 35%. Approximate market shares for the five major merchants, presented using 10% bands, are shown in Table 7.2 below.⁴³¹

Table 7.2 Merchant market shares of sales of key building supplies (2021)

Merchant	Market share
PlaceMakers	25-35%
ITM	20-30%
Carters	20-30%
Bunnings	5-15%
Mitre 10	5-15%

Note: As discussed in paragraph 7.26 above, these market shares are based on sales of key building supplies to trade customers, for the five major merchants only.

Source: Commerce Commission analysis of data supplied by the five major merchants. 432

Retail/DIY sales are included in our dataset for PlaceMakers, Carters and ITM, but we understand that these account for a small proportion of their total sales.

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- 7.28 Concentration measures, such as the three-firm concentration ratio (CR3) and Herfindahl-Hirschman Index (HHI), can indicate levels of competition in a market. The three largest merchants hold over 80% of sales of key building supplies. However, the merchant channel has become slightly less concentrated over the past five years, with the HHI decreasing from approximately 2700 to 2400 between 2017 and 2021.
- 7.29 Although PlaceMakers is the largest of the five major merchants, the data we have received indicates that it lost market share for sales of key building supplies between 2017 and 2021. 435 ITM has gained market share, while market shares for Bunnings, Carters and Mitre 10 have remained relatively constant over the five-year period. Market shares changing over time can be an indication that competition is working well, with customers switching to alternative providers with better offerings.

The degree of concentration varies between regions

- 7.30 The degree of concentration varies throughout New Zealand, depending on how many merchants are operating in each local or regional market and the attractiveness of their offers. There are examples of some locations where there are only one or two building supplies merchants. 436 Although not determinative, these differences in concentration support the view that competition varies across regions.
- 7.31 Our analysis suggests that concentration at the merchant level is generally higher in less populated and more rural regions of New Zealand. This is likely to reflect the reduced commercial viability of operating merchant stores in these areas, due to the smaller customer bases able to be served.
- 7.32 We have used the boundaries of the 16 regional councils and unitary authorities throughout New Zealand when considering regional concentration. In 2021, the largest merchant in 11 of these 16 regions had greater than 40% market share.
- 7.33 However, we have not undertaken a detailed assessment of regional concentration in this study. For example, we have not assessed the boundaries of any regional or local market, or whether a regional level is the appropriate geographic dimension, as part of a formal market definition exercise.

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As discussed in Chapter 6, a higher CR3 reflects a more concentrated market, with 70% or above indicating high concentration.

As discussed in Chapter 6, the HHI is the sum of squares of market shares. A higher HHI reflects a more concentrated market, with 2,500 or above indicating high concentration (it can range from 0 to 10,000).

For example, hui participants noted that PlaceMakers is the only merchant operating on Waiheke Island, Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 3 and 8.

- 7.34 The degree of concentration in each region, as measured by the three-firm concentration ratio and HHI, is shown in Figure 7.3 and Figure 7.4 below. This suggests that the most concentrated regions are Gisborne, Northland, Southland, Tasman and the West Coast.
- 7.35 Concentration has changed in some regions between 2017 and 2021. Some regions have become more concentrated for example, the HHI has increased for Bay of Plenty, Manawatū-Whanganui, Marlborough and Tasman. Others have become less concentrated for example, the HHI has decreased for Auckland, Canterbury, Gisborne, Nelson and Otago.

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Figure 7.3 HHI by region (2017 and 2021)

Source: Commerce Commission analysis of data supplied by the five major merchants.⁴³⁷

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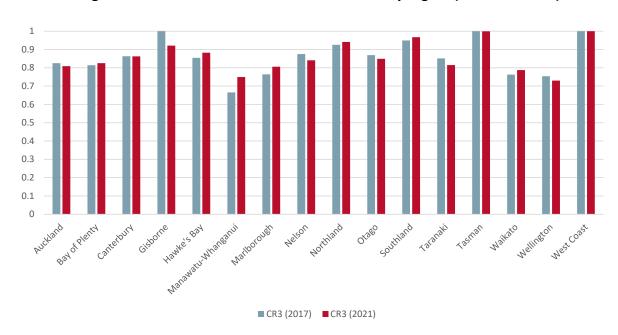


Figure 7.4 Three-firm concentration ratios by region (2017 and 2021)

Source: Commerce Commission analysis of data supplied by the five major merchants. 438

7.36 Our analysis of data supplied by the five major merchants shows that gross profit margins are generally higher in provincial and rural areas than metropolitan areas. 439 This may reflect the fact that less densely populated areas tend to be serviced by fewer competitors than more densely populated ones.

Conditions of entry and expansion for merchants | Ngā tikanga whakauru, whakawhānui hoki mā ngā kaihoko

- 7.37 This section discusses the conditions for entry and expansion for building supplies merchants. To enter or expand, a merchant needs to:
 - 7.37.1 find a location for a store (and develop the site, if it is a greenfield site);
 - 7.37.2 secure supply of building products to put in the store; and
 - 7.37.3 attract customers to buy from its store.
- 7.38 The discussion below notes that:
 - 7.38.1 limited availability of suitable sites can restrict entry and expansion by merchants; and

We allocated each of the five major merchants' stores into three geographic areas: metropolitan, provincial and rural. Our analysis shows that gross profit margins becomes progressively higher when moving from metropolitan centres, to provincial centres, to rural areas.

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^{438 [].}

- 7.38.2 land covenants, exclusive leases and other contractual provisions with similar effect appear to be further limiting competition between merchants.
- 7.39 Apart from the recent shortages affecting products such as plasterboard and structural timber, it does not appear there are significant concerns regarding merchants' ability to secure supply of building products. Chapter 6 discusses this further.
- 7.40 Potential barriers to builders switching between merchants, such as rebates and loyalty schemes, are discussed separately in Chapter 8. These factors could make it harder for merchants to attract customers.

Limited availability of suitable sites can restrict entry and expansion by merchants

- 7.41 Access to suitable sites may constrain entry and expansion by building supplies merchants. Merchants have told us that it can be difficult to access suitable land for stores.
- 7.42 There are several key factors in finding suitable sites. Examples are listed below:
 - 7.42.1 **Location:** The land needs to be in a suitable location for customer traffic and/or to facilitate delivery of materials to building sites. The suitability of land may also be influenced by the existing networks of stores (for example, a merchant may already have an existing store nearby). 440
 - 7.42.2 **Size:** The land needs to be large enough for a building supplies merchant. This can be particularly challenging in urban areas, given merchants require a large amount of land (including yard areas), which may not provide the landlord with an optimal return.⁴⁴¹
 - 7.42.3 **Zoning:** The land needs to be appropriately zoned for development as a building supplies store.⁴⁴²

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442] [[l; l; l;].

- 7.42.4 **Price:** The land needs to be priced at a level that will result in a viable long-term investment in a merchant store.⁴⁴³
- 7.43 Sites suitable for building supplies merchants may differ from those suitable for other retailers. For example, street location and foot traffic may not be paramount considerations for a building supplies merchant who focuses on trade customers and/or operates on a delivery-based model. 444, 445

Land covenants, exclusive leases and other contractual provisions with similar effect appear to be limiting competition between merchants

- 7.44 A covenant is a promise to do or not to do something that is registered against land, and imposes restrictions on how that land can be developed or used. Covenants are attached to (or run with) land. This means that they can bind any third parties who subsequently acquire (or lease) that land.
- 7.45 We have identified two main categories of land covenants potentially affecting competition for key building supplies:
 - 7.45.1 **Store covenants:** Covenants on land containing clauses or terms which prevent or restrict the site from being used for operating a business that sells key building supplies. Store covenants will tend to reduce the availability of sites for merchant stores.
 - 7.45.2 Land development covenants: Covenants on land zoned for residential buildings, which contain clauses or terms which give a building supplies merchant preferential rights to supply key building supplies for any housing to be constructed on the land. Land development covenants will tend to limit other merchants' ability to attract customers.
- 7.46 A merchant can lodge a store covenant for its own benefit over land it owns. However, many merchants lease the land on which they operate their stores. Where this is the case, the landlord may agree to lodge a store covenant on the land (and/or adjoining land which it owns) for the benefit of the merchant.
- 7.47 Merchants can also enter into commercial leases with landlords containing exclusivity clauses or terms which prevent or restrict the operation of businesses selling key building supplies nearby (exclusive leases). Exclusive leases apply in a different context to the store covenants discussed above. However, they appear to have a similar purpose and effect.

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^{443 [];} [].

Street location is likely to be more important for DIY customers, given many of these customers will drive to merchants' stores.

7.48 Land development covenants may be used where a merchant has a related land development business. In this situation, the land development business could lodge a covenant benefitting its related merchant business.

Store covenants and exclusive leases may prevent rival merchants from opening stores

- 7.49 In our view the use of store covenants and exclusive leases is unduly restricting competition between building supplies merchants.
- 7.50 Store covenants and exclusive leases are likely to reduce a new or existing merchant's ability to access suitable sites. In turn, this may hinder entry and expansion. The effect is likely to be greatest in developed urban areas where the cost of land is high or there is less availability of suitable sites.
- 7.51 We have identified around 60 store covenants benefitting the major merchants. 446 Of these:
 - 7.51.1 all, except three, are currently active as of November 2022; and
 - 7.51.2 all, except five, prohibit the operation of a merchant (or similar business) on the land.⁴⁴⁷
- 7.52 Four fifths of these store covenants have a fixed expiry date. As discussed below, many of them have long durations.
- 7.53 The remaining fifth of store covenants do not have a fixed expiry date. These covenants are over land adjoining, or near, land leased by a merchant, where the landlord has agreed to lodge a covenant for the merchant's benefit. These store covenants typically expire when the merchant stops leasing the land and/or using it to sell building supplies.
- 7.54 We have also identified around 80 exclusive leases held by merchants. These exclusive leases can prevent or restrict adjoining property held by the landlord from being used for a business which sells key building supplies.
- 7.55 While the use of store covenants and exclusive leases is common, their use varies across merchants. Some merchants hold significantly more covenants than others, and they appear to be used more often in certain regions such as Auckland and the lower North Island.

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However, the number of land titles these covenants cover is more than 100. This is due to instances where land with a covenant has been subdivided, with the covenant then applying to each lot,

The remainder, for example, require that sightline of the store from nearby roads is maintained.

- 7.56 Merchants told us the primary purpose of store covenants is to stop a competitor from establishing itself near a merchant's planned or existing store. They consider this is justified, as it provides them with the necessary confidence that they will make a return on the investment associated with developing a new store. They are the store of the stor
- 7.57 We consider that these claimed benefits for many store covenants and exclusive leases are unlikely to negate the competitive harm caused by the reduced availability of sites.
- 7.58 Store covenants can have the effect of preventing, or at least slowing, the expansion of rivals. A merchant has provided a recent example where they were precluded from leasing land due to a store covenant lodged by a competing merchant. ITM noted that it has occasionally found them to be a problem when attempting to secure suitable sites to open a new store in a region or town with sufficient demand for market entry. 454
- 7.59 The effect of store covenants appears to be long lasting. For the two thirds of covenants which have a fixed expiry date, the median duration is 20 years. Of these, eight are due to expire within the next two years. There are also many that have terms as long as 99 or 999 years.⁴⁵⁵
- 7.60 Store covenants with long durations are especially concerning. Because covenants are attached to (or run with) the land, store covenants would bind any third parties who subsequently acquire or lease the site if they were still active. This may result in other merchants being precluded from operating on a site, even after the merchant who benefits from the covenant has left the area.
- 7.61 This appears inconsistent with the merchants' rationale for lodging store covenants. They told us the purpose of lodging a store covenant is generally to help ensure an adequate return on investment (ROI) for development of a new store. A store covenant appears unnecessary to achieve this purpose once the merchant stops operating on the land or after it has had a reasonable period to recoup its investment.

450 For example: [];[]. 451 452 Monopoly Watch New Zealand has stated: "Restrictive Covenants help consumers, when they are implemented by a challenger, they hinder competition when it's perpetuated by a high market share incumbent"; "Submission on residential building supplies market study draft report (1 September 2022)" at 5. 453] recently enquired into a site in [] but was precluded from leasing it due to a For example, [covenant lodged by a competitor, []. Incidentally, [] has an active store covenant over land in the same area, [454 ITM "Submission to the residential building supplies market study draft report" (2 September 2022) at

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- 7.62 We have seen examples where a merchant has agreed not to enforce a store covenant on land. However, this appears limited to situations where the potential entrant is not seen as a direct competitive threat. These concessions appear to only occur where the entrant's core business is not building supplies, but provides some products also stocked by the merchant.⁴⁵⁶
- 7.63 In summary, the use of store covenants by merchants make it harder for competitors to enter and expand. In addition, we consider that the merchants' stated rationales for using store covenants does not sufficiently justify their restrictive effect on competition.

Land covenants and exclusive leases under the Commerce Act

- 7.64 Section 27 and 28 of the Commerce Act apply to exclusivity clauses in leases and land covenants. Land covenants and exclusive leases may breach sections 27 and/or 28 of the Commerce Act:
 - 7.64.1 section 27 prohibits entering into or giving effect to a contract, arrangement or understanding containing a provision which has the purpose, effect, or likely effect of substantially lessening competition in a market;⁴⁵⁷ and
 - 7.64.2 section 28 prohibits the requiring or giving of, or enforcing, a covenant that has the purpose, effect or likely effect of substantially lessening competition in a market. Such covenants are unenforceable. 458
- 7.65 For the purposes of sections 27 and 28, two or more land covenants and exclusive leases can be aggregated when assessing their competitive effect where, taken together, they would be likely to substantially lessen competition. The same person must be party to all relevant agreements being assessed under section 27 or entitled to benefit from the covenants being assessed under section 28.459
- 7.66 As noted above, we have identified around 60 store covenants and 80 exclusive leases benefitting the major merchants that potentially limit competition. We identified land covenants as a factor affecting competition in both the retail fuel market study and the grocery market study. 460

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For example, a home living retailer which also stocks paint. [

⁴⁵⁷ Commerce Act 1986, s 27.

⁴⁵⁸ Commerce Act 1986, s 28.

⁴⁵⁹ Commerce Act 1986, s.3(5) and (6).

Commerce Commission "Market study into the retail fuel sector: Final report" (5 December 2019) at [6.117]-[6.122]; Commerce Commission "Market study into the retail grocery sector: Final report" (8 March 2022) at [6.75]-[6.99]. We identified more than 90 restrictive land covenants in the grocery market study.

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- 7.67 Independent of this study, we are taking enforcement action relating to a land covenant in the building supplies industry. The Commission's decision to take enforcement action under the Commerce Act is made on a case-by-case basis with reference to our Enforcement Response Guidelines.⁴⁶¹
- 7.68 Due to the prevalence of land covenants and exclusive leases, we intend to undertake a compliance programme in early 2023 to promote compliance with sections 27 and 28 of the Commerce Act. This is likely to start with the building supplies industry, but may include targeted outreach with other sectors. We encourage any merchant or supplier benefitting from land covenants and exclusive leases which prevent competitors from accessing certain sites to review them for compliance with the Commerce Act.
- 7.69 As noted in Chapter 10, we also recommend an economy-wide review of land covenants and exclusive leases to assess whether a wider multi-sector solution is needed to address their impact on competition more generally. 462

Land development covenants may prevent rival merchants from attracting customers

- 7.70 Land development covenants may also be restricting competition between merchants. These covenants appear to make it more difficult for other merchants to supply building materials for new houses to be built on land.
- 7.71 We are aware of land development covenants in Hawke's Bay and in Wairarapa. 463
 These covenants apply to residential land developments and require that a specific merchant be given the first and last option to provide a quote for the supply of building materials. This appears to influence the merchant through which building products are purchased by trade customers wanting to build on the land.
- 7.72 Covenants of this kind could reduce the contestable market, which could impact on entry or expansion by merchants. Further, these types of covenants have the potential to affect competition by:
 - 7.72.1 first, removing the incentive on the benefitting merchant to initially quote a competitive price; and
 - 7.72.2 secondly, removing uncertainty regarding the price needed to win a tender, given the benefitting merchant is provided visibility of quotes from other merchants.

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Commerce Commission "Enforcement Response Guidelines" (October 2013), available at: https://comcom.govt.nz/ data/assets/pdf file/0030/62589/Enforcement-Response-Guidelines-October-2013.pdf.

This recommendation was largely supported in submissions on the draft report, Consumer NZ "Submission on residential building supplies market study draft report" (1 September 2022) at 3; Fletcher Building "Submission on residential building supplies market study draft report" (1 September 2022) at [4.10]; ITM "Submission on residential building supplies market study draft report" (2 September 2022) at [30].

- 7.73 We are also aware of clauses in sale and purchase agreements (SPAs) for residential zoned property which give preferential rights to a merchant to provide a first and last quote for building supplies for building work. The information we have received suggests that these clauses are limited to developments in Hawke's Bay. 464
- 7.74 We are concerned about the potential impact on competition of land development covenants and similar clauses in SPAs, particularly where they are widely used and require competing merchants' quotes to be disclosed. 465 We recommend these covenants and clauses are also considered within an economy-wide review to assess whether a wider multi-sector solution is needed to address their impact on competition more generally. We also encourage any merchant or supplier benefitting from these covenants or clauses to review them for compliance with the Commerce Act.
- 7.75 However, we have not opened an investigation into these covenants or clauses at this time. The use of land development covenants and similar clauses in SPAs does not appear to be widespread and most merchants do not appear to benefit from them. 466, 467 In addition, we understand from the relevant merchants that:
 - 7.75.1 houses have already been built on many of the affected lots;⁴⁶⁸
 - 7.75.2 the clauses in SPAs have not been enforced (either formally or informally);⁴⁶⁹
 - 7.75.3 they do not intend to rely on these covenants and clauses (to the extent that rights under them may remain available) or to use such covenants or clauses in future.⁴⁷⁰

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As with the covenants detailed above, land development covenants and clauses in SPAs can also be assessed under sections 27 and 28 of the Commerce Act. For the purposes of section 27 and 28, two or more land development covenants and SPAs can be aggregated when assessing their competitive effect where, taken together, they would be likely to substantially lessen competition.

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7.76 We consider that the economy-wide review recommended in Chapter 10 should seek to gather information on the extent to which similar covenants or clauses, which are intended to influence consumers' choice of which merchant or retailer to purchase from (for example, by giving a particular merchant or retailer preferential rights to supply or quote), are being used in other sectors.

Impact of vertical integration on competition between merchants | Te pāpātanga o te kōmitimiti poutū ki te whakataetae i waenga i ngā kaihoko

- 7.77 The impact of vertical integration on competition between merchants is discussed in Chapter 6.
- 7.78 In summary, there is a risk of vertically integrated operators supplying key building supplies to their own merchant businesses ahead of competing merchants. However, outside of the recent supply shortages, we have not seen evidence of non-vertically integrated merchants having difficulty accessing inputs from vertically integrated suppliers. Therefore, vertical integration does not normally appear to be a significant factor affecting competition between merchants.

Chapter 8 Rebates, loyalty schemes and merchant preferred supplier arrangements | Ngā moni tuku mai, kaupapa piripono me ngā whakahaere kaihoko i pāingia

Summary of findings

- Arrangements between suppliers and merchants often include terms for the supplier to pay rebates to the merchants. Rebates between suppliers and merchants are widespread and can be significant in value.
- Merchant stocking is important for suppliers of many key building supplies. The structure of some of the supplier-merchant rebate arrangements, particularly tiered retroactive and share of wallet rebates, can create strong incentives for merchants to sell the products to which the arrangements relate. This can make it less likely that a merchant would be willing to dual stock or encourage sales of alternative supplies and therefore make it harder for alternative suppliers to compete effectively.
- There is potential for supplier-merchant rebates to harm competition between suppliers, particularly in highly concentrated markets where suppliers have a significant share of supply and an assured base of sales.
- The use by suppliers of customer specific quotes to offer discounts to customers who
 might switch to alternative suppliers offers short-term benefits to those customers.
 However, they also have the potential to make it harder for smaller suppliers to
 compete effectively with larger incumbents and thus may limit the scope for smaller
 suppliers to become more effective competitors over the longer term.
- Rebates provided by suppliers to builders also occur in the case of some key building supplies. The prevalence of these rebate agreements varies by key building supply but, where paid, they are typically paid to larger customers. Based on the evidence we have received, these rebates appear less likely to harm competition than rebates from suppliers to merchants.
- Rebates are also paid by merchants to a small number of their customers, primarily GHBs. Our analysis indicates that these rebates are overall offered to customers that represent a minority of total sales of key building supplies. A wide variety of rebate structures are used and the amounts paid tend to be relatively low. It is unlikely that these rebates are adversely affecting competition between merchants.
- Many builders are part of loyalty schemes offered by merchants. There are a wide variety of rewards available. The schemes appear to be relatively low cost for merchants to operate. It is unlikely that they are adversely affecting competition between merchants.
- There is nonetheless value to the competitive process in ensuring that end consumers are well informed, including about the nature of rebates and loyalty schemes offered.

Introduction | Kupu whakataki

- 8.1 This chapter discusses the arrangements between market participants at different levels of the key building supplies industry supply chain.⁴⁷¹ It considers the role the arrangements may have on the effective working of competition in key building supplies, and focuses in particular on the likely effects of rebates, loyalty schemes and other vertical arrangements.
- 8.2 In this chapter, we consider the effect of rebates and other vertical arrangements between different levels of the supply chain:
 - 8.2.1 arrangements between suppliers and merchants;
 - 8.2.2 arrangements between suppliers and builders; and
 - 8.2.3 arrangements between merchants and builders.

Arrangements between suppliers and merchants | Ngā whakahaerenga i waenga i ngā kaituku me ngā kaihoko

- 8.3 In this section we consider the arrangements between suppliers (for example, manufacturers and importers) and merchants.
- 8.4 As described in Chapter 6, the extent to which key building supplies are distributed through merchants varies. For some supplies, most sales are through the merchant channel.
- 8.5 It is therefore important to assess whether the arrangements between suppliers and merchants are operating in a way which could harm competition.
- 8.6 We have found that:
 - 8.6.1 merchant stocking is important to suppliers for some key building supplies;
 - 8.6.2 merchants typically have a core product range and 'preferred' suppliers;
 - 8.6.3 merchant decisions on stocking are influenced by a range of non-price factors;
 - 8.6.4 price is also an important factor;
 - 8.6.5 merchant stocking decisions may also be influenced by the perceived risk of an adverse response from a supplier that has market power;
 - 8.6.6 some rebate structures have the potential to harm competition between suppliers; and

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We refer to arrangements between market participants at different levels of the supply chain as vertical arrangements.

8.6.7 the use of customer specific quotes by suppliers to offer targeted price discounting to merchants may contribute to the difficulties new entrants at the supplier level have in gaining necessary scale in some markets.

Merchant stocking is important to suppliers for some key building supplies

- 8.7 We understand that all merchants supply products at the request of their customers even when they are not stocked. This is known as 'indent' supply. Supplying products on demand is different from choosing to purchase and stock a product line. We heard from suppliers of some key building supplies that merchant stocking was a very important driver of sales in the New Zealand market. 473
- 8.8 In relation to our case study supplies, we heard that:
 - 8.8.1 in plasterboard, suppliers highlighted that not being stocked was a barrier to them reaching efficient scale, and that getting stocked was important due to the convenience it provided to builders (for example, in relation to easy returns), and the benefits it provided in brand recognition and distributing more broadly across the country.⁴⁷⁴
 - in structural timber, the vast majority of suppliers' sales are to merchants and frame and truss manufacturers (most of whom are either owned by merchants or sell through merchants). Suppliers view these channels as important for ensuring sales continuity and the broad, efficient distribution of their products, with the alternatives (selling into export markets or directly to end users) being significantly less desirable.⁴⁷⁵
 - 8.8.3 in ready-mix concrete, the merchant channel is less important due to the nature of the product meaning that it is delivered directly to customers. Therefore, merchant stocking is not an important feature.⁴⁷⁶
- 8.9 We discuss later in this chapter the effect that rebates can have on merchants' choice of which products to stock. The importance of merchant stocking varies across key building supplies depending on how important the merchant channel is to total sales, as demonstrated by the differences in the case study products. This means that the extent to which available rebates may influence the decision to stock (or promote) products is also likely to vary across key building supplies.

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Merchants typically have a core product range and preferred suppliers

- 8.10 When merchants decide on what products to stock they typically decide on a core range of products which all their stores nationally must stock or are recommended to stock.⁴⁷⁷ Depending on the structure of the merchant, there may be more flexibility in determining the products to be stocked at an individual store level.⁴⁷⁸
- 8.11 Merchants will also often choose preferred suppliers for a particular product category. The meaning of the term 'preferred' varies by merchant and some merchants instead refer to 'primary' suppliers. Typically, however, a preferred supplier is the main supplier of a particular product category across a merchant's network. Some merchants stated that their preference was to have at least two preferred suppliers in each category, but that for some key building supplies this was not possible—for example, due to insufficient storage space or the branded or nongeneric nature of a product. In other cases, such as structural timber, one merchant noted having multiple preferred suppliers was necessary as there was not any one supplier that could provide sufficient volume across its whole network. One merchant said that if there is customer demand for a product and it passes compliance checks (ie the product meets the required industry standards) then the local store manager can decide to stock a product.
- 8.12 One supplier raised concerns about the impact preferred supply agreements were having on their ability to get stocked by merchants. However, given their limited visibility of the agreements, they did not have views on which part of the agreements were likely to be problematic. A small supplier also told us that they had products which had been stocked at a local level that had been subsequently removed after pressure from head office. Has
- 8.13 Many of the supplier agreements we reviewed classify the supplier as 'primary'/'preferred' or 'secondary' but these varied in their specific provisions. None contained exclusivity clauses but many different rebate clauses were observed, including some that we have expressed concerns about elsewhere in this report. We consider that the specific content of some preferred supply agreements may be limiting competition, but the mere existence of a preferred supplier agreement is not of particular concern.

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8.14 In some cases, we saw broader agreements between suppliers and merchants which provided additional rebates and marketing support if the merchant required all their stores to stock the suppliers' range of products. Inducements of this nature have a greater potential to impact competition in a product market. However, they appear rare and do not appear to prevent merchants from also stocking competing products. Accordingly, they also seem unlikely to impact competition.

Merchant decisions on stocking are influenced by a range of non-price factors

- 8.15 Merchants' supply agreements are typically between 1-3 years in length but are often rolled over. 485 One merchant stated that they aim for multi-year supplier arrangements to build and invest in relationships. 486
- 8.16 Typically, agreements with suppliers are reached through bilateral negotiations, although the process varies depending on the building supply. In some cases, merchants said they would conduct full tenders or Requests for Proposals to decide whether to replace their existing supply. However, we heard this was less common as doing so is a significant exercise.
- 8.17 We understand that there are a range of non-price factors which influence whether a product is chosen to be stocked, including:⁴⁹⁰
 - 8.17.1 product compliance, technical support and quality of product;
 - the ability of suppliers to deliver both in terms of meeting the required volumes and the lead times and reliability of delivery; and
 - 8.17.3 whether there would be demand for the product.
- 8.18 The role of compliance and regulations is discussed further in Chapter 4. In relation to stocking being demand-led, one merchant told us that demand in the market is largely driven by what is specified in the plans.⁴⁹¹

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- 8.19 Suppliers we spoke with who had struggled to get stocked in the merchant channel told us that they did not have issues with meeting the required compliance and service times. 492 They acknowledged the role builder and designer demand had on merchant decisions but said that this argument was partly circular: until they could get access to the merchant channel it was harder to reach scale and provide a compelling offer to builders and designers to generate demand. They also noted the additional challenges that the building regulatory system add to creating demand. 493
- 8.20 We also heard examples in other product areas where merchants had put in significant effort with new suppliers to meet compliance pathways and also encouraged their customers to take up a new product, working to create demand.⁴⁹⁴
- 8.21 It appears to us that, in making decisions on stocking, merchants weigh up the risks of stocking a new product, which include the risk of limited demand or more investment being needed, against the commercial benefits of doing so. Merchants can therefore have an important role in facilitating entry/expansion of suppliers and stimulating demand for a product.

Price is also an important factor

- 8.22 In addition to the non-price factors discussed above, the net price (that is the price after rebates or other discounts have been taken into account) is also an important factor when deciding which building products to stock.⁴⁹⁵
- 8.23 We understand that it is typical for key building supplies to have a standard list price and for the negotiations between suppliers and merchants to be around the level of rebates.
- 8.24 Our analysis shows that the proportion of key building supplies which are covered by rebates from suppliers to merchants is very high but varies by merchant. 496
- 8.25 The value of rebates provided from suppliers to the five major merchants is substantial, with total rebates paid worth over \$200 million in 2021. 497

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- 8.26 Across all the key building supplies purchased by the five major merchants, we estimate the value of rebates received is around 10% of the total value of purchases. The average rebate level (as a proportion of purchases) for each merchant varies. Merchants with higher total sales typically receive higher rebate levels as suppliers are willing to provide additional rebates to merchants with greater scale.
- 8.27 Based on our analysis, rebate levels can vary significantly across different building supplies. There are some particularly high rebate tiers in some building supplies which are also highly concentrated.⁴⁹⁹

Merchant stocking decisions may also be influenced by the perceived risk of an adverse response from a supplier that has market power

- 8.28 As described in Chapter 6, markets for some key building supplies are highly concentrated and, combined with high barriers to entry, this can lead to suppliers having market power.
- 8.29 We heard that the perceived threat of action from suppliers with market power may influence merchant decision making. For example, in weighing up whether to switch some supply away from a supplier with market power, the perceived commercial risk that the supplier may respond by offering worse terms in their next agreement, or simply pursuing direct sales and disintermediating the merchant, can be a consideration. 500
- 8.30 Similarly, we heard that the ability for suppliers to decline to provide discounts for particular jobs (to a merchant) meant that where suppliers had substantial market power, merchants may be afraid of taking action that might upset the supplier, in case they stopped offering them discounts.⁵⁰¹
- 8.31 In our assessment the perceived threat of such an adverse response by incumbents could have an effect on competition between suppliers by dampening merchants' incentives to switch suppliers. Nevertheless, we have not seen evidence of threats of retaliatory conduct against merchants in practice.

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- 8.32 We encourage any supplier or merchant with practical examples of retaliatory conduct to report them to the Commission so that we may consider what action may be appropriate using our competition compliance and enforcement functions and powers.
- 8.33 Conduct by businesses with substantial market power that has the purpose of harming, deterring, or preventing competition can breach the Commerce Act. From April 2023, it will also breach the Commerce Act if the conduct has the effect or likely effect of substantially lessening competition in a market.⁵⁰³
- 8.34 In the next sub-sections, we consider how the structure of rebates and targeted discounts may affect competition for the upstream supply of some key building supplies in some circumstances.

Some rebate structures have the potential to harm competition between suppliers

- 8.35 Rebates can have varying effects on competition, depending on the circumstances, including the structure of rebates offered.
- 8.36 Rebates are a widely used business payment practice in many sectors that can benefit consumers. A rebate is a post-purchase discount given by a supplier to a purchaser under certain conditions. Rebate structures vary.
- 8.37 Rebates may have several purposes. For example, they may be a way for suppliers to pass through lower costs from economies of scale to customers and can allow suppliers to charge different prices to different customers with different willingness to pay (which may increase the total quantity supplied of the product). Rebates can also align the incentives of suppliers and distributors and give them confidence to make buyer-specific investments.⁵⁰⁴

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We note that from 3 April 2023 new legislation comes into force which strengthens the law to prohibit firms with market power from engaging in conduct that substantially lessens competition, regardless of whether they would have done the same thing if they did not have market power, Ministry of Business, Innovation & Employment "Review of section 36 of the Commerce Act and other matters"

https://www.mbie.govt.nz/business-and-employment/business/competition-regulation-and-policy/reviews-of-the-commerce-act-1986/review-of-section-36-of-the-commerce-act-and-other-matters/.

OECD "Executive Summary of the Roundtable on Fidelity Rebates held at the 125th meeting of the Competition Committee of the OECD" (DAF/COMP/M(2016)1/ANN4/FINAL) www.oecd.org.

- 8.38 However, rebates offered to merchants by a supplier with a large share in a market can, in some circumstances, harm competition by reducing the ability of others to compete effectively. Some rebate schemes may provide strong incentives for merchants to achieve a minimum level of sales of the firm's products, or a given market share. They may even encourage quasi or full exclusivity. This can hinder smaller competitors from competing by raising their costs and restricting their access to sufficient distribution channels, and ultimately end consumers, to achieve necessary scale. Sol
- 8.39 In this subsection we describe the different types of rebate structures we have observed in relation to key building supplies and explore whether some structures may be adversely affecting competition.
- 8.40 In our assessment:
 - 8.40.1 there are a range of different rebate structures used in the market;
 - 8.40.2 some rebate structures have the potential to harm competition between suppliers we refer to these as quantity-forcing rebates;⁵⁰⁷ and
 - 8.40.3 there are potential efficiency reasons for the use of quantity-forcing rebate structures but little evidence to suggest they outweigh the potential harm to competition with other pricing mechanisms available that could deliver the same pricing outcomes to merchants and suppliers without creating the same risk of excluding competing suppliers in highly concentrated markets.
- 8.41 We explain the reasons for our assessment below.

There are a range of different rebate structures used in agreements between suppliers and merchants

8.42 Our analysis in this market study revealed a range of different rebate structures are in use. We set these out in Table 8.1 below.

David Spector "Loyalty Rebates: An Assessment of Competition concerns and a proposed rule of reason" (2005) at 94, available at: http://www.cepremap.fr/depot/docweb/514.pdf.

OECD "Executive Summary of the Roundtable on Fidelity Rebates held at the 125th meeting of the Competition Committee of the OECD" (DAF/COMP/M(2016)1/ANN4/FINAL) www.oecd.org.

There is no widely agreed terminology in the literature on rebates with multiple different terms used capturing a range of different types of rebates. We use the term 'quantity-forcing' rebates to distinguish the types of rebate structures which we think are most likely to pose a risk to competition. This is a term which can also be found in the economic literature for example, Marius Schwartz and Daniel Vincent "Quantity 'Forcing' and Exclusion: Bundled Discount and Nonlinear Pricing" in *Issues in Competition Law and Policy* (April 2008).

Table 8.1 Overview of the different types of rebates observed in merchant-supplier agreements

Type of rebate		Description	Example	
Flat percentage rebates		The supplier agrees to pay a fixed percentage of the value of purchases back to the merchant at the end of a period. These rebates are not explicitly conditional on any specific volume target.	A 7% rebate paid annually on all purchases made by a merchant from a particular supplier.	
Lump sum rebates		The supplier agrees to pay a fixed value amount to the merchant as a lump sum on a periodic basis. These rebates are not explicitly conditional on any specific volume target.	An annual \$100,000 rebate paid by the supplier to the merchant as part of a supply agreement.	
Tiered incremental rebates		The supplier agrees to pay different percentage levels of rebates to a merchant as a merchant reaches different volume levels. The higher tier is only payable on incremental sales above the threshold rather than the entire volume of sales.	A supplier will pay a 5% rebate to a merchant on all purchases up to \$1m within a year and a 10% rebate back on all purchases above \$1m.	
	Tiered retroactive rebates (also known as target, rollback or zero-rated rebates)	The supplier agrees to pay the merchant a percentage rebate based on the total volume of purchases, with the rebate level varying according to the total volume purchased in a set period.	A supplier at the end of each year will pay 5% back on all purchases if total purchases in the year are below \$10m, but 8% on all purchases if total purchases are above \$10m in the year.	
Quantity- forcing rebates	Share of wallet rebates	The supplier agrees to pay the merchant a percentage rebate of purchases based on the total share of purchases the merchant made in a category from that supplier. The rebate level applies to the total volume purchased from the merchant in a set period. At its most extreme a share of wallet rebate would be contingent on 100% of purchases and would be known as an exclusivity rebate.	A supplier will pay a rebate of 4% if a merchant makes at least 60% of its category purchases from the supplier; and a rebate of 8% if a merchant makes at least 80% of its category purchases from the supplier.	

Source: Commerce Commission.

- 8.43 The two most common types of rebate arrangement we observed across our case study were flat percentage rebates and tiered retroactive rebates. There were some cases where suppliers offered purely a flat percentage rebate. However, often arrangements would have a flat percentage base rate which was not dependent on sales, in combination with additional rebates conditional on certain volume tiers being achieved. In a small number of cases, rebate steps started at zero per cent and so there was effectively no rebate given for a small number of purchases.
- 8.44 Tiered rebate arrangements that are retroactive appear very common across a broad range of key building supplies. These rebate arrangements involve a retrospective payment of the rebate at the higher rebate percentage on all purchases since the start of the relevant rebate period once the higher rebate threshold is achieved and not simply on incremental purchases after that threshold is met. We identified these rebate arrangements in relation to the supply of many key building supplies, including our case study products of plasterboard and structural timber, as well as bagged concrete, roofing, insulation, fibre cement, timber cladding, plywood and other key building supplies.⁵¹¹
- 8.45 Among the arrangements we reviewed, lump sum rebates were not uncommon but were typically (though not always) linked to some additional benefit—for example, to support additional marketing or conferences. Tiered incremental rebates were rare. Although some of the merchant agreements appeared to include these as a potential option, the agreements we saw had not taken up this option. One merchant's supply agreement noted that these types of rebates were 'not preferred'. 513
- 8.46 Share of wallet rebates do not appear to be very common.⁵¹⁴

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Quantity-forcing rebate structures have the potential to harm competition between suppliers

- 8.47 There is a large body of economic literature that discusses the potential anti-competitive effects of different rebate structures. The primary concern is that some rebate structures have the potential to prevent or limit competition by making it harder for competitors to access distribution channels. These concerns arise when rebates are structured in a way that can induce exclusivity, near exclusivity or require a minimum volume of sales.⁵¹⁵
- 8.48 In particular, rebates may be structured in a way which makes it very costly for a purchaser to switch even small amounts of volume away from the established supplier. This disincentivises switching to an alternative supplier. 516 This is sometimes referred to as 'quantity forcing' in the literature.
- 8.49 In order to entice a merchant to switch, an alternative supplier attempting to win even a small share of supply would have to offer merchants a relatively greater discount to compensate for the loss of the rebate the merchant would have received from the incumbent supplier if the merchant had not obtained some supply from the alternative supplier. If the level of rebate on all units purchased is dependent on a specific volume being purchased, then any switching that reduced purchases below that threshold volume would raise the price of all units that are purchased from the incumbent supplier.

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For example: OECD "Fidelity Rebates - Background Note by the Secretariat" (2016), available at: https://one.oecd.org/document/DAF/COMP(2016)5/en/pdf; US FTC/DOJ "Conditional Pricing Practices: Public Workshop" (23 June 2014) https://www.ftc.gov/news-events/events/2014/06/conditionalpricing-practices-economic-analysis-legal-policy-implications; ICN "Report on the analysis of loyalty discounts and rebates under unilateral conduct laws" (June 2009)

https://centrocedec.files.wordpress.com/2015/07/report-on-the-analysis-of-loyalty-discounts-andrebates-2009.pdf; David Spector "Loyalty Rebates: An Assessment of Competition concerns and a Proposed Rule of Reason" (2005), available at:

https://www.cepremap.fr/depot/docweb/docweb0514.pdf; Chiara Fumagalli, Massimo Motta, and Claudio Calcagno "Price Discrimination and Single-Product Rebates" in Exclusionary Practices: The Economics of Monopolisation and Abuse of Dominance (2018) at 126-238.

516 For example: "Quantity 'forcing' refers to pricing schemes that reward a buyer for purchasing some threshold quantity from a firm. When there are significant scale economies and buyers are unable to coordinate, economic theory shows that a firm can profitably use quantity forcing to exclude competitors, reducing overall welfare and harming some buyers. Inducements to reach the quantity threshold may be provided through nonlinear pricing of the target product", Marius Schwartz and Daniel Vincent "Quantity 'Forcing' and Exclusion: Bundled Discount and Nonlinear Pricing" in Issues in Competition Law and Policy (April 2008) at 1; "Some rebate schemes may induce strong incentives for retailers to achieve a minimum level of sales or a given market share, or even encourage quasi- or full exclusivity. This is the case in particular when they include rollback rebates (ie, rebates that apply to the entirety of a customer's purchases conditional on reaching a given target, expressed in absolute or in market share terms)", David Spector "Loyalty Rebates: An Assessment of Competition concerns and a Proposed Rule of Reason" (2005) at 94, available at:

https://www.cepremap.fr/depot/docweb/docweb0514.pdf.

- 8.50 There is also the potential for the use of rebates by a majority of suppliers in a market that has a small number of similar sized players to harm competition by facilitating accommodating behaviour. We have not seen evidence of accommodating behaviour and do not discuss this issue further in this chapter.
- 8.51 Different rebate structures are likely to affect competition to differing extents:
 - 8.51.1 Attachment H sets out stylised examples that demonstrate how different rebate structures may impact merchant decisions about which suppliers to source product from, and therefore competition between suppliers.
 - 8.51.2 Flat percentage rebates or lump sum rebates appear less likely to harm competition because these types of rebates are not contingent on volume. Similarly, tiered incremental rebates may also be less likely to harm competition as the loss of any discount only applies to the volume being switched rather than to all sales.
 - 8.51.3 Quantity-forcing rebate structures (both share of wallet and tiered retroactive rebates) have the potential to harm competition between suppliers, particularly when used by suppliers with substantial market power that have an assured supply base. By assured supply base we mean a supply base which is 'must have' for the merchant and cannot be sourced from elsewhere. This may be because of the strength of the brand in the market. Where there is a proportion of the merchants' customers that would otherwise be willing to switch products, suppliers may be able to use quantity-forcing rebates to make it harder for alternative suppliers to compete for this 'contestable share'.
- 8.52 As noted above, tiered retroactive rebates are the most common form of rebate that we observed in the supply agreements we reviewed.
- 8.53 Based on our analysis, supply agreements for key building supplies appear to be negotiated on a bilateral basis. We observed instances where the rebate volume tiers often closely matched the expected demand from each merchant. This may mean that some suppliers are able to individually tailor rebate volume tiers to minimise the likelihood of a particular merchant switching. This might involve setting the highest rebate tier close to the merchant's expected purchases, thus reducing the size of the 'headroom' which is contestable without putting the achievement of a higher rebate at risk. Such headroom might make it more likely that a merchant would obtain sales above the highest tier from another supplier. Similarly, the tailored structures may allow suppliers to set out larger steps around the contestable share.

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OECD "Policy Roundtables, Loyalty and Fidelity Discounts and Rebates" (2002) at 9, available at: https://www.oecd.org/daf/competition/abuse/2493106.pdf.

The assured base is sometimes also referred to as uncontestable demand.

- 8.54 Rebate agreements for key building supplies contain a range of different volume tiers and steps in rebate levels. Our analysis indicates that many agreements have steps of 1 to 3 percentage points (pp). However, some agreements have very small (for example, 0.1pp) rebate steps. Other agreements have steps in rebates as high as 10pp. The risk of harm to competition from quantity-forcing rebate structures increases with the size of the rebate step. However, even rebates with small steps could harm competition if applied retroactively across purchases of tens of millions of dollars which can result in very strong incentives to purchase from the supplier offering the rebate, particularly when close to rebate tiers.
- 8.55 The potential harm to competition from quantity-forcing- rebate structures in agreements between suppliers and merchants may be less when competing suppliers have other distribution options. In both our plasterboard and structural timber case studies, the merchant channel was highlighted as being very important to suppliers. This is also the case across a range of other key building supplies. However, for other key building supplies, such as our ready-mix concrete case study, sales are made primarily on a direct basis.⁵²¹
- 8.56 Even where the merchant channel is important, the extent of coverage across the different merchants likely also impacts the potential competitive effect of quantity-forcing rebate arrangements. For example, the risk of harm to competition may be higher if a quantity-forcing rebate is offered to all merchants and drives exclusive or near exclusive purchases by those merchants.^{522, 523}

Commerce Commission analysis of rebates, [].

For example: [].

However, we note that sales made on a direct basis can also be covered by rebate arrangements. We discuss supplier to builder rebates from paragraph 8.85 below.

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- 8.57 We have heard a range of evidence about the potential for quantity-forcing rebate structures to affect competition for the supply of key building supplies. Some of the evidence indicates that quantity-forcing rebates are a factor affecting competition:
 - 8.57.1 Although merchants typically consider a range of factors in coming to their stocking decisions, we heard from a merchant that the rebate structures they faced strongly incentivised additional purchases.⁵²⁴
 - 8.57.2 Merchants also appear to closely monitor how their purchase decisions are progressing and we saw multiple examples of merchants keeping tracking spreadsheets with the required purchases needed to hit the next rebate tier level. In some cases, these additional purchasing decisions were assessed against an ROI threshold to show the percentage gain from buying additional units. In the examples we saw, there were occasions when the ROI for purchasing additional units to reach a tier level was above 100%, which would indicate that making the additional purchases was beneficial even if these units could not be sold. 525
 - 8.57.3 Based on our analysis, it appears that merchants do consider the implications of not meeting certain volume thresholds by shifting supply arrangements, and the extent to which headroom might allow for it.⁵²⁶ We identified evidence of this occurring in a category review decision where a merchant indicated that it would ideally limit share growth of a new supplier to the growth of the category because, if they dropped rebate tiers, they could lose a substantial amount.⁵²⁷
 - 8.57.4 Several smaller suppliers also highlighted rebates and lack of access to merchants as a factor limiting their ability to compete in the market. 528

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- 8.58 However, we have also heard from some merchants that they regard the effect of quantity-forcing rebates on their decision making as being less significant. 529
- 8.59 Merchants also may themselves be benefitting from rebate structures of this kind:
 - 8.59.1 We heard that the quantity-forcing rebates used in the industry were originally introduced to prevent merchants competing away all their margin. 530
 - 8.59.2 The structure of quantity-forcing rebates means that rebate payments are typically received at a later date than the original transaction, with some uncertainty in relation to the payment. This means that increases in rebate payments may pass less directly to merchant pricing than wholesale price reductions (and may therefore benefit merchants).
- 8.60 It was not possible to robustly draw conclusions from quantitative analysis estimating the extent of the pass through of rebates to merchant pricing because:
 - 8.60.1 the pass-through effect from changes to rebates is difficult to distinguish from other factors influencing prices;
 - 8.60.2 merchants compete across a range of products and on a range of factors other than just price; and
 - 8.60.3 merchants may pass on benefits indirectly rather than simply through price cuts to that particular product.
- 8.61 In addition, even if there is full consumer pass-through of the rebates from merchants to consumers that does not mean consumers are receiving the best price, given the potential for quantity-forcing rebates to limit entry or expansion by competing suppliers upstream.
- The use of quantity-forcing rebate structures can make it harder for alternative suppliers to be stocked through the merchant channel and harder for existing suppliers to expand. These outcomes would tend to lessen competition and ultimately lead to worse outcomes for end consumers.
- 8.63 Of our case study products, our assessment indicates that the rebate structures applying to plasterboard are likely to be negatively affecting competition because they impact merchant decision making and make it harder for alternative suppliers to reach scale.

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Mitre 10 "Submission on residential building supplies market study draft report" (31 August 2022) at [9]; Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [1457]; ITM 'Submission on residential building supplies market study draft report (2 September 2022) at 4.

Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [1509]; [].

Outside of our case study products we have less information to draw conclusions on the effect of rebates, however given the extent of concentration in the industry there are likely other building supplies where suppliers may have market power and are using similar rebate structures which may also be affecting competition.

There are potential efficiency reasons for the use of quantity-forcing rebate structures but little evidence to suggest they outweigh the potential harm to competition

- 8.65 Rebates may be pro-competitive or benign if they pass on to merchants efficiency benefits from suppliers realising economies of scale. They may also align incentives between suppliers and merchants to promote products by reducing the scope for free-riding on the supplier's promotional activity by other suppliers.
- 8.66 Tiered retroactive rebates, a form of quantity-forcing rebates, appear to have been a common feature of the industry for many years and have become standard industry practice. ⁵³¹ We heard different explanations for why tiered retroactive rebates are used, including that they:
 - 8.66.1 can offer benefits of administrative convenience;⁵³²
 - 8.66.2 provide merchants with pricing benefits in response to volume encouraging more brand investment and innovation;⁵³³
 - 8.66.3 provide some degree of certainty which assists the supplier in managing sales and operations plans and therefore production levels;⁵³⁴ and
 - 8.66.4 recognise the size and growth of a customer and the increased efficiency in ordering and logistics regarding the larger-scale operations.⁵³⁵
- 8.67 We heard that unlike other products where rebates may increase total demand, for some building supplies like plasterboard, overall demand is unlikely to be affected by incentive structures due to demand being price inelastic and very highly correlated with overall building demand.⁵³⁶

Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [1545]-[1561].

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Mitre 10 "Submission on residential building supplies market study draft report" (31 August 2022) at [14].

ITM "Submission on residential building supplies market study draft report" (2 September 2022) at 4; Mitre 10 "Submission on residential building supplies market study draft report" (31 August 2022) at [13]; [].

For example: []; [].

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8.68 On balance the potential benefits from the use of quantity-forcing rebates, in highly concentrated building supply markets, are unlikely to outweigh the possible harm to competition. We consider that there are likely to be other pricing mechanisms that could deliver the same pricing outcomes to merchants and suppliers without creating the same risk of excluding competing suppliers in highly concentrated markets. These include flat prices for all units, or incremental rebates. We provide an example in the example box.

Example of different approaches with the same average price.

If a supplier expects a merchant to purchase 200 units, the average price would be equivalent between:

- Flat price: a flat price for all units of \$8.75;
- Incremental rebate: a \$10 price with an arrangement to provide a 10% rebate on the first 100 units, then 15% rebate for additional units purchased beyond 100+ units;
- Retroactive rebate: a \$10 price with an arrangement which gives no rebate for the first 180 sales but once this threshold has been passed retroactively provides 12.5% rebate on all sales.

If we assume competitors can only compete for 20% of the market (for example, this assumed 'contestable share' might be driven by supply constraints or demand characteristics which mean competitors are not able to compete for all sales), the impact of these arrangements on competition varies significantly.

- the flat price would likely have no detrimental effect on competition;⁵³⁷
- the incremental rebate would also be unlikely to have a material detrimental effect on competition, while still enabling some economies of scale to be passed on; and
- the retroactive rebate would mean a competing supplier would not be able to profitably offer the same rebate, once accounting for the need to compensate the merchant for the lost rebate on all sales.
- 8.69 We have heard that merchants like receiving consistent pricing during the year and that this is more difficult to achieve when using an incremental rebate structure compared with quantity-forcing rebates.⁵³⁸ However, suppliers and merchant already have to forecast sales volumes and estimate the expected price for quantity-forcing rebates, with periodic 'washups' once volumes are known. A similar approach would appear feasible for incremental rebates using an expected average price. If anything, the risk of needing to adjust payments due to selling fewer units is higher with the quantity-forcing rebates which have larger effective price differences for any given volume step. Consistent pricing therefore does not appear to be a benefit of quantity-forcing rebates over incremental rebates. We nevertheless accept that changing the structure of rebates may have some limited additional administrative burden.

⁵³⁷ Assuming it is not predatory pricing. 538

Residential building supplies market study - Day 2 transcript of consultation conference (28 September 2022) at [1297]-[1314].

- 8.70 As noted in Chapter 1, this study has not enquired into compliance with the provisions of the Commerce Act relating to anti-competitive conduct. However, we retain the ability to further investigate any industry participant's use of rebates if information collected during this study, or outside of it, gives us reason to believe that anti-competitive conduct may be occurring.
- 8.71 We encourage all suppliers, particularly those in highly concentrated markets, to review their rebate structures for compliance with the revised section 36 of the Commerce Act which comes into force in April 2023. We have consulted on and will be issuing guidance relating to the misuse of market power. Our guidance will discuss a range of conduct covered by the amended section 36, including rebates, and will be of general application to all businesses. Our views, including from this study, have informed the drafting of the guidance.
- 8.72 In 2014 the Commission investigated the rebate structures used by Winstone Wallboards. The evidence at the time did not support a conclusion that Winstone Wallboards had breached the Commerce Act. ⁵³⁹ In the 2014 report, the Commission observed that other factors may have been affecting competition in relevant markets at that time. In the intervening years, several factors have changed including the exit of Knauf and failed entry by USG Boral (both large international plasterboard suppliers).
- 8.73 Having assessed information collected in this study, we have opened an investigation to collect more information about Winstone Wallboards' use of rebates, to further consider any effect that these may be having on competition, and whether they may breach Part 2 of the Commerce Act.

The use of customer specific quotes by suppliers to offer targeted price discounting to merchants may contribute to the difficulties new entrants at the supplier level have in gaining necessary scale in some markets

8.74 Agreements between suppliers and merchants often include provision for merchants to request customer specific quotes (CSQs) from the supplier. They appear to be a common feature across different key building supplies. Suppliers will consider requests for CSQs on a case-by-case basis.

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Commerce Commission "Winstone Wallboards Limited – Investigation closure report" (22 December 2014).

- 8.75 CSQs appear to be used in two main ways. First, they are a mechanism for both merchants and their suppliers to enable merchants to get better pricing when the merchant is coming under competitive pressure from another supply channel. Second, CSQs may be used to recognise that the volumes of the builder warrant additional price cuts. 540 CSQs tend to be used in larger projects, so are more common in commercial building projects than residential building projects. 541
- 8.76 We heard that the prevalence of CSQs has declined recently as excess demand has meant customers are more focused on simply securing supply than negotiating for discounts. 542 It is unclear the extent to which this decline is temporary.
- 8.77 CSQs allow suppliers to set different prices for customers who have different willingness to pay for the product. Setting different prices for different customers is common in many sectors and, provided it does not exclude competitors, often benefits consumers by increasing trade and driving firms to compete.⁵⁴³
- 8.78 Competition driving sustained lower pricing is an outcome we seek to promote. However, there is a risk that short-term targeted discounts (even when above an incumbent's costs) could prevent competitors achieving and benefitting from economies of scale. This could limit their ability to provide a more effective competitive constraint over the longer term.
- 8.79 There are some markets for key building supplies where suppliers have a very high market share and there is a need for entrants to reach a certain minimum scale to cover fixed costs. 544
- 8.80 In such markets, entry on a small scale is unlikely to significantly constrain incumbent firms in the short term. Small-scale entry may nevertheless be profitable and has the potential to become a more effective competitive constraint over time as the entrant grows to reach the necessary scale.
- 8.81 However, a small-scale entrant may not be able to remain in the market if the incumbent responds to entry by lowering its own prices below the small entrants' costs (even when this post-entry price is above the incumbent's costs). In such cases, targeted discounts in response to small-scale entry may make it harder or impossible for the entrant to reach the scale required to compete effectively in the long term. This may ultimately lead to worse outcomes for consumers.

540 541	[[].]; []; [].];
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OECD "Fidelity Rebates – Background Note by the Secretariat" (2016) at [13]-[14], available at: https://one.oecd.org/document/DAF/COMP(2016)5/en/pdf.

For example, see Attachment A.

- 8.82 Our view is that targeted discounting by suppliers with market power and scale advantages is likely contributing in some cases to weaker long-term competition for key building supplies. However, given the potential pro-competitive benefits of discounted pricing we do not propose any recommendations for regulatory intervention in this area.
- 8.83 We nonetheless encourage suppliers, particularly those in highly concentrated markets, to review their pricing conduct for compliance with the revised section 36 of the Commerce Act which comes into force in April 2023.
- 8.84 We retain the ability to investigate potentially anti-competitive targeted discounting by suppliers with substantial market power on a case-by-case basis if information collected during this study, or outside of it, gives us reason to believe that anti-competitive conduct may be occurring.

Arrangements between suppliers and builders | Ngā whakahaerenga I waenga i ngā kaituku me ngā kaihanga

As well as having rebate arrangements with merchants, some suppliers also have arrangements with some of their end users (builders) to provide additional rebates and benefits.⁵⁴⁵ Invoicing is through the merchant, but the builder can additionally claim a rebate from the supplier based on the volumes purchased.⁵⁴⁶ The supplier may also offer builders marketing support. Suppliers that directly supply builders—that is, without going through the merchant channel—also offer rebates to builders.

For example, Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [1852]-[1862].

End users are not just builders, but for ease of discussion we will refer to the persons receiving these rebates as builders.

- 8.86 End-user rebates are typically negotiated by larger customers such as GHBs and recognise the greater volumes purchased by these customers.⁵⁴⁷ How the rebate is used depends on each customer's operating model. We understand that it is common among GHBs for some or all of the rebate to be retained as income to the franchisor.⁵⁴⁸ Franchisees may still obtain the benefit of lower upfront prices negotiated by the franchisor than those they would receive if purchasing individually, even if no rebate is passed on.⁵⁴⁹ Some GHBs distribute the entire rebate to their franchisees.⁵⁵⁰
- 8.87 The prevalence of these rebate arrangements varies by key building supply. 551 However, we understand that they are overall a common feature of the arrangements between suppliers and larger customers. 552

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- 8.88 The structure of rebates paid varies, and a combination of structures may be used within a rebate agreement. Some concerns were raised during the study that share of wallet or tiered retroactive rebates from suppliers to builders are common. These rebates could incentivise builders to make all purchases from that supplier. However, we only saw limited evidence of builders receiving these quantity-forcing rebates—usually, the rebates were flat rate and/or lump sum. Sounds
- 8.89 We also heard concerns that rebates from suppliers to builders may incentivise specification by brand. 556 It is possible that a builder's preference for a product for which they will receive a rebate could have some influence on the decision a specifier in turn makes, or the decision to substitute. However, this does not appear to be a significant factor affecting competition, particularly given that specification choices are generally made by designers rather than builders.
- 8.90 One merchant noted that, because it lacks visibility of the details of supplier-builder rebates, these rebates make it more difficult to introduce new suppliers/products to the market—the merchant does not know the true price that the customer is paying, but some customers may be reluctant to switch to new alternatives because of the rebate.⁵⁵⁷
- 8.91 We acknowledge that the lack of transparency around builder rebates may have wider implications, both in adding uncertainty to merchants' stocking decisions and, in some cases, leading to misaligned incentives between builders and their customers. In this way, they have the potential to inhibit competition.
- 8.92 Overall, we consider that suppliers' provision of rebates to builders is less likely to harm competition than rebates from suppliers to merchants, because it appears that these rebates are not commonly structured in a way that may induce exclusivity, near exclusivity or require a minimum volume of sales. Additionally, the smaller volumes that most builders purchase compared to merchants means that it would more often be feasible for suppliers to compete for the whole of a builder's supply.
- 8.93 We nonetheless encourage all suppliers, particularly those in highly concentrated markets, to review their rebate structures for compliance with the revised section 36 of the Commerce Act which comes into force in April 2023.

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Elephant Plasterboard "Submission on residential building supplies market study draft report" (6 September 2022) at 1; Elephant Plasterboard "Cross-submission on residential building supplies market study draft report" (16 October 2022) at 1.

^{555 [].}

Castalia on behalf of Affordable Building Coalition "Submission on residential building supplies market study draft report" (1 September 2022) at 16.

8.94 We retain the ability to further investigate any industry participant's use of rebates if information collected during this study, or outside of it, gives us reason to believe that anti-competitive conduct may be occurring.

Arrangements between merchants and builders | Ngā whakahaerenga i waenga i ngā kaihoko me ngā kaihanga

- 8.95 In this section we consider arrangements between merchants and their customers (builders).
- 8.96 Rewards offered by merchants to builders can take the following forms:
 - 8.96.1 rebates from merchants to builders;
 - 8.96.2 loyalty schemes offered by merchants to builders; and
 - 8.96.3 bundling discounts—when multiple products are offered in a package priced at a discount compared to buying each of the products individually.
- 8.97 Bundling does not appear to be common in agreements between merchants and builders (other than for warranty purposes). We understand that merchants (and suppliers) rarely require builders to purchase all supplies, or specific supplies, in order to benefit from rebates or discounts.
- 8.98 For this reason, the focus of our analysis in this section is on rebates and loyalty schemes.

Rebates from merchants to builders are negotiated with a relatively small number of builders and are set at relatively low levels

8.99 Rebates are offered by merchants to a small number of their customers. They are primarily paid to GHBs and are unusual for SME builders. However, SMEs may be part of a collective that receives rebates, in the nature of a builder buying group such as Combined Building Supplies Cooperative Limited (CBS). Sec.

⁵⁵⁸ Mitre 10 "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 30; Fletcher Building "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [42.1]; []; 1; [];[]. 559 [];[];]; [];[].

Combined Building Supplies Cooperative Limited (CBS) "Submission on residential building supplies market study draft report" (4 August 2022) at 2.

- 8.100 Although GHBs are some of merchants' larger customers, our analysis indicates these rebates are overall offered to customers that represent a minority of their total sales of key building supplies. The rebates paid appear to, for the most part, be relatively low in value. 1662
- 8.101 The structure and level of the rebates agreed is usually the result of bilateral negotiations between the parties.⁵⁶³ Some GHBs explicitly identify in RFPs the nature of rebates required to win their business, with merchants responding accordingly.⁵⁶⁴ Rebates may also be offered during negotiations or renegotiations to match those offered by other merchants to win or retain the business.⁵⁶⁵
- 8.102 We observed the range of rebate structures described in Table 8.1 above in the merchant to builder channel, with the exception of share of wallet rebates. 566
- 8.103 Agreements may contain a package of rebates. For example, within one agreement, sales volumes might be recognised through a flat percentage or tiered retroactive rebate; marketing, event and conference support could be provided through a lump sum rebate; and show home support may be provided through discounts on products on the condition that they are used to build houses that will be used as show homes for a set period. We observed considerable variation in the packages of rebates agreed, reflecting their emergence from negotiations.

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However, since we reviewed only a selection of agreements, it is possible that share of wallet rebates are also used in this channel.

- 8.104 For rebates tied to sales volumes, the key figure is usually the total price paid for all products in aggregate (but may exclude items such as freight, pallets and GST). That is, the rebate percentage does not usually vary by product purchased. Where different rebate percentages apply, this appears to be in relation to product category rather than specific product. 568
- 8.105 As with the rationale for other rebates, rebates to customers from merchants can recognise scale efficiencies provided by larger customers. Frices for customers to purchase key building supplies may be the same across the board, with adjustments to price based on volume made via rebates.
- 8.106 Administrative convenience can also influence the use of rebates rather than solely discounts on price to builders. Rebates are often used to fund the head office or franchisor of GHBs. 571 Similarly, CBS told us that the rebates (generally 2% to 3%) it receives from suppliers are used to cover its operating expenses—although it commented that its primary focus was on negotiating upfront discounts for its members. 572 CBS suggested that, to ensure merchants and building groups focus on better discounts at the time of each transaction, a maximum rebate of 5% could be imposed. 573
- 8.107 Some GHBs are offered but refuse to accept rebates. These GHBs prefer to negotiate for a better upfront price.⁵⁷⁴

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569	[].]; [];[];].
570 571	For example: [[[]; []; [].];].

Combined Building Supplies Cooperative Limited (CBS) "Submission on the residential building supplies market study draft report" (4 August 2022) at 1. CBS's average rebate is 2.8%: at 2.

⁵⁷³ Combined Building Supplies Cooperative Limited (CBS) "Submission on the residential building supplies market study draft report" (4 August 2022) at 2.

574 []; []; [].

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Loyalty schemes to builders are more widely available, with the nature of rewards varying

- 8.108 The major merchants all offer what could be described as loyalty schemes to some or all of their trade customers. These appear to be relatively low cost for merchants to operate. 575
- 8.109 Where these involve membership in a scheme, the level of customer spend required for eligibility varies between merchants, as do the conditions on which a customer can remain a member.⁵⁷⁶ Customers may receive additional rewards for reaching certain spend thresholds.⁵⁷⁷
- 8.110 The information that we were provided suggests that merchants do not usually offer additional rewards for purchasing specific products. Instead, the rewards are tied to overall spend (but may exclude items such as freight, pallets and GST) or to factors that are not solely related to the purchases made, such as a perceived need to strengthen a relationship.
- 8.111 There are both price and non-price rewards offered:
 - 8.111.1 Price rewards are similar to rebates. Builders receive a discount on purchases of building supplies, sometimes based on loyalty to a particular merchant (for example, reaching a threshold for spending or making a certain number of purchases).⁵⁷⁸
 - 8.111.2 Non-price rewards provide benefits that do not reduce the price of building supplies. These might be offered through points schemes or at the discretion of merchants. Rewards vary by programme and could include attendance at trade events, gift cards, consumer products or travel. 579

575 For example: []; [].

For example,

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For example, Bunnings' PowerPass scheme.

For example, Carters' Advantage club, PlaceMakers' PlaceMakers Plus, ITM's Trade Club, Bunnings' Smart Trade, Mitre 10's Airpoints and BuildLink's Smart Trade arrangements.

For example, Carters may invite trade customers to the Advantage scheme if their purchases exceed \$25,000 per annum (Carters "Carters Advantage" https://www.carters.co.nz/carters-advantage); PlaceMakers may invite trade customers to the PlaceMakers Plus scheme (at the "Blue" level) if their purchases exceed \$25,000 per year (PlaceMakers "Terms and Conditions" https://plus.placemakers.co.nz/); Bunnings' customers can apply for a PowerPass Account by completing an online application evidencing their status as a business (Bunnings "PowerPass Accounts" https://trade.bunnings.co.nz/powerpass); Mitre 10 uses Airpoints, for which some trade customers may be eligible but they need to discuss this with their Account Manager or the Trade Team at their local store (Mitre 10 "Earn Airpoints Dollars with us" https://www.mitre10.co.nz/airpoints); and ITM Trade Club is dependent upon individual stores' eligibility criteria (ITM "Trade Club Rewards" https://www.itm.co.nz/Trade-Services/Trade-Club-Rewards).

- Merchants identified several reasons for offering loyalty schemes, including that: 8.112
 - competing merchants also offer such schemes, which means that some customers have an expectation of receiving these benefits;⁵⁸⁰
 - the schemes can be used to incentivise customers to pay on time;⁵⁸¹ and 8.112.2
 - 8.112.3 events accessed through the schemes are useful for merchants to build relationships with their customers.⁵⁸²

Merchant to builder rebates and loyalty schemes do not appear to make it harder for merchants to compete for customers

- 8.113 Merchant-builder rebates and loyalty schemes have the potential to harm competition if they make it less likely that builders will purchase supplies from competing merchants.
- 8.114 If there are key customers in the market (for example, large GHBs), whose volume is critical for achieving the scale necessary for a merchant to operate effectively, then merchants could have the incentive to 'lock in' these customers to prevent competing merchants from achieving this scale. This would require competing merchants to compete for key customers' entire supply volume instead of being able to supply part of their demand. However, the potential for harm is reduced if GHBs periodically tender for supplies.

Rebates

- 8.115 As rebates are typically offered to GHBs, we primarily focus on GHB behaviour in our assessment of their effect.
- 8.116 Merchants did not raise rebates as a factor locking in builders to other merchants and preventing merchants from gaining access to new customers.

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582	[]; [].	

- 8.117 This accords with other evidence that we received.⁵⁸³ We understand that GHBs consider several factors when choosing a merchant, including supply certainty. Price is also an important factor, but the availability of rebates does not appear to be a significant component of the net price paid by GHBs.⁵⁸⁴ Those who responded to our specifier survey did not overall identify 'rebates, discounts and/or loyalty benefits' as one of the most important factors when choosing where to purchase building supplies.
- 8.118 We understand that, for those GHBs that enter supply agreements with merchants, GHBs typically renegotiate, put out RFPs or go out to tender approximately every one to four years. Regular RFPs or tenders tend to reduce customer foreclosure risk because even if the structure of a particular rebate meant that in a given period a customer might purchase all of its supply from one merchant, the customer would not be locked in for the long term. Competing merchants may be able to compete for the customer's business when the existing agreement expires.
- 8.119 We also understand that some GHBs operate their procurement processes with a view to entering multiple preferred supplier agreements, rather than one exclusive supply agreement. As projects arise, they obtain quotes from each of the merchants they have entered agreements with and select the best. GHBs that are willing to trade off a possible higher rebate for the option to continually negotiate lower upfront prices do not appear to be locked in by rebate structures.
- 8.120 Other GHBs have longstanding arrangements with a particular merchant. Some of these have a preference to maintain an exclusive relationship with this chosen merchant. But, where this is the case, it seems to be in order to build a strong relationship with that merchant, rather than due to the rebate structures offered. 587

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	[[[];]; [].];
585	[[[];];].	
586	[]; [].
587	[1; [].

- 8.121 The risk of harm to competition from rebates is also reduced if there are other customers that a merchant can supply. In this regard, we note that there are a large number of customers that are not paid rebates. The evidence we have indicates such customers are overall a majority of merchants' sales by revenue of key building supplies.⁵⁸⁸
- 8.122 These factors suggest that merchants' rebates to builders do not hinder the ability of merchants to compete among themselves, or hinder the ability of new merchants to enter. GHBs do not appear to be locked into merchants by these rebates; it seems that other merchants can (and do) compete for their business, and also have many other customers for which they can compete. Our view is that they are unlikely to be adversely affecting competition between merchants.
- 8.123 As noted in relation to our discussion of supplier-to-merchant rebates, this study has not enquired into compliance with the provisions of the Commerce Act relating to anti-competitive conduct. While we are not currently aware of specific rebate arrangements between merchants and builders which we consider appropriate for further investigation, we retain the ability to further investigate any industry participant's use of rebates if information collected during this study, or outside of it, gives us reason to believe that anti-competitive conduct may be occurring.
- 8.124 We encourage merchants to review their rebate structures for compliance with the revised section 36 of the Commerce Act which comes into force in April 2023. We have consulted on and will be issuing guidance relating to the misuse of market power. Our guidance will discuss a range of conduct covered by the amended section 36, including rebates, and will be of general application to all businesses. Our views, including from this study, have informed the drafting of the guidance.

Loyalty schemes

Loyalty schemes are more widely offered and we have considered how both GHBs 8.125 and smaller customers respond to them and how they impact competition.

588 For example:

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- 8.126 As above, we understand that supply certainty and price are particularly important for GHBs in their choice of merchant. For the most part, GHBs do not appear to consider loyalty schemes as one of the most important factors in their purchasing decisions. See Some do not participate in these schemes. Evidence of GHBs entering multiple supplier agreements to shop between merchants referred to above suggests these GHBs do not prioritise obtaining the highest number of loyalty points (or similar) from any given merchant.
- 8.127 It also appears that smaller trade customers do not generally regard loyalty schemes as a significant factor.⁵⁹¹ We understand that the vast majority of smaller trade customers operate multiple trade accounts.⁵⁹² Although they may still have a preferred merchant, other accounts may be used where there is better pricing or product availability, reflecting the significant factors they identified.⁵⁹³
- 8.128 In our specifier survey, discussed in Chapter 5, most responders did not select the option 'rebates, discounts and/or loyalty benefits' as one of the most important factors when choosing where to purchase supplies.
- 8.129 We understand from merchants that loyalty schemes of some form could be considered a requirement to operate in the market. There may be some customers for which they are particularly important. But, because of their overall similarity, these schemes were considered unlikely to be a key factor through which most customers differentiate between merchants.
- 8.130 Overall, we consider that loyalty schemes are unlikely to be adversely affecting competition between merchants. Loyalty schemes do not appear to be a significant factor in the purchasing decisions of most customers. For those for which these schemes are important, there are several major merchants competing for their custom. Merchants did not suggest that they are locked out of the market through loyalty scheme offerings which they are unable to match.

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591 592 593	[[For example, [[];].].]; [].
594]]; [].
595 596	[].]; [].

8.131 The information we have gathered on the costs required to operate loyalty schemes suggests that, even if they are a requirement to operate in the market, these costs are unlikely to be prohibitive for new entrants.⁵⁹⁷

There is value to the competitive process in ensuring that end consumers are well informed, including about rebates and loyalty schemes

- 8.132 Although we have reached the conclusion above that rebates and loyalty schemes are unlikely to be adversely affecting competition between merchants, there is nevertheless value to the competitive process in ensuring that end consumers are well informed. This reduces the potential for harm from a possible misalignment of incentives. Considerations in this section apply to the rebates and loyalty schemes offered by *both* suppliers and merchants.⁵⁹⁸
- 8.133 In the context of rebates and loyalty schemes, there is potential for undisclosed benefits to influence a builder's capacity to objectively assess the value proposition of a product or merchant for the end consumer. So me industry participants also highlighted that the end consumer is ultimately paying for these benefits yet may not be aware of their prevalence. For example, the end consumer may be presented with an invoice for a project, but they may not know that the materials cost to the builder may be cheaper due to rebates, nor that the builder may be receiving some loyalty rewards for purchasing with that merchant. We heard that a lack of transparency means the benefits are less likely to flow back to end consumers at the lowest prices. So 1

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For example: Master Plumbers "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 2, although this was noted as an anecdotal observation;

For example: Monopoly Watch "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 11. See also: Property Council of New Zealand "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at [10.1];

For example: Property Council of New Zealand "Submission on residential building supplies market study draft report" (31 August 2022) at [10.1]; and Kiwi Infrastructure Limited "Submission on residential building supplies market study draft report" (11 September 2022) at 3. Consumer New Zealand also submitted that rebates may be causing harm to consumers but did not further elaborate: Consumer New Zealand "Submission on residential building supplies market study draft report" (1 September 2022) at 3.

Monopoly Watch highlighted in particular the "suite of benefits" provided by suppliers and installation teams, including conference sponsorships, training days, entertainment, cash rebates, discounts and finance: Monopoly Watch "Submission on residential building supplies market study draft report" (1 September 2022) at 7.

- 8.134 A misalignment of incentives from these rewards is most likely to arise where end consumers are not well informed about different products, are not familiar with the building industry and rely on builders to make these decisions on their behalf, or rely on their recommendations. These consumers may find it challenging to question the choices builders make when purchasing key building supplies. This appears to be the case for some end consumers in New Zealand. 602
- 8.135 An important development is the Building (Code of Ethics for Licensed Building Practitioners) Order 2021, which came into force on 25 October 2022. This Order introduces a Code of Ethics for Licensed Building Practitioners (LBPs). The Code of Ethics includes requirements for LBPs to inform and educate their clients and to declare and manage actual or potential conflicts of interest appropriately. 603
- 8.136 MBIE has also released guidelines to help users of the Code of Ethics navigate it. In relation to conflicts of interest, the guidelines note that:⁶⁰⁴

Conflicts of interest exist when you or your family or company have a personal, or financial connection which may adversely affect your professional judgement or actions. For example, perhaps your professional judgement or actions could be influenced by the personal connection that you have to a particular job, product, supplier or client (e.g. rushing the job or insisting on the use of a particular product in order to get trade points from a particular manufacturer or retailer).

- 8.137 While these guidelines are not authoritative on the legal obligations created, we consider that the examples provided indicate that MBIE's expectation in developing the Code of Ethics is that LBPs' alignments with merchants through rebates and loyalty schemes will be disclosed to end consumers.
- 8.138 We consider that the Code of Ethics and guidance associated with it may assist in ensuring builders provide consumers with full information about the choices available to them and the factors influencing builders' purchasing decisions made on their behalf. LBPs will be required to share additional information, which in turn could influence wider change.
- 8.139 Concerns were also raised during the study about the variety of non-monetary rewards received by specifiers, such as architects, and how this might ultimately affect the services received by end users. These include industry award sponsorships, international conferences and travel and general hospitality.⁶⁰⁵

Clauses 14 and 22 of the Building (Code of Ethics for Licensed Building Practitioners) Order 2021, available at: https://www.legislation.govt.nz/regulation/public/2021/0335/latest/LMS573729.html.

 $\underline{https://www.lbp.govt.nz/assets/lbp/documents/guidelines/code-of-ethics-guidelines-for-lbps.pdf}.$

^{602 [}

Ministry of Business, Innovation and Employment "Code of Ethics: Guidelines for Licensed Building Practitioners" (October 2021) at 11, available at:

For example: Castalia on behalf of Affordable Building Coalition "Submission on residential building supplies market study draft report" (1 September 2022) at 17.

- 8.140 We acknowledge that there is the potential for non-monetary incentives provided to designers to influence their choice of product. However, we note that registered architects are required to comply with the Registered Architects Rules 2006. Rule 52 mandates that a registered architect must avoid any significant conflict of interest, or manage any significant actual or potential conflict and disclose it to all relevant parties. Additionally, rule 56 requires that a registered architect, in respect of their professional activities, must be remunerated solely by the fees and benefits specified in their written terms of appointment or employment agreement and must not offer or accept any significant inducement that creates, or may create, a conflict of interest.
- 8.141 Relatedly, and as with many other industries, many participants in the market for residential building supplies are involved in sponsorship arrangements. This includes sponsorships within the industry—for example, sponsorships of organisations such as Te Kāhui Whaihanga | New Zealand Institute of Architects—and sponsorships outside of the industry, for example, sponsoring sports leagues or teams.
- 8.142 Sponsorships of organisations operating in the industry (and certain amounts of client entertainment) are a common part of business. However, during our study, concerns have been raised about the extent of rewards and sponsorship in the industry and, in particular, sponsorship of groups with regulatory-type roles, which could give rise to a form of regulatory capture. The concern was that sponsorships by suppliers create a feeling of loyalty towards their products, which could influence how those with regulatory-type roles perform their functions.⁶⁰⁶
- 8.143 The party that raised these concerns was most concerned about sponsorship arrangements between suppliers and the Building Officials Institute of New Zealand (BOINZ).⁶⁰⁷ In addition to the sponsorship effect described above, this party was particularly concerned that sponsors of BOINZ may obtain better opportunities to disseminate knowledge to building officials about the suitability of sponsors' products. This could in turn influence building officials' acceptance of competitors' products, or the ease to substitute or specify a competitive brand, thereby making it more difficult for competing (non-sponsoring) suppliers to compete—particularly where the sponsorship agreements are exclusive.⁶⁰⁸

Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [2168]-[2211].

Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [2138]-[2141]; and Elephant Plasterboard "Cross submission on residential building supplies market study draft report" (17 October 2022) at 4.

See also Elephant Plasterboard "Cross submission on residential building supplies market study draft report" (17 October 2022) at 4-5.

- 8.144 However, we understand from BOINZ that the sponsorship arrangements are non-exclusive, relatively inexpensive, and offer (proportionately) limited benefits to suppliers. Additionally, we understand that non-sponsoring suppliers can approach BOINZ to share technical and compliance information with members, and that there have been occasions where competitors to the sponsoring suppliers have delivered presentations on product technical capability at branch meetings and at the BOINZ conference. On this basis, we do not consider that the BOINZ arrangements are likely to be significantly affecting competition.
- 8.145 We nonetheless recognise the potential for either actual or perceived conflicts of interest to arise from sponsorship arrangements, particularly of bodies that are involved in regulatory-related functions. We note the important support that many of these organisations provide to groups within the industry—for example, by providing forums to increase the knowledge of members. We also acknowledge that it can be difficult to obtain the funds necessary to perform these important functions. 610 This challenge should still be balanced with the need to ensure decision makers are objectively assessing information, and based on that objective assessment, providing quality services to end users.
- 8.146 We therefore encourage industry participants to consider the risk of actual or perceived conflicts of interest when determining their funding models.

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Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [2238]-[2272].

Chapter 9

Impediments to the entry or expansion of new or innovative building supplies | Ngā taupā ki te tukuga mai, te whakawhānui rānei i ngā putunga hanga whare hou, auaha rānei

Summary of findings

- Domestic initiatives, notably the MBIE-led Building for Climate Change (BfCC) programme will, over time, call for a significant innovative response from the building industry.
- BfCC will introduce new requirements for the sector to measure and eventually place caps on the embodied carbon emissions (emissions attributable to construction of buildings, including the building supplies), and operational emissions of new buildings.
- The regulatory and behavioural barriers discussed in Chapter 4, appear to incentivise sticking to familiar building products and inhibit the entry or expansion of new or innovative key building supplies. If not addressed, these barriers could well inhibit the entry or expansion of the hoped-for innovation in 'green' building supplies.
- There appears to be a lack of transparency, and possibly limited public awareness, about the energy performance of new and existing homes in New Zealand. End consumers may not have sufficient information to make decisions that reflect the longer-term economic benefits of energy efficient homes.
- It appears there is opportunity to leverage international work such as the European Union 'Energy Performance of Buildings Directive' to upgrade the environmental standards of building supplies, through looking to incorporate international standards for 'green' building supplies into clear compliance pathways within the New Zealand building regulatory system.
- Innovation in offsite manufacturing (OSM) can add a range of benefits for the construction process and has the potential to increase competition in the markets to supply key building supplies.
- A consenting environment which was largely designed around inspections for onsite builds was previously an obstacle for OSM. However, significant progress has been made by some BCAs and MBIE to address the concerns. The BuiltReady scheme, which introduces some of the recent reforms of the Building (Building Products and Methods, Modular Components, and Other Matters) Amendment Act 2021, aims to close the gap further through a new voluntary manufacturer certification scheme for Modular Component Manufacturers (MCM).
- For domestic offsite manufacturers, lack of certainty around pipeline and absence of large long-term contracts remains the key challenge. These businesses can be expected to defer long-term investments to grow capacity to more efficient levels of production in the face of demand uncertainty.
- Strategic long-term government focus (eg, via procurement or regulatory facilitation) is likely to be critical to ensure that OSM reaches its full potential and delivers innovation for consumer benefit.

Introduction | Kupu whakataki

- 9.1 This chapter discusses impediments to the entry or expansion of new or innovative building supplies, such as 'green' building supplies or novel prefabricated products. It considers this in the context of the broader themes of building for climate change and standardisation (offsite manufacturing and prefabrication).
- 9.2 The terms of reference ask us to consider impediments to the entry or expansion of new or innovative building supplies such as 'green' building supplies or novel prefabricated products. Our <u>additional paper on the scope of this study</u> stated that we have placed less emphasis on the extent to which any particular current or future building supply itself may be new or innovative, as we are looking at innovation more broadly.
- 9.3 Competition issues raised in other parts of this report also apply generally to the entry or expansion of new or innovative building supplies, such as the building regulatory system appearing to incentivise sticking to familiar building products. In this chapter we describe some specific programmes and initiatives for these innovative products and some specific barriers that have been reported to us by industry participants.
- 9.4 Innovations in building supplies can emerge in different forms, including improvements to production efficiency, process improvement, new products and/or services. New or innovative building supplies may contribute to more efficient construction processes and/or to building more energy efficient homes.
 - 9.4.1 'Green' building supplies are a subset of new or innovative building supplies that contribute to reducing emissions of the construction sector and are discussed from paragraph 9.6 below.
 - 9.4.2 Novel prefabricated products and offsite manufacturing cover a range of products and processes that utilise some form of manufacturing and standardisation that integrates with the construction process. We discuss this from paragraph 9.64 below.
- 9.5 The topics covered in this chapter are:
 - 9.5.1 the implications of domestic initiatives for 'green' building supplies; and
 - 9.5.2 factors affecting competition for new or innovative building supplies and novel prefabricated products. For the purposes of this topic we mostly use the broader industry terminology of 'offsite manufacturing' and discuss impediments to it, and potential impacts on competition.

Green building supplies | Putunga hanga whare kākāriki

- 9.6 Building supplies can affect the environment through their use in construction as well as through the operational efficiency of buildings. 'Green' building supplies contribute to reducing emissions of the construction sector. They are a subset of new or innovative building supplies that:
 - 9.6.1 are more environmentally friendly to produce, supply or build with; or
 - 9.6.2 contribute to building more energy efficient homes, reducing the environmental impact of operating buildings.

9.7 This section finds:

- 9.7.1 domestic initiatives, notably MBIE's BfCC programme, will, over time, call for a significant innovative response from the building industry, and are likely to encourage innovation for 'green' building supplies;
- 9.7.2 impediments to the entry or expansion of 'green' building supplies that exist currently, if not addressed, could well inhibit the entry or expansion of the hoped-for innovation in 'green' building supplies; and
- 9.7.3 there is significant work offshore to upgrade environmental standards for building supplies, and there appears to be an opportunity to leverage this work, through looking to incorporate international standards for 'green' building supplies into clear compliance pathways within the New Zealand building regulatory system to help facilitate entry or expansion.
- 9.8 Buildings have a significant role to play in reducing emissions. In 2018, nearly 9.4 per cent of domestic emissions were building related. The Government's Emissions Reduction Plan (ERP) sets a long-term vision that by 2050 building-related emissions will be near zero and buildings provide healthy places to live and work.

The terms emissions, carbon emissions and carbon are used to represent all greenhouse gas emissions, Ministry of Business, Innovation & Employment "Transforming Operational Efficiency" (August 2020) at footnote 2.

This includes both the construction and operations of buildings taking a "consumption" approach to measuring emissions. This figure increases to above 15% contribution when considering only long-lived domestic emissions (ie, if biogenic methane is excluded), Ministry for the Environment, Manatū Mō Te Taiao "Aotearoa New Zealand's First Emissions Reduction Plan" (May 2022) at 228-229, available at: https://environment.govt.nz/what-government-is-doing/areas-of-work/climate-change/emissions-reduction-plan/. Other reports have found that the construction and operations of buildings are responsible for between 13 and 20% of domestic emissions (taking a consumption-orientated view). Half of this is from construction and half from operating buildings, Thinkstep "The carbon footprint of New Zealand's built environment: hotspot or not?" (May 2018) at 4.

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- 9.9 It appears that the energy efficiency of new homes built in New Zealand today is behind international comparators, as the minimum standards (that relate to energy efficiency) set in the Building Code (to which most new homes in New Zealand are built) are below international standards, and there are few incentives to build to a higher standard. The quality of our existing housing stock is poor. 614
- 9.10 New Zealand may be starting behind our international peers as we look to our long-term vision of reducing the building-related emissions to near zero.

Domestic initiatives calling for innovation in building products

- 9.11 Several domestic initiatives are likely to require a significant innovative response from the building industry for 'green' building supplies and promote the entry or expansion of 'green' building supplies in the long term.
- 9.12 This is likely to include innovation in, or competing alternatives to, traditional key building supplies. The increased choice and other benefits this has the potential to bring would positively impact competition.
- 9.13 Most notably, BfCC will introduce measures to limit the emissions from the construction and operation of buildings.
- 9.14 The ERP, which is closely aligned to the objectives of BfCC, specifies how the building and construction sector will contribute to a sector-wide carbon budget through to 2035 and provides a range of actions to support reducing carbon emissions.
- 9.15 Other initiatives are:
 - 9.15.1 Rautaki Hanganga o Aotearoa, New Zealand's Infrastructure Strategy, published by Te Waihanga, New Zealand Infrastructure Commission;⁶¹⁵
 - 9.15.2 the Homestar programme, led by the New Zealand Green Building Council (NZGBC);⁶¹⁶ and

OECD "Better Life Index" https://www.oecdbetterlifeindex.org/topics/housing/; Alan Johnson, Philippa Howden-Chapman and Shamubeel Eaqub "A Stocktake of New Zealand's Housing" (February 2018) at 42, available at: https://www.beehive.govt.nz/sites/default/files/2018-02/A%20Stocktake%20Of%20New%20Zealand%27s%20Housing.pdf.

Te Waihanga, New Zealand Infrastructure Commission "Rautaki Hanganga o Aotearoa, New Zealand Infrastructure Strategy 2022-2052" (May 2022), available at: https://www.tewaihanga.govt.nz/strategy/.

International Energy Agency "Energy policies of IEA Countries. New Zealand 2017 Review" (2017) at 225, available at: https://www.iea.org/reports/energy-policies-of-iea-countries-new-zealand-2017-review; OECD "OECD Environmental Performance Reviews: New Zealand 2017" (20 March 2017) at 47, available at: https://read.oecd-ilibrary.org/environment/oecd-environmental-performance-reviews-new-zealand-2017_9789264268203-en; [];

NZ Green Building Council "Homestar" https://www.nzgbc.org.nz/homestar.

9.15.3 ongoing updates to Healthy Homes standards. 617

Building for Climate Change

- 9.16 BfCC is a long-term programme run by MBIE to reduce emissions from constructing and operating buildings, and to make sure buildings are prepared for the future effects of climate change. 618 It will set targets and caps for energy use and emissions, helping to change people's behaviour and the way they think about building.
- 9.17 BfCC contributes to the development of New Zealand's National Adaptation Plan, which will be finalised and published in August 2022, after current consultation on the impacts of climate change across a range of areas, including homes and buildings. 619, 620 BfCC aligns closely with the ERP, which sets an emissions budget and actions across a range of sectors (including building and construction) to reduce emissions.
- 9.18 BfCC includes two emissions mitigations frameworks:
 - 9.18.1 The Whole-of-life embodied carbon framework considers all carbon emissions attributable to the building itself. This includes emissions across the full supply chain, the construction processes (and the waste arising), repair and maintenance, and processes at the end-of-life of a building;⁶²¹ and
 - 9.18.2 The *Transforming Operational Efficiency framework* considers emissions directly and indirectly attributable to the operation of new buildings, including from the use of energy and water. It also defines indoor environmental quality parameters for all new buildings to comply with.⁶²²

TenancyServices "About the healthy homes standards" https://www.tenancy.govt.nz/healthy-homes/about-the-healthy-homes-standards/.

Building Performance "Draft National Adaptation Plan for climate resilience"

https://www.building.govt.nz/about-building-performance/all-news-and-updates/draft-national-adaptation-plan-consultation/.

Ministry for the Environment, Manatū Mō Te Taiao "Kia urutau, kiaora: Kia āhuarangi rite a Aotearoa – Adapt and thrive: Building a climate-resilient New Zealand – Draft national adaptation plan, Managed retreat" (April 2022), available at: https://environment.govt.nz/assets/publications/Adapt-and-Thrive-consultation-document.pdf.

Ministry of Business, Innovation & Employment "Whole-of-life embodied carbon framework" (August 2020), available at: https://www.mbie.govt.nz/dmsdocument/11794-whole-of-life-embodied-carbon-emissions-reduction-framework.

Ministry of Business, Innovation & Employment "Transforming operational efficiency framework" (August 2020), available at: https://www.mbie.govt.nz/dmsdocument/11793-transforming-operational-efficiency.

Building Performance "Emissions reduction" https://www.building.govt.nz/getting-started/building-for-climate-change/emissions-reduction/.

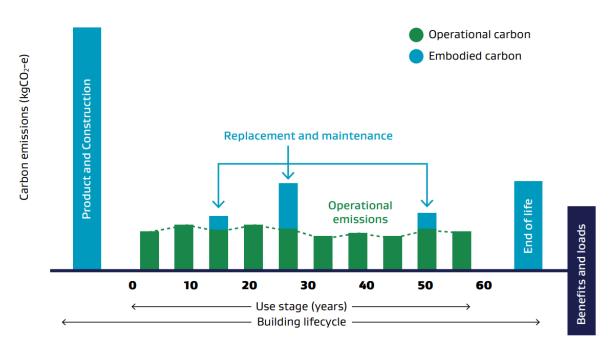


Figure 9.1 Operational and embodied carbon emissions over the life cycle of a building

Source: Ministry of Business, Innovation & Employment. 623

- 9.19 Figure 9.1 is a stylised example that shows typically the most significant embodied carbon emissions happen before the building is used, in the production of construction materials and products. However, embodied carbon emissions also occur during the building's operation due to maintenance activities, and also at the end of the life of the building due to demolition activities, and disposal or recycling of materials and products. 624, 625
- 9.20 BfCC first proposes to introduce measuring and reporting requirements of emissions for new buildings, for both whole-of-life carbon and operational efficiency. This will introduce new challenges for the sector to become familiar with measuring the emissions of new buildings.

Ministry of Business, Innovation & Employment "Whole-of-life embodied carbon framework" (August 2020), available at: https://www.mbie.govt.nz/dmsdocument/11794-whole-of-life-embodied-carbon-emissions-reduction-framework.

^{&#}x27;Benefits and loads' embodied carbon include the reuse, recovery and recycling of materials and are reported separately to other embodied carbons, Ministry of Business, Innovation & Employment "Whole-of-life embodied carbon framework" (August 2020) at 4.

Submissions have provided differing views on the life cycle emissions of some materials, such as steel or timber. This study has not formed a view of the embodied carbon profiles of 'green' building supplies.

- 9.21 Initial, intermediate and then final caps on emissions will then be introduced for both operational efficiency and embodied carbon. Requirements will be introduced for public sector buildings ahead of all other buildings. The level of caps will be determined closer to their introduction and be informed by the results of the reporting. Final caps are expected to reflect New Zealand's net zero carbon emission commitment by 2050.
 - 9.21.1 The requirements introduced under the operational efficiency framework may be considered an extension of existing requirements under the Building Code, with some new measures introduced (such as airtightness). However, the embodied carbon framework introduces new requirements to many sector participants as embodied carbon is not currently considered within the Building Code.
 - 9.21.2 The timeframes for, and level of, the caps on emissions will impact the rate of innovation required by the sector. While the high-level approach is set out in consultation documents, the specific level of the caps and the timeframes for introducing them are yet to be determined. Cap levels will be set considering best practice and in consultation with the sector to ensure they are ambitious but achievable.
- 9.22 While there has been broad support for the need for change, we have heard concerns that implementation periods for new requirements could increase the cost of introduced measures. For example, if an implementation period is too short, builders could be required to dispose of building materials that will not meet new requirements.⁶²⁶
- 9.23 Increasingly significant innovations are likely to be necessary as caps are introduced and then tightened.
- 9.24 Having a series of initial, intermediate and final caps on emissions allows the programme to adjust its approach at each stage, and the impact and costs to the industry of each step-change is likely to vary. BfCC caps are an outcome requirement (a requirement of the completed building rather than any one specific component, such as the insulation performance of walls) and place less emphasis on methods to achieve an outcome. Therefore, it is difficult to determine which key building supplies will be impacted in the long term.
 - 9.24.1 Incremental performance increases (such as the H1 energy-efficiency Acceptable Solution updates included in the 2021 Building Code update) may simply necessitate a 1:1 building material swap, for example, by requiring the use of window frames with a thermal break. 627 This level of change would likely impact suppliers, and the design-and-build stages of the construction process.

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^{626 []}

- 9.24.2 As the caps tighten, and require greater improvements to building performance, more intensive work at the design stage of the construction process may be necessary, and may impact the overall design of a building. For example, a designer may take an innovative approach to the thermal envelope rather than using traditional methods of insulating within the cavity of the structural frame, or a design using timber-pile foundations rather than a concrete slab.
- 9.24.3 Over time, it is likely that BfCC will influence decisions of building typologies being built – decisions at the developer stage of the construction process. Attached housing (such as townhouses and mediumdensity residential housing) can be more energy efficient and have greater opportunities to reduce the embodied carbon of the building.
- 9.24.4 Innovations in OSM are also likely to play an important role in achieving the objectives of BfCC, largely though processes that construct more energy efficient homes. Construction processes in factory conditions can allow greater accuracy, which can build more airtight and energy efficient homes, and there is less materials waste (and more opportunities to recycle) through OSM. 628 Māori stakeholders expressed interest in both 'green' building supplies and OSM. 629
- 9.25 As the BfCC programme develops towards its introduction (expected to be in 2025), MBIE is working to identify an appropriate pathway to introduce the BfCC emissions mitigations frameworks into the building regulatory system. 630 Annual updates to the Building Code will likely be included as a process for implementing BfCC requirements.
- 9.26 Homestar will support the transition to BfCC through upskilling the sector on how to build 'green'. 631 The NZGBC has identified that sector education, skills, and understanding is critical for informing industry consultation through the development of BfCC, and to promote the use and understanding of 'green' building supplies.
- 9.27 The National Māori Authority noted that there is a range of disruptive practices available that could open the door to substitute building products and methods, and that, in its view, there is also a need for funding for Māori research projects, to be led by Māori.632

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⁶²⁹ See paragraph 3.12 above.

Ministry of Business, Innovation & Employment "Building for Climate Change – Summary Report" (May 2021) at 47, available at: https://www.mbie.govt.nz/dmsdocument/14726-building-for-climatechange-summary-report.

⁶³¹ Designing and constructing lower emissions buildings, which may include using 'green' building supplies or alternative construction methods.

⁶³² National Māori Authority "Residential Building Supplies Market Study Submission (25 August 2022); National Māori Authority "Cross-submission on residential building supplies market study draft report" (13 October 2022) at 3. See also paragraph 3.44 above.

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Emissions Reduction Plan

- 9.28 In May 2022, the Ministry for the Environment released the ERP, which sets strategies, policies and actions for achieving New Zealand's first emissions budget and contributes to global efforts to limit global temperature rise to 1.5°C above preindustrial levels. 633 It is the first in a series of "stepping stone" emissions budgets and emissions reductions plans and sets the plan for the first emissions budget period (2022-2025).
- 9.29 Chapter 12 of the ERP, titled Building and Construction, introduces a range of planned actions and initiatives to reduce emissions from the building and construction sector that considers both operational and embodied carbon emissions of buildings and construction.⁶³⁴ The objectives of BfCC and the Building and Construction chapter of the ERP are closely aligned, and both are led by MBIE.
- 9.30 Chapter 12 of the ERP indicates that, for the first emissions budget period, initiatives to reduce building and construction emissions will contribute a reduction of 0.9 to 1.7 Mt CO_2 -e. This will be mainly through the potential impact of non-regulatory initiatives such as a behaviour change programme and providing technical infrastructure such as data and tools.
- 9.31 Many of the planned actions in the ERP will support the objectives of BfCC and promote the entry or expansion of 'green' building supplies. Planned actions include addressing barriers in the building regulatory system, supporting innovations, and proposing demand-side measures. For example:
 - 9.31.1 introducing whole-of-life embodied carbon requirements into the Building Code and addressing barriers in the current regulations to the sector considering whole-of-life embodied carbon;⁶³⁶
 - 9.31.2 actions to support innovation, notably an initiative to establish an Embodied Emissions Climate Innovation Platform;⁶³⁷ and

https://environment.govt.nz/publications/aotearoa-new-zealands-first-emissions-reduction-plan/.

Ministry for the Environment, Manatū Mō Te Taiao "Aotearoa New Zealand's First Emissions Reduction Plan" (May 2022), available at: https://environment.govt.nz/publications/aotearoa-new-zealands-first-emissions-reduction-plan/.

Ministry for the Environment, Manatū Mō Te Taiao "Aotearoa New Zealand's First Emissions Reduction Plan" (May 2022) at 225-244, available at: https://environment.govt.nz/publications/aotearoa-new-zealands-first-emissions-reduction-plan/.

For the first budget period the total projected emissions for the sector (without initiatives in the plan) is 32.5 Mt CO₂-e, available at: https://environment.govt.nz/publications/aotearoa-new-zealands-first-emissions-reduction-plan/.

Ministry for the Environment, Manatū Mō Te Taiao "Aotearoa New Zealand's First Emissions Reduction Plan" (May 2022) at 231, Action 12.1.1, available at:

https://environment.govt.nz/publications/aotearoa-new-zealands-first-emissions-reduction-plan/.

Ministry for the Environment, Manatū Mō Te Taiao "Aotearoa New Zealand's First Emissions Reduction Plan" (May 2022) at 232, Action 12.1.2, available at:

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- 9.31.3 introducing mandatory energy performance certificates (EPCs) for buildings, which could initially apply to government, commercial and large residential buildings and potentially expand to other residential buildings in future. 638
- 9.32 In its Building and Construction Sector Trends Annual Report, MBIE has noted that work is underway to progress regulatory changes that will meet the objectives of the ERP, which includes the development of data and reporting tools to monitor progress. 639
- 9.33 It is difficult to assess what the impacts will be for the future supply and innovations for 'green' building supplies, as many of the planned initiatives are not yet set out in detail. While some of the initiatives in the ERP (identified in paragraph 9.31 above) may promote the entry or expansion of 'green' building supplies, it appears they are unlikely to address the specific impediments that we have identified in the following section.

Other initiatives that will support new or innovative 'green' building supplies

- 9.34 In May 2022, Te Waihanga, New Zealand Infrastructure Commission published Rautaki Hanganga o Aotearoa, New Zealand's Infrastructure Strategy. It includes a range of recommendations that may support the construction sector to transition to net zero carbon by 2050, including recommendations to ensure a consistent trans-Tasman approach in product and building standards and qualification requirements.⁶⁴⁰
- 9.35 The Homestar programme, led by the NZGBC, is an independent tool for assessing the health, efficiency, and sustainability of homes. It provides a rating between 6 Homestar (good standard) and 10 Homestar (world-leading) based on a home's energy performance and environmental impact. While the Homestar rating of a building can vary, the Homestar standard is approximately 30% higher (or more) than the minimum standards required by the Building Code. 641 The Homestar programme largely focuses on new builds, however existing buildings can also gain Homestar accreditation.

Ministry for the Environment, Manatū Mō Te Taiao "Aotearoa New Zealand's First Emissions Reduction Plan" (May 2022) at 232, Action 12.1.2, available at:

https://environment.govt.nz/assets/publications/Aotearoa-New-Zealands-first-emissions-reduction-plan.pdf.

⁶⁴¹ [].

Ministry of Business, Innovation & Employment "Building and Construction Sector Trends Annual Report 2022" (October 2022) at 9, available at: https://www.mbie.govt.nz/dmsdocument/25439-building-construction-sector-trends-annual-report-2022.

Te Waihanga, New Zealand Infrastructure Commission "Rautaki Hanganga o Aotearoa, New Zealand Infrastructure Strategy 2022-2052" (May 2022) at 161, Recommendation 66, available at: https://www.tewaihanga.govt.nz/strategy/.

- 9.36 Homestar facilitates demand for 'green' building supplies by including credits for using materials that are reused, eco-preferred or responsibly sourced. Its use is increasing, and a range of developers use the Homestar standard. Kāinga Ora has recently adopted the 6 Homestar v4.1 standard for all of the homes it builds, and builders who participate in Kāinga Ora builds also benefit by upskilling in building 'green'. 644, 645
- 9.37 Healthy Homes standards are requirements by the Government for rental properties and are periodically upgraded. Changes to the Healthy Homes standards will largely impact existing rental housing and may be a driver of demand for 'green' building materials used in retrofit. Notable updates to Healthy Homes standards include requiring ceiling and underfloor insulation for all rental homes from 1 July 2019.⁶⁴⁶

Impediments to the entry or expansion of 'green' building supplies

- 9.38 Competition issues raised in other parts of this report also apply generally to the entry or expansion of new or innovative building supplies including 'green' building supplies, and some issues identified below are more unique to 'green' building supplies (such as a lack of transparency in the energy performance of new and existing homes).
- 9.39 Current impediments to the entry or expansion of 'green' building supplies, if not addressed, could well inhibit the entry or expansion of the hoped-for innovation in 'green' building supplies. We have found:
 - 9.39.1 impediments in the building regulatory system appear to incentivise sticking to familiar building products;
 - 9.39.2 there may be a skills and education gap in the construction sector, with new skills being necessary to prepare for climate change; and
 - 9.39.3 a lack of transparency, and possibly limited public awareness, in the energy performance of new and existing homes in New Zealand.

642 []; [].

For the year ended June 2022 there were 7,800 Homestar registrations, increasing from 4,871 registrations in the previous year, NZ Green Building Council "Submission on residential building supplies market study draft report" (1 September 2022) at 7, NZ Green Building Council "AGM report", available at: https://www.nzgbc.org.nz/Attachment?Action=Download&Attachment_id=45153;

[].

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Kāinga Ora "Healthier homes under Homestar" (9 June 2020) https://kaingaora.govt.nz/news/healthier-homes-under-homestar/. Homestar has a transition period where projects may register for Homestar v4 or v5. Homestar anticipates the changeover to v5 will occur in early 2023, at which point Kāinga Ora will not be able to register new projects under the Homestar v4 standard, NZ Green Building Council "Technical resources" https://www.nzgbc.org.nz/Category?Action=View&Category id=305.

TenancyServices "Current insulation regulations" https://www.tenancy.govt.nz/maintenance-and-inspections/insulation/compulsory-insulation/.

9.40 Addressing impediments to the entry or expansion of 'green' building supplies will be critical to the success of BfCC and the sectors' ability to respond. Therefore, it is important to consider impediments as they stand today and their impact in the long term, should they not be addressed.

Impediments in the building regulatory system

- 9.41 Chapter 4 finds that regulatory and behavioural barriers appear to incentivise sticking to familiar building products and inhibit the entry or expansion of new or innovative key building supplies. If not addressed, these barriers are likely to inhibit the entry or expansion of the hoped-for innovation in 'green' building supplies.
- 9.42 We have heard examples of New Zealand builders looking to source new or innovative 'green' building supplies from overseas, and finding considerable barriers in our building regulatory system, due to a lack of alignment with international standards. For example:
 - 9.42.1 a builder has had difficulty gaining consent to use imported cross-laminated timber (CLT).⁶⁴⁷ There is no clear compliance pathway for the use of CLT in New Zealand or Australia, though in Australia it appears that builders can leverage European Codes for CLT.⁶⁴⁸ CLT can be used as an alternative to steel elements in a building to reduce embodied carbon;
 - 9.42.2 it can be challenging to gain consent for imported high performance windows that have been tested to international standards that are higher than the Building Code. We have heard that the challenge is proving compliance (by relying on international standards), rather than the performance of the products being an issue for consent;⁶⁴⁹ and
 - 9.42.3 Mr Gardiner highlighted that the Building Code does not provide a clear compliance pathway for uPVC window frames or structural insulated panels (SIPs), which have been widely adopted overseas due to their high thermal performance and are manufactured to international standards. 650

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648	[].		
649	[].

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at 20-22.

A skills and education gap in the construction sector

- 9.43 It appears there is a need to address current and future skill shortages in the construction sector, which includes new skills that may enable the sector to adapt for climate change. This includes technical design skills (eg, CAD design), OSM processes, and building with innovative materials.⁶⁵¹
- 9.44 As noted in paragraph 9.34 above, the New Zealand Infrastructure Commission has made recommendations to reduce barriers for international products by aligning qualification requirements to international standards. This aligns with other feedback that we have heard that there is a skills shortage in New Zealand which may inhibit the ability to adopt overseas building practices.⁶⁵²
- 9.45 The NZGBC has identified that industry participants' experience with building green has a significant impact on perceptions of the costs and other difficulties. It has observed that builders which gain experience in building to Homestar (for example, through a Kāinga Ora build) have a more positive view on the impacts and costs, and that Kāinga Ora and other public sector funding initiatives can play a critical role to incentivise low emissions building and grow experience in the sector. 654

Lack of transparency of energy performance of existing homes

- 9.46 There appears to be a lack of transparency, and possibly limited public awareness, about the energy performance of new and existing homes in New Zealand. End consumers may not have sufficient information to make decisions that reflect the longer-term economic benefits of energy efficient homes.
- 9.47 The NZGBC has described sustainability information for existing owner-occupied homes as a 'blind-spot'. The scope of the BfCC Operational Efficiency framework is limited to new buildings, and Homestar largely focusses on new buildings (as noted in paragraph 9.35). 556

"Some submitters also pointed out that preparing for climate change would require our future workforce to have new skills, of which many will be in high demand internationally", Te Waihanga, New Zealand Infrastructure Commission "Rautaki Hanganga o Aotearoa, New Zealand Infrastructure Strategy 2022-2052" (May 2022) at 155.

"The skills shortage is mainly thanks to a lack of industry experience...", NZ Green Building Council "A Zero Carbon Road Map for Aotearoa's Buildings" (September 2019) at 18, available at: https://www.nzgbc.org.nz/Attachment?Action=Download&Attachment_id=2528.

654 [

NZ Green Building Council "Submission on residential building supplies market study draft report" (1 September 2022) at 5.

EECA has a focus on improving the energy efficiency of existing homes, such as the 'Warmer Kiwi Homes programme' which provides funding for insulation and heating, though this has less emphasis on providing consumers with information on the energy performance of homes, Energy Efficiency & Conservation Authority (EECA), Te Tari Tiaki Pūngao "Energy efficient homes" https://www.eeca.govt.nz/strategic-focus-areas/energy-efficient-homes/.

9.48 A recent study of the potential for broader dwelling energy certification for New Zealand (including existing homes) found that a main rationale is:⁶⁵⁷

To support a proper functioning of the housing market. Specifically, to allow people considering buying or renting a building to more fully understand the way it is likely to perform, and hence more accurately estimate the balance of costs between choosing it or another one with a different rating. Currently, there is no formal way in New Zealand for potential owners or renters to assess the thermal properties of a dwelling.

- 9.49 It is plausible that if sufficient information were available, end consumers might be willing to pay more for more energy efficient homes than less energy efficient homes. This may provide an incentive to build to a higher energy efficiency performance standard and, in turn, lead to increased demand for 'green' building supplies. 559
- 9.50 In particular, demand for building supplies which improve the thermal performance of homes may increase. Thermal performance of buildings is a key element of the BfCC Operational Efficiency framework. MBIE notes that "[t]hermal Performance is primarily determined by passive design measures and the quality of the thermal envelope". 660
- 9.51 The ERP includes an initiative to introduce mandatory EPCs for buildings, initially for government, commercial and large residential buildings and potentially expanded to other residential buildings in future. The NZGBC has suggested creating a regime for New Zealand could take one or two years, drawing on other EPC regimes from other OECD countries. 661, 662

Kōtuitui: New Zealand Journal of Social Sciences Online "Towards dwelling energy certification for New Zealand: normalisation issues" (August 2021) at 208, available at: https://www.tandfonline.com/doi/pdf/10.1080/1177083X.2021.1960866.

Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [2640]-[2646].

Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [2665]-[2676]. Monopoly Watch "Submission on residential building supplies market study draft report" (1 September 2022) at 14; NZ Green Building Council "Energy efficient homes – do they sell for more?" (26 March 2018)

https://www.nzgbc.org.nz/KNOWLEDGEHUB/Story?Action=View&Story_id=284; Roman Jaques "Do we value homes that perform?" Build 178 (1 June 2020)

https://www.buildmagazine.org.nz/index.php/articles/show/do-we-value-homes-that-perform.

Ministry of Business, Innovation & Employment "Transforming operational efficiency framework" (August 2020) at 11.

For example, a review of implementation of EPCs in twelve EU Member States. "Energy Performance Certificates across Europe – From design to implementation" (October 2010), available at: https://c2e2.unepccc.org/wp-content/uploads/sites/3/2016/08/bpie-energy-performance-certificates-across-europe.pdf.

Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [2708]-[2712]. Other comments during the Conference suggested a far greater implementation period, and very high associated refurbishment costs associated with introducing EPCs. This appears to reflect the UK regime where rental properties require minimum EPC ratings. As noted in paragraph 9.54, New Zealand already has a comparable Healthy Homes standard in place, and minimum EPC ratings would not be necessary, Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [2595] and [2726]-[2727].

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- 9.52 EPCs were introduced in the UK and European Union from 2007. EPCs in the UK and Europe are widespread; they are mandatory for all residential homes that are built, sold, or rented.⁶⁶³
- 9.53 Submitters noted that, in the EU, EPCs are a useful regulatory lever that has been widely used for decarbonisation of the housing sector, and building developers in the UK are using them as a primary measure of housing efficiency.^{664, 665}
- 9.54 In the UK, minimum EPC ratings are required for rental properties, as a means of requiring landlords to improve rental properties. New Zealand addresses this issue through minimum standards for rental properties through the Healthy Homes standards. Therefore, while EPCs would provide an information benefit for rental homes, requiring minimum EPC ratings for rental homes in New Zealand does not appear to be necessary (though may be a possible evolution of Healthy Homes in the long term).
- 9.55 Extending mandatory EPCs from government, commercial and large residential buildings to all (new and existing) residential buildings could help address the current lack of information available to consumers regarding the energy performance of residential homes. This could help promote competition for key building supplies, because firms are likely to face stronger incentives to improve their offerings when consumers can make meaningful comparisons.
- 9.56 We acknowledge that this would be a significant policy decision, and one that may have implications for many homeowners for both building new homes and/or renovating or retrofitting existing homes. The costs and benefits of such a policy decision would need to be considered before any decision on implementation and, if adopted, on implementation timing.⁶⁶⁷
- 9.57 This is ultimately a policy matter that concerns both housing policy and emissions reductions. We do not therefore make any recommendation in respect of it.
- 9.58 We have pointed to the relevance of this measure for its potential to raise consumer awareness and engagement around the energy efficiency of housing and, through that, to stimulate demand for 'green' building supplies and competition for key building supplies.

https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/59_96/2116821_ndf

https://www.barratthomes.co.uk/advice-and-inspiration/are-new-build-homes-more-energy-efficient/.

Northern Alliance for Greenhouse Action, Brunswick "Mandatory Minimum Energy Efficiency Standards for the Private Rental Sector " (October 2018) at 2, available at:

https://www.naga.org.au/uploads/9/0/5/3/9053945/mandatory_minimum_energy_efficiency_standards
ds for the private rented sector.pdf.

Possible impacts for existing homeowners could be mitigated though initially introducing EPCs as voluntary.

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For an example energy performance certificate from the UK, see:

Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [2692]-[2707].

Barratt Homes "Are new-build homes more energy-efficient?" (23 March 2022)

9.59 Homestar can also facilitate demand from homeowners that have a preference for environmentally friendly housing and demand can in turn stimulate competition. We have identified examples where Homestar ratings have been included in a Land Information Memorandum (LIM) report by a Local Council. The added validity of including the rating in a LIM may enable banks to provide more (or better) offers in relation to properties having those (or potentially EPC) ratings. 668

Significant offshore work to upgrade environment standards of building supplies

- 9.60 It seems to us that there is an opportunity to leverage international work to upgrade the environmental standards of building supplies, through looking to incorporate international standards for 'green' building supplies into clear compliance pathways within the building regulatory system.
- 9.61 As noted in paragraph 9.9 above, it appears that the energy efficiency of new homes built in New Zealand are behind international comparators, which can be attributed to the minimum standards (that relate to energy efficiency) set in the Building Code. By remaining out of step with international standards, New Zealand may not benefit from international development of standards for 'green' building supplies.
- 9.62 We have heard that non-acceptance of European certification against ISO standards creates barriers for importers, and that there are instances where overseas products have needed to be reengineered to a lower level to comply with New Zealand standards. 669
- 9.63 The European Union has recently undergone a similar programme to BfCC to reduce the emissions of its construction sector. In addition to providing direction to reduce emissions, it is addressing whether the regulatory framework is fit-for-purpose to achieve its sustainability and climate objectives.
 - 9.63.1 Acknowledging its building sector as crucial for achieving its energy and environmental goals, the European Union amended its 'Energy Performance of Buildings Directive' in 2018 to provide direction for the building sector to reduce energy consumption and CO2 of buildings. ⁶⁷⁰ It introduced energy performance measures for new and existing buildings, new standards for buildings, and facilitates more targeted financing to investments in the building sector. ⁶⁷¹

For example, ANZ offers discount home loan rates for homes that have a Homestar 6 rating or higher which may facilitate demand for environmentally friendly housing, ANZ "ANZ Healthy Home Loan package" https://www.anz.co.nz/personal/home-loans-mortgages/loan-types/healthy-homes/;
[].

Introduced as part of the 'Clean energy for all Europeans' package, European Commission "Clean energy for all Europeans package" https://energy.ec.europa.eu/topics/energy-strategy/clean-energy-all-europeans-package en.

European Commission "Energy Performance of Buildings Directive 2010/31/EU" (19 May 2010), available at: https://energy.ec.europa.eu/topics/energy-efficiency/energy-efficient-buildings/energy-performance-buildings-directive en.

9.63.2 More recently in 2022, as part of a set of proposals to make sustainable products the norm and set sustainability requirements for products across the product lifecycle, the European Union is progressing a proposal that aims to boost the internal market for construction products and to ensure that the regulatory framework is fit-for-purpose for achieving its sustainability and climate objectives. This proposal includes the creation of a framework to assess and communicate the environmental and climate performance of construction products, new requirements for the design and manufacture of construction products, and make it easier for standardisation bodies to create common European standards.⁶⁷²

Offsite manufacturing and prefabrication | Te waihangatanga me te hanga i wāhi kē

- 9.64 In this section we discuss the potential for increased competition and disruption from OSM and prefabrication.
- 9.65 Topics covered are:
 - 9.65.1 the range of products and processes encompassed by OSM and prefabrication;
 - 9.65.2 the potential benefits of OSM and prefabrication;
 - 9.65.3 the progress that has been made to reduce regulatory barriers to OSM and prefabrication;
 - 9.65.4 ongoing challenges and the importance of government support; and
 - 9.65.5 the potential for OSM, over time, to disrupt established industry structures.

The range of products and processes encompassed by offsite manufacturing and prefabrication

- 9.66 The term OSM is often used interchangeably with the term prefabrication (or shortened colloquially to 'prefab') and covers the range of products and processes that utilise some form of offsite assembly and standardisation as part of the construction process. In the remainder of this chapter, we refer simply to "OSM".
- 9.67 OSM includes the factory assembly of:
 - 9.67.1 a basic floor, wall, roof-truss or frame;
 - 9.67.2 components such as windows;

European Commission "Green Deal: New proposals to make sustainable products the norm and boost Europe's resource independence" (30 March 2022), available at: https://ec.europa.eu/commission/presscorner/detail/en/IP 22 2013.

- 9.67.3 more complex panel products (such as structural insulated panels); and
- 9.67.4 full modular buildings (or hybrid 'pod and panel' components) ready to deliver to site.
- 9.68 The outputs of OSM range in complexity. For the purposes of this study, offsite manufacturers can be considered as both purchasers of key building supplies (as inputs) and as suppliers of (more complex) key building supplies. Using the supply of timber as example, the frame and truss industry changed trading arrangements from supplying timber for onsite framing to suppling prefabricated timber wall frames. We heard that panelisation can be considered a further step in this offsite manufacturing process including walls, insulation, and wiring to the framing before being supplied onsite.⁶⁷³
- 9.69 There are a range of different OSM business and operational models which can draw on an onshore or offshore manufacturing base. Some favour a more flexible customer-centric approach to design and manufacture, offering customisation by clients, whereas others emphasise greater standardisation (with less customisation) to lower cost in the design and manufacturing processes.⁶⁷⁴
- 9.70 Offsite NZ is a non-profit membership organisation that informs, educates, and advocates for innovation and excellence in offsite design and construction in New Zealand.⁶⁷⁵
- 9.71 Any residential build can employ some degree of offsite manufacturing strategies. 676

The potential benefits of offsite manufacturing

- 9.72 The potential benefits of OSM include:
 - 9.72.1 increased speed and efficiency of onsite assembly. A number of interested parties emphasised the ability to assemble a weatherproof building envelope on site faster than a traditional build;⁶⁷⁷

- 9.72.2 increased production speed through a combination of standardisation and the use of technologies such as robotics used in the manufacturing process.⁶⁷⁸ In addition to production speed, site works can be carried out simultaneously and improve the build sequence timing;⁶⁷⁹
- 9.72.3 reduced building materials wastage when compared to a typical onsite build;⁶⁸⁰
- 9.72.4 improved operational efficiency of buildings with the use of better performing products such as SIPs that use alternative insulations (for example, expanded foam) and the ability to build more airtight buildings.⁶⁸¹ Factory-based activity is also said to be easier to monitor for quality assurance; and
- 9.72.5 the ability to work in a controlled environment may enable health and safety benefits for workers as environmental and site-specific risks can be mitigated. 682
- 9.73 At scale, OSM has the potential to lower construction costs compared to a traditional onsite construction methods. Most interested parties we spoke to, however, say this is not currently evident given the OSM industry is still developing capacity and that there is not yet sufficient demand certainty for the scale of operations to be fully efficient. Instead, participants cited some of the other benefits outlined above as primarily driving the appeal of OSM currently.
- 9.74 OSM could also potentially indirectly have positive impacts on the supply of key building supplies. OSM can potentially drive change in the markets for key building supplies through introducing efficiencies and scale to the construction process, which may in turn:
 - 9.74.1 improve consenting confidence and efficiency by building relationships with BCAs and improving BCA know-how;
 - 9.74.2 facilitate imports when efficient;
 - 9.74.3 introduce or enhance purchasing power when buying materials from vertically integrated upstream suppliers.

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9.75 In our Māori engagement session at the conference, we heard that developing OSM at scale and transporting it to the regions as a promising solution for supplying housing stock to regional and rural areas.⁶⁸³

The progress that has been made to reduce regulatory barriers to offsite manufacturing

- 9.76 We understand that a particular challenge for OSM until recently has been a consenting system largely designed around onsite inspections for traditional onsite building, but that significant progress has been made by designers, BCAs and MBIE to address those concerns.⁶⁸⁴
- 9.77 An example of this progress is that we heard that technical information in relation to SIPs are better understood and that designers are including appropriate information in project documentation. This is improving BCA confidence in assessing compliance of panelised units. This was supported by the fact that BCA requests for information had, over time, reduced significantly in relation to this supplier's SIPs products.⁶⁸⁵
- 9.78 We understand development of digital solutions such as cloud-based monitoring software (Artisan) have played an important role in enabling information to be accessible to BCAs where onsite inspection may not be practical or to provide digital evidence of compliance. BCAs can access a historical record of the construction process which provides greater assurance via a desk-based review.⁶⁸⁶

MBIE's BuiltReady programme

- 9.79 In addition, the recent launch of MBIE's voluntary certification scheme for modular component manufacturers (included as part of the 'BuiltReady' programme), implements the reforms of the Building (Building Products and Methods, Modular Components, and Other Matters) Amendment Act 2021 and aims to further reduce remaining regulatory barriers to OSM.
- 9.80 Under the BuiltReady scheme, the entire prefabricated construction process, whether in respect of components or of an entire prefabricated building, from design (where relevant), manufacture, assembly, transportation, and installation on site will be assessed and certified. Third-party inspections, audits and post-certification surveillance by an accredited and registered modular component manufacturer certification body will ensure certified manufacturers are producing modular components that meet the requirements of the Building Code.

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Residential building supplies market study – Day 3 transcript of consultation conference (29 September 2022) at [514]-[543]. See also paragraph 3.43 above and the recent partnership between HUD and Toitū Tairāwhiti through the Whai Kāinga Whai Oranga programme, which recently opened the new Toitū Tairāwhiti BuiltSmart OSM facility in Gisborne.

- 9.81 Depending on how manufacturers meet specified certification and registration criteria, they may be certified to:
 - 9.81.1 manufacture only modular building components to a Building Code compliant design that must be approved by a BCA through either a building consent application or a current national multiple-use approval;⁶⁸⁷ or
 - 9.81.2 *design and manufacture* modular building components to a Building Code compliant design that they have developed themselves.
- 9.82 BuiltReady scheme rules for scheme parties and manufacturers or certification bodies considering applying for the scheme have recently been released. The scheme rules are designed to provide a clear and robust framework so that MCMs can demonstrate they meet stringent third-party certification requirements.
- 9.83 The policy groundwork created by BuiltReady is a significant advancement to enable faster, more consistent building consent approaches for OSM. It is, however, still too early to assess the level of uptake and success of the programme. For BuiltReady and OSM to reach full potential, sustainable long-term growth in the sector is a prerequisite.
- 9.84 For complete modular house builds, the MultiProof system currently offers a consenting pathway for OSM that has an especially standardised approach to construction. 689
- 9.85 Under the MultiProof system, MBIE will assess whether a set of plans and specifications for a standardise building design will comply with the Building Code. MultiProof speeds up the consenting process by requiring a BCA, where a MultiProof design has been approved by MBIE, to make a decision on a building consent application within 10 working days (instead of the usual 20 working days) and sets a narrower scope for the BCA to review.
- 9.86 The BCA must assess whether the design, with any permitted variations, is the same as the design approved by MBIE, that the proposed site meets the conditions of the MultiProof design, and that the site-specific features of the design comply with the Building Code. The BCA will then complete the inspections required.
- 9.87 To be eligible for consent under MultiProof the builder must intend and be able to build an approved design at least 10 times over two years. MultiProof therefore suits an offsite manufacturer using similar designs and a standardised construction method.

Under the MultiProof system which is discussed in paragraphs 9.84 to 9.87.

https://www.building.govt.nz/assets/Uploads/building-code-compliance/certifications-programmes/product-assurance/builtready-scheme-rules-2022.pdf.

Building Performance "MultiProof" https://www.building.govt.nz/building-code-compliance/product-assurance-and-certification-schemes/multiproof.

9.88 Some interested parties we spoke to said that adjustments to the MultiProof system to allow greater flexibility for minor variations would be a useful measure to reduce consenting barriers to OSM.⁶⁹⁰ This perspective largely reflects an offsite business model that specialises in repeatable full modular designs.

Ongoing challenges and the importance of government focus

- 9.89 Currently domestic OSM manufacturers, as purchasers of key building supplies (as inputs) mostly access the same supply chain and source their materials from merchants like most builders. In that respect, their challenges as purchasers, in terms of the services, prices and/or ranges of materials stocked by the major merchants, are currently similar to other purchasers of key building supplies.
- 9.90 At larger scale, OSM manufacturers ought to be able to achieve better material prices for greater volumes. Potentially they could look to approach suppliers directly and bypass merchant intermediaries.
- 9.91 We heard consistently from interested parties that the main challenge to the OSM industry involves achieving scale while managing investment risk.
- 9.92 The OSM industry is still in the early stages of development relative to its potential. Like any large building product manufacturing facility, lack of demand certainty and an absence of larger-scale longer-term contracts to provide a pipeline of work means that investment risks remain. Businesses will be reluctant to make long-term investments to grow capacity to more efficient levels of production if there is a lack of visibility around pipeline. Some smaller offsite manufacturers may be riskier business partners for investors and consumers and concerns about liquidity can undermine take up of OSM products.
- 9.93 Despite experiencing significant recent growth, OSM is still relatively small compared to the wider construction industry. Over the 10-year period from 2011 to 2021 the proportion of prefabrication strategies identified in residential consent data increased 300% from around 3% to around 9% of reported building consents. This equates to an underlying growth rate of approximately 12% per annum in residential projects utilising offsite strategies.⁶⁹¹
- 9.94 In September 2021, the government released its policy statement on housing and urban development. The strategy that this policy statement outlines includes support for innovative building methods that speed up and scale up construction and make housing more affordable, such as offsite manufacturing. The main mechanism for which such support is to be extended is, at present, through building system legislative reform (such as BuiltReady) and through government-led projects (such as Kāinga Ora's new build programme).

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Offsite NZ "Education, Skills and Attitudes Survey 2021" at 7, available at:

https://www.offsitenz.com/education-skills-attitudes-survey-2021.

https://www.hud.govt.nz/our-work/government-policy-statement-on-housing-and-urban-development/.

- 9.95 We have discussed the BuiltReady programme. For its part, Kāinga Ora has announced support for OSM due to the benefits, in particular the speed of construction, that it provides.⁶⁹³ Between 2019 and 2021, Kāinga Ora doubled the number of homes delivered using offsite manufacturing solutions and is on track to complete 500 units using offsite manufacturing by the end of the 2022 financial year.⁶⁹⁴
- 9.96 In 2021 Kāinga Ora published an OSM strategy "Transforming construction through innovation", and set a target to increase the number of offsite manufacturing solutions used in their new build programme by a minimum of 20 percent year-on-year for the duration of the public housing plan. 695
- 9.97 We consider that Kāinga Ora's OSM strategy is likely to offer pipeline support for the OSM industry. However, providing certainty and long-term visibility for build partners in relation to Kāinga Ora OSM demand, remains a key challenge. ^{696, 697} Kāinga Ora advises that it expects its migration to a system-wide house delivery methodology, which it is in the process of implementing, and multi-year pipeline of work opportunities to assist with this.
- 9.98 The UK government has identified OSM as key strategic area in its Construction Sector Deal published in 2019.⁶⁹⁸ The policy paper aims to create a partnership with industry to transform the sector's productivity through innovative technologies and a more highly skilled workforce. Social housing provider Homes England also support the use of OSM through broad range strategic partnership and funding initiatives. Their strategy includes incorporating OSM into building lease disposals to promote a range of OSM on Homes England land and encourage strategic partners to use OSM through the provision of development finance to developers.⁶⁹⁹

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Construction Sector Deal, available at: https://www.gov.uk/government/publications/construction-sector-deal.

sector-deal/construction-sector-deal.

Homes England's strategic plan, available at: https://www.gov.uk/government/publications/homes-england-strategic-plan-201819-to-202223.

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Kāinga Ora has begun discussions with iwi on Offsite Manufacturing (OSM) solutions also, for example, setting up BuildSmart with Toitū Tairāwhiti, Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 3.

Kāinga Ora "Transforming construction through innovation", available at:
https://kaingaora.govt.nz/assets/Developments-and-Programmes/Kainga-Ora-Offsite-Manufacturing-Plan-Transforming-construction-through-innovation.pdf.

Kāinga Ora "Transforming construction through innovation", available at:

https://kaingaora.govt.nz/assets/Developments-and-Programmes/Kainga-Ora-Offsite-Manufacturing-Plan-Transforming-construction-through-innovation.pdf.

Fig. 1

- 9.99 Criteria used to determine the extent of offsite manufacturing solutions used in a build is part of the UK's approach to setting OSM targets and measuring outcomes. As an example, the concept of a pre-manufactured value (PMV) is used in determining funding eligibility under UK's Affordable Homes Programme. PMV is a metric used to calculate the proportion of manufactured components within the context of an overall construction project cost and is used to measure and incentivise the use of OSM in the UK.
- 9.100 An effective all-of-government strategy in relation to OSM could cover a broad range of initiatives.
- 9.101 We heard from a UK industry participant about how policy initiatives there are driving industry transformation and that an effective government strategy covers "Five Ss'":⁷⁰¹
 - 9.101.1 **Scale**. The UK government has recognised it needs to play a role in driving scale through its own commissioning behaviour, acting as a client through its social housing programme, while mandating and driving the use of OSM through other funded programmes.
 - 9.101.2 **Stimulation**. Stimulating the market is about supporting the supply chain. This is to avoid creating large demand pressures only to find the supply chain is not mature enough to deliver. This could, for example, include putting measures in place for working capital funds to support investment and the purchase of machinery and for training.
 - 9.101.3 **Standardisation**. Standardisation attempts to use more commonality in approaches to design and ultimately facilitates the move to scale.
 - 9.101.4 **Safety**. Prioritising safety ensures that innovation is done responsibly and should be at the heart of OSM culture.
 - 9.101.5 **Soft levers**. Soft levers are indirect policy approaches that can drive OSM. These can relate to carbon focused polices and moving to a manufacturing model which is less wasteful. Policies which aim to speed up the consenting process is another example of a soft level.
- 9.102 Other factors which are acting as a constraint on OSM capacity are skills and labour shortages. We consider that OSM has the potential to improve labour productivity in New Zealand and more education pathways are opening. Further emphasis on training and development to address specific skills shortages, such as Computer Aided Design, would be beneficial.⁷⁰²

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Information on Affordable Homes Programme 2021 to 2026, available at: https://www.gov.uk/guidance/apply-for-affordable-housing-funding#about.

Residential building supplies market study – Day 2 transcript of consultation conference (28 September 2022) at [3228]-[3331].

- 9.103 Finally, in the past there have been some negative perceptions that 'prefab' buildings are lesser quality. Such perceptions are inconsistent with many of the benefits we consider OSM appears to have, such as the ability to improve airtightness and build to a greater degree of precision in a controlled factory environment.
- 9.104 There have also been examples of financial failure of modular building companies leaving consumers out of pocket and without delivery of buildings. 703 The different building processes involved in this method of building may present financing, payment and ownership risks for consumers that differ from those encountered with conventional on-site building. However, we consider these can most likely be overcome with focused consumer education initiatives to supplement rights and obligations appropriately defined by contract, as well as other consumer protection laws to support consumer confidence in OSM products. This could be examined as part of Phase Three of MBIE's Building System Legislative Reform Programme. 704

Offshore offsite manufacturing and importers can supplement a growing domestic offsite manufacturing sector

- 9.105 Offshore OSM has been identified as being able to supplement a domestic OSM sector which faces capacity constraints. 705 For example, we have heard that manufacturing modular homes offshore has the advantage of being able to access less constrained labour markets and building supplies at a lower cost. 706
- 9.106 In the vast majority of cases, however, offshore manufacture of prefabricated products such as windows or structural insulated panels, will not be set up with the New Zealand market in mind. This presents additional challenges to a potential importer wanting to access that supply because consenting pathways for certain products and systems typically reflect a particular NZ perspective. Undertaking performance assessments for compliance purposes adds time and costs and may dissuade an importer or offshore manufacturer from access to a small market.

See https://www.stuff.co.nz/business/property/130486707/nz-tiny-homes-goes-into-liquidation-

compliance, it was not (yet) the customer's property and is instead an asset of the business in liquidation. This is so despite the customer making significant milestone payments. Customers in such circumstances face significant loss if determined to be unsecured creditors in the liquidation.

704 See paragraph 4.256 above.

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leaving-customers-with-unfinished-homes and https://www.stuff.co.nz/business/property/130500323/eightyyearold-left-practically-homeless-and-190000-out-of-pocket-by-nz-tiny-homes-liquidation. It has been reported that the liquidator has informed a customer that, because the customer's home was unfinished and did not yet have code

- 9.107 Many overseas window manufacturers, for example, produce for much larger markets such as Europe, and could offer the same product in New Zealand but clear compliance pathways do not exist. Some we spoke to suggest there may a good reason for this such as the unique durability requirements for New Zealand windows. Others contend the products are manufactured and designed to a high international standard and ought to satisfy the requirements of the Building Code in New Zealand. We have already noted the opportunity to leverage international standards (subject to appropriate checks to be satisfied that the performance requirements of the Building Code will be met).
- 9.108 International shipping costs is also a relevant consideration. These transport costs, which sometimes include inefficiencies associated with 'shipping air' inside the modular units, also have an associated carbon cost. We understand being closer to suppliers may also have implications for quality control. A domestic SIP manufacturer told us that they prefer sourcing supplies from a domestic supplier so they can build relationships and have confidence in the quality of product delivered.⁷⁰⁹
- 9.109 In the longer term, it is likely that an OSM industry better suited to New Zealand might have domestic manufacturers with national reach and a number with manufacturing bases close to regions where there are significant development opportunities.
- 9.110 It appears that while the domestic industry develops capacity, clearer consenting pathways to importing offshore prefabricated key building supplies could facilitate competition in OSM while supplementing domestic supply.

Over time offsite manufacturing has the potential to disrupt

- 9.111 While interested parties have observed that OSM should not be seen as a "silver bullet" to address increasing construction costs, it appears to have significant potential to compete with more traditional ways of building.
- 9.112 In addition to the range of potential benefits that OSM offers, if the industry is able to sustain further investment in capacity, it has the potential to increase competition in key building supplies by disrupting established practices and industry structures.⁷¹⁰

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9.113 Greater scale and capacity of the industry may eventually enable a shift in the supply chain that is able to bypass intermediaries and source directly from suppliers, enable greater innovation in building practices, and offer homeowners and end consumers more choice. The For OSM to achieve scale and deliver the benefits of competition, it will require investment for the long term and needs to overcome similar barriers to competition that we have identified in relation to all key building supplies. Strategic long-term government focus is likely to be critical to ensure that OSM reaches its full potential, for example, via government procurement and regulatory facilitation.

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Kiwi Infrastructure "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 1.

Chapter 10 Recommendations to enhance competition | Ngā whakatau hei hāpai i te whakataetae

List of recommendations

Recommendations to enhance the regulatory system

- 1. Introduce competition as an objective to be promoted in the building regulatory system.
- 2. Better serve Māori through the building regulatory system.
- 3. Create more clear compliance pathways for a broader range of key building supplies:
 - a. Update and develop more Acceptable Solutions and Verification Methods
 - b. Expand the range of product certification schemes that can issue product certificates deemed compliant with the Building Code
 - c. Investigate reducing further barriers to certification and appraisal
 - d. Develop guidance for key building supplies that identifies the appropriate Building Code clauses and possible means of proving compliance.
- 4. Explore ways to remove impediments to product substitution and variations:
 - a. Explore ways to reduce specification by brand
 - b. Increase flexibility in the MultiProof scheme.

Recommendations to support sound decision making

- 5. Establish a national system to share information about building products and consenting.
- 6. Establish an education and mentoring function to facilitate a better co-ordinated and enhanced approach by BCAs to consenting and product approval processes.
- 7. Develop and implement an all-of-government strategy to coordinate and boost offsite manufacturing.

Recommendations to address strategic business conduct

- 8. Promote compliance with the Commerce Act, including by discouraging the use of quantity-forcing supplier-to-merchant rebates that may harm competition.
- 9. Consider the economy-wide use of land covenants, exclusive leases and contractual provisions with similar effect.

Introduction | Kupu whakataki

10.1 This chapter draws on our findings about factors affecting competition from previous chapters and makes recommendations that we consider could improve competition for key building supplies for the benefit of New Zealanders.

This study | Tā mātou take wānanga

- 10.2 This study has considered the dynamics of competition within each level of the industry supply chain for key building supplies, but it has focused most strongly on conditions for the entry and expansion of new or competing products. Improving these conditions is, in our view, critical to better facilitating workable competition for key building supplies.
- 10.3 The building regulatory system has at its heart the provision of safe, healthy, and durable homes for New Zealanders. While innovation is recognised as important to achieving those objectives, the building regulatory system has several features which prevent competition from working well.
- 10.4 The building regulatory system continues to incentivise designers, builders and BCAs to favour familiar building products over new or competing products. Merchants also have incentives that reinforce this approach.
- 10.5 Despite the comprehensive design of the building regulatory system and its capacity to recognise and promote innovation, in practice the system is complex to navigate, some aspects (such as the express durability requirement in the Building Code) are unique to New Zealand, and there is variability in interpretation and application of the Building Code. This has led to uncertainty, increased cost and risk aversion in getting new building products accepted for general use.
- 10.6 In our view, this is due to the combined effect of:
 - 10.6.1 the way the building regulatory system the Building Act, the Building Code, and related instruments, and the consenting system is applied to building products; and
 - 10.6.2 the decision-making behaviours of designers, builders, BCAs and government agencies in response to, and in applying the regulatory system.
- 10.7 This makes it difficult for competing products to be introduced in New Zealand markets and consequently for competing suppliers to expand their businesses. It can be difficult for competing suppliers to obtain the efficiency benefits that can accrue from operating at scale and increasing productive capacity. This reinforces the market position of established and familiar building supplies and methods and of the existing suppliers of those products.

- 10.8 In addition, there are two areas where strategic business conduct is affecting competition:
 - 10.8.1 Quantity-forcing rebates paid by established suppliers to merchants appear, under certain conditions, to be reinforcing regulatory factors impacting entry and expansion, making it difficult for new or competing products to access distribution channels and increase sales. These rebates reward merchants for purchasing greater volumes of product through a single supplier by offering higher percentage rebates that apply across all of a merchant's purchases with that supplier. Under certain conditions, these rebate structures can deter merchants from stocking competing products in their stores, making it more difficult for new or smaller suppliers to get established.
 - As in previous market studies in the fuel and groceries sectors, we have also identified the use of land covenants and exclusive leases benefitting merchants. In some cases, these covenants, exclusive leases and contractual provisions with similar effect may impede the entry or expansion of competitors in the supply of key building supplies by limiting the availability of sites and/or constraining customers' choice of merchant.

10.9 We make four further observations:

There is substantial work underway by government agencies and the construction industry relating to the housing crisis, climate change, resource management and local government reform. The Building Legislative Reform Programme that was commenced in 2019 remains ongoing. As part of this programme, in July 2022, MBIE commenced a first-principles review of the building consent system focused on institutions, practice and system management (Consent Review).⁷¹² This study, into factors affecting competition for key building supplies, and those other programmes and initiatives complement one another.

Ministry of Business, Innovation & Employment "Issues discussion document: Review of the building consent system" (21 July 2022), available at: https://www.mbie.govt.nz/have-your-say/building-

consent system (21 July 2022), available at: https://www.mble.govt.nz/nave-your-say/build consent-system-review/; Chapter 4 at paragraph 4.235.

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- 10.9.2 Initiatives like the appointment of the Plasterboard Taskforce suggest that it is possible to respond to 'bottlenecks' in the building regulatory system using the range of regulatory and operational tools that are already available. Measures such as those adopted by the Plasterboard Taskforce could, where appropriate, be considered for a wider range of key building supplies to better support competition. For example, through the recently established Critical Materials Taskforce which is intended to monitor emerging supply chain risks and to provide guidance, advice, data and information to inform MBIE's Critical Materials and Products Work Programme. Programme.
- 10.9.3 The New Zealand building sector comprises many businesses and entities of small scale at all levels, including the design, consent and building stages of construction. It is costly for small-scale participants to invest in knowledge about alternative products compared to those with which they are familiar. Similarly, it is relatively more costly for smaller BCAs than for larger ones to assure themselves about alternative products.
- 10.9.4 The construction sector has been under significant pressure in recent times, with elevated demand, supply chain interruption and loss of production due to global events and challenges such as the COVID-19 pandemic, and rising input costs. These conditions are plainly not conducive to good consumer outcomes. As the pressures on the industry start to ease, and supply and demand come into better balance, insights from recent experience may provide useful learnings for the future.

Our recommendations | Ā mātou whakatau

- 10.10 The factors affecting competition that we have identified relate to the building regulatory system, the way in which it is applied by industry participants such as designers, builders, BCAs and government agencies, as well as the strategic business conduct of some market participants.
- 10.11 Our case studies of concrete (including cement), plasterboard and structural timber show that the factors affecting competition apply to a greater or lesser extent in relation to different key building supplies.
- 10.12 At a system level, there is potential for greater coordination of initiatives that can encourage uptake of new and innovative construction methods and technologies, particularly those that can drive scale of production and build workforce capability and capacity within the construction industry and in turn, support workable competition.

Castalia on behalf of Affordable Building Coalition "Submission on residential building supplies market study draft report" (1 September 2022) at 5.

Hon Dr Megan Woods "Taskforce set up to protect construction industry from product shortages & delays" (24 November 2022) https://www.beehive.govt.nz/release/taskforce-set-protect-construction-industry-product-shortages-delays.

See the summary of demand and supply pressures in Chapter 2 from paragraph 2.75.

- 10.13 We also consider that better engagement with Māori is key to delivering on obligations derived from the Treaty of Waitangi (the Treaty) and to ensuring that the building regulatory system serves and supports Māori to achieve their aspirations within the sector. We expect that supporting Māori in these ways will also support improved competition more broadly.
- 10.14 Technical judgements about what is required to deliver quality housing to New Zealanders properly fall to building sector expert policy agencies. However, in our view, there is scope to place greater emphasis on competition and innovation for key building supplies without compromising the core objectives of the building regulatory system. The aim is to produce better long-term outcomes for consumers safe, healthy and durable homes, that can be built with a wider range of costeffective key building supplies, including those that are new or innovative.
- 10.15 Our recommendations form a suite of measures that are directed at policy makers, decision makers and industry participants. We present them in three groups:
 - 10.15.1 Enhance the regulatory system Competition should take a more prominent position in the regulatory system and decision making within it to ensure the effective operation of markets for key building supplies and delivery of safe, durable, quality housing for New Zealanders. In practice, this means that within the current framework it is important to create clear compliance pathways for more key building supplies and make it easier for designers and market participants to use and adopt new or competing building supplies. Māori interests should also be better served.
 - 10.15.2 **Support sound decision making** Greater information sharing and stronger coordination across, and in partnership with, government are needed to influence the decision-making behaviours of designers, builders, BCAs and government agencies involved in the implementation and application of the building regulatory system.
 - 10.15.3 Address strategic business conduct Increased awareness is needed of the potential for business conduct to affect competition for key building supplies and, potentially, to breach the Commerce Act. In particular, the use of quantity-forcing supplier-to-merchant rebates, land covenants and exclusive lease arrangements.
- 10.16 Our recommendations are necessarily interdependent and we acknowledge that changes in one part of the system can have implications for other parts of the system. There may be several ways to achieve the objectives of our recommendations.

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The Treaty of Waitangi/Te Tiriti o Waitangi is a founding document of government in New Zealand and is one of the major sources of New Zealand's constitution. Our reference to "the Treaty" is to both the English and Te Reo versions.

- 10.17 Most of our recommendations would be suitable for implementation by Government as they are of a regulatory nature or involve coordination or the provision of information that we consider existing government entities would be best placed to facilitate. They are complementary to the work already underway by Government. As is contemplated by the statutory role of a market study, further work will be required to consider these matters, and details relating to the design and implementation of our recommendations, if they are adopted.
- 10.18 Other recommendations are directed at industry participants for action, such as activity that we recommend to ensure compliance with the Commerce Act regarding the use of quantity-forcing rebates, land covenants, exclusive leases and contractual provisions with similar effect. We also identify action that we are taking, or intend to take, in relation to some strategic conduct that has come to our attention.
- 10.19 The remainder of this chapter discusses the three groups of recommendations.

Enhance the regulatory system | Te whakaniko i te pūnaha ture

- 10.20 The regulatory system makes it difficult for competing key building supplies to enter and become established in the New Zealand market and consequently for competing suppliers of key building supplies to enter and expand their businesses.
- 10.21 Despite the flexibility that is available in the system to use and adopt new products (for example, through Alternative Solutions, and product certification schemes such as CodeMark), it is too slow, costly and uncertain to get them accepted for general use. This is due to the combined effect of:
 - 10.21.1 the way the building regulatory system (comprising the Building Act, the Building Code and related instruments, and the consenting system) is applied to building products; and
 - 10.21.2 the decision-making behaviours of designers, builders, BCAs and government agencies in response to and in applying the building regulatory system.
- The Building Code and associated systems are complex to navigate. The Building Code uses qualitative words and phrases to set performance levels for building work and, for building products, establishing what the qualitative words and phrases mean in practice generally involves starting with the Standards currently referenced in Acceptable Solutions and Verification Methods. It is those Standards that are generally used to establish the required performance levels for products. These compliance pathways for building products (ie, through Acceptable Solutions and Verification Methods, and referenced Standards) are narrow and there are few 'streamlined' processes.

- 10.23 These pathways have their origins in the national standards under the Building Act 1991 and, while they are not the only means of complying with the Building Code, they are much more certain and less costly than other methods so have become embedded as "how we build here". These compliance pathways have not been expanded to keep pace with contemporary building practices or the development of new products, despite the enabling nature of the regulatory framework. This has had the effect of limiting the potential for competition from alternative, new or innovative building supplies or methods of building.
- 10.24 There is scope to expand the range of clear compliance pathways, whether through looking to develop more Acceptable Solutions and Verification Methods or looking to reference within them the international standards to which building products are produced in countries with performance standards likely to meet or exceed those of the Building Code.
- 10.25 The pathway to acceptance for general use through Alternative Solutions can commonly be protracted, costly and uncertain. It appears that, in part, this is due to the variability of treatment that new or innovative building supplies can receive across different BCAs and from different compliance officers within the same BCA.
- 10.26 In practice, the operation of the building regulatory system does not enable timely response to changing markets and innovations in building products. It continues to incentivise designers, builders and BCAs to favour familiar building products over new or competing products.
- 10.27 While many of these challenges are shared by all participants in our study, Māori submitters also identified some uniquely Māori experiences and priorities for building which are not currently well served by the building regulatory. These relate to involvement in decision-making within the regulatory building system, relationship building, and building capability in the Māori workforce, capacity and scale among Māori businesses, and identifying greater opportunities for Māori leadership.⁷¹⁷
- 10.28 We make four recommendations related to the processes that underpin the regulatory system:
 - 10.28.1 Introduce competition as an objective to be promoted in the building regulatory system;
 - 10.28.2 Better serve the needs of Māori through the building regulatory system;
 - 10.28.3 Create more clear compliance pathways for a broader range of key building supplies; and
 - 10.28.4 Explore ways to remove impediments to product substitution and variations.

For example, this is illustrated in the experiences of Māori in building papakāinga on communallyowned Māori land, as discussed in Chapter 3 at paragraph 3.17.

10.29 These recommendations aim to make the regulatory process more supportive of new and competing building products so that competition can lead to better outcomes for all New Zealanders.

Recommendation 1 – Introduce competition as an objective to be promoted in the building regulatory system

- 10.30 The building regulatory system has at its heart the provision of safe, healthy, and durable homes for New Zealanders. While innovation is recognised as important to achieving those objectives, the building regulatory system continues to incentivise designers, builders and BCAs to favour familiar building products over new or competing products, and this affects competition for key building supplies.
- 10.31 In our view, there is scope to place greater emphasis on competition and innovation for key building supplies. We recommend that promoting competition is included as another objective of the building regulatory system, to be evaluated alongside safety and durability without compromising those essential objectives.
- 10.32 Submitters expressed a range of views about the merits and role of competition as an objective in the building regulatory system and the extent of legislative change needed.⁷¹⁸ We do not consider that including competition as an express objective would, on its own, deliver the improvements to competition that we have identified as being necessary.⁷¹⁹
- 10.33 However, it would ensure that the competition implications for decision-making are taken into account across the range of regulatory tools already available. The pursuit of competition as an objective would also inform implementation of our other recommendations aimed at reducing complexity, increasing compliance pathways, reducing barriers to certification and appraisal of building products, and addressing decision-making behaviours.

For example, National Association of Steel Framed Housing Inc (NASH) "Submission on residential building supplies market study draft report" (1 September 2022) at 4; BRANZ "Submission on residential building supplies market study draft report" (1 September 2022) at [39]; Property Council of New Zealand "Submission on residential building supplies market study draft report" (31 August 2022) at [5.1].

For example, some submitters questioned whether promoting competition as an objective of the building regulatory system was likely to have a material impact without change to risk, liability and insurance settings or material consolidation in the number of BCAs nationally. We discuss this further in relation to recommendations to support sound decision-making.

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- 10.34 The benefits of this approach will depend on the extent to which the competition objective is pursued in practice alongside the other important objectives of the building regulatory system. In general, greater competition in key building supplies will tend to reduce prices and enhance supply chain resilience, product quality, service levels and innovation outcomes which are consistent with the objectives of promoting safe, healthy and durable homes which are already at the core of the building regulatory system.⁷²⁰
- 10.35 Other policies that influence the building sector and, in particular, consumer choice such as those relating to de-carbonisation, sustainability and energy efficiency should also continue to promote competitive neutrality alongside other objectives.⁷²¹
- 10.36 We recently published Competition Assessment Guidelines to assist decision makers to consider the competition implications of policy design and these are likely to assist in relation to policy design in the building sector as well as other policy areas.⁷²²

Recommendation 2 – Better serve Māori through the building regulatory system

- 10.37 Māori who engaged with this study shared a range of perspectives and experiences of the industry. Those who engaged with us described some uniquely Māori experiences of the building regulatory system and some uniquely Māori priorities for building. Other issues described were common across the industry, affecting Māori and non-Māori similarly.
- 10.38 We consider that Māori can be better served by:
 - 10.38.1 Delivering on obligations derived from the Treaty by addressing the challenges faced by Māori within the sector. Greater opportunities are needed for Māori to be actively involved in the identification of any further issues arising, and on the design and implementation of any improvements. This should include the identification of more opportunities for Māori leadership and for mātauranga Māori to play a role in these processes;⁷²³
 - 10.38.2 Ensuring that the consenting system provides opportunities for Māori to build productive relationships with BCAs and the flexibility to accommodate Māori building objectives; and

ICN "ICN Steering Group Statement: The Role of Competition & Competition Policy in Times of Economic Crisis" at 1, available at: https://www.internationalcompetitionnetwork.org/wp-content/uploads/2022/10/SG Statement-Role-of-Competition-in-Times-of-Economic-Crisis-2022.pdf.

Chapter 9 from paragraph 9.46 provides competition consideration of energy performance certificates (EPCs), while noting that competition is not the only consideration for such policies.

Commerce Commission "Competition Assessment Guidelines" (September 2022)

https://comcom.govt.nz/ data/assets/pdf file/0022/293143/Competition-Assessment-Guidelines-September-2022.pdf.

Te Aka Māori Dictionary defines "mātauranga Māori" as "Māori knowledge – the body of knowledge originating from Māori ancestors, including the Māori world view and perspectives, Māori creativity and cultural practices", see https://maoridictionary.co.nz/.

10.38.3 Supporting opportunities for building capability and capacity among Māori including workforce development, identifying opportunities for more Māori leadership across the sector, and supporting Māori businesses to expand and compete at scale.

Delivering on obligations derived from the Treaty

- 10.39 In order to deliver on obligations derived from the Treaty, Māori must be engaged as the Treaty partner across the construction sector and their views, including mātauranga Māori, should properly inform decision making. Those working on initiatives to support Māori within the sector should look for opportunities to coordinate their work to maximise scale and the intended benefits to Māori and to the sector.
- 10.40 This work should target the specific areas for improvement identified below. However, Māori also should be actively engaged in the identification of any further issues arising, and on the design and implementation of any improvements. These processes should also aim to include increased opportunities for Māori leadership and for mātauranga Māori to play a role in finding solutions, and to help ensure that their outcomes serve and support Māori to achieve their aspirations, including improved housing outcomes. We expect that supporting Māori in this way will also support improved competition for key building supplies.

Ensuring that the consenting system provides opportunities for productive relationships with BCAs and the flexibility to accommodate Māori building objectives

- 10.41 This study has described a range of challenges facing the construction sector in recent times. For example, common themes related to challenges with rising building costs and supply chain disruption as well as difficulties navigating the building consent system. Some represented a shared experience with other participants in the building regulatory system and some reflected a uniquely Māori perspective.
- 10.42 Māori face challenges at all tiers in the building consent system and in its connection with other regulatory systems such as those relating to land use and the environment. While not all of these fall within the scope of this study, the building consent system in particular does not appear to adequately respond to the unique needs and aspirations of Māori. This is also acknowledged in the Government's Discussion Document for the Consent Review. We support the sentiment and ambition of that review:724
 - ... [to] investigate issues facing Māori, understand where the system does not work for Māori building, and identify opportunities for the building consent system to be responsive to the needs of Māori. The building consent system should not be a barrier to Māori determining and fulfilling their own social, cultural and economic aspirations, particularly in relation to the construction of papakāinga, buildings for communal use and buildings that are purpose built to the natural environment.

Ministry of Business, Innovation & Employment "Issues Discussion Document – Review of the Building Consent System" (July 2022) at 36, available at: https://www.mbie.govt.nz/dmsdocument/22845-issues-discussion-document-review-of-the-building-consent-system.

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- 10.43 Consistent with our discussion above, we consider that the Consent Review should actively engage Māori in the identification of issues affecting Māori within the consent system, and on the design and implementation of any improvements, to help ensure that these objectives are met. The Review could also usefully explore the facilitation of stronger and more direct relationships between Māori and BCAs, and increased opportunities for Māori leadership.
- 10.44 In addition, our suite of recommendations aims to create and incentivise sharing of information and continuous education and mentoring of BCAs through a dedicated function. 725, 726 Involving Māori in the co-design and implementation of these initiatives could lead to greater understanding of mātauranga Māori and develop relationships that enhance trust and confidence in the regulatory system.

Supporting opportunities for building capability and capacity among Māori including workforce development and supporting Māori businesses to expand and compete at scale

- 10.45 Strengthening other relationships within the sector is also required to give effect to obligations under the Treaty, grow capability and capacity within the significant Māori workforce within the sector, identify opportunities for more Māori leadership, and help Māori businesses to expand and compete at scale.
- 10.46 Māori who engaged with this study made clear the importance of strong support for educational and capability-building initiatives targeted at workforce development and enhancing best practice across all aspects of the regulatory system, as well as providing increased opportunities for Māori leadership within the sector and building scale and capacity among Māori businesses.
- 10.47 Initiatives that generate scale have the potential to support Māori to achieve their aspirations to:
 - 10.47.1 Be active in developing markets for new building products and manufacturing methods such as 'green' building supplies and offsite manufacturing, sustainable low-carbon building methods as well as establishing new supply chains; and
 - 10.47.2 Increase opportunities for developing workforce capability, particularly in rural and regional areas.

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Refer to recommendations 3, 4, and 5.

We used the term 'centre of excellence' in Recommendation 6 in the Draft Report. Having considered comments on the Draft Report we have reframed Recommendation 6 to reflect a more educational and mentoring role.

- 10.48 In Chapter 3 we described a number of initiatives already underway to help achieve some of these objectives. For example, those led through the Construction Sector Accord and its Māori advisory group, Kōtuiā te hono, the Government's procurement policy through which mandated agencies have a target of 5 per cent of contracts being awarded to Māori businesses, and platforms such as Amotai. 727, 728
- 10.49 We encourage the identification of further opportunities that support Māori businesses to increase workforce opportunities and capability and to expand and compete at scale, such as partnerships within both the public and private sectors that provide for subcontracting and mentoring. We also encourage more active identification of opportunities for Māori leadership within the sector, for example, at decision-making and Board level.
- 10.50 We also agree with submitters that in relation to some projects a co-ordinated approach may produce the most efficient use of resources and best achieve successful outcomes for Māori, and for improvements to competition in the supply of key building supplies. In all cases, greater opportunities are needed for Māori to be actively involved in the identification of any further issues arising, and on the design and implementation of any improvements. This should include the identification of more opportunities for Māori leadership and for mātauranga Māori to play a role in these processes.

Recommendation 3 – Create more clear compliance pathways for a broader range of key building supplies

- 10.51 The objective of a performance-based building regulatory system is to allow flexibility in how designers and builders can show that the performance requirements of the Building Code will be met. However, in practice, compliance pathways for building products can be complex to navigate as building products may need to comply with a number of different clauses of the Building Code.
- 10.52 An assessment may be required of the extent to which a product (which could be one of many product components) contributes to compliance with the Building Code. Certain requirements of the Building Code, such as the durability requirement, are unique to New Zealand. This complexity has reinforced the use of familiar building products for which clear compliance pathways already exist in Acceptable Solutions and Verification Methods and associated referenced Standards.

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Amotai "About Amotai" https://amotai.nz/about. See also Te Puni Kōkiri, the Ministry of Māori Development "Progressive Procurement" https://www.tpk.govt.nz/en/a-matou-whakaarotau/maorieconomic-resilience/progressive-procurement.

Industry led initiatives are noted in Chapter 3 at paragraph 3.35.

- 10.53 There is broad acceptance that more key building supplies need to be subject to clear compliance pathways.⁷²⁹ Greater alignment with international standards for building products would be beneficial for competition. For example, through cross-referencing such international standards in Acceptable Solutions or Verification Methods and/or evaluating the overseas certification schemes against which those building products are assessed.⁷³⁰
- 10.54 Some submitters noted that recommendations on the review of the Building Code from 2007 have not been fully implemented. In particular, the 2007 review proposed a framework for explicit quantitative performance measures to replace qualitative measures which would clearly articulate the performance required of buildings and therefore of products used in buildings. Submitters commented on the impracticability of the task, noting the level of research and resources needed to review (and create new) guidance, standards, Acceptable Solutions and Verification Methods at the scale and pace to positively improve competition. It was also suggested that the lack of implementation of the 2007 review might be symptomatic of the difficulties created by the uniqueness of the NZ Building Code compared with other jurisdictions, particularly around durability and the lack of fully quantitative measures to assess compliance.
- 10.55 There is an extensive range of regulatory tools available under the Building Act to adopt technical information, reference technical standards (in part or in whole) and recognise product certification schemes through which assurance can be given that building products and methods comply with the Building Code.
- 10.56 If the range of clear compliance pathways for building products was expanded through these mechanisms, consenting costs could be reduced, and choice, innovation and competition enhanced without compromising the existing building regulatory system objectives of delivering safe, healthy and durable homes.

For example, structural insulated panels (SIPs) and high-performance windows (other than aluminium) are not covered by existing Acceptable Solutions or Verification Methods.

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [129.2].

New Zealand Department of Building and Housing "Building for the 21st century: Report on the Review of the Building Code" (November 2007), available at: https://ndhadeliver.natlib.govt.nz/delivery/DeliveryManagerServlet?dps_pid=IE2354147. See also John Gardiner "Practical issues with the building regulatory system for suppliers of building products — An assessment" (3 August 2022) at [14].

BRANZ "Submission on residential building supplies market study draft report" (1 September 2022) at [43].

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [11].

- 10.57 This might be achieved by MBIE as the central regulator in a variety of ways, including:
 - 10.57.1 Updating and developing more Acceptable Solutions and Verification Methods – including to better reflect international standards for building products;
 - 10.57.2 Expanding the range of product certification schemes that can issue product certificates deemed compliant with the Building Code at a scheme level or product level;
 - 10.57.3 Investigating reducing further barriers to certification and appraisal; and/or
 - 10.57.4 Developing guidance that, for key building supplies, identifies the appropriate Building Code clauses and the possible means of proving compliance with those clauses.
- 10.58 There may also be other ways to develop more clear compliance pathways for building products that we have not identified that could be explored in this process. ⁷³⁴ Ultimately, each approach would require building sector policy makers to consider how best to achieve the objectives of the building regulatory system while at the same time reducing, to the greatest extent possible, limitations on competition within the industry.
- 10.59 Compliance pathways would also need to avoid being either too specific, which could undermine the entry of new or innovative products, or too broad, which could introduce a risk of performance failure.

Update and develop more Acceptable Solutions and Verification Methods

10.60 As noted in Chapter 4 there is an over-reliance on the use of referenced standards to set performance criteria and a lack of diversity in the range of product standards referenced in clear compliance pathways. Product solutions available to the building sector have grown faster than the rate at which new or alternative standards have been referenced in Acceptable Solutions.⁷³⁵

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [3.5] and Section Five from [124]. Mr Gardiner identified other potential improvement measures that could be considered including guidance and resources to help product suppliers navigate the building regulatory system, assist BCAs make risk-informed decisions, and to assist those with roles under the Building Act 2004 to comply.

See discussion in Chapter 4 at paragraph 4.140.

- 10.61 MBIE regularly reviews the Building Code and associated Acceptable Solutions or Verification Methods. There may be opportunity to prioritise or expand the review of Acceptable Solutions and Verification Methods to create these pathways for more key building supplies.
- 10.62 The aim would be to make it easier for a wider range of key building supplies to be used in residential construction without the need for additional product certification or appraisal. This would reduce the cost and time for obtaining building consents that include these products and increase choice. Barriers to imports and innovation may also be reduced.
- 10.63 There are several ways to enhance and increase the availability of Acceptable Solutions or Verification Methods which could be considered. They include:
 - 10.63.1 updating existing compliance pathways to increase confidence and certainty;
 - 10.63.2 developing compliance pathways where they do not exist to increase choice and competition;
 - 10.63.3 promoting alignment to and referencing of international standards when updating or creating new compliance pathways to reduce barriers to imports and increase the availability of new products, such as 'green' building supplies;⁷³⁸
 - 10.63.4 developing a process for creating compliance pathways for new products identified by suppliers or specifiers to enhance innovation and uptake of new products; and
 - 10.63.5 setting out product performance criteria in Acceptable Solutions and Verification Methods (or in guidance under section 175 of the Building Act), as distinct from cross-referencing NZ Standards to increase the availability of new products through providing greater comparability of products.⁷³⁹

Ministry of Business, Innovation & Employment "Programme of work"

https://www.building.govt.nz/building-code-compliance/annual-building-code-updates/programme-of-work/.

See discussion in Chapter 4 regarding product certification (from paragraph 4.6) and Alternative Solutions (from paragraph 4.107).

A discussion of alignment with EU standards in the context of 'green' building supplies is included in Chapter 9 at paragraph 9.60.

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [41] and [125.3].

10.64 Relatedly, we understand that when standards are updated any Acceptable Solution and Verification Method that references those standards is not automatically updated. This may mean that these compliance pathways cease to be useful (since products that are manufactured to the new standards will not automatically comply). Consideration could also be given to streamlining and accelerating the process for updating associated Acceptable Solutions and Verification Methods to incorporate updated standards to maintain their usefulness as compliance pathways.

Expand the range of product certification schemes that can issue product certificates deemed compliant with the Building Code

- 10.65 Certification of building products is a feature of building regulatory systems internationally.
- 10.66 Section 262(2) of the Building Act empowers the central regulator to, by notice, specify certifications of building methods or products provided by persons outside New Zealand to be treated as product certifications for the purposes of the Building Act. 740
- 10.67 Currently, CodeMark is the only certification scheme recognised under the Building Act, with JAS-ANZ the only product certification accreditation body recognised (and only for the CodeMark scheme). Only a limited number of products have received CodeMark approval. Similar to the CodeMark scheme, the new modular components scheme 'BuiltReady', will allow manufacturers to secure certificates covering their design and/or manufacture of modular components that will be deemed to comply with the Building Code. Both CodeMark and BuiltReady are New Zealand schemes, funded, administered and promoted by the Government.
- 10.68 Recognising alternative schemes and the international certification bodies through which building products can be certified as compliant with the Building Code for the purposes of Part 3, Subpart 7 of the Building Act 2004, could increase the opportunities for overseas suppliers to establish compliance of their products for NZ markets. The Unilateral recognition by New Zealand of such overseas schemes (or specific product ranges certified in accordance with those overseas schemes) could also reduce costs for imported products and increase consumer choice. The Parket Park

See discussion on product certification in Chapter 4 at paragraphs 4.91 to 4.106.

As at 22 November 2022, 153 products were listed on the CodeMark product certificate register, Building Performance "Product certificate register" https://www.building.govt.nz/building-code-compliance/product-assurance-and-certification-schemes/codemark/product-certificate-register/.

The BuiltReady scheme is expected to commence operating in late 2022.

New Zealand Building Industry Federation "Residential building supplies market study: NZ Building Industry Federation Submission" (1 September 2022) at [2.7].

Registered Master Builders Association "Submission on residential building supplies market study draft report" (1 September 2022) at 3.

- 10.69 Pursuing this approach would require identifying and assessing potential overseas certification bodies and schemes. The Chief Executive of MBIE could then issue a notice declaring certifications of building products or building methods issued by a specific overseas body (or bodies) to be evidence of compliance with the Building Code. Such certificates would have to be accepted by a BCA as evidence of compliance, in the same way as is expected of a CodeMark certificate.⁷⁴⁵
- 10.70 A starting point would be to consider the schemes through which most common international certifications are issued for products imported into New Zealand, such as through the US-based International Code Committee Evaluation Service (ICC ES) and the British Board of Agrément (BBA). However, other overseas schemes and certification bodies may also merit consideration.

Investigate reducing further barriers to certification and appraisal

- 10.71 Product assurance pathways such as CodeMark certification and BRANZ appraisal involve significant time and cost, sometimes taking up to 12 months, as noted in Chapters 4 and 5.⁷⁴⁷ The time and cost of these pathways can deter suppliers from introducing new products to New Zealand.⁷⁴⁸
- 10.72 Along with expanding the range of product certification schemes recognised within the New Zealand regulatory system, reducing other barriers to certification and appraisal would increase the range of products that designers, builders and BCAs can have confidence comply with the Building Code and would likely increase competition.
- 10.73 In addition to expanding the range of certification pathways, streamlining the certification process, based on risk, appears to have merit. This would involve developing a fast-track process for low-risk products and incorporating it into product certification schemes recognised within the New Zealand regulatory framework.⁷⁴⁹ For specific products or product groups, this could involve, for example:
 - 10.73.1 allowing greater reliance on external quality assurance systems;
 - 10.73.2 less frequent reviews of product certificates (required under the Building Act); and/or

Section 262(2)-(3) of the Building Act 2004. A notice can be issued by the Chief Executive of MBIE, which would be secondary legislation.

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [72]-[75] and [129.2].

See discussion in Chapter 4 at paragraphs 4.102 to 4.115.

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [71]. Mr Gardiner recommended a review of the cost structure of CodeMark and aligning certification to the risks of non-compliance by allowing for greater reliance by product certification bodies on third party quality assurance systems.

Including current schemes CodeMark and BuiltReady, but extending to schemes from other jurisdictions approved under section 262(2) of the Building Act 2004.

- 10.73.3 a lower number of mandatory factors that must be considered for certification under specific product certification scheme rules (such as CodeMark).
- 10.74 The value of taking a risk-based approach would depend on which products and aspects of processes pose the least risk, and whether certification and appraisal of them could be streamlined without introducing undue risk to the system.
- 10.75 In contrast, direct contributions by government to the cost of certification and/or BRANZ appraisal risk favouring particular providers and undermining investment in certification and appraisal services in general.⁷⁵⁰

Develop guidance for key building supplies that identifies the appropriate Building Code clauses and the possible means of proving compliance

- 10.76 Our work, along with the report of John Gardiner, points to a current lack of guidance to assist building products suppliers to navigate the complexity of the Building Code.
- 10.77 Guidance that could assist suppliers and promote competition would:
 - 10.77.1 explain all relevant Building Code clauses for common products to assist manufacturers and users of building products to understand compliance pathways more easily;⁷⁵¹ and
 - 10.77.2 detail how to provide evidence to meet the Building Code's clause for Durability (B2).⁷⁵²
- 10.78 Guidance of this sort should be specific enough to make understanding of compliance pathways materially easier but broad enough to allow for its application to new or innovative products. If too specific, it may be interpreted as only relating to existing products, which could entrench the popularity of these products as more familiar and undermine entry of new or innovative key building supplies.

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [68]-[71]; New Zealand Construction Industry Council "Submission on residential building supplies market study draft report" (1 September 2022) at 1.

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [43.3].

We understand that durability as an express requirement is unique to New Zealand but in effect "inferred" in other jurisdictions. Overseas suppliers would find guidance helpful because the NZ Building Code requires documented evidence of compliance which is not always available in documentation used in other countries, John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [57].

Recommendation 4 – Explore ways to remove impediments to product substitution and variations

- 10.79 As discussed in Chapters 4 and 5, and in our case study on plasterboard, we observe that building supplies are often specified by brand in building plans and consent applications. Where this occurs, substitutions will either require amendment to the building consent or may be accepted as minor variations. The process for seeking substitutions can add time, cost and complexity to a build and designers and builders tend to avoid them for this reason.
- 10.80 We recommend removing impediments to product substitution and reducing the need for consent variations for minor changes to building design.
- 10.81 Making product substitution easier would promote competition by allowing more changes to products after consent had been granted. Improving the ability of products to compete in this way would improve outcomes for consumers.
- 10.82 The key impediment to substitution is the requirement to obtain approval from the BCA for the proposed alternative product. Reducing the need to obtain approval for substitutes could be achieved by amending the way plans in consent applications are able to specify brands, or providing additional direction about what constitutes a minor variation.

10.83 We recommend:

- 10.83.1 exploring ways to reduce specification by brand; and
- 10.83.2 increasing flexibility in the MultiProof scheme.

Exploring ways to reduce specification by brand

- 10.84 Development of more clear compliance pathways for a broader range of key building supplies should, wherever feasible, stipulate performance criteria for building products. From a competition perspective, this would better facilitate specification of products by performance criteria and better enable choice between alternative products provided what is chosen can be shown to meet the performance criteria. In the absence of performance criteria, designers tend to revert to specification by brand and to using familiar products.
- 10.85 When looking to reduce impediments to substitutions, we recognise there may be a need to continue to allow for the possibility that products might be specified by brand. We therefore recommend through regulations and guidance:
 - 10.85.1 Expressly allowing product substitution options to be included when plans and specifications are lodged with building consent applications (particularly when proprietary systems or products are being specified in designs) (for example, through amendment to the Building (Forms) Regulations 2004); and/or

- 10.85.2 Giving stronger direction about what constitutes a 'minor variation' to a building consent (for example, through amendment to the Building (Minor Variations) Regulations 2009).
- 10.86 These approaches avoid the drawbacks of alternative approaches such as banning specification by brand or generally allowing substitution of 'equivalent products' without further consideration by the BCA.
- 10.87 Prohibiting specification by brand could unduly restrict design choice and impact the enforceability of implied warranties provided under the Building Act. Allowing use of any equivalent product may be ineffective or unworkable as determining equivalence may be open to interpretation and requiring the specification of alternatives is likely to be onerous for designers.
- 10.88 When allowing for specification of building materials by brand, we consider that legislation should make it clear that specification of alternative brands is also permitted. This would allow for design choice, making substitutions easier without imposing an unnecessary burden on designers by requiring the specification of alternatives in all cases.
- 10.89 Further work on 'minor variation' would support substitutions where design alternatives are not specified. Both these approaches offer potential benefits to overcome the effect on competition of specification by brand.
- 10.90 In November 2021, MBIE published general guidance on product substitution for designers and builders.⁷⁵³ This guidance includes specific examples of the process for considering substitutions for plasterboard wall lining, exterior cladding and insulation. In addition, MBIE has recently provided, product-specific guidance to BCAs in relation to plasterboard substitutions, given supply shortages for this product in recent times.⁷⁵⁴ Similar guidance could be issued for other key building supplies commonly specified by brand, to increase confidence in the use of competing products.

Ministry of Business, Innovation & Employment "Product Substitution – Plasterboard" (June 2022) https://www.building.govt.nz/projects-and-consents/build-to-the-consent/making-changes-to-your-plans/plasterboard-substitution-in-aotearoa-new-zealand/.

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Ministry of Business, Innovation & Employment "Product Substitution Guidance" (November 2021), available at: https://www.building.govt.nz/assets/Uploads/building-code-compliance/certifications-programmes/product-assurance/product-substitution.pdf.

10.91 This approach to guidance could complement the approaches noted above and might also facilitate a more consistent approach to 'minor variation' substitutions for specific products across BCAs. It is possible, through further guidance and training, that some BCAs might be encouraged to accept more brand-neutral product substitutions. However, their willingness to consider substitutions may also ultimately be assured through regulation in combination with guidance, or through more clear compliance pathways that facilitate brand-neutral specification, for example, by specifying product performance measures. 755 Any initiatives should be focused on providing greater clarity and certainty for BCAs interpreting applicable requirements.

Increase flexibility in the MultiProof scheme

- 10.92 The Building Amendment Act 2009 introduced a framework for multiple-use approvals known as MultiProof, as discussed in Chapter 9.756 While a building consent is still required, MultiProof speeds up the consenting process for builders and developers that use standardised designs by providing a statement to MBIE that a set of plans and specifications for a building complies with the Building Code.
- 10.93 MultiProof can support competition for residential building products by making it easier for building products, particularly those that are less widely used, to gain approval as compliant with the Building Code across the whole country. However, its use may be impeded if a design change is made relative to the design approved as part of the MultiProof. In this case, a BCA will need to assess the whole design for Building Code compliance. We understand that this is even the case for minor variations, although MBIE guidance encourages BCAs to take a 'reasonable' approach to considering Building Code compliance where there are variations. 757
- There may be opportunities to amend the MultiProof scheme so that designers can 10.94 make small changes to designs without 'voiding' the MultiProof. For example:
 - The legislative framework and scheme rules could be amended to provide 10.94.1 that, if the designer certifies that changes are minor and do not affect Building Code compliance, the BCA may continue to treat the MultiProof certification as evidence of compliance with the Building Code. However, some balance would be needed to avoid providing too much scope for selfcertification by designers.
 - 10.94.2 Alternatively, the legislative framework could be amended to provide a detailed list of aspects of a design that could be changed without affecting the validity of the MultiProof.

⁷⁵⁵ For example, Elephant Plasterboard "Cross submission on residential building supplies market study draft report" (17 October 2022) at 2.

⁷⁵⁶ See discussion of the Multiproof scheme in Chapter 9 at paragraphs 9.84 to 9.88.

Building Performance "National Multiple-Use Approvals: Information for Building Consent Authorities" https://www.building.govt.nz/building-code-compliance/product-assurance-and-certificationschemes/multiproof/multiproof-information-for-bcas/.

10.95 We see significant potential in removing regulatory barriers to enable faster and more consistent building consent approaches, particularly using modular construction and offsite manufacturing techniques through schemes such as MultiProof and BuiltReady. Ensuring the success of such schemes will be important to support innovation, develop scale and sustainable long-term growth for the construction sector which in turn will better facilitate workable competition for key building supplies.

Support sound decision making | Te tautoko i te whakatau tikanga

10.96 Chapters 3, 4 and 5 illustrate the challenges in decision making about product use and consenting. These challenges generally relate to perceptions of liability, the need for greater coordination and focus around access to information, and supporting new technologies and building products and methods to develop at a scale that makes them a viable competitive alternative to familiar building products and methods.

Liability and risk

10.97 Respondents to our survey on the building regulatory system commented on the difficulties of satisfying BCAs regarding product compliance, pointing to the current building regulatory system having a negative impact on competition by limiting the availability of products. This is, in part, because BCAs are perceived as being risk averse due to concerns about potential liability. It appears that when presented with new or unfamiliar building products, a BCA's response is often to suggest that the applicant seek CodeMark certification or BRANZ appraisal to reduce potential liability.⁷⁵⁸ Some submitters advocated for change to risk, liability and insurance settings.⁷⁵⁹

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See Chapter 4 at paragraphs 4.221 to 4.226 and 4.264 to 4.275; see also John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [82].

For example, Property Council of New Zealand "Submission on residential building supplies market study draft report" (31 August 2022) at [5.1]; Taituarā "Review of the Building Consent System – issues Discussion Document – Submission to the Ministry of Business, Innovation and Employment" (September 2022) at [70]-[80]; available at: https://12233-console.memberconnex.com/Attachment?Action=Download&Attachment id=2679.

- 10.98 The Law Commission and government have previously considered issues relating to joint and several liability settings and the joint and several liability rule has been retained. MBIE's discussion document for the Consent Review expressly notes that these matters are out of scope for the Consent Review.
- 10.99 A Policy Position Statement "Risk, Liability and Insurance in the Building Sector Policy Position Statement", released by MBIE alongside the Consent Review discussion document, acknowledges that a range of perspectives on risk, liability and insurance settings exist. 161 It also records that:
 - 10.99.1 Its research and consultation with sector participants has produced a mixed picture on the impact of risk and liability settings on BCA behaviour. While some BCAs perceive there to be a risk of being the last party standing when there are absent defendants in building negligence cases, MBIE has been unable to find concrete evidence as to ways in which BCAs were over-investing in carrying out their consenting functions. Additionally, other BCAs and industry stakeholders do not see liability as an issue and argue that it is not a primary driver of consenting behaviour;⁷⁶²
 - 10.99.2 There is little evidence that capping BCAs' liability costs or limiting BCAs duty of care would result in BCAs acting in a less risk-averse way or changing their approach in delivering their consenting function (and in any event it is questionable whether this would be desirable);
 - 10.99.3 The Government is therefore not persuaded that liability and excessive risk aversion is driving BCA consenting behaviour, decision making and efficiency;⁷⁶³ and

Ministry of Business, Innovation & Employment "Risk, Liability and Insurance in the Building Sector – Policy Position Statement" (July 2022), available at: https://www.mbie.govt.nz/dmsdocument/22842-risk-liability-and-insurance-in-the-building-sector-policy-position-statement.

Ministry of Business, Innovation & Employment "Risk, Liability and Insurance in the Building Sector – Policy Position Statement" (July 2022) at 12, available at: https://www.mbie.govt.nz/dmsdocument/22842-risk-liability-and-insurance-in-the-building-sector-policy-position-statement.

Ministry of Business, Innovation & Employment "Risk, Liability and Insurance in the Building Sector – Policy Position Statement" (July 2022) at 13, available at:
https://www.mbie.govt.nz/dmsdocument/22842-risk-liability-and-insurance-in-the-building-sector-policy-position-statement.

Te Aka Matua o te Ture, Law Commission "Liability of Multiple Defendants NZLC R132" June 2014 at [7.36]-[7.46], available at: https://www.lawcom.govt.nz/our-projects/joint-and-several-liability?id=916. Note the Law Commission recommended retaining joint and several liability, but with modifications including a backstop cap on liability for BCAs and a comprehensive building warranty scheme, considering this a prerequisite if proportionate liability were considered.

- 10.99.4 There is a weak case for establishing a publicly provided insurance scheme for building defects after weighing up the costs, risks and potential benefits. While the public policy case for a government provided insurance scheme is not currently justified, this could change in the future to the extent the policy problem becomes clearer and if there are material changes in the costs, risks and potential benefits of such an intervention. 764
- 10.100 Submissions we have received suggest risk, liability and insurance continue to concern some industry participants. They are important issues if risk-averse behaviour of BCAs, designers and builders is being driven by liability concerns as that restricts the approval and adoption of new or innovative products and limits competition for key building supplies.
- 10.101 However, given the previous consideration of these matters, the Government position described in the Position Statement, and the lack of any clearly better alternative, we have not focused in this study on the nature of liability faced by BCAs, its impact on competition, or changes to risk, liability, and insurance settings.
- 10.102 The Government's Building System Legislative Reform Programme is taking a wholeof-system approach to risk and liability in the sector focused on ensuring inputs into the building process are high quality, rather than focusing on liability and culpability when things go wrong. 765 The focus is on strengthening the incentives, accountabilities and behaviours of industry participants to enable efficient consenting, quality building, improved sector capability and positive outcomes for homeowners. Completed and potential reforms are intended to lower potential liability risk.
- 10.103 Our recommendations in this study can contribute to this approach. For example, through implementation of initiatives to improve coordination and access to information about building products including a risk framework for BCAs to assess risk of non-compliance (discussed at paragraph 10.123.1 below).
- 10.104 Nevertheless, work in each phase of the Programme the Consent Review, review of occupational regulation, and the evaluation of consumer protection measures – may produce additional information relevant to risk, liability and insurance settings, including whether any alternative arrangements could lead to clearly better outcomes for consumers.

policy-position-statement.

⁷⁶⁴ Ministry of Business, Innovation & Employment "Risk, Liability and Insurance in the Building Sector -Policy Position Statement" (July 2022) at 20, available at: https://www.mbie.govt.nz/dmsdocument/22842-risk-liability-and-insurance-in-the-building-sector-

⁷⁶⁵ Ministry of Business, Innovation & Employment "Issues Discussion Document - Review of the Building Consent System" (July 2022) at 15, available at: https://www.mbie.govt.nz/dmsdocument/22845issues-discussion-document-review-of-the-building-consent-system.

10.105 In any further consideration of the liability regime as it applies to BCAs, designers and builders, and/or the possible introduction of a building warranty insurance scheme, in our view it would be appropriate for the Government to take account of competition objectives alongside the other objectives underpinning the building regulatory system as we have recommended under Recommendation 1.

Improving coordination and focus around access to information about building products

- 10.106 A well-functioning consent system is crucial to promoting competition for key building supplies. We consider that there are opportunities to bring greater efficiency, certainty and consistency to the consent system by improving the ways technical information about building supplies is shared. Our recommendations in these areas aim to improve the consideration and use of alternative products and improve competition by reducing reliance on familiar products and building systems.
- 10.107 There is currently no repository for product and consenting information, accessible to designers, builders, and BCAs. This means it can be difficult to find technical information about new or innovative products, and the basis on which they have been granted consent. There are 67 BCAs throughout New Zealand, but there is no formal or authoritative system for co-ordinating consenting decisions between BCAs. The outcome is reflected in market participants' concerns that decision making by BCAs can be inconsistent, both between regions and within BCAs.
- 10.108 Some suggested that consolidation of BCAs is required. This could be considered by MBIE as the central regulator as part of the Consent Review. In this study, we have focused on other ways to improve coordination and access to information about building products.

Supporting new technologies and building methods to provide a viable competitive alternative to familiar building products and methods

- 10.109 We also consider that OSM has the potential to increasingly compete with traditional key building supplies, and over time, to disrupt some of the established supply chain structures in the industry.
- 10.110 For domestic offsite manufacturers, lack of certainty around pipeline and absence of large long-term contracts remains the key challenge. These businesses can be expected to defer long-term investment to grow capacity to more efficient levels of production in the face of demand uncertainty.
- 10.111 Greater coordination and focus are needed to realise the potential of these processes and technologies to make a significant difference to scale of production and capability so that they provide a viable competitive alternative to familiar building products and methods.

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [61]. Mr Gardiner pointed out that product assurance information is not public knowledge and there is no centralised repository for it currently.

- 10.112 Our recommendations in this area therefore look to increase capability by sharing knowledge and expertise, and enhancing confidence and trust in products, particularly as new or innovative products are developed and used in New Zealand and internationally:
 - 10.112.1 Establish a national system to share information about building products and consenting primarily for designers, builders and BCAs;
 - 10.112.2 Establish an education and mentoring function to facilitate a better co-ordinated and enhanced approach by BCAs to consenting and product approval processes;
 - 10.112.3 Develop and implement an all-of-government strategy to coordinate and boost offsite manufacturing.

Recommendation 5 – Establish a national system to share information about building products and consenting

- 10.113 The Building (Building Products and Methods, Modular Components, and Other Matters) Amendment Act 2021 puts in place a framework to require that manufacturers provide specified information about their products, with supporting regulations. While the proposed regulations include a requirement for information to be stored in a structured data format that is accessible across the supply chain, by MBIE, and online, there is no central repository proposed for this information.⁷⁶⁷
- 10.114 Although the concept of a national products register has not been adopted previously, we consider that some aggregation or coordination of available building product databases should be considered, especially as the new legislative requirement is likely to stimulate the development of more building product information.
- 10.115 We recommend that options for some form of national system are explored to facilitate access to information about building products. The purpose of such a system would be to:
 - 10.115.1 encourage, enable and incentivise the sharing of information about new or innovative building products and methods;
 - 10.115.2 include links to Acceptable Solutions and Verification Methods;
 - 10.115.3 include links to product certification registers; and

Ministry of Business, Innovation & Employment "Discussion document: Building System Reform: Building Amendment Bill Proposals for regulations for: Building Product Information Requirements, Modular Component Manufacturer Certification Scheme, Product Certification Scheme" (April 2021), available at: https://www.mbie.govt.nz/dmsdocument/14150-building-amendment-bill-proposals-for-regulations-discussion-document.

- 10.115.4 enable sharing of information about new or innovative key building supplies, where BCAs have approved them for use in Alternative Solutions along with any issues that have been encountered in the use of these building supplies in consented projects.
- 10.116 A new product information system would likely need to be developed and implemented in stages, for example, starting with a subset of key building supplies and expanding it once the operating model has been established.
- 10.117 When developing such a system, the elements that would be important to consider include what key data and basic product assurance information is made publicly available, how data standards align with international standards for product data, and how existing product datasets already held within the construction sector can be leveraged. It would require a co-ordinated approach between government in partnership with industry to resource, design, deliver, implement and maintain it.
- 10.118 It will likely require delivery through a formal programme structure that investigates and determines design implementation and maintenance of the system including:⁷⁶⁸
 - 10.118.1 Governance and mandate: roles, responsibilities, obligations, accountabilities;
 - 10.118.2 Operating model: a centralised or de-centralised (eg, federated) model;
 - 10.118.3 Operating principles: design, development, implementation, ongoing maintenance and management;
 - 10.118.4 Scheme rules: access, obligations, ownership and liability for information;
 - 10.118.5 Data standards and safeguards: development, implementation, review; and
 - 10.118.6 Timeframes and resourcing across all stages (design, development, implementation).
- 10.119 The aim would be for this system to become the primary reference source for information about building products, making it easier for designers, builders and BCAs to find information about available building products. Such a system should reduce the barriers to use of different building products.

Submissions received from GS1 advocate an ecosystem approach is taken and describe a range of parameters for data standards and operating that could be usefully considered.

10.120 It should also include information about product failures, to assist with distributing information about known issues with building product performance. Making product performance information available assists the competitive process by facilitating informed customer choice. This is true whether the performance revealed is strong or poor. It follows that the information must be accurate, and it must be maintained as current to be relied on by all participants and regulators in a way that enhances competition among key building supplies and their suppliers.

Recommendation 6 – Establish an education and mentoring function to facilitate a better co-ordinated and enhanced approach by BCAs to consenting and product approval processes

- 10.121 As discussed in Chapter 4, there can be inconsistencies between (and within) BCAs in terms of which building products and methods they accept as compliant with the Building Code. This is also a theme reflected in in the Consent Review.
- 10.122 BCAs already have a range of formal and informal mechanisms for sharing information between and within BCAs about the Building Code and building products. However, there may be options to expand and deepen those arrangements, with a particular focus on sharing information about new or innovative building products and methods and how these interact with the Building Code. Arrangements could potentially be facilitated by establishing a new body, or based within MBIE, a large BCA, or an association such as the Building Officials Institute or Taitaurā Local Government Professionals Aotearoa. ⁷⁶⁹
- 10.123 The kind of best practice initiatives that the new function could pursue might include:
 - 10.123.1 A risk framework for BCAs to assess risk of non-compliance. The aim would be to ensure BCA staff apply an appropriate level of scrutiny to consent applications, but are also not 'over-scrutinising' applications as a result of not having the appropriate information available, or sufficient certainty over their accountability.⁷⁷⁰
 - 10.123.2 Providing clear guidance on applying the 'reasonable grounds' test for granting building consent under s49(1) of the Building Act and the evidence required to make a statutory decision.⁷⁷¹
 - 10.123.3 Sharing examples of effective working relationships between Māori and BCAs and applying sound participation and engagement practices consistent with the Treaty.

There is a range of existing models and initiatives for sharing best practice in other sectors, such as the Quality Planning web resource and continuous education and capability building initiatives through Local Government New Zealand and Taitaurā Local Government Professionals Aotearoa.

John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [82]-[84].

This is linked to the development and use of a compliance risk framework. See discussion in John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [82]; also referred to in Chapter 4 at paragraphs 4.46 and 4.152.

- 10.123.4 An online best practice resource, similar to the Quality Planning Resource an initiative for resource management professionals operated in partnership between the Ministry for the Environment, Local Government New Zealand, the NZ Planning Institute and other professional bodies. The aim would be to share information and case studies about best practice in building consents.
- 10.123.5 Promoting across BCAs the uptake of systems such as Artisan which facilitates online building inspections.⁷⁷³

Recommendation 7 – Develop and implement an all-of-government strategy to coordinate and boost offsite manufacturing

- 10.124 OSM has the clear potential, over time, to make a significant difference to productivity, innovation and competition in New Zealand. Adopting OSM methods could particularly benefit areas where there are high housing needs, potentially creating sustainable capacity and capability to better service rural and regional communities. We understand this would particularly benefit Māori businesses and communities.
- 10.125 Larger offsite manufacturers and larger builders would be better positioned to negotiate with building products suppliers and/or merchants, exercise countervailing purchaser power and use their scale to negotiate better prices for key building supplies. They may be able to bypass intermediaries and source directly from suppliers, or sponsor imports where it is efficient to do so.
- 10.126 At greater scale these businesses are likely to be more able to justify investment in quality assurance for their products, better able to develop BCAs confidence in the compliance of their products, and better able to spot (and push back against) inconsistent BCA consenting approaches. They may be more attractive to insure and better able to manage liability effectively. By contrast, some smaller-scale offsite manufacturers may be riskier business partners for investors and consumers and concerns regarding product quality and/or liquidity can undermine the take up of OSM products.⁷⁷⁴
- 10.127 Some consumer education initiatives may be useful to support the increased use of OSM products, particularly full modular buildings purchased directly by consumers, given the different building processes, payment and ownership risks that appear to accompany this method of building. This may effectively supplement rights and obligations appropriately defined by contract, and other consumer protection laws, to support consumer confidence in the use of OSM products. This could be examined as part of Phase Three of MBIE's Building System Legislative Reform Programme.⁷⁷⁵

The Quality Planning website has been operating since 2001 and is a useful resource for resource management practitioners, council planners, private practitioners, consultants and environmental managers, Quality Planning "The Quality Planning Resource" https://www.qualityplanning.org.nz/.

See discussion in Chapter 3 at paragraph 3.35; BRANZ "Artisan" https://www.branzartisan.nz.

See paragraphs 9.92 and 9.103 above.

See paragraph 4.256 above.

- 10.128 Importantly, strategic long-term government focus is likely to be critical to ensure that OSM reaches its full potential and delivers innovation for consumer benefit.
- 10.129 While the introduction of BuiltReady and MultiProof schemes and the procurement approach of Kāinga Ora are significant achievements, our view is that under current policy settings and government arrangements the pro-competitive shift towards OSM-type technologies and methods is likely to be slow to emerge.
- 10.130 We recommend an 'all-of-government' strategy is developed to provide greater focus, coordination and scale of production, to incentivise uptake of technologies and building methods like OSM to fully realise the potential to provide a viable competitive alternative to familiar building products and methods.
- 10.131 Through its procurement choices, government can influence the conditions and entry for new and innovative building products in New Zealand. For example, mandates relating to the proportion of the value of the building work that is done offsite (pre-manufactured value (PMV)) in government construction projects and/or and the tendering of long-term government contracts with OSM providers would promote investment in manufacturing facilities in New Zealand.
- 10.132 An 'all-of-government' strategy could consider demand and supply-side initiatives such as:
 - 10.132.1 Government leading by example through procurement policies, priorities and initiatives that promote innovation and OSM. For example:
 - 10.132.1.1 Making competition for key building supplies an explicit objective in procurement policies;
 - 10.132.1.2 Scaling up procurement of OSM and setting PMV targets for OSM and similar technologies;
 - 10.132.1.3 Considering longer-term contracts with offsite manufacturers to provide greater certainty of a pipeline of work, to encourage capital investment; and
 - 10.132.1.4 Expanding use of supplier panels to provide more choice in procuring key building supplies, particularly where there is a limited number of suppliers.
 - 10.132.2 Use of incentives for home buyers and builders using OSM, for example, based on PMV; and
 - 10.132.3 Coordination of government and industry initiatives and programmes to deliver on a wide set of outcomes for markets, businesses and communities.

The importance of coordination and scale

- 10.133 Two themes recur across Recommendations 1 to 7:
 - 10.133.1 Aspirations of scale that enabling operating at scale has the potential to create a step-change in developing markets and delivering housing in New Zealand that meets the objectives of the Building Act; and
 - 10.133.2 The value of improved coordination across government agencies and industry participants to obtain efficiencies which in turn enhance competition. These include information sharing and establishing effective working relationships within the construction sector and between agencies such as BCAs and Māori.
- 10.134 There is a balance to be struck between having enough firms operating at scale to drive innovation and effective competition, but not ending up with only one or two very large competitors.
- 10.135 We consider that Government and government agencies are in a unique position to drive both greater coordination and enabling operations at scale, for example, through purposeful and strategic support of initiatives like the Construction Sector Accord and directly through procurement policies.

Address strategic business conduct | Te whakatau i te whanonga rautaki pakihi

- 10.136 Our view, as outlined in Chapters 7 and 8, is that:
 - 10.136.1 quantity-forcing rebates paid by established suppliers to merchants appear, under certain conditions, to be reinforcing regulatory factors impacting entry and expansion, creating difficulties for new or competing products to access distribution channels; and
 - 10.136.2 land covenants and exclusive leases benefitting the major merchants potentially limit competition including by preventing rivals from opening stores in areas where they otherwise compete directly or constraining customers' choice of merchant.
- 10.137 We make two recommendations in this area:
 - 10.137.1 Promote compliance with the Commerce Act, including by discouraging the use of quantity-forcing supplier-to-merchant rebates that may harm competition; and
 - 10.137.2 Assess the economy-wide use of covenants and exclusive leases.
- 10.138 These recommendations aim to increase awareness of, and compliance with provisions of the Commerce Act relating to misuse of market power and other anti-competitive conduct as well as addressing broader impacts of land covenants and exclusive leases across this and other industries.

Recommendation 8 – Promote compliance with the Commerce Act, including by discouraging the use of quantity-forcing supplier-to-merchant rebates that may harm competition

- 10.139 In Chapter 8 we discussed the range of rebate structures used in the supply of key building supplies by distributors to merchants.
- 10.140 In our view, quantity-forcing rebates paid by some established suppliers to merchants are, under certain conditions, creating impediments to entry and expansion for competing suppliers of some key building supplies. Rebates between suppliers and merchants are widespread for some key building supplies and can be significant in value.
- 10.141 In particular, tiered retroactive and share of wallet rebates used by manufacturers with merchants (termed 'quantity-forcing' rebates in economic literature) appear capable of discouraging merchants from stocking more than one product within a category; or if more than one product is stocked, they can provide strong incentives to maintain existing market shares by deterring switching to competing products.⁷⁷⁶
- 10.142 The effect of quantity-forcing rebates on competition may vary depending on the key building supply. They are more likely to be problematic where:
 - 10.142.1 markets are highly concentrated;
 - 10.142.2 rebate arrangements cover a larger proportion of the market;
 - 10.142.3 there are reasons that alternative suppliers may only be able to compete for a partial supply of a merchant's sales;
 - 10.142.4 the arrangements are tailored to each individual merchant's demand; or
 - 10.142.5 the highest tier covers a large proportion of the merchant's sales and the steps between tiers are significant.
- 10.143 There are some potential efficiency benefits from using quantity-forcing rebates. However, we consider that there are likely to be other pricing mechanisms that could deliver the same outcomes to merchants and suppliers without creating the same risk of excluding competing suppliers in highly concentrated markets. On balance, the potential benefits of using quantity-forcing rebates, in highly concentrated building supply markets, are generally unlikely to outweigh the potential harm to competition.

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A discussion of the terminology and references to economic literature are provided in Chapter 8 from paragraph 8.40.

- 10.144 We do not recommend legislative change to prohibit the use of such rebate structures or cap the level of rebates allowed across the key building supplies industry. This is because:
 - 10.144.1 rebates can provide benefits;⁷⁷⁷
 - 10.144.2 whether or not any given rebate structure has the effect of lessening competition is dependent on the specific circumstances; and
 - 10.144.3 rebates are used across a wide range of sectors and therefore to the extent any policy changes were called for these would make sense to apply more broadly.
- 10.145 In our view, the potential effect of rebates on competition in key building supplies is most appropriately addressed under the provisions of the Commerce Act. The Act currently prohibits firms with a substantial degree of market power from misusing it for a proscribed purpose. From April 2023 the Act will prohibit such firms from engaging in conduct that substantially lessens competition, regardless of whether they would have done the same thing if they did not have market power.
- 10.146 We encourage all suppliers, particularly those in highly concentrated markets, to review their rebate structures for compliance with the Commerce Act, particularly with the amended section 36 which comes into force next year. The have consulted on and will be issuing guidance relating to the misuse of market power. Our guidance will discuss a range of conduct covered by the amended section 36, including rebates, and will be of general application to all businesses. Our views, including from this study, have informed the drafting of the guidance.
- 10.147 Our case study into plasterboard supply shows that competition for some key building supplies is more likely to be affected by quantity-forcing rebates given other features in those markets.
- 10.148 In 2014 the Commission investigated the rebate structures used by Winstone Wallboards and concluded that the evidence at that time did not support a finding that Winstone Wallboards had breached the Commerce Act. The Since 2014, several factors appear to have changed, including the exit of Knauf and failed entry by USG Boral (both large international plasterboard suppliers).

More information about our investigation processes and the range of compliance and enforcement outcomes that can result from an investigation can be found in our Investigation Guidelines and Enforcement Response Guidelines, Commerce Commission "Investigation Guidelines", available at: https://comcom.govt.nz/ data/assets/pdf_file/0028/89821/Competition-and-Consumer-Investigation-Guidelines-July-2018.pdf; Commerce Commission "Enforcement Response Guidelines", available at: https://comcom.govt.nz/ data/assets/pdf_file/0030/62589/Enforcement-Response-Guidelines-October-2013.pdf.

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For example, as a mechanism to pass on economies of scale.

Commerce Commission "Investigation into Winstone Wallboards Limited" (22 December 2014), available at: https://comcom.govt.nz/ data/assets/pdf file/0028/94393/Winstone-Wallboards-Limited-Investigation-closure-report-22-December-2014.pdf.

10.149 Having assessed information collected in this study, we have opened an investigation to collect more information about Winstone Wallboards' use of rebates, to further consider any effect that these may be having on competition, and whether they may breach Part 2 of the Commerce Act.

Recommendation 9 – Consider the economy-wide use of land covenants, exclusive leases and contractual provisions with similar effect

- 10.150 In Chapter 7 we identified that land covenants and exclusive leases are used in this industry, as in others we have previously studied and have the potential to limit competition.
- 10.151 Sections 27 and 28 of the Commerce Act apply to exclusivity clauses in leases and land covenants. Land covenants and exclusive leases may breach sections 27 and/or 28 of the Commerce Act:
 - 10.151.1 section 27 prohibits entering into or giving effect to a contract, arrangement or understanding containing a provision which has the purpose, effect, or likely effect of substantially lessening competition in a market; and
 - 10.151.2 section 28 prohibits the requiring or giving of, or enforcing, a covenant that has the purpose, effect or likely effect of substantially lessening competition in a market. Such covenants are unenforceable.
- 10.152 For the purposes of sections 27 and 28, the aggregate effect of two or more land covenants and exclusive leases (or similar contractual provisions) can be considered to assess whether, taken together, they are likely to substantially lessen competition in a market.⁷⁸⁰
- 10.153 We have identified around 60 store covenants and around 80 exclusive leases benefitting major building supply merchants throughout New Zealand.⁷⁸¹
- 10.154 We are also aware of examples where merchants are benefitting from covenants, or similar clauses in sale and purchase agreements, which give them preferential rights to quote for supplying building materials for houses to be built on land zoned for residential development. However, this practice appears to be limited to certain residential developments in Hawke's Bay and Wairarapa.
- 10.155 We consider the use of these covenants and exclusive leases (and similar contractual provisions) is, in some cases, unduly restricting competition between building supplies merchants.⁷⁸² As noted in Chapter 7 they are likely to reduce a new or existing merchant's ability to access suitable store sites, or their ability to attract customers, which in turn may hinder entry and expansion.

Details about store covenants and exclusive leases is included in Chapter 7 at paragraph 7.49.

⁷⁸⁰ Commerce Act 1986, s3(5) and (6).

See discussion in Chapter 7 at paragraphs 7.49 to 7.63 regarding store covenants and exclusive leases; and at paragraphs 7.70 to 7.75.3 regarding land development covenants.

- 10.156 We are particularly concerned about land covenants and exclusive leases or other similar contractual provisions that:
 - 10.156.1 have long fixed terms or no expiry date which could potentially impede new entry and expansion even after a retailer/merchant has stopped operating on the land;⁷⁸³ or
 - 10.156.2 are intended to influence customers' choice of which merchant (or other retailer) they purchase from (for example, by giving a particular merchant preferential rights to quote for work).
- 10.157 This is the third consecutive market study in which land covenants, in one form or another, have been identified as potentially negatively impacting on competition.⁷⁸⁴ We consider it would be valuable to obtain more information about the scale of their use and their effects across the economy.
- 10.158 We recommend an economy-wide review into land covenants and exclusive leases, including other similar contractual provisions, to assess whether a wider multi-sector solution is needed to address their impacts on competition more generally. Such a review could involve a cross-agency approach.⁷⁸⁵
- 10.159 Due to the prevalence of land covenants and exclusive leases, and the use in some cases of other similar contractual provisions, we intend to undertake a compliance programme in early 2023 to promote compliance with sections 27 and 28 of the Commerce Act in relation to their use. This is likely to start with the building supplies industry but may include targeted outreach with other sectors.
- 10.160 We encourage any merchant or supplier benefitting from land covenants and exclusive leases (or other similar contractual provisions) which prevent competitors from accessing certain sites, or give preferential rights to quote for work, to review them for compliance with the Commerce Act.⁷⁸⁶

Commerce Commission "Market study into the retail fuel sector – Final report" (5 December 2019) at [6.117]-[6.122]; Commerce Commission "Market study into the retail grocery sector – Final report" (8 March 2022) at [6.75]-[6.99]. We identified more than 90 restrictive land covenants in the grocery market study.

In contrast, a store covenant or exclusive lease with a short fixed-term (eg, 5 years) would help ensure a ROI with lower risk of having a long-term effect on competition.

We would envisage a collaboration across government agencies involved in land, planning and development matters generally, for example, with Ministry of Housing and Urban Development, Land Information New Zealand, the Treasury, Ministry of Justice, Ministry for the Environment, and Department of Internal Affairs.

This recommendation was largely supported in submissions on the draft report, Consumer NZ "Submission on residential building supplies market study draft report" (1 September 2022) at 3; Fletcher Building "Submission on residential building supplies market study draft report" (1 September 2022) at [4.10]; ITM "Submission on residential building supplies market study draft report" (2 September 2022) at [30].

10.161 Independent of this study, we are taking enforcement action in relation to use of a land covenant in the building supplies industry. Our decision to take enforcement action under the Commerce Act is made on a case-by-case basis with reference to the particular circumstances of each case and the factors described in our Enforcement Response Guidelines.⁷⁸⁷

Conclusion | Whakakapinga

- 10.162 The factors affecting competition that we have identified in this study relate to the building regulatory system, the way in which it is applied by industry participants such as designers, builders, BCAs and government agencies, as well as the strategic business conduct of some market participants.
- 10.163 In our view, effective competition for key building supplies working in tandem with building regulation can support better prices, quality, range and innovation in respect of key building supplies, as well as ensuring safety and durability of buildings.
- 10.164 Our suite of recommendations aims to provide tangible improvements in competition for key building supplies without undermining the other key policy objectives of the building regulatory system.

Commerce Commission "Enforcement Response Guidelines" (October 2013), available at: https://comcom.govt.nz/ data/assets/pdf file/0030/62589/Enforcement-Response-Guidelines-October-2013.pdf.

Attachment A Plasterboard case study

- A1 This attachment discusses the findings in relation to our plasterboard case study. In addition to understanding how competition in the supply of plasterboard is functioning, the case study aims to illustrate the extent to which some or all of the factors affecting competition identified in our report impact the supply of plasterboard.
- We acknowledge that there have been some recent and ongoing shortages of plasterboard in New Zealand. The government has established a plasterboard taskforce to examine this, and there is indication that the shortages have begun to ease. 788, 789
- A3 The objective of our study is not to investigate short-term issues in the supply of plasterboard. However, this case study does highlight that some of the factors which contributed to the recent shortages are issues which are also likely limiting effective competition in the supply of plasterboard over the long term. We note that some steps already undertaken, such as better enabling product substitution, are aligned with our recommendations set out in Chapter 10.⁷⁹⁰
- A4 To inform our plasterboard case study we have:
 - A4.1 interviewed six suppliers of plasterboard;⁷⁹¹
 - A4.2 reviewed hundreds of documents provided by the major supplier of plasterboard in New Zealand and the major merchants, including supply agreements;⁷⁹²
 - A4.3 interviewed and surveyed builders and designers;⁷⁹³ and

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        Hon Dr Megan Woods "Plasterboard taskforce set up to ease shortages" (21 June 2022)
        https://www.beehive.govt.nz/release/plasterboard-taskforce-set-ease-shortages.
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        Radio NZ "Signs plasterboard supply problems could be easing" (10 October 2022)
        https://www.rnz.co.nz/news/business/476393/signs-plasterboard-supply-problems-could-be-easing.
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        Ministry of Business, Innovation & Employment "Product Substitution: Plasterboard" (June 2022),
        available at: https://www.building.govt.nz/assets/Uploads/building-code-compliance/certifications-
        programmes/product-assurance/product-substitution-plasterboard-guidance.pdf.
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                                                                                                        ].
        Some suppliers did not wish comments on the market to be attributed to them, and doing so may risk
        the Commission being able to obtain similar evidence in future. Therefore, in most cases we do not
        name individual suppliers throughout this case study.
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- A4.4 met with regulatory and standards bodies and reviewed the relevant regulations.
- A5 In this attachment we set out:
 - A5.1 a summary of our findings;
 - A5.2 an overview of plasterboard as a key building supply;
 - A5.3 the industry structure and participants;
 - A5.4 the building regulatory system;
 - A5.5 how plasterboard is specified and purchased;
 - A5.6 pricing practices and vertical arrangements; and
 - A5.7 innovation and building for climate change.

Summary

- A6 Plasterboard represents a relatively small proportion of the total cost of building materials for a residential build. However, this understates the importance of effective competition for supply of plasterboard.⁷⁹⁴ This is because differences in plasterboard type and quality, as well as the accompanying service package provided by suppliers can impact the speed of installation. Delays in plasterboard installation can have consequential effects on timing and installation of other products and therefore significantly impact the overall efficiency of residential construction. These delays can have significant cash flow implications for builders and subcontractors.
- A7 We have found that competition in the supply of plasterboard is not working well.
- A8 The market is very highly concentrated with Winstone Wallboards' GIB brand holding around 95% market share over a long period.⁷⁹⁵

]. Winstone Wallboards has maintained a market share of over 90% of the wholesale supply of plasterboard in New Zealand for many years, Commerce Commission "Investigation into Winstone Wallboards Limited" at [38], available at:

https://comcom.govt.nz/__data/assets/pdf_file/0028/94393/Winstone-Wallboards-Limited-Investigation-closure-report-22-December-2014.pdf.

As highlighted by Castalia on behalf of Affordable Building Coalition "Cross submission on residential building supplies market study preliminary issues paper" (18 March 2022) at 18-20.

For example: Hon Dr Megan Woods "Plasterboard taskforce set up to ease shortages" (21 June 2022) https://www.beehive.govt.nz/release/plasterboard-taskforce-set-ease-shortages; Radio NZ "Fletcher Building meeting: Simplicity seeking answers to GIB board shortage" (13 June 2022) https://www.rnz.co.nz/news/national/469034/fletcher-building-meeting-simplicity-seeking-answers-to-gib-board-shortage.

- A9 There is evidence the market position held by Winstone Wallboards is partly driven by historical strong performance and a highly regarded service and quality proposition. However, there is a range of factors which has made it harder for potential competitors to enter the market and to compete effectively or expand once they have entered. These factors limit the competition Winstone Wallboards faces. The factors include:
 - A9.1 the design of the building regulatory system and building practice, which have led to the use of plasterboard for structural bracing. Use of plasterboard for structural bracing is rare overseas and use in this way creates additional requirements for suppliers. These additional requirements make it more difficult to import plasterboard into New Zealand and lead to some products from overseas being substitutes for a more limited part of the market (eg, DIY building);
 - A9.2 designers commonly specify plasterboard by brand in building plans because the building regulatory system encourage this. Once specified in a building consent, the costs associated with switching to competing products discourage builders from looking at alternative options;
 - A9.3 getting building consents approved is more challenging for products that authorities are less familiar with and so designers are more likely to specify a plasterboard product which is widely used and familiar to the industry;
 - A9.4 rebate structures disincentivise merchants from stocking alternative products, contributing to difficulties for alternative suppliers accessing the merchant channel; and
 - A9.5 the level of investment required to establish and maintain a strong distribution presence in New Zealand and the even greater level of investment required to develop a manufacturing plant mean that alternative suppliers struggle to sustain viable operations with only a small share of the market.
- A10 Due to the difficulties alternative suppliers face in entering the market and expanding their offering, consumers likely receive pricing, innovation and quality that are worse than if entry and expansion was easier. For example, when large international suppliers of plasterboard have entered the New Zealand market in the past and presented a credible competitive threat to Winstone Wallboards, it developed new products and innovations to match the competitors.

The role of plasterboard in residential construction

A11 Plasterboard can also be known as gypsum board, drywall, wallboard or sheet rock, but in New Zealand is often referred to as GIB, the brand name for the product range of the largest provider, Winstone Wallboards (part of Fletcher Building).

For example: the need for additional testing to demonstrate suitability for structural bracing; tools and systems to help designers meet compliance; and potentially different production runs as attributes of the board (such as thickness) may need to be adjusted to create a compliant system.

- A12 Plasterboard consists of two paperboards that sandwich gypsum, a powdery white or grey sulfate mineral. Gypsum is non-combustible, and compared to other wall materials, like solid wood and plaster, gypsum boards are typically much lighter and cheaper.
- A13 Plasterboard is the most commonly used material for wall linings when constructing new residential buildings. At least 91% of new residential buildings use plasterboard as their primary wall lining material. 797, 798
- A14 Although there are other materials which can physically be used for internal wall linings such as plywood or fibre cement, there appears to be little in the way of close economic substitutes to plasterboard for interior drywall linings.⁷⁹⁹
- A15 The total value of plasterboard sales in New Zealand is likely to be in excess of \$250 million a year.800
- A16 Plasterboard comes in different thicknesses and dimensions but in New Zealand the standard boards are typically either 10mm or 13mm thick. These standard boards represent over half of all sales. 801 We heard from market participants that the standard thickness in other countries is often different.802
- A17 In addition to the standard board products, there are a range of different performance boards which have additional capabilities such as additional fireproofing, soundproofing or water resistance. There is also a range of complementary products such as plaster compounds, trims and tape.
- A18 We understand from suppliers that they typically sell their products as part of wall systems. These systems are often designed to satisfy certain requirements of the building regulatory system in New Zealand plasterboard is often used to provide structural bracing which leads to additional requirements. We discuss this further below.

797 The other approximately 0-10% selected 'other' but did not specify the alternative and so these may have been other types of plasterboard. This excluded bathrooms and laundry rooms and where multiple wall linings were used. This figure excludes empty responses and houses with multiple lining types. 798 Commerce Commission analysis of anonymised BRANZ 2020 survey data, [799 []. 800

Commerce Commission analysis of merchant sales data estimates sales of around \$250m in 2021,]. This figure is rounded to the nearest \$50m, and is likely an underestimate as there will be a small proportion of direct sales which are not counted in this data. 801

This figure has been rounded to the nearest \$50m, Commerce Commission analysis of merchant sales data, [].

802 [A19 Some plasterboard products which have additional water-resistant properties are used to line areas of the house at higher risk of water exposure. The extent of potential substitution for wet area wall linings is likely greater due to the greater importance of water-resistant qualities which means other materials with strong water-resistant features are more likely to be used. However, the plasterboard share of supply for wet lining areas is also substantial, being estimated to be over 80% of the market. 803 The plasterboard used for wet lining in New Zealand is also predominantly manufactured by Winstone Wallboards under the Aqualine product line.

Industry structure and participants

- A20 In this section we provide an overview of the industry structure in relation to plasterboard and consider both:
 - A20.1 the level of concentration in the different layers of the supply chain; and
 - A20.2 whether there are any aspects of the structure of the industry which may act as an impediment to effective competition in the supply of plasterboard.

A21 Our assessment is that:

- A21.1 the supply of plasterboard in New Zealand is very highly concentrated at the supplier level with only one domestic manufacturer and limited supply from importers;
- A21.2 a range of factors that makes it difficult for alternative suppliers to enter and expand have likely contributed to a recent plasterboard shortage;
- A21.3 there is sufficient choice of where to purchase plasterboard but ultimately, the distributors (merchants) are all stocking similar products;⁸⁰⁴
- A21.4 the scale required to efficiently service the distribution of plasterboard means that it can be difficult for smaller alternative suppliers to compete without an established presence; and
- A21.5 there is little evidence to suggest the common ownership of Winstone Wallboards and other Fletcher Building business units downstream is a significant factor driving GIB's market share or affecting competition.
- A22 We describe the ways in which other factors such as building regulatory system and pricing arrangements are affecting competition later in this case study.

Commerce Commission analysis of anonymised BRANZ 2020 survey data, []. This figure excludes empty responses and houses with multiple lining types.

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We discuss the reasons merchants all primarily stock one product in paragraphs A107 to A109 below where we discuss the vertical arrangements suppliers have with merchants.

The supply of plasterboard in New Zealand is very highly concentrated upstream

A23 The supply of plasterboard is characterised by very high concentration upstream. Winstone Wallboards has held a share of over 90% of the supply of plasterboard since the mid-1990s with their share typically fluctuating around 95%.⁸⁰⁵

]. Winstone Wallboards has maintained a market share of over 90% of the wholesale supply of plasterboard in New Zealand for many years, Commerce Commission "Investigation into Winstone Wallboards Limited" at [38], available at: https://comcom.govt.nz/ data/assets/pdf file/0028/94393/Winstone-Wallboards-Limited-

Investigation-closure-report-22-December-2014.pdf.

For example: Hon Dr Megan Woods "Plasterboard taskforce set up to ease shortages" (21 June 2022) https://www.beehive.govt.nz/release/plasterboard-taskforce-set-ease-shortages; Radio NZ "Fletcher Building meeting: Simplicity seeking answers to GIB board shortage" (13 June 2022) https://www.rnz.co.nz/news/national/469034/fletcher-building-meeting-simplicity-seeking-answers-to-gib-board-shortage.

A24 We set out a brief overview of the different suppliers in Table A1 below.⁸⁰⁶

Table A1 Suppliers of plasterboard in New Zealand

Supplier	Share	Overview
Winstone Wallboards	~95%	The only domestic manufacturer of plasterboard in New Zealand, producing the GIB branded plasterboard and systems which are widely used in New Zealand. Winstone Wallboards has facilities in Auckland, Wellington and Christchurch, and is part of the Building Products Division of Fletcher Building.
Elephant Plasterboard	0-5%	Elephant Plasterboard (NZ) Limited distributes the Elephant Plasterboard brand manufactured in Thailand. Elephant Plasterboard has been operating in New Zealand for over 30 years and offers its own bracing systems and calculators.
ProRoc Plasterboard	0-5%	Sold through Bunnings and is primarily targeted at DIY customers. The product is from French multinational Saint-Gobain manufactured in Thailand.
Handyboard	0-5%	Mitre 10 distributed own brand plasterboard targeted at DIY/non-structural applications.
Knauf	0-5%	Large global manufacturer of building supplies including plasterboard resulting from merger of USG Boral and Knauf. Both USG Boral and Knauf had separately tried to enter the New Zealand market. USG Boral invested in distribution in New Zealand in 2017 and gained share before pulling out of the market in 2021. During that time, it developed its own bracing systems and calculator. Knauf entered in 2013 and exited within a few years.
Youngman Supply Group	0-5%	Following Knauf/USG's withdrawal from distributing in New Zealand the Youngman Supply Group has continued to import Knauf (USG Boral) plasterboard but with a more limited distribution presence.
Baier Group	0-5%	Small independent merchant operating out of Christchurch. ⁸⁰⁷
CSR	0-5%	Large Australian manufacturer of plasterboard who have also successfully started distributing insulation in New Zealand. Currently no direct supply of plasterboard to New Zealand. Had previously tried to enter the New Zealand market in the 1990s. 808
saveBOARD	0-5%	Not technically a plasterboard but can be used in similar applications. Is made from upcycled materials and has been tested in New Zealand for NZBC structural bracing requirements.

Source: Commerce Commission analysis.⁸⁰⁹

https://www.stuff.co.nz/business/129975853/plasterboard-coming-back-into-balance-after-step-up-in-manufacturing-imports; which suggests as of October 2022 there are 36 importers.

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As Winstone Wallboards has a market share of approximately 95%, all other suppliers will have market shares between 0-5%, for example: Hon Dr Megan Woods "Plasterboard taskforce set up to ease shortages" (21 June 2022) https://www.beehive.govt.nz/release/plasterboard-taskforce-set-ease-shortages; Radio NZ "Fletcher Building meeting: Simplicity seeking answers to GIB board shortage" (13 June 2022) https://www.rnz.co.nz/news/national/469034/fletcher-building-meeting-simplicity-seeking-answers-to-gib-board-shortage.

Due to the recent changes in the market, there will be other suppliers who have recently begun importing plasterboard into New Zealand which are not covered by this table. See, for example: Tina Morrison "Plasterboard coming back into balance after step up in manufacturing, imports" (8 October 2022)

- A25 Winstone Wallboards is currently the only domestic manufacturer of plasterboard in New Zealand. Other supply comes from manufacturing plants primarily in Thailand and Australia, and we have also seen reports of some limited direct imports from China.⁸¹⁰
- A26 Suppliers like Elephant Plasterboard and Knauf (USG Boral) have developed products which enable them to compete more closely with Winstone Wallboards using the product for a structural application. Other suppliers seek to supply a smaller proportion of the market where plasterboard is not used in structural applications.
- A27 There have been recent highly publicised moves to increase imports into New Zealand. For example, by Simplicity Living importing plasterboard from Thailand. Simplicity Living acknowledged the additional flexibility it had because its building used three storey concrete structures from engineered design and therefore did not rely on plasterboard bracing systems. ⁸¹¹ It is too early to assess whether the increased demand to import products directly is simply a temporary response to the current supply shortage or will result in a greater expansion and use of imports in the longer term.

A range of factors which make it difficult for alternative suppliers to enter and expand have likely contributed to a current plasterboard shortage

- A28 Following a significant increase in demand, there have recently been acute shortages in the supply of plasterboard. Winstone Wallboard's has told us that demand for plasterboard is currently higher than its supply capacity, which has led to shortages and implementation of an allocation model.⁸¹² The impact of the plasterboard shortages has meant some builders have had no option other than to delay projects, driving substantial additional costs into building projects.⁸¹³
- A29 Challenges with freight and high global demand, in addition to difficulties for builders switching suppliers when the product is specified by brand, have led to difficulties for importers increasing their supply in the market. We further consider the difficulties suppliers face in expanding their presence in the market later in this case study where we discuss the impact of the building regulatory system and the way decisions are made to choose plasterboard.

Daniel Smith "Simplicity blasts Fletcher Building for lack of Gib" (10 June 2022) https://www.stuff.co.nz/business/128912460/simplicity-blasts-fletcher-building-for-lack-of-gib.

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For example, Jonathan Killick "Unable to source Gib here, frustrated builders import plasterboard from China" (27 May 2022) https://www.stuff.co.nz/business/128697392/unable-to-source-gib-here-frustrated-builders-import-plasterboard-from-china.

Jonathan Milne "Building projects grind to a halt as dominant Fletcher freezes Gib orders" (11 February 2022) https://www.newsroom.co.nz/building-projects-grind-to-a-halt-as-dominant-fletcher-freezes-gib-orders.

For example, Jonathan Milne "Builders forced to the wall as Gib shortage becomes critical" (18 May 2022) https://www.stuff.co.nz/business/industries/300591111/builders-forced-to-the-wall-as-gib-shortage-becomes-critical.

- A30 There is also an inherent difficulty increasing plasterboard capacity. In the short term, in response to recent increases in demand, the only domestic manufacturer Winstone Wallboards has increased production and is currently operating both its existing manufacturing plants at maximum capacity. It said it was not viable to increase the capacity of the existing Auckland facility due to site constraints.
- A31 Increasing plasterboard production capacity otherwise involves long-term investment decisions. In December 2019, Winstone Wallboards received Fletcher Building Board approval to construct a new approximately \$400 million manufacturing and distribution facility in Tauriko, Bay of Plenty to replace the Auckland facility. The facility will provide 50% more capacity than the existing Auckland plant. We have also heard that it is possible to build smaller manufacturing plants (with lower capacity) with lower levels of investment. B15
- A32 Investing in new capacity is a process which takes many years, and COVID-19 lockdowns may have delayed the process.⁸¹⁶ The scale of investment required also affects investment decisions.
- A33 However, Winstone Wallboards' incentives to invest in a timely manner are likely weaker due to the limited constraints they face. 817 Concentrated markets are also typically less resilient to demand shocks and uncertainty. In many markets, having more large suppliers in the market, motivated to invest in increased capacity, can reduce the risks of shortages.

There is a choice of where to purchase plasterboard but limited stocking of alternatives

A34 There is a range of options for purchasers when deciding where and how to purchase plasterboard.⁸¹⁸

Winstone Wallboards "New Tauranga Facility – It's All Go" (1 March 2022) https://www.gib.co.nz/gib-news/new-tauranga-facility/new-tauranga-facility-its-all-go/;
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Monopoly Watch "Cross submission on residential building supplies market study draft report" (17 October 2022) at 9, suggests a plasterboard plant can be built for \$75m;

Tina Morrison "Fletcher Building says plasterboard market will return to 'equilibrium' by October" (22 June 2022) https://www.stuff.co.nz/business/129041772/fletcher-building-says-plasterboard-market-will-return-to-equilibrium-by-october.

Concentrated markets perform particularly badly at times of significant demand uncertainty. The suppliers are less worried about losing market share to competitors if demand suddenly increases and can wait for the demand uncertainty to subside before committing to expensive investment in new production capacity, Andrea Coscelli & Gavin Thompson "Competition & Markets Authority: Economics working paper – Resilience and Competition Policy" at 12, available at:

https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/10
64924/Resilience and competition policy - AC.pdf.

For example, Registered Master Builders Association "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 11, Q29.

- The five major building supply merchants (Bunnings, Carters, ITM, Mitre 10 and PlaceMakers) account for nearly all plasterboard sales in New Zealand.⁸¹⁹
- A36 There is a distinction between whether a merchant stocks plasterboard, or merely supplies it on request (indent supply). With the exceptions of Bunnings (which stocks a limited range of ProRoc plasterboard for the DIY market) and Mitre 10 (which has responded to Bunnings' offer with a rival DIY product, Handyboard), merchants have not typically stocked plasterboard other than GIB in large quantities. We understand that due to the current shortages in the market some merchants in certain stores may also have started stocking alternative products. 820 All major merchants supply alternatives at the request of builders.
- A37 The factors influencing merchants stocking decisions and the role of rebates is discussed further in Chapter 8 and in the discussion on rebates below.

The supply of plasterboard has scale efficiencies at two levels

- A38 The investment required to establish a manufacturing plant for plasterboard is relatively high and provides a constraint on introducing additional production capacity into the New Zealand market.⁸²¹ In order to justify such a large capital investment we heard from suppliers they would need to have gained sufficient share through an import model first to justify the risk being taken.⁸²² We also understand that there can be other barriers to establishing a domestic manufacturing presence including finding suitable land which has, or for which it can obtain, suitable consents and good transport links.⁸²³
- A39 Importers manufacturing abroad may have greater scale than Winstone Wallboards, and so are likely to have similar or even lower per-unit cost production.⁸²⁴

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- A40 Set against these potential production cost advantages are the cost of freight and exchange rate risk. We understand that the freight costs have become more substantial in recent years. 825 In our discussions with importers some told us they have historically been able to supply plasterboard at a level which matches or beats the incumbents' pricing in New Zealand but that freight costs have been increasing sharply. 826
- A41 Even prior to recent freight cost changes, in order to match the (rebate inclusive) pricing offered by the incumbent, and remain profitable, some suppliers using an import model indicated that they would need to reach certain market share thresholds to benefit from scale economies.⁸²⁷ This has not been achieved in recent decades.
- A42 Although almost all sales are made through the merchant channel in the supply of plasterboard, there are typically three different distribution options provided in the market for these sales:⁸²⁸
 - A42.1 ex-warehouse, where a merchant makes their own arrangements to collect products from the supplier's warehouse;
 - A42.2 freight into store (FIS), where the supplier makes deliveries to a designated merchant store from their main warehouses; and
 - A42.3 delivered to site (DTS), where product is delivered from the supplier direct to a building site.
- DTS and FIS are the most common approaches, with ex-warehouse being less common. The extent of delivery-to-site varies regionally but we understand in Auckland (the largest regional market), delivery-to-site is the most common approach. As noted in Chapter 5, availability of product (delivery in full and on time) is one of the key drivers for builders in choosing a supplier generally. The approach to distribution and reliability of service also appears to be an important component of competition in the supply of plasterboard.
- A44 This means that to establish a presence in the market, providers need to invest in their distribution capabilities within New Zealand and the competitive constraint provided by importers without this distribution network is diminished.

A45 We have heard that building a comprehensive distribution service capable of servicing direct to site deliveries involves a not insubstantial level of fixed cost. This increases the importance of having some minimum level of scale to be a viable supplier and the inability to reach this scale appears to have been one of the key reasons past entrants have left the market. The supplier are supplied to the supplier and the inability to reach this scale appears to have been one of the key reasons past entrants.

Vertical integration does not appear to be a significant driver of entry barriers

- A46 Winstone Wallboards is part of the Fletcher Building Group, which also includes a merchant (PlaceMakers) and a residential builder (Fletcher Living). This raises the possibility that internal trading arrangements in the vertically integrated group could be used to deter entry or weaken rivals at a different level of the supply chain.
- A47 We have not identified any evidence that Fletcher Building's position in two levels of the supply chain is being used to exclude rivals up or downstream.
- We consider that vertical integration is not having a material effect on competition in the supply of plasterboard. There is the potential for Winstone Wallboards to benefit from having a more assured pipeline of demand from PlaceMakers, given the merchant business is part of the same group. 832 However, PlaceMakers have only a moderate share of the distribution of plasterboard. 833 It seems likely that there would be a number of other merchants which suppliers could use if PlaceMakers did not stock independent suppliers' plasterboard products. Vertical integration was not raised by other suppliers who had tried to enter the market as presenting any difficulty. PlaceMakers also told us they operate at arms' length from other Fletcher Building business units and management are driven on targets for their own business unit not the broader business. 834
- A49 Winstone Wallboards told us that it treats PlaceMakers on an arms' length basis and consistently with its other merchant customers. Winstone Wallboards said its general trading terms (including list prices), invoicing and payment terms apply consistently to all merchants, while rebate arrangements and other terms relating to customer support vary between merchants (as they are tailored to the merchants' specific needs). 836

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As highlighted by Castalia on behalf of Affordable Building Coalition "Cross submission on residential building supplies market study draft report" (17 October 2022) at 9.

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A50 Some merchants raised concerns that Winstone Wallboards and other upstream Fletcher Building units could be incentivised to favour PlaceMakers. Merchants also raised concerns about allocation in response to stock shortages. Winstone Wallboards had put in place a method of allocation based on previous sales. At face value this is not favouring PlaceMakers over other merchants. Our analysis of merchant competition appears to show that PlaceMakers has been losing share to other suppliers which indicates that to the extent there is any preferential treatment given to PlaceMakers its effect on merchant competition is limited. We discuss our approach to assessing allocation models in more detail in Chapter 6.

Building regulatory system

- A51 This section summarises how the building regulatory system applies to plasterboard and how this could affect competition. Our survey seeking views on the building regulatory system received a large volume of responses related to plasterboard and the barriers to seeking an alternative product driven by regulations.
- A52 Our assessment is that the building regulatory system is creating impediments to effective competition in the supply of plasterboard. This is due to:
 - A52.1 the high cost of certification and slow timeframes creating additional entry costs;
 - A52.2 the approach to consenting means that it is costly for builders to change supplier when the product has been specified by brand; and
 - A52.3 the practice in New Zealand of using plasterboard for structural bracing creates additional entry barriers.
- A53 A more detailed discussion of the building regulatory system is contained in Chapter 4.

The way plasterboard is used in New Zealand requires additional certification which can be costly and slow

- A54 To use plasterboard as a structural component, in practice a branded system that complies with the Building Code will be specified in the design plans before a BCA will grant building consent.
- A55 The most recognised and widely used compliance certification is a BRANZ appraisal, which market participants have said can be difficult, lengthy, and expensive to obtain.⁸³⁸

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- A56 BRANZ appraisals are not the only way to comply with the Building Code. Some suppliers, for example, do not have a BRANZ appraisal but instead rely on appraisals from independent engineers and can still be specified in architectural plans in compliance with the Building Code.
- A57 We have heard that plasterboard that does not have an appraisal can be used for certain types of building projects, such as DIY projects, relining older houses that do not require bracing plasterboard, or other non-structural building work.

The approach to consenting means that it is costly for builders to change supplier when the product has been specified by brand

- A58 The current building regulatory system has led to products being specified by brand at the consenting stage. This means that the designer chooses the material supplier, and builders can face challenges if they want to use an alternative brand.
- As discussed in Chapter 4 we understand that there are number of features of the consenting process which contribute to making it harder for alternative providers to establish a presence in New Zealand. We understand these factors as summarised below also apply to decisions in relation to plasterboard:
 - A59.1 BCAs face joint/several liability and therefore require a high burden of proof when assessing consents with a preference for products which are 'tried and tested' in New Zealand.⁸³⁹
 - A59.2 BCAs are very familiar with the GIB products and so using those products means it is easier to get through the consenting process. This familiarity can impact how readily a builder may seek to substitute a plasterboard product after consent has been granted. One supplier stated that BCAs appear to particularly challenge consent changes for alternative plasterboard supply above and beyond other building supplies.⁸⁴⁰
 - A59.3 There is no central consenting body and limited information sharing, so new entrants have to repeatedly prove their product across multiple BCAs (and even within BCAs).⁸⁴¹

The practice in New Zealand of using plasterboard for structural bracing creates additional barriers to entry and expansion

- A60 Where plasterboard is used in a non-structural capacity, the Building Code imposes no requirements. Where plasterboard is used in a structural capacity, it must comply with B1 Structure, of the Building Code. Clause B1 includes bracing requirements.
- A61 In order to demonstrate compliance with Clause B1, a residential building can comply with Acceptable Solution B1/AS1.

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Castalia on behalf of Affordable Building Coalition "Submission on regulatory and standards systems" (18 May 2022) at [2.1.1].

- A62 B1/AS1 prescribes the design requirements for simple residential buildings. It incorporates a range of relevant standards, and one of these is *NZS 3604:2011* Timber-framed buildings. Timber-framed buildings are very common in New Zealand.
- A63 NZS 3604:2011 prescribes methods of complying with the Building Code requirements for the structure of residential buildings, including their foundations, framing layout, member sizes, bracing systems, fixings and connectors (when read along with the Acceptable Solution B1/AS1).⁸⁴²
- A64 Section 5 of NZS 3604:2011 provides detailed information about how to calculate the bracing for a residential building. If a residential building is not designed to achieve B1 compliant bracing via its internal walls, external walls, roof and foundations, the building will not be within the scope of NZS 3604:2011.
- A65 NZS 3604:2011 expressly refers to P21, which specifies the wall bracing test and evaluation procedure.⁸⁴³ P21 was developed by BRANZ. In essence, P21 describes how the bracing units (BU) of a product for use on an internal wall can be determined. Based on NZS 3604:2011, the relevant bracing requirements depend on the building's location.
- A66 One of the ways to comply with NZS 3604:2011 is to use a plasterboard wall system.
- A67 In New Zealand, using plasterboard for structural bracing has become standard practice in residential buildings. In most of the rest of the world, plasterboard is primarily used as a wall lining product that must only support its own weight and be resistant to certain types of forces reasonably expected within a building.
- A68 Winstone Wallboards stated that the reason plasterboard is used for bracing in New Zealand is that the systems they have are the most effective in terms of price and usability.⁸⁴⁴
- A69 While some other suppliers have developed similar systems, some suppliers suggested that:845
 - A69.1 plasterboard was not originally designed to be used as a structural component; and

BRANZ "Technical Paper P21, A wall bracing test and evaluation procedure" (2010).

NZS 3604:2011 https://www.standards.govt.nz/shop/nzs-36042011/.

^{[];} BRANZ "GIB EzyBrace Systems" https://www.branz.co.nz/appraisal-codemark-certificates/gib-ezybrace-systems/.

Examples of similar systems include: BRANZ "USG Boral Bracing Systems"

https://www.branz.co.nz/appraisal-codemark-certificates/899-2015-usg-boral-bracing-systems/;;

Elephant Plasterboard "Elephant Quickbrace Systems"

https://elephantplasterboard.co.nz/bracing-systems/.

- A69.2 there are other materials better suited to bracing buildings, and in other countries plasterboard is not used for bracing.⁸⁴⁶
- A70 One supplier suggested it was possible to change the way frame and truss was designed to take on all the bracing requirements.⁸⁴⁷ However, this requires getting designers to change building plans from the start and using plasterboard as structural bracing has become the default.
- Our view is that the unique building regulatory system in New Zealand, which permits use of plasterboard for structural bracing, in combination with the strong practice of relying on this compliance pathway, creates entry barriers. This could prevent some large international plasterboard manufacturers from entering due to additional compliance requirements they would need to meet for the New Zealand market compared with other jurisdictions (where plasterboard is only permitted for non-structural uses). It also creates additional difficulties for the suppliers who have decided to enter due to the interaction with the way plasterboard is specified and purchased, for example, increasing specification by brand which increases switching costs. We discuss such factors further in the following section.

How plasterboard is specified and purchased

A72 In this section we consider the way in which plasterboard is specified and purchased and the different factors that influence those decisions. We consider what this tells us about how competition is functioning in the supply of plasterboard and whether the way decisions are made has any impact on the effectiveness of competition. A more detailed discussion of the way building materials are specified and purchased is set out in Chapter 5.

A73 Our assessment is that:

- A73.1 it is very common for plasterboard to be specified by brand at the design stage meaning that designers are typically the primary decision makers;
- A73.2 the factors which influence designers' decisions are likely to lead to indirect network effects (where different parties value a product more because other parties in the system also use the product or are more familiar with it);
- A73.3 designers place value on BRANZ appraisals and tools to assist them in design; and
- A73.4 builders typically purchase what is specified in the building consent, due to the potential costs and delays of attempting to substitute products.

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It is very common for plasterboard to be specified by brand

- A74 The evidence from our survey of builders and designers is that the material used for interior walls (which primarily relates to plasterboard) is the building material which is most often specified by brand (see Figure 5.2 in Chapter 5).
- We have also seen evidence indicating that designers are typically the primary decision-maker when it comes to selecting plasterboard.⁸⁴⁸
- A76 We understand that this is primarily driven by the consenting process and the Acceptable Solution that includes plasterboard as a structural bracing element, meaning it is difficult to prove compliance without using a specific product.⁸⁴⁹

The factors which influence designers' decisions are likely to lead to network effects

- A77 We heard that because all the information for the incumbent's products is known throughout the industry due to the prevalence of use, there are additional costs for designers in using an alternative. This reflects the time and costs involved in seeking out and understanding the relevant information for alternative plasterboard products. We also heard that this additional cost is reinforced by the responses of BCAs, who similarly have a lack of familiarity with other products. Therefore, specifying alternatives is viewed as creating more difficulties in getting consents.
- A78 Designers also said that they often considered whether builders were comfortable using the material. We heard that due to familiarity with the incumbent's product builders will not typically seek out an alternative to GIB if it is specified.⁸⁵¹
- We heard that certain brands are "ingrained" in the eyes of architects, designers, and BCAs. They gave the examples of plasterboard and fibre cement products.⁸⁵²
- Our view is that this combination of factors appears to mean that the more a product is used by others in the market, the greater value it has to other users. This is because each group of participants (for example, designers, BCAs, Builders) know that the other groups in the building supplies industry will already have familiarity with the product and are therefore unlikely to encounter problems. This creates little incentive for designers to search for alternatives, particularly as the price may be a less direct consideration for designers.⁸⁵³ These indirect network effects create a self-reinforcing cycle of behaviour, increasing the difficulties for alternative suppliers seeking to gain scale in the market.

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Designers also place value on BRANZ appraisals and tools to assist them in design

- One designer indicated that BRANZ appraisal is one of the most important requirements for specification and that they do not recommend a product for specification if it does not have BRANZ appraisal. The designer noted that the industry expects that if BRANZ appraisal is received then the product is 'good to go'.⁸⁵⁴
- A82 Designers also said that the incumbent does a good job of providing all the necessary information, including free technical advice and a free tool to architects which is used to calculate bracing solutions.⁸⁵⁵
- A83 If a specific bracing calculator has been used by designers to create the walls and decide how the house will be braced, it can become difficult to specify an alternative product. 856 We understand from other suppliers that to compete in New Zealand it has become necessary to match these offerings, and we understand that USG Boral developed its own bracing calculator on entry and Elephant Plasterboard also has its own bracing calculator.
- A84 Our view is that the market expectation that suppliers' products should be BRANZ appraised and provide additional tools and systems to meet the needs of designers in structural bracing, are costs of entry for alternative suppliers which some smaller suppliers may be unable to meet.

Builders typically purchase what is specified in the plans

- A85 Builders are not the primary decision makers when it comes to selecting plasterboard. They purchase what is specified in the building plans.
- We heard that the cost of switching to an alternative product once a product is specified is high, due to the additional time and expense needed to go back through the consenting process. For example, we heard that every council has consent documents relating to GIB, so it is easy and convenient to specify GIB, but when offering an alternative, it takes a lot of time and often gets rejected. We heard that the builder can only influence the choice to use an alternative product when they are involved much earlier in the design phase, to allow more time to arrange supply and convince BCAs to accept different methods.

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- A87 Builders frequently commented on the lack of choice in plasterboard both in response to our survey and in interviews. One builder commented that they had never used anything but GIB, and they had no idea how you would even go about getting alternative plasterboard. Other builders suggested that the lack of alternatives was linked to merchants refusing to stock alternative products.⁸⁵⁹
- A88 There were also a number of positive comments made about the service and products of Winstone Wallboards relative to alternatives, including in relation to Winstone Wallboards' reliability of supply, BRANZ appraisal, long presence in the market and service proposition.⁸⁶⁰
- A89 Winstone Wallboards also told us about a double blind net promoter score (NPS) research piece where builders gave very high positive scores for Winstone Wallboards relative to alternative suppliers.⁸⁶¹
- A90 The cost of plasterboard was also highlighted as being small relative to the overall cost of a build meaning that delays to construction (eg, due to consenting problems or service issues) were viewed as outweighing any potential savings able to be secured from finding a cheaper alternative supply.⁸⁶²

Pricing practices and vertical arrangements

- A91 This section provides an overview of the pricing practices and vertical arrangements between suppliers of plasterboard. These types of arrangements are discussed more fully in Chapters 7 and 10.
- A92 Our assessment is that:
 - A92.1 plasterboard prices are likely higher than they would be with more effective competition;
 - A92.2 the structure of rebates between the incumbent upstream supplier and merchants is likely to disadvantage alternative suppliers and hinder their ability to compete for more than a small share of the market;
 - A92.3 the rebates between suppliers and builders seem less likely to impact competition;

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- A92.4 the approach to targeted discounts by the incumbent through customer specific quotes (CSQs) in response to competitors offers may also have a role in preventing alternative providers from reaching scale; and
- A92.5 contracts expressly requiring exclusivity do not appear to be present between manufacturers of plasterboard and the major merchants.

Plasterboard prices are likely higher than they would be with more effective competition

- A93 Pricing of plasterboard is typically based on a published list basis, but with supplier terms being negotiated with merchants on a bilateral basis (primarily on the level and tiers of rebates).⁸⁶³
- A94 The agreements between plasterboard suppliers and major merchants typically last between one and three years. However, the agreements may roll over and we understand supply agreements are often longstanding, with negotiations focusing only on the rebate level.
- A95 Merchants typically indicated that due to there being little choice in the supply of plasterboard, their ability to negotiate a better deal was more limited than in other product categories.⁸⁶⁴
- A96 Merchants set their own prices to customers (eg, builders) with a margin to contribute to their own costs. Our analysis of merchant margins in relation to plasterboard suggest that margins for this product category appear lower than other products. ⁸⁶⁵ This may partly be driven by the extent to which plasterboard is delivered directly to site by suppliers. Where plasterboard is delivered directly to site by the supplier, we understand that the merchant's role is more limited as it is not stocking and managing the delivery of the product and so the merchant will commonly take a lower margin than when the merchant stocks and delivers the product. ⁸⁶⁶
- A97 Prices of plasterboard over the last five years have been increasing. We also understand that Winstone Wallboards plans to increase its plasterboard prices by over 15% in early 2023.⁸⁶⁷
- A98 Suppliers of plasterboard told us that their costs have increased at a greater rate than the rate at which price increases have been implemented. They said that cost increases have occurred across all key inputs, with particularly significant increases occurring in the key inputs of paper, gypsum and energy. See

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         Tina Morrison "Fletcher Building plans to increase Gib price by 15.4%" (5 November 2022)
        https://www.stuff.co.nz/business/130387061/fletcher-building-plans-to-increase-gib-price-by-154.
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- A99 There could be a range of reasons input costs may have been rising faster than plasterboard prices for a period and it is unclear whether this trend will continue. For example, this may have been the result of a temporary increase in competitive pressure in the period USG Boral expanded their competitive presence in New Zealand.
- A100 We also heard that New Zealand plasterboard prices are high compared to other markets.⁸⁷⁰
- A101 We have also seen reports that smaller players may limit their attempts to win customers as they experience fierce competition when they attempt to grow their market share or undercut Winstone Wallboards' prices.⁸⁷¹
- A102 Our view is that prices are higher than they would be if there were more effective competition. This takes into account factors such as the fact that merchants appear to have more limited ability to negotiate because there are fewer viable alternative suppliers.⁸⁷²

The structure of rebates between the incumbent upstream supplier and merchants is likely to disadvantage alternative suppliers and hinder their ability to compete for more than a small share of the market

- A103 Suppliers of plasterboard have highlighted the importance of having their board stocked by merchants due to:
 - A103.1 the increased awareness this provides in the market; and
 - A103.2 builders often needing small additional amounts of supply (or returns), which becomes impractical to service without merchant stocking (especially outside of Auckland).⁸⁷³

Elephant Plasterboard as reported in Stuff: "One thing I have learned is to keep our market share below 5%, and don't undercut Gib prices. As long as we do both of those things we are OK. But as soon as we step over that line, then we have hell to pay", Daniel Smith "How to build a plasterboard monopoly" (9 July 2022)

https://www.stuff.co.nz/business/129088441/how-to-build-a-plasterboard-monopoly.

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Castalia on behalf of Affordable Building Coalition "Cross submission on residential building supplies market study – Preliminary issues paper" (18 March 2022) at [16] and [21];

- A104 This means that the arrangements between suppliers and merchants have an important role in the market. A major feature of these arrangements are the rebates given by suppliers to merchants.
- A105 Most of these rebate arrangements are on tiered structures so that when a merchant's purchases of plasterboard reach a certain threshold the rebate level steps up. This step-up in rebate applies not just to future purchases but all purchases in the period. 874 This is called a tiered retroactive rebate, which we explain in further detail in Chapter 8 and Attachment H.
- A106 The level of rebate steps and the volume tiers varies by merchant allowing suppliers to target each merchant's incentives around their perceived likely volume. These structures mean that when a merchants sales are nearing the next rebate volume tier they can face significant incentives to purchase additional stock, including effective negative prices for extra stock.
- A107 Merchants stated that they make their decisions on whether to stock suppliers by considering prices net of rebates and a range of other factors. One merchant indicated that the rebate incentives in plasterboard strongly incentivised additional volume. There are also a number of other factors which merchants highlighted as impacting their decision making:
 - A107.1 the expected demand from builders.⁸⁷⁸ They stated that because it is so common for GIB to be specified and used by the industry they rarely get requests for alternative materials to be stocked.⁸⁷⁹
 - A107.2 compliance with New Zealand standards;
 - A107.3 the reliability of delivery and service; and
 - A107.4 the net price.

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- A108 Winstone Wallboards stated that the structure and operation of the New Zealand market means that a strong presence in the merchant channel will enhance a plasterboard supplier's sales volumes. However, stocking a bulky and fragile product like plasterboard involves inventory risk for merchants. To compensate for that, a supplier's offer to merchants will need to address not just price, but also quality, stock availability and service.⁸⁸⁰
- A109 We heard from a number of alternative suppliers that the structure of the rebates given by suppliers to merchants is a contributing factor in the difficulties they faced entering and expanding their position in the market, as they make it harder to get stocked by the major merchants.⁸⁸¹
- A110 As discussed in Chapter 8 our view is that quantity-forcing rebate structures, including tiered retroactive rebate structures, are likely to make it harder for alternative suppliers to be stocked through the merchant channel and contribute to less effective competition.
- A111 Our view is that the rebate structures applying to plasterboard are likely affecting competition because they impact merchant decision making and make it harder for alternative suppliers to reach scale.
- As well as rebates, we also understand that suppliers such as Winstone Wallboards may give targeted Customer Service Quotes (CSQs) to merchants where the merchant is coming under competitive pressure from another supplier.⁸⁸² We understand this may be less common in residential than commercial building.
- A113 Competition driving sustained lower pricing is an outcome the Commission seeks to promote. However, there is a risk that short-term targeted discounts (even when above the incumbent's costs) could prevent rivals achieving and benefitting from economies of scale. This could limit their ability to provide a more effective competitive constraint over the longer term.⁸⁸³

The rebates between suppliers and builders seem less likely to impact competition

A114 We have also seen evidence of plasterboard suppliers providing additional rebates directly to some larger builders.⁸⁸⁴

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         Residential building supplies market study - Day 2 transcript of consultation conference
         (28 September 2022) at [1709]-[1737]; Elephant Plasterboard "Cross submission on residential building
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- A115 There are some factors which suggest these rebates may be harming competition:
 - A115.1 although these rebates are paid directly to builders by suppliers, the plasterboard is usually supplied to builders by merchants, acting as intermediaries. This could raise barriers to entry for suppliers if it makes merchants reluctant to stock new suppliers because customers are less likely to switch as they would lose the rebate;⁸⁸⁵
 - A115.2 end customer rebates involve an additional set of agreements with several builders rather than the more limited number of merchants which increase costs for new suppliers;⁸⁸⁶ and
 - A115.3 there is a risk the rebates may misalign incentives between builders and their customers.
- A116 However, we understand that end customer rebates:
 - A116.1 are offered only to a limited proportion of the market;887 and
 - A116.2 are structured in a way which an alternative supplier would likely be able to match, for example, on a per house basis.⁸⁸⁸
- A117 Our view is that the provision of rebates to builders by suppliers is less likely to harm competition than those provided to merchants by suppliers, because it appears they are not commonly structured in a way that may induce exclusivity, near exclusivity or require a minimum volume of sales. However, we acknowledge that the lack of transparency around end-user rebates may have wider implications, both in adding uncertainty to merchants' stocking decisions and, in some cases, leading to misaligned incentives between builders and their customers. In this way, they have the potential to inhibit competition.

Innovation and building for climate change

A118 In this section we discuss innovation in the supply of plasterboard and the evidence we have seen in relation to how the changes in the market linked to products impact on the environment and building for climate change.

that medium to large GHBs are offered discount prices or rebates which are conditional on exclusivity to that supplier, Elephant Plasterboard "Cross submission on residential building supplies market study draft report" (17 October 2022) at 1. We have seen no evidence of such agreements occurring for plasterboard in practice.

A119 Our assessment is that:

- A119.1 there would likely be a greater level of innovation in the market if barriers to entry were reduced;
- A119.2 having products with a lower environmental impact is becoming more important for plasterboard; and
- A119.3 suppliers of new or innovative products may face additional challenges to other suppliers in expanding their presence in the market.

There appears to have been a range of innovations in the market but the level of innovation in the market would likely increase if barriers to entry and expansion were reduced

- A120 We heard mixed views about the level of innovation in the supply of plasterboard in New Zealand:
 - A120.1 We heard that there have been some innovations in the quality of plasterboard and the level of service in the plasterboard market. For instance, we understand that there have been improvements to the type of paper used and the precision of delivery systems. 889 Fletcher Building also submitted that Winstone Wallboards' plasterboard bracing systems have been developed and tested to meet the NZ performance requirements and their investment in this innovation should be celebrated as one which has led to lower overall building costs. 890
 - A120.2 However, we have also heard that compared to other countries the supply of plasterboard appeared to demonstrate a number of characteristics of an uncompetitive market, including a lack of innovation. We heard that there were delivery techniques (for example, delivering without pallets to large sites) that new entrants introduced which had been around for years in other countries, but which were not being used in New Zealand prior to other suppliers entering the market.

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***Pletcher Building "Submission on residential building supplies market study draft report" (1 September 2022) at 8.

***Pletcher Building "Submission on residential building supplies market study draft report" (1 September 2022) at 8.

**Pletcher Building "Submission on residential building supplies market study draft report" (1 September 2022) at 8.

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**Pletcher Building "Submission on residential building supplies market study draft report" (1 September 2022) at 8.

A121 Our view is that some of these innovations provide benefits for customers and may help to make the construction process more efficient. However, innovation in the supply of plasterboard is, as expected, often driven by the competitive threat of a rival supplier. ⁸⁹³ This suggests that there would be more innovation if competition was more effective.

Having products with a lower environmental impact is becoming more important for plasterboard

- A122 The industry appears to increasingly value 'green' and 'sustainable' product offerings for plasterboard. We observed suppliers seeking to reduce the carbon footprint of manufacturing and develop their sustainability offering. Suppliers are also assessing the 'green' offerings of competitors and developing products with similar credentials.
- A123 The potential benefits of offsite manufacturing (OSM) in relation to plasterboard were also highlighted. For example, one OSM supplier suggested that traditional building methods often lead to there being a large bin full of rubbish onsite (including offcuts of excess, plasterboard), but that there can be greater reuse and recycle of materials in a factory environment.⁸⁹⁷ For example, they said plasterboard offcuts are kept cleaner and can therefore be reused, rather than typically thrown into a wastebin.
- A124 We consider that the increasing importance of environmental factors has the potential to disrupt industries such as plasterboard either directly or through changes in construction methods changing the customer base. However, it is not clear how quickly this may happen, and the success of future innovation is likely to be assisted by the removal of barriers to entry and expansion that we have discussed in our report and in this case study.

Suppliers of new or innovative products may face additional challenges to other suppliers in expanding their presence in the market

A125 In addition to traditional plasterboard manufacturers, saveBOARD has emerged in New Zealand as an alternative product with green credentials.

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- A126 saveBOARD produces internal wall and ceiling lining from a structural composite panel made from upcycled materials.⁸⁹⁸ The core of the product is made from shredded and compressed composite packaging.
- A127 We heard that the building regulatory system is set up for historical building methods, which can make it more challenging coming in with new material like saveBOARD, as is the case for any new building product in the building regulatory system. ⁸⁹⁹ For example, we heard that there is a plasterboard standard, but saveBOARD is not a traditional plasterboard product so cannot be tested against plasterboard standards. We understand saveBOARD tries to demonstrate compliance by showing that the performance attributes of its product exceed those of current plasterboard products which meet the standard. We also heard the high cost of getting tested through BRANZ can be difficult for new entrants like saveBOARD to meet. ⁹⁰⁰
- A128 Our view is that the success of innovative products will be improved by addressing the issues we have identified as increasing the barriers to entry and expansion across key building supplies.

saveBOARD "Paperfaced internal lining" https://www.saveboard.nz/paperfaced-internal.

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Attachment B Structural timber case study

- This attachment discusses the findings of our structural timber case study. In addition to understanding how competition in the supply of structural timber is functioning, the case study aims to illustrate the extent to which some or all of the factors affecting competition identified in our report impact the supply of structural timber.
- B2 For the purposes of this case study, we define structural timber as sawn timber that can be used for structural framing in residential building.
 - B2.1 This definition does not include engineered timber, which is distinct from sawn timber in its manufacturing process among other attributes. However, we note some engineered timber products can be used for structural framing and we consider this closely throughout the case study.
 - B2.2 Although we sometimes refer to a market for structural timber, it is important to note we have not conducted a formal market definition analysis for the case study. Instead, our definition above reflects our approach to defining *key building supplies* in line with the scope and objectives of this market study.
- B3 To inform our structural timber case study we have:
 - B3.1 spoken with three major suppliers of structural timber;
 - B3.2 reviewed hundreds of documents submitted by structural timber suppliers, engineered timber suppliers, and the major merchants (including detailed written submissions and supply agreements);
 - B3.3 collected detailed product-level purchasing and sales data from the major merchants;
 - B3.4 reviewed relevant survey responses and written submissions from a range of other industry participants and stakeholders; and
 - B3.5 met with regulatory and standards bodies and reviewed the relevant regulations.
- B4 In this attachment we set out:
 - B4.1 a summary of our findings;
 - B4.2 the role of structural timber in residential construction;
 - B4.3 the industry structure and participants;
 - B4.4 the building regulatory system;
 - B4.5 how structural timber is specified and purchased;
 - B4.6 pricing practices and vertical arrangements;

- B4.7 innovation and building for climate change; and
- B4.8 conditions of entry and expansion.

Summary

- Structural timber is by far the most common type of framing used in residential building in New Zealand. It is an important part of the overall building envelope, both on its own and as a key input into prefabricated frame and truss (F&T), which itself is a significant focus of competition between building supply merchants.
- Overall, we consider that competition is working adequately in the supply of structural timber, although we have identified some areas of potential risk.
- B7 Competition appears to be working adequately because:
 - B7.1 Structural timber is seen as a commodity with limited scope for product differentiation between suppliers and brands. This is facilitated by the performance-based structural grading system. Consequently, structural timber is not commonly specified by brand in building plans, which promotes switching between suppliers. As a result, suppliers are collectively faced with variable market demand.
 - B7.2 Distributors of structural timber include major merchants and independent F&T manufacturers. These distributors appear to have a reasonable amount of countervailing power with suppliers due to their size, willingness to switch, and awareness of other suppliers' pricing. This usually makes it difficult for structural timber suppliers to price above the market level.
 - B7.3 The major suppliers of structural timber appear to face some competitive constraint from a long tail of smaller regional sawmills and from national suppliers of laminated veneer lumber (LVL) framing, which is a direct substitute (ie, LVL framing products can be used when structural timber has been specified in plans). There are also indirect framing substitutes such as panel systems and steel framing, although these substitutes are used at a relatively small scale.
- B8 The following features of the structural timber market may present risks for effective competition:
 - B8.1 Two major suppliers, Carter Holt Harvey (CHH Woodproducts) and Red Stag, account for most of the supply of structural timber in New Zealand. They appear to benefit from economies of scale (and, in CHH Woodproducts' case, from vertical integration with Carters) and have strong, stable market positions. These aspects of industry structure increase the risk of unilateral market power being acquired and exercised. They may also impact the market's susceptibility to supplier coordination and/or resilience to demand pressures.

- B8.2 New Zealand's building regulatory system explicitly requires structural timber to be durable for at least 50 years. Currently, it appears to be prohibitively difficult to demonstrate compliance with this requirement outside of the established standards framework, which is prescriptive regarding the species of timber that can be used structurally and the chemical treatment that must be applied. Further, the form of chemical treatment required and the express nature of the durability requirements are unique to New Zealand. These requirements are designed to improve the quality of New Zealand's housing stock and protect structural timber from damage, but may also serve to protect incumbents from innovation and import competition.
- B8.3 Barriers to entry and expansion appear to be high for structural timber suppliers. Building and operating sawmills incurs significant sunk costs and there are risks associated with the price and availability of logs (a key input sourced from third-party forest owners). Many smaller sawmills have closed in the last 15 years, and there have been few new entrants in this period.

The role of structural timber in residential construction

- Structural timber is sawn timber that can be used for structural framing in residential building. It is often known as *framing timber* or *timber framing*. Its key structural properties are strength and stiffness; it can withstand stress without breaking or bending.
- In New Zealand, most structural timber is either Radiata Pine or Douglas Fir. It is produced by sawmills, which process raw logs into sawn timber and residue. 901 Not all sawn timber is suitable for structural use; around half of a log's timber will have the required structural properties, but we understand this can range from 30% to 80% depending on the 'structural yield' of the log. 902 The remainder can be used in non-structural applications (eg, appearance timber).
- Structural timber is by far the most common type of framing used in residential building in New Zealand. In 2020, it was used in 73% of new residential builds.

 However, as shown in Figure B1 below, this has fallen from 93% in 2013 which reflects growing usage of other framing options (especially engineered timber). 903
 - B11.1 As noted earlier, our definition of structural timber does not include engineered timber. Unlike sawn timber, engineered timber is a composite material made from wood and adhesives. It has different physical properties and includes a broader set of suppliers, products, and applications.

901 Residue products can include wood chip, bark, and sawdust.

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Ommerce Commission analysis of BRANZ New Dwellings Survey data, [].

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- B11.2 However, some LVL framing products are positioned as close substitutes to structural timber and are subject to similar regulations and market conditions. We consider them direct substitutes for structural timber, despite drawing a distinction in our terminology, because LVL framing products can generally be used when structural timber has been specified in building plans (see paragraphs B97 to B98 below). Usage of engineered timber as framing in new residential builds (most of which we understand to be LVL framing) has grown from 1% in 2013 to 13% in 2020.
- B11.3 Other framing types used in residential housing include panel systems and steel framing. We view these as indirect substitutes for structural timber because they have substantively different characteristics and cannot be used when structural timber has been specified in building plans. The choice to use panel systems or steel framing in place of structural timber is an important engineering decision taken by designers, who we expect to be less likely than other decision makers (eg, builders) to be responsive to short-term competitive conditions for the supply of structural timber.⁹⁰⁴

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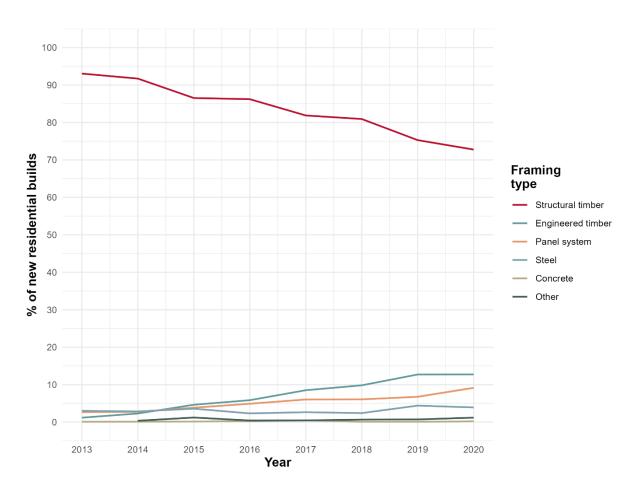


Figure B1 Framing type by share of new residential builds in New Zealand

Source: Commerce Commission analysis of BRANZ New Dwellings Survey data. 905

B12 Structural timber products can vary in terms of:

- B12.1 structural grade (all structural timber products are assigned a grade of SG6, SG8, or SG10, where a higher grade indicates stronger and stiffer timber, and SG8 is the most common);
- B12.2 species of tree (as above, usually either Radiata Pine or Douglas Fir);
- B12.3 level of chemical preservative treatment (most common is hazard class H1.2, indicating moderate risk of dampness or water);
- B12.4 whether it has been kiln dried (KD) after treatment (this is usually the case, but structural timber is sometimes purchased wet and stored until dry enough to install); and
- B12.5 the physical dimensions of the timber (ie, length, width, and height).

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- Structural timber is a key input into prefabricated F&T, which is produced by both merchants and independent manufacturers. Most structural timber goes through this intermediate manufacturing step before being sold to the construction level, though some is also distributed by building supply merchants as loose 'stick timber'. 906
- Overall, structural timber is an essential part of the residential construction sector. The total value of structural timber sales (including as F&T) to the major merchants alone is likely to be in excess of \$600 million a year. 907
- B15 Demand for structural timber is variable as it is strongly linked to the overall level of residential construction. It is also generally viewed as a commodity product with limited differentiation between suppliers and brands. Therefore, suppliers are all faced with this variable market demand and must take it into account when making decisions around pricing and production capacity. 908
- B16 There was recently a major shortage of structural timber in New Zealand due to a spike in residential construction demand that could not be met by existing sawmill capacity. The shortage led to increased prices and rationing of supply (beginning in early 2021), which had significant flow-on effects for the wider sector. 909 We understand the shortage has now begun to ease and structural timber is becoming more freely available. 910

Industry structure and participants

- In this section we provide an overview of the industry structure in relation to structural timber and consider both:
 - B17.1 the level of concentration in the different layers of the supply chain; and
 - whether there are any aspects of the structure of the industry which may act as an impediment to effective competition in the supply of structural timber.
- B18 Our assessment is that:
 - B18.1 the supply of structural timber is highly concentrated;
 - B18.2 the acute domestic capacity shortage has affected competitive dynamics in the short term;
 - B18.3 it appears structural timber suppliers are generally price-constrained by distributors;

906	[].
907	Commerce Commission analysis of merchant sales data estimates sales of around \$600m in 2021. This
	figure is rounded to the nearest \$50m, and is likely an underestimate as there will be a small proportion
	of direct sales which are not counted in this data, [].
908	[].
909	[],
910	Carter Holt Harvey "Cross submission on residential building supplies market study draft report"
	(13 October 2022) at [26]: [l.

- B18.4 engineered timber suppliers provide further constraint;
- B18.5 some features of the structural timber market could facilitate supplier coordination;
- B18.6 there are many participants competing at the distribution level; and
- B18.7 vertical integration between CHH Woodproducts and Carters has the potential to impact competition.
- We start by providing an overview of the structural timber supply chain. The remainder of the section discusses each of the above findings in more detail.

Overview of the structural timber supply chain

- B20 The supplier level of the New Zealand structural timber market is mainly comprised of domestic production. Almost all structural timber used in New Zealand was produced in New Zealand; very little is imported from overseas.⁹¹¹
- B21 There are two major domestic suppliers of structural timber: Carter Holt Harvey (CHH Woodproducts) and Red Stag Timber (Red Stag). Combined, these two suppliers likely account for between 65-80% of structural timber volumes in New Zealand. ⁹¹² The remaining volume is supplied by smaller national and regional suppliers.
- B22 Structural timber is typically sold through distributors; we are not aware of any direct sales from the supplier level to the construction level. As noted above, structural timber distribution comes in two forms:
 - B22.1 loose 'stick timber' sold to the construction level by building supply merchants (including major merchants and specialist timber merchants); and
 - B22.2 prefabricated F&T sold to the construction level by F&T manufacturers (directly and through merchants).
- B23 We refer to both groups (building supply merchants and F&T manufacturers) collectively as structural timber distributors. There is significant overlap between these groups; more than half of the F&T manufacturing plants in New Zealand are owned by building supply merchants.⁹¹³
- There is also a notable instance of vertical integration between the supplier and distribution levels. The largest structural timber supplier, CHH Woodproducts, and the building supply merchant, Carters (which operates 50 stores and nine F&T plants) are both are part of the CHH Group.⁹¹⁴

⁹¹³ [

<sup>911 [].
912</sup> See Table B1 below.

Ultimately owned by the parent entity, Rakau Building Supplies Holdings Limited.

B25 Figure B2 below depicts the structural timber supply chain as we understand it, including a selection of market participants at each level. The remainder of this section discusses aspects of industry structure in more detail.

Supplier Level Other domestic manufacturers Smaller domestic sawmills McAlpines / South Pine Major domestic manufacturers **Timberlink** (imports from Australia) Waipapa Pine CHH Woodproducts (part of CHH Group) **Red Stag Timber** Manufacturers of substitute Kiwi Lumber products (eg, LVL framing) Distribution Level (frame and truss manufacturing) Other merchant-owned Carters F&T plants Independent F&T F&T manufacturers manufacturers (PlaceMakers, ITM, Mitre 10*) Distribution Level (building supply merchants) Other major merchants Merchants with national network of F&T plants Other general merchants Mitre 10* Direct sales of **PlaceMakers** frame and truss Carters Specialist timber ITM **Bunnings** merchants Merchant sales of Merchant sales of frame and truss stick timber Construction level Medium/small Commercial **Group home** Subresidential DIY **builders** builders contractors **builders**

Figure B2 Overview of the supply chain for structural timber

*Note: Mitre 10 has a small number of member-owned F&T plants; however, they do not have nationwide coverage so are not 'self-sufficient' (aside from those particular stores)

Source: Commerce Commission. 915

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The supply of structural timber is highly concentrated

- B26 In New Zealand, structural timber suppliers are mostly operators of domestic sawmills. Outside of this we are aware of one supplier, Timberlink, that does not operate a sawmill in New Zealand and instead imports structural timber from Australia.
- B27 Overall, supply of structural timber is highly concentrated at this level, ie, a small number of suppliers control a large amount of the supply. We estimate that the top two suppliers account for 65-80% of structural timber volume in New Zealand, and the top three suppliers account for 70-90%. This degree of concentration increases the risk that competition is not as effective as it could be.
- B28 Table B1 below provides an overview of notable structural timber suppliers in New Zealand including our estimates of their market shares. 916

916 We used a range of estimates from different datasets and metrics (including on sales revenue and quantities of timber sold). The range provided is not indicative of any individual estimate but shows the range of market share estimates we have seen. Therefore, market shares will not necessarily add to 100%.

Table B1 Selection of structural timber suppliers in New Zealand

Supplier name	Estimated market share	Structural timber sawmill location(s) ⁹¹⁷	Other notes
CHH Woodproducts	50-55%	Kawerau and Nelson	Historical incumbent, vertically integrated with Carters. Sells structural timber under the Laserframe brand.
Red Stag Timber	15-25%	Rotorua	Started producing structural timber in 2004.
McAlpines (incl. South Pine)	5-15%	Rotorua, Rangiora, and Nelson	For historical reasons, the Rotorua and Rangiora mills operate under the McAlpines name, while the Nelson mill operates as South Pine. 918
Waipapa Pine 0-10% Kerikeri		Started producing structural timber in 2012.	
Kiwi Lumber	0-10%	Masterton	
Max Birt Sawmills	0-10%	Pōkeno	
Pukepine Sawmills	0-10%	Te Puke	
Timberlink	0-10%	Australia	Only structural timber importer we are aware of. Used to have a mill in Blenheim that closed in Dec 2020. 919

Source: Commission review of information collected during the case study, including internal documents, RFI responses, and merchant data.⁹²⁰

- B29 Our analysis of merchant data suggests that CHH Woodproducts and Red Stag's shares of supply to merchants were reasonably stable between 2017 and 2020 (ie, prior to the current supply shortage).⁹²¹
- We understand that CHH Woodproducts and Red Stag both benefit from substantial economies of scale, allowing them to efficiently supply distributors across the whole country and making it difficult for competitors to win market share off them. 922 This suggests their strong market positions may be somewhat entrenched.

917]. 918]. 919 Maia Hart "Blenheim sawmill with 75 staff to close by end of the year" (Sep 8, 2020) Stuff https://www.stuff.co.nz/business/122704945/blenheim-sawmill-with-75-staff-to-close-by-end-of-theyear. 920].];[];[];[921 Commerce Commission analysis of merchant data [922].

- B31 However, our analysis also shows that some smaller suppliers' share of supply to merchants grew steadily over this same period. There is also a long tail of smaller sawmills that may be able to compete with the major suppliers in certain regions, if not nationally. This may provide some competitive constraint on CHH Woodproducts and Red Stag, especially given the limited product differentiation between different brands of structural timber.
- B32 Structural timber's declining share of the wider framing market may also be weakening the market positions of CHH Woodproducts and Red Stag over time. 924 We specifically discuss the constraint provided by engineered timber suppliers below.

The acute domestic capacity shortage has affected competitive dynamics in the short term.

- B33 Following a significant increase in demand, there have recently been acute shortages in the supply of structural timber. The recent nationwide capacity shortage has led to structural timber volumes being rationed by suppliers, many of whom have operated strict allocation models.
- We understand the shortage has now begun to ease and structural timber is becoming more freely available. However, until recently, suppliers were effectively guaranteed demand for every unit they could produce. This made it difficult for us to assess the intensity of competition that would normally occur between suppliers looking to secure distribution of their product.
- B35 The shortage could be explained in part by the inherent difficulty of increasing sawmill capacity. We understand structural timber sawmills across the country are operating at full capacity (in some cases, overcapacity) to respond to heightened demand. 926 Further, sawmill capacity upgrades are underway, but the scale and cost of these investments inevitably result in long lead times. 927
- B36 However, we note that concentrated markets are typically less resilient to demand shocks and uncertainty. Having more large suppliers in the market, with more motivation to invest in capacity increases, may have helped to alleviate some of the acute impacts of the shortage.

See Figure B1 above.

^{923 []; [].}

Carter Holt Harvey "Cross submission on residential building supplies market study draft report" (13 October 2022) at [26]; [].

^{926 [];[].}

⁹²⁷ [].

Andrea Coscelli & Gavin Thompson "Competition & Markets Authority: Economics working paper – Resilience and Competition Policy", available at:

https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/10 64924/Resilience and competition policy - AC.pdf.

It appears structural timber suppliers are generally price-constrained by distributors

- Price is typically the most important factor considered by distributors when selecting a structural timber supplier. Given the commodity nature of the product, pricing is typically expected to be consistent across structural timber suppliers. 929
- B38 Suppliers have said that distributors are generally aware of market pricing and are willing to put pressure on suppliers if their pricing is not in line with competitors. 930
 - B38.1 We have seen several examples of distributors switching between suppliers, often after holding RFPs to extract competitive pricing. ⁹³¹
 - B38.2 According to one market participant, it is not common for distributors to switch structural timber suppliers because of the relationship-driven nature of supply arrangements. However, they confirmed that distributors readily provide feedback on pricing and cannot be taken for granted as customers. 932
- B39 This would have been unlikely to apply during the recent supply shortage, where distributors were more likely to prioritise security of supply over price, and prices naturally rose to reconcile supply and demand. This may also be the case somewhat during other periods of high demand, which we understand occur on a variable basis, but on balance are less common than periods of low demand.
- B40 This dynamic is reinforced by the large size of many structural timber distributors. This group includes major merchants such as PlaceMakers and ITM, and large F&T manufacturers such as VIP Frames & Trusses. Due to their relative size and sophistication, these distributors are likely to have more buyer power and ability to constrain suppliers than a more fragmented customer base would.

Engineered timber suppliers provide further constraint

As noted earlier, engineered timber framing usage grew from 1% to 13% between 2013 and 2020, with structural timber usage falling from 93% to 73% over the same period. This has created an opportunity for engineered timber suppliers to expand their presence in the wider framing market and constrain the major structural timber suppliers, though submitters have said that LVL can be difficult for builders to source. 933

929	[];[].	
930	[];[].
931 932]].].		
933	Commerce Commission "He Kohinga Kōrero – Engagement with Māori on Residential Building Supplies Market Study – Summary of key themes" (4 August 2022) at 9; [].				

- We understand the main engineered timber framing suppliers are CHH Futurebuild (also part of the CHH Group), Nelson Pine, and Juken. These suppliers all distribute nationally and produce LVL framing products that can be used in F&T.⁹³⁴
- Other relevant engineered timber suppliers include Prolam and Wood Engineering Technology; both produce glued laminated timber (glulam) products that can be used for structural framing. Ongoing innovation in the engineered timber space may continue to give rise to new suppliers and framing products.
- B44 Engineered timber framing products can carry a price premium as they are designed to be straighter and less prone to distortion than sawn timber, and are typically more expensive to manufacture.⁹³⁵
- B45 The closeness of competition between engineered timber suppliers and structural timber suppliers may depend on the level of this price premium, which we understand is usually around 10-15%. 936
- B46 Not all of the decline in structural timber usage has been captured by engineered timber. The other major beneficiary is panel systems, an indirect substitute whose usage as framing grew from 3% in 2013 to 9% in 2020. While we do not consider panel system suppliers here as a direct competitive constraint, we include them in our later discussion of potential innovative disruptors.

Some features of the structural timber market could facilitate supplier coordination

- Some aspects of industry structure make the structural timber market potentially vulnerable to coordination at the supplier level. Specifically, the high degree of concentration, homogenous product, common inputs and cost structures, and relative transparency of pricing could be exploited by suppliers to keep the market price artificially high by co-ordinating to restrict output.
- B48 However, other features of the structural timber market reduce the risk of coordination. For example, there do not appear to be frequent interactions between competitors and the market is characterised by variable demand.
- B49 While certain market features may create a coordination risk, we have not seen any evidence of coordination occurring.

934 935] []]; [].].];	
936]]; []; [];[];].

There are many participants competing at the distribution level

- B50 Structural timber is distributed in the form of loose 'stick timber' and, more commonly, prefabricated F&T.
- B51 There are many participants at the distribution level, including major building supply merchants, specialist timber merchants, merchant-owned F&T manufacturers, and independent F&T manufacturers.
- B52 Both forms of structural timber constitute a crucial aspect of a building supply merchant's offering to customers and are generally among their highest-selling categories. The ability to supply structural timber is an important criterion for a builder when selecting a merchant, and merchants view F&T sales as a way to gain a customer's business for the 'balance of the house'. 937
- B53 We therefore observe merchants competing closely with each other for the distribution of structural timber products. 938
- Suppliers of both structural timber and engineered timber framing told us they had not had difficulties accessing customers and having their products stocked by merchants. One supplier told us that the current distribution model is efficient and works well for its needs.⁹³⁹

Vertical integration between CHH Woodproducts and Carters has the potential to impact competition

- B55 The main vertically integrated player in the structural timber market is CHH Group, which owns both CHH Woodproducts and the building supply merchant, Carters. This vertical integration could impact competition if:
 - B55.1 CHH Woodproducts made it difficult for Carters' competitors to access structural timber (input foreclosure); or
 - B55.2 Carters made it difficult for CHH Woodproducts' competitors to access distribution channels (customer foreclosure).
- B56 Both types of foreclosure have the potential to occur and impact competition in future, particularly input foreclosure given CHH Woodproducts' relatively stronger market position. We discuss each in more detail below.

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938	Г]; [1		
	L	J, [٦٠		
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	l	J, [J, [].

Potential for input foreclosure

- We understand CHH Woodproducts normally supplies structural timber to a range of Carters' competitors, including other major merchants and F&T manufacturers, at similar prices to what Carters pays. 940 This means Carters' competitors do not normally appear to be limited in their ability to access structural timber.
- B58 However, during the recent shortage, we are aware that Carters has benefitted from being guaranteed structural timber supply from CHH Woodproducts, and that CHH Woodproducts did not include some of Carters' main competitors in its timber allocations. Given CHH Woodproducts is a large supplier of structural timber in New Zealand, this significantly limits the pool of potential supply sources for those merchants.
- B59 CHH has explained that it decided to fulfil delivery orders to customers that had purchase commitments with it. Customers that had not provided a purchase commitment were not included in its timber allocations during the shortage. The two customers that had provided purchase commitments (Carters and PlaceMakers) continued to receive supply. 942
- Due to the shortage, we understand that the merchants that were not included in CHH's allocations found it difficult to replace the lost volumes that they had previously purchased from CHH. 943 This appears to have affected competition between merchants in the short term.
- Affected merchants told us that, due to being unable to satisfy structural timber orders in some cases:⁹⁴⁴
 - B61.1 they have lost customers (including for products other than structural timber);
 - B61.2 they have suffered reputational damage; and
 - B61.3 that sales representatives at certain competing merchants capitalised on the opportunity to inform customers that they could guarantee supply when other merchants could not.

940	[]; [].		
941	(27 March 2021 timber-supplies	l), available at: <u>https</u> s-to-mitre-10-bunnin	Carter Holt Harvey cuts timb :://www.nzherald.co.nz/bus gs-itm/P3T6DQ2PBT4JDZ64 cript of consultation confer	siness/housing-carter-hol 1AAF26WIRU4; Residenti	It-harvey-cuts- al building
942	[Carter Holt Har];[]. on on residential building su		,
943 944	[]; []; [].].	

- B62 The extent to which these effects may persist in the long term, now that demand and available supply appear to be returning to a more normal balance, is unclear.
- B63 In our view, it does not appear that CHH gave or intended to give preferential treatment to vertically integrated merchants. While CHH's approach differs from other suppliers that offered pro-rata allocations based on recent purchasing history, CHH appears to have taken a justifiable commercial decision to prioritise its contractual commitments in the face of limited supply.
- B64 However, suppliers of key building supplies should, in times of supply constraint, be mindful that their decisions on the allocation of available supply have the potential to affect competition. In some circumstances, allocation models that have significant non-transitory effects on competition risk breaching Part 2 of the Commerce Act. We consider that, all else held equal, a pro-rata allocation model based on recent purchasing history carries a lower risk than a model that does not include some existing customers.
- We retain the ability to investigate any conduct of this nature if there is reason to believe that it may breach the Commerce Act. We encourage any supplier deploying, or considering deploying, similar allocation models in times of supply shortages to review them for compliance with sections 27 and 36 of the Commerce Act.

Building regulatory system

- In this section we provide an overview of how the New Zealand building regulatory system relates to structural timber, specifically in terms of structural grading and durability requirements.
- We consider whether any aspects of the building regulatory system may facilitate or impede effective competition in the supply of structural timber.
- B68 Our assessment is that:
 - B68.1 there are limited pathways for satisfying the Building Code's explicit durability requirements;
 - B68.2 New Zealand's structural timber durability standards are prescriptive and unique;
 - B68.3 the structural grading system appears to be mostly performance based; and
 - B68.4 overall, the regulatory system provides some protection to incumbents from innovation and import competition.
- B69 The remainder of the section discusses each of the above findings in detail.

There are limited pathways for satisfying the Building Code's explicit durability requirements

- B70 In this subsection, we outline how Clause B2 of the Building Code and its accompanying Acceptable Solution, B2/AS1, interact to effectively require that structural timber complies with the standards NZS 3602:2003 and NZS 3640:2003.
- B71 Clause B2 (Durability) of the Building Code specifies the durability requirements of building elements.
- B72 B2/AS1 is the only Acceptable Solution associated with Clause B2 of the Building Code. Clause 3.2 of B2/AS1, refers to the standard NZS 3602:2003 Timber and Wood-based Product for use in Building.
- B73 NZS 3602:2003 in turn specifies a range of different treatment standards specified in further standards, depending on the intended use and species of the timber. We provide a more detailed explanation of this standard in the following subsection.
- B74 Included in B2/AS1, alongside this reference to NZS 3602:2003, is the following "comment" text (emphasis added):

The use of different timbers or timber treatments to those referred to in NZS 3602 are outside the scope of this Acceptable Solution. Where the use of a different timber or timber treatment is proposed, it shall be separately assessed for compliance with the Building Code. For example, if imported hard-wood is to be used to surface a deck, evidence that the timber was durable for a minimum of 15 years in the expected exposure conditions is required.

- As such, where an unspecified species of timber is intended to be used, or the intended use of the timber is not expressly contemplated by B2/AS1, the architect will need to demonstrate compliance with the clause in the Building Code itself.
- B76 Clause 3.2 of B2/AS1 also refers to NZS 3640:2003 Chemical preservation of round and sawn timber. NZS 3640:2003 prescribes the requirements for the preservative treatment and identification of timber to provide protection from decay and insect attack.
- B77 NZS 3640:2003 specifies different treatment classes for timber according to the species and intended use of the product. The classes range from H1 to H6.
- B78 Classes H1.1 and H1.2 are applied to all species of timber and required in accordance with the specifications in *NZS 3602:2003*. Classes H2, H3.1, H3.2, H4, H5 and H6 apply only to Pinus species of timber.
- B79 At C1.12 of *NZS 3640:2003* it states (emphasis added):

While it may be possible to treat other species using the provisions of this Standard, such treatments are outside of the scope of this Standard and the adequacy of the resulting treatments will need to be demonstrated.

B80 As previously outlined, the performance-based Code does not specify requirements in detail. For example, B2 provides:

PERFORMANCE B2.3.1

Building elements must, with only normal maintenance, continue to satisfy the performance requirements of this code for the lesser of the specified intended life of the building, if stated, or:

- (a) The life of the building, being not less than 50 years, if:
 - (i) Those building elements (including floors, walls, and fixings) provide structural stability to the building, or
 - (ii) Those building elements are difficult to access or replace, or
 - (iii) Failure of those building elements to comply with the building code would go undetected during both normal use and maintenance of the building.

(b) 15 years if:

- (i) Those building elements (including the building envelope, exposed plumbing in the subfloor space, and in-built chimneys and flues) are moderately difficult to access or replace, or
- (ii) Failure of those building elements to comply with the building code would go undetected during normal use of the building, but would be easily detected during normal maintenance.

I 5 years if:

- (i) The building elements (including services, linings, renewable protective coatings, and fixtures) are easy to access and replace, and
- (ii) Failure of those building elements to comply with the building code would be easily detected during normal use of the building.
- B81 Structural timber would naturally be subject to the 50-year durability requirement, given its structural application in buildings. While it may be possible to achieve this level of performance outside of the established standards framework, demonstrating it is likely to entail a high evidential burden and there is limited guidance on how to do so. 945
- Moreover, we understand this type of explicit durability requirement is unique to New Zealand. In other jurisdictions, similar requirements are typically implicit and do not require direct evidence to demonstrate a certain period of durability. Consequently, the required body of evidence is unlikely to exist even for types of structural timber that are commonly used overseas.

^{945 [];} John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [56]-[59].

- In our view, an importer looking to ensure their untreated or differently treated (and/or alternative species) structural timber product complies with these requirements, as determined at the discretion of an individual BCA, is unlikely to find this an easy task.
- B84 Therefore, while this alternative compliance pathway is technically possible, the remainder of this section assumes that structural timber must comply with the standard *NZS 3602:2003* in order to be used in New Zealand.

New Zealand's structural timber durability standards are prescriptive and unique

- B85 The standard *NZS 3602:2003* outlines requirements that wood-based building components (including structural framing components) must adhere to, in order to be considered durable for 50 years.
- B86 For this case study, we focus on the structural framing components. These are essentially certain uses or applications of structural timber in a framing context. For example:
 - 1E.2) All midfloor framing excluding boundary joists but including associated ceiling framing
- B87 The standard includes a table that groups building components by their respective level of exposure to the elements (weather conditions, moisture, and the ground). Most structural framing components fall within two exposure categories:
 - D) Members protected from the weather but with a risk of moisture penetration conducive to decay
 - E) Members not exposed to weather or ground atmosphere
- B88 For each exposure category and structural framing component, the table sets out:
 - B88.1 the species or type of timber that can be used;
 - B88.2 the grade of timber that can be used (generally includes all structural grades);
 - B88.3 the maximum moisture content of the timber (generally either 18% or 20%); and
 - B88.4 the level of chemical preservative treatment required, with reference to the hazard classes defined in the standard *NZS 3640:2003 Chemical preservation of round and sawn timber* (which also details the specific chemical preservation process for each hazard class).

- B89 There is some variation in the species specified for each structural framing component in NZS 3602:2003:
 - B89.1 Radiata Pine is specified for all structural framing components, and Douglas Fir is specified for most. For some, Larch and Cypress species are also specified. 946
 - B89.2 LVL is specified for some components. We understand this is one of the main reasons LVL framing can be easily used in place of many structural timber components.
- B90 Significantly, the standard does not include a catch-all option, which means there are inevitably some exclusions. For example, the standard does not specify Spruce, Birch, or other Pine species (all of which we understand are used for structural framing overseas). 947, 948 And, aside from LVL, it does not specify any other form of engineered timber (eg, glulam) for structural framing components.
- Where Radiata Pine is specified in the standard for structural framing components, it is almost always required to be chemically treated to hazard class H1.2 or higher. H1.2 indicates moderate risk of dampness or water and is usually achieved with a boron-based preservative compound, as set out in NZS 3640:2003.
- Other species of timber are also generally required to be treated to at least hazard class H1.2, although there are limited exceptions in the standard for some species (including Douglas Fir) to be used untreated in certain applications due to their natural durability.⁹⁵⁰
- B93 These treatment requirements appear to be unique to New Zealand, in terms of both the form of treatment required and the strictness of the standard. It has been suggested that this may be due to New Zealand's particular climate, earthquake risk, and risk of leaky homes. 951

The structural grading system appears to be mostly performance based

B94 Clause B1 (Structure) of the Building Code, and its accompanying Acceptable Solution B1/AS1, specify the structural performance requirements of building elements.

946	Cypress species include the macrocarpa, Mexicar	n cypress, and Lawson's	cypress. They are treated
	collectively throughout the standard.		
947	[].		
948	Brooks Post and Beam "Technical info – What Sp	ecies of Wood to Use in	a Timber frame?"
	https://www.brookspostandbeam.com/timber-fi	rame-blog/2018/9/11/w	hat-species-of-wood-to-use-in-
	<u>a-timberframe</u> .		
949	In some cases, H1.1 is specified for Radiata Pine.	However, we understan	d that no H1.1 treated timber
	is currently produced in New Zealand, so in pract	ice H1.2 timber is alway	s used when H1.1 is specified,
	Weathertight "Timber Treatment" https://www.	weathertight.org.nz/nev	v-buildings/timber-treatment/.
950	Weathertight "Timber Treatment" https://www.	weathertight.org.nz/nev	v-buildings/timber-treatment/.
951	[]; []; [];
	[]; [].

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- In respect of timber, B1/AS1 refers to the standards NZS 3603:1993 Timber Structures, NZS 3622:2004 Verification of Timber Properties, and the joint Australia/New Zealand standard AS/NZS 1748.2:2011 Timber Solid Stress-graded for structural purposes Qualification of grading method.
- B96 Together, these standards interact to set out the structural grading and verification requirements for New Zealand structural timber: 952
 - B96.1 All structural timber must be stress-graded to determine its strength and stiffness, with statistical samples selected for further physical verification. The whole process must be independently audited.
 - B96.2 Structural timber is assigned a grade of either SG6, SG8, or SG10. A higher grade indicates stronger and stiffer timber, so timber with fewer defects (eg, knots, pith, wane) is more likely to receive a higher structural grade. 953 Different grades are suitable for different applications; we understand SG8 is the grade most often required for structural framing applications.
- B97 The standard *NZS 3604:2011 Timber-framed buildings* also outlines that engineered timber products can be directly substituted for structurally graded timber provided:
 - B97.1 they are the same size and their structural properties have been verified using the same process; and
 - B97.2 they are either LVL or glulam, and they were manufactured using either Radiata Pine or Douglas Fir.
- B98 To our understanding, this definition covers all engineered timber framing products currently likely to be used in New Zealand. However, it may still exclude imported products (which may be manufactured from different species), and future innovations (eg, cross-laminated timber framing).
- B99 Overall, feedback from market participants suggests the performance-based nature of the structural grading system creates a level playing field for structural timber suppliers and facilitates substitution between structural timber brands.⁹⁵⁴

Andrew King "What's behind timber strength and stiffness?" (1 February 2003)
https://www.buildmagazine.org.nz/index.php/articles/show/whats-behind-timber-strength-and-stiffness.

Building Performance "Technical information inspectors should know"

https://www.building.govt.nz/building-code-compliance/b-stability/b1-structure/non-structural-timber-issues/technical-information-builder-inspectors-should-know/.

^{954 [];} John Gardiner "Practical issues with the building regulatory system for suppliers of building products – An assessment" (3 August 2022) at [97].

B100 However, one structural timber distributor advised that this performance-based system still creates some avoidable barriers to entry. For example, a lack of alignment with international structural grading systems means timber that had been structurally graded overseas (even in Australia) and imported into New Zealand would need to be restamped and recertified at the importer's expense. 955

Overall, the regulatory systems may protect incumbents from innovation and import competition

- B101 The building regulatory system is restrictive in terms of the allowable characteristics of structural timber in New Zealand. We understand that it is also relatively unique in aspects such as the chemical treatment requirements and the explicit 50-year durability requirement.
- B102 We do not have a view on whether this restrictiveness and uniqueness is necessary from a technical perspective. We note it is important that New Zealanders can have confidence in the durability and structural performance of their homes and that certain attributes may differentiate New Zealand from other jurisdictions.
- B103 We consider that these aspects of the regulatory system favour the status quo and may protect incumbent structural timber suppliers from some competition from imports.
- B104 Overseas structural timber is unlikely to comply with the species and treatment requirements set out in the durability standards. Therefore, any prospective importer of structural timber is likely to face significant regulatory compliance barriers. 956 This is likely to come in one of two forms:
 - B104.1 An importer of a specified, but untreated, species of structural timber may be able to establish standalone treatment facilities to bring the timber in line with Acceptable Solution B2/AS1. We understand this is possible but would require a sizeable capital investment.⁹⁵⁷
 - B104.2 An importer of an unspecified species of structural timber would have to pursue an alternate compliance pathway to convince BCAs that the durability requirements are satisfied. This may involve CodeMark certification or BRANZ appraisal, both of which we understand are difficult, lengthy, and expensive to obtain. 958

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957 []; [].

Frame & Truss Manufacturers Association of New Zealand "Submission on residential building supplies market study preliminary issues paper" (4 February 2022) at 4.

⁹⁵⁸ Fletcher Building "Submission on regulatory barriers to entry or expansion" (13 May 2022) at [3].

- B105 It is unclear whether importing structural timber would be viable even in the absence of these durability standards (we discuss this further from paragraph B159 below). It may also be possible to overcome the barriers discussed above. However, if prospective import competition was to materialise, we consider these regulatory barriers are likely to preclude entry in the short term.
- B106 Suppliers of innovative substitute products, for example, engineered timber framing, are also likely to face regulatory obstacles:
 - B106.1 As LVL is the only type of engineered timber specified for use in structural framing components, suppliers of any other form of engineered timber framing would have to pursue a similar alternative compliance pathway to that described in paragraph B104.2.
 - B106.2 This appears to create barriers to market given the reliance on standards. 959
- B107 The growing usage of engineered timber framing and continuing innovation in the wider engineered timber space provides an excellent opportunity for new suppliers to disrupt the structural timber market. However, we consider that these regulatory obstacles for new engineered timber products are likely to provide incumbents some protection from this disruption.
- B108 Moreover, the consensus-based nature of the standards process can provide opportunity for incumbents to frustrate the development or review of NZ Standards. 960

How structural timber is specified and purchased

- B109 In this section we consider the way in which structural timber is specified and purchased and the factors that influence those decisions, including the scope for product differentiation between suppliers and brands.
- B110 Our assessment is that:
 - B110.1 there is little differentiation between structural timber suppliers and brands; and
 - B110.2 structural timber is usually specified based on generic performance characteristics.
- B111 The remainder of the section discusses each of the above findings in detail.

John Gardiner "Practical issues with the building regulatory system for suppliers of building products –
An assessment" (3 August 2022) at [49]-[51] and [63]; [];

There is little differentiation between structural timber suppliers and brands

- B112 Structural timber is generally viewed as a commodity product. It fulfils a specific functionality in construction with limited scope for additional attributes or features. It also undergoes a relatively uniform manufacturing process that is designed to produce a consistent product.
- B113 Consequently, there is little difference between the structural timber products produced by different suppliers, who generally face a common market price. 961
 - B113.1 As noted previously, individual structural timber products can vary in terms of structural grade, species, chemical treatment, moisture content, and sizing. However, these are all relatively generic attributes that can be produced by any structural timber supplier.
 - B113.2 For example, structural grade is a performance-based metric that can be achieved by any supplier that follows the grading process. As another example, we are not aware of any structural timber suppliers that market a proprietary chemical treatment process.
- B114 Further, most structural timber suppliers only offer one brand. For example, CHH Woodproducts sells all of its structural timber under the Laserframe brand, which comes in SG8 and SG10 (with further variation in terms of sizing and chemical treatment). 962, 963

Structural timber is usually specified based on generic performance characteristics

- B115 Builders, specifiers, and end users are generally indifferent between different suppliers and brands of structural timber. Due to the commodity nature of the product, it is very rare for a certain brand of structural timber to be specified in building plans.⁹⁶⁴
- B116 In our survey of builders and specifiers, we asked how often materials within each of the eight major components of residential buildings were specified by brand.

 Materials in the walls (structural/framing) component (in which structural timber is by far the most common material) were ranked second-least likely to be specified by brand.

⁹⁶¹ []; []; [

⁹⁶⁴ []; [].

Laserframe "Laserframe structural timber" https://chhwoodproducts.co.nz/products/laserframe-structural-timber/.

McAlpines operates under two brands (McAlpines and South Pine), but this relates to the naming of their sawmills rather than separate products produced by a single sawmill.

- B117 Instead, structural timber is usually specified in terms of its structural grade (as well as physical dimensions). 965 As noted above, structural grade is a performance-based metric defined by the standards system and can be achieved by any structural timber supplier, which facilitates substitution between suppliers.
- B118 We note that the structural grading system appears to be specific to sawn timber. It seems engineered timber products cannot be assigned the structural grade SG8, which may limit the ability of engineered timber suppliers to position their products as direct substitutes.
- B119 However, as noted above, the standards system allows for LVL and glulam framing products to be treated equivalently to structurally graded timber. Therefore, if SG8 timber has been specified in plans, any reluctance to substitute it for equivalent engineered timber framing is more likely to come from behavioural bias than technical or regulatory limitations.

Pricing practices and vertical arrangements

- B120 In this section we discuss structural timber pricing, including how prices are set and the nature and prevalence of rebates.
- B121 Our assessment is that:
 - B121.1 variation in the price of structural timber is driven by log prices and variable demand;
 - B121.2 rebates are commonly offered by structural timber suppliers to merchants;
 - B121.3 supplier-to-merchant rebates are not observed to cause competitive harm; and
 - B121.4 structural timber suppliers do not tend to offer exclusivity clauses or end-user rebates.
- B122 The remainder of the section discusses each of the above findings in detail.

Variation in the price of structural timber is driven by log prices and variable demand

B123 Logs are the main input into structural timber. Structural timber suppliers typically purchase logs from third-party forest owners, and we understand the cost of logs accounts for 40-60% of structural timber production costs (with other notable costs including labour and plant maintenance/repairs). 966

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966 [];[

- B124 Log prices are determined quarterly according to export parity pricing. Structural timber suppliers are price takers as export log volumes significantly exceed the volume purchased for use in structural timber sawmills, though we understand the vast majority of exported logs would not be suitable for structural timber production.⁹⁶⁷
- B125 We have received mixed feedback about the extent to which structural timber suppliers have passed on cost increases. One supplier told us its structural timber pricing has been largely synchronous with log prices over the last decade, while others have told us they have absorbed significant increases in log costs. In any case there seems to be a consensus that both structural timber prices and log prices have trended upward during this period. 968
- B126 Demand for residential housing construction, which is variable, is another major driver of structural timber prices.
- B127 Times of high demand provide the main opportunity for structural timber suppliers to raise prices, as we would expect in an industry with high fixed costs. While suppliers can to some extent prioritise structural timber production and operate sawmills at increased (or full) capacity, this capacity is ultimately fixed in the short term because any upgrades are too costly and time-consuming to respond to temporary peaks in demand. Distributors (and, by extension, builders) can therefore be willing to pay significantly more to secure supply. This has been the case during the recent shortage, and we understand that sawmill profitability has recently been strong as a result. 969
- B128 When demand is low, there is surplus capacity in the market and structural timber suppliers face lower market prices. Responses can include reducing sawmill production, pivoting to other timber products, or selling into export markets. We have heard that, on balance, the market spends more time in this part of the cycle, creating risks for sawmill profitability.⁹⁷⁰

Rebates are commonly offered by structural timber suppliers to merchants

B129 Rebates can provide more surety to suppliers about sales volumes by encouraging merchants to concentrate their purchases in a single source of supply. They allow suppliers to pass along the efficiencies achieved by supplying a significant volume to a single merchant customer, or otherwise reward merchants for mutually beneficial behaviour (eg, opening a new store).

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- B130 However, rebates can limit merchants' incentives to promote competitive tension between multiple suppliers. They can create strategic barriers to entry and expansion of other suppliers by 'locking up' the demand of major merchant customers.

 Nevertheless, some merchants may use rebates from structural timber suppliers to create competitive tension between suppliers.⁹⁷²
- B131 We have observed share of wallet and tiered retroactive structures in rebate arrangements between structural timber suppliers and distributors. However, we understand that some customers do not receive rebates from structural timber suppliers. Tiered retroactive rebates appear to be the most common type of rebate arrangement between structural timber suppliers and distributors. These arrangements typically include at least three volume tiers, where a higher rebate percentage is applied to purchases when the distributor reaches a higher volume tier. These
- B132 Another supplier told us that it offers a mix of tiered volume rebates and share of wallet rebates. 976 Share of wallet rebates are schemes that link rebate tiers to a certain percentage of the distributor's total structural timber purchases (rather than a specific volume).
- B133 This supplier advised us that share of wallet rebates assist in providing certainty around sales volumes, and that they usually include a condition that the supplier's pricing will remain competitive with the market.⁹⁷⁷

Supplier-to-merchant rebates are not observed to cause competitive harm

- B134 It does not appear that rebates are causing merchants to purchase from a single structural timber supplier, or to only purchase from large suppliers. No suppliers advised us that they were struggling to access merchant channels because of rebates or for any other reason.
- B135 Our analysis of merchant data shows that the major merchants tend to split their structural timber purchases between multiple suppliers. Except for Carters, no merchant purchased more than between 60-70% of their structural timber from a single supplier in any year between FY17 and FY21.⁹⁷⁸

- B136 Further, we have been told by merchants that they prefer to use multiple structural timber suppliers, including smaller regional ones, to maximise efficiency and minimise the risk of supply interruptions. They also said that structural timber supply agreements are often negotiated at a store-by-store level, and different stores may choose to use different suppliers for reasons such as geographic proximity. 979
- B137 As noted in the previous section, structural timber rebates tend to be driven by the major merchants and it appears other customers do not typically receive rebates. This means a supplier looking to enter or expand in the structural timber market should have access to a reasonably wide pool of non-rebated customers, including specialist timber merchants and independent F&T manufacturers.
- B138 One supplier also told us that, although rebates may lock in customers to an extent, the variable nature of the structural timber market creates opportunities to revise rebate agreements and gain sales to rebated customers. 980
- B139 Overall, we have not observed supplier-to-merchant rebates causing competitive harm in the structural timber market.
- B140 Chapter 8 includes a more detailed discussion of different types of rebates and their effect on competition.

Structural timber suppliers do not tend to offer exclusivity clauses or end-user rebates

B141 Based on our analysis, exclusivity clauses and rebate agreements do not appear to be common between suppliers and builders. 981

Innovation and building for climate change

- B142 In this section we discuss how the structural timber market is impacted by innovation and the shift towards green products and building for climate change.
- B143 Our assessment is that:
 - B143.1 engineered timber and panellisation are potential innovative disruptors;
 - B143.2 structural timber naturally has low-embodied carbon but there are questions around its end-of-life impact; and
 - B143.3 building for climate change may have other indirect flow-on effects for structural timber.
- B144 The remainder of the section discusses each of the above findings in detail.

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Engineered timber and panellisation are potential innovative disruptors

- B145 We understand structural timber suppliers continue to invest in improving the productivity and efficiency of sawmills, for instance, through automation technology. 982
- B146 However, it appears that innovation in the wider structural framing space is largely centred around engineered timber and panellisation.
- B147 Engineered timber is generally seen as a premium product that offers quality and sustainability advantages over sawn timber. We understand it can also use logs more efficiently, including sections of the log that would not normally be used for structural timber, thereby reducing waste. It is increasingly used as framing in residential construction and we expect its emergence to exert competitive constraint on structural timber suppliers and drive further innovation. 983
- Panellisation is a form of OSM that is becoming increasingly common in the structural framing space. Usage of panel systems as framing in residential builds has grown from 3% in 2013 to 9% in 2020. 984 These systems for example, structural insulated panels (SIPs) can combine multiple building components including framing, insulation, and wall lining, and often offer sustainability and operational efficiency benefits (eg, by improving the airtightness of buildings). 985
- B149 Producers of panel systems in New Zealand include NZSIP, Formance, Bondor, Metra, and Lockwood. As we understand it, their products do not compete directly with structural timber because substitution between the products is unlikely to occur once building plans have been finalised. Nevertheless, we expect them to exert some level of out-of-market constraint on structural timber as any poor competitive outcomes in the structural timber market are likely to drive increased uptake of panel systems in the long term.
- B150 Chapter 9 includes a more detailed discussion of OSM and its broader implications for the residential construction sector.

Structural timber naturally has low-embodied carbon but there are questions around its end-of-life impact

B151 Timber products have naturally low-embodied carbon due to their significant level of sequestered carbon (ie, carbon absorbed by and stored within the tree), which significantly offsets emissions from the production process.

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982 [ ].
983 [ ]; [ ].
984 Commerce Commission analysis of BRANZ New Dwellings Survey data, [ ].
985 [ ]; [ ].
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- B152 Therefore, structural timber is generally considered to be a sustainable building material, especially when compared to other structural framing options like steel or concrete framing which feature high-energy production processes and no sequestration. 987
- B153 However, timber typically re-releases this sequestered carbon at the end of its life, which calls into question its sustainability benefits. There is ongoing debate about how much weight to place on end-of-life emissions when evaluating and comparing the sustainability of building supplies.⁹⁸⁸
- B154 It may be possible to mitigate these end-of-life emissions by reusing timber components or recycling them into new materials, or through emissions-reducing technology such as BECCS (bioenergy with carbon capture and storage). Figure B3 below illustrates this effect.

Cumulative embodied carbon Timber (used wastefully) Timber used wastefully has a higher initial and long-term impact under a typical end-of-life scenario Typical steel/concrete Timber (used efficiently) Timber used efficiently has a lower embodied carbon throughout the lifecycle Carbon capture could reduce the impact of a wasteful timber design, but only in the long-term Time Construction Timber (BECCS) End of sequestration End of life

Figure B3 Lifetime embodied carbon impact of timber vs. steel/concrete

Source: Timber and carbon sequestration (Will Hawkins, Jan 2021). 989

The structural engineer "Timber and carbon sequestration" (January 2021), available at: https://www.istructe.org/lStructE/media/Public/TSE-Archive/2021/Timber-and-carbon-sequestration.pdf.

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The structural engineer "Timber and carbon sequestration" (January 2021), available at: https://www.istructe.org/IStructE/media/Public/TSE-Archive/2021/Timber-and-carbon-sequestration.pdf.

B155 We have heard that New Zealand's chemical treatment requirements might make it especially difficult to use structural timber efficiently at the end of its life cycle. According to one stakeholder, treated timber is difficult to reuse, recycle, or safely burn as fuel. However, they also indicated that Golden Bay Cement has developed a system to efficiently use waste treated timber for fuel in cement manufacturing, and that others may be able to find similar applications. 990

Building for climate change may have other indirect flow-on effects for structural timber

- B156 As building techniques continue to evolve and respond to sustainability needs, structural timber is likely to be indirectly impacted in other ways due to its essential role in residential buildings.
- B157 For example, one of the key aspects of MBIE's Building for Climate Change (BfCC) programme is Transforming Operational Efficiency, which includes reducing the amount of energy required to heat and cool a house through better insulation and ventilation.991
- B158 We understand that the typical sizing of structural timber framing (90mm width by 45mm height) may not always allow a sufficient cavity to house the amount of insulation required by this programme (in line with international best practice). 992 Therefore, changes to the standard approach to insulating within a timber frame, or the sizing of timber frames (for example, to 140mm by 45mm) may be necessary to meet the requirements of this programme, or potentially even sooner through annual Building Code updates.

Conditions of entry and expansion

- In this section we discuss other potential impediments to entry and expansion in the structural timber market.
- B160 Our assessment is that:
 - B160.1 building and operating sawmills requires significant sunk costs and there are scale economies in producing structural timber;
 - B160.2 log prices and availability create significant risks for the profitability of sawmills; and
 - B160.3 importing structural timber is unlikely to be viable.

990 EnviroNZ "6 simple ways to deal sustainably with construction and building waste" Stuff (15 July 2022) https://www.stuff.co.nz/business/green-business/129234955/6-simple-ways-to-deal-sustainably-withconstruction-and-building-waste; [].

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⁹⁹¹ Ministry of Business, Innovation & Employment "Transforming Operational Efficiency – Building for climate change programme" (August 2020), available at: https://www.mbie.govt.nz/dmsdocument/11793-transforming-operational-efficiency.

B161 The remainder of the section discusses each of the above findings in detail.

Building and operating sawmills requires economies of scale and significant sunk costs

- B162 There are significant sunk costs associated with entering the market as a domestic sawmiller, potentially in the region of \$200-250 million or higher. Costs include building sawmilling, kiln drying/grading, and treatment facilities. We have also heard that the process of obtaining resource and council consents is costly and time-consuming. 993
- B163 Market participants have suggested that some of these costs could be mitigated by purchasing an existing sawmill with the required facilities and consents already in place. For example, Red Stag entered the market by purchasing a sawmill in 2003.⁹⁹⁴
- B164 Economies of scale appear to play a major role in structural timber manufacturing. We understand that ongoing capital investment in sawmill capacity increases and productivity improvements are requirements to achieve and maintain economies of scale. 995
 - B164.1 It appears that large sawmills benefit significantly from the economies of scale that they have been able to achieve and can use their high volumes to justify continued investment in capacity, whereas smaller mills can struggle to match this.
 - B164.2 Other sawmills can struggle to sustain this level of investment. We understand that some medium-sized sawmills have been able to afford incremental productivity improvements in recent years, while smaller ones are only able to keep pace with maintenance and regulatory requirements (eg, WorkSafe).
- Overall, the structural timber market has been trending towards consolidation at the supplier level. There have been many sawmill closures since 2008 (including the closure of CHH Woodproducts' large Whangārei mill in 2020), with very few entries in the same period. We understand that the importance of economies of scale and the need for ongoing capital investment is a major driver of this trend. These factors may ultimately represent barriers to entry by new sawmillers and expansion by existing small sawmillers.

993	[[]; [];[];
994	Red Stag "Overview" https:	://www.redstagtimber.co.nz/a]; [bout-us/overview/;];
995	[J.];[];[];
996	[Denise Piper "Coronavirus _,]; Carter Holt Harvey Whangāre	i mill closure 'couldn't be w	orse' for industry"

(Feb 10, 2020) Stuff https://www.stuff.co.nz/business/119392473/coronavirus-carter-holt-harvey-

whangrei-mill-closure-couldnt-be-worse-for-industry.

Log prices and availability create significant risks for the profitability of sawmills

- B166 As noted previously, logs are a critical input into structural timber. Domestic sawmills compete with a range of other timber manufacturers for log supply, including overseas purchasers who account for the majority of demand.⁹⁹⁷
- B167 For this reason, log prices are determined quarterly according to export parity pricing. Structural timber suppliers are essentially price takers and in some cases can be forced to absorb significant log price increases when structural timber demand does not support a corresponding price increase. This effect is especially pronounced for smaller sawmills that may be unable to offset input price increases with other scale efficiencies. This has a detrimental effect on the competitiveness of smaller sawmillers.
- B168 We understand that logs are treated as a commodity product despite having differentiating attributes such as structural yield (ie, the proportion of the log that is suitable for structural timber production). Therefore, even though most 'structural grade' logs are currently retained in New Zealand and used for structural timber production, they would be exported if domestic sawmills were not willing to match this parity pricing.
- B169 Moreover, sawmills can sometimes struggle to obtain log supply at all. We understand fluctuations in international log demand can create volatility in the domestic log market which has flow-on effects for ability of domestic sawmills (especially smaller ones) to secure consistent supply of structural grade logs. 998

Importing structural timber is unlikely to be viable

- B170 As we discussed in Chapter 4, New Zealand's unique and prescriptive building regulatory system may limit or preclude the possibility of importing structural timber. However, there are other market features that may also present barriers to import competition.
- B171 Some market participants have considered importing structural timber but found it too risky due to transport costs and the volatility of international timber prices and exchange rates. We have also heard that overseas structural timber is often lower quality and can feature high levels of wane, twist, and crook that would not be accepted in the New Zealand market.⁹⁹⁹

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- B172 We also understand that the recent acute structural timber shortage is a global phenomenon, with countries like Australia and the United States facing even more significant shortages. New Zealand has relatively limited buying power and is unlikely to outcompete these countries for any surplus capacity available in the global market. This may preclude the possibility of any short-term 'top up' imports during times of shortage. 1000
- B173 One supplier also suggested that allowing "a temporary flood of cheap international timber" to resolve a domestic shortage may have adverse effects for domestic sawmills and leave New Zealand over-exposed to the international market. 1001
- B174 We note that at least one supplier, Timberlink, is known to import structural timber from Australia, although this may be a special case as they formerly operated a sawmill in Blenheim which closed in December 2020. 1002, 1003
- B175 Overall, it is difficult to assess the viability of importing structural timber. We consider that importing structural timber is unlikely to be viable due to regulatory barriers. Even without these barriers, the evidence suggests that viability would remain doubtful.

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Maia Hart "Blenheim sawmill with 75 staff to close by end of the year" (Sep 8, 2020) Stuff

https://www.stuff.co.nz/business/122704945/blenheim-sawmill-with-75-staff-to-close-by-end-of-theyear.

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Attachment C Concrete and cement case study

- C1 This attachment discusses the findings in relation to our cement and ready-mix concrete (RMX) case study. In addition to understanding how competition in the supply of cement and RMX is functioning, the case study aims to illustrate the extent to which some or all of the factors affecting competition identified in our report impact the supply of cement and/or RMX.
- C2 In this attachment we may refer to markets for cement and/or RMX. However, we have not conducted formal market definition analysis for this case study. Instead, our definition reflects our approach to defining key building supplies in line with the scope and objectives of this market study.
- C3 We have drawn on a range of evidence and research to support the findings of this case study. For example, we have:
 - C3.1 spoken with three major suppliers of cement and/or RMX;
 - C3.2 reviewed numerous written responses and internal documents provided by cement and RMX suppliers;
 - c3.3 reviewed relevant survey responses and written submissions from a range of industry participants and stakeholders, such as Concrete NZ;
 - C3.4 reviewed publicly available and firm-level data on the production and prices of cement and RMX in New Zealand; and
 - C3.5 met with regulatory and standards bodies and reviewed the relevant regulations.
- C4 This attachment sets out:
 - C4.1 a summary of our findings;
 - C4.2 an overview of how cement and RMX are used in residential construction;
 - C4.3 the industry structure and participants;
 - C4.4 the building regulatory system;
 - C4.5 how and why customers select cement and RMX products;
 - C4.6 pricing practices and vertical arrangements;
 - C4.7 innovation in cement and RMX, and building for climate change; and
 - C4.8 the conditions for entry and expansion.

Our findings on cement and ready-mix concrete

Our assessment is that there appears to be a reasonable level of competition occurring for both materials, particularly at the RMX level. However, there are elements of markets for both materials which may be causing competition to not work as well as it could be.

Competition for cement appears to be working reasonably well

- Our assessment is that competition to supply cement is working reasonably well. This is supported by our findings, including that:
 - C6.1 a new cement supplier entered the market in 2012 (HR Cement), and now supplies between 5% and 10% of the market; 1004
 - C6.2 price competition appears to be strong, driven by this new entrant, and a large player improving increasing its capacity;
 - C6.3 firms are responding to customer demand by innovating to introduce lowembodied carbon products to the New Zealand market; and
 - C6.4 customers of cement suppliers appear to be generally satisfied with the level of service and quality of product they receive.
- C7 This level of competition appears to be underpinned by factors including:
 - C7.1 bulk cement products are somewhat homogeneous, enabling substitution;
 - C7.2 NZ Standards for cement have performance-based measures that are consistent with some other jurisdictions, enabling some imported cement to be used in New Zealand;
 - C7.3 the use of incentives such as retroactive tiered rebates being uncommon for cement, relative to other residential construction materials; and
 - C7.4 customers having a degree of countervailing power through price competitiveness clauses and medium-to-low barriers to switching suppliers.

However, there may be some features affecting competition for cement, or downstream at the ready-mix concrete level

C8 While there is evidence of competition between suppliers, we have observed some features which may be reducing the effectiveness of this competition or may be having downstream effects.

Market shares are provided as a range, due to confidentiality.

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- C9 The cement market is highly concentrated. Two large players supply between 75% and 95% of the bulk cement market. This, along with other factors, may make the sector vulnerable to accommodating conduct. However, this concentration declined somewhat between 2012 and 2020, largely attributable to the growth of HR Cement. Cement.
- While retroactive tiered rebates are uncommon, exclusive (or minimum volume) supply agreements are prevalent. These appear to be driven by mutual benefits, such as supply chain efficiency and resilience. However, they may also have the effect of raising switching costs for customers.
- Additionally, benefits from economies of scale in the cement market may act as a barrier to entry, particularly for domestic manufacturers. This is due to the capital required, but also a need to secure dependable sales to downstream RMX producers to maintain scale. These efficiencies have resulted in a high degree of vertical integration by cement manufacturers in the New Zealand sector. Vertical integration may benefit customers where these benefits are passed on. However, this may also be a barrier to cement firms seeking to enter or expand.
- C12 The New Zealand Emissions Trading Scheme (ETS) does not currently appear to be distorting competition. However, carbon-reduction policies, such as the ETS, do have the potential to do so.
- C13 Additionally, this drive to secure downstream sales has the potential to influence competition in RMX markets. For example, vertical integration may drive concentration of RMX producers, or suppliers may seek to enter exclusive contracts.

Competition for supply of ready-mix concrete also appears to be working reasonably well

- Our assessment is that competition to supply RMX appears to be working reasonably well. Our findings include:
 - C14.1 the threat of losing customers and/or market share constrains larger firms' ability to impose price increases;
 - C14.2 customers appear to have the ability to switch between suppliers, and often do;
 - C14.3 many RMX producers have entered the market in recent years;
 - C14.4 these producers appear to provide a competitive restraint at a local level; and

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C14.5 firms are innovating to develop low-carbon products to win customers.

Market shares are provided as a range, due to confidentiality.

1006 Commerce Commission analysis of market participant and publicly available data, [

- This level of competition between RMX suppliers appears to be underpinned by factors including:
 - C15.1 performance-based New Zealand standards enable low barriers to product switching, and enable innovation;
 - C15.2 although there is some brand preference, RMX is not usually specified by brand in building plans;
 - C15.3 there are numerous competitors, particularly in densely populated regions such as Auckland, Tauranga and Hamilton;
 - C15.4 the use of exclusive supply contracts is uncommon; and
 - C15.5 the use of incentives such as retroactive tiered rebates are uncommon for RMX.
- C16 However, there are some factors which may inhibit the ability of RMX producers to enter or expand. These appear to be largely structural rather than strategic or regulatory. For example, in some regions such as Auckland, there is a perceived scarcity of suitable sites to build RMX plants.

How cement and ready-mix concrete are used in residential construction

Cement is typically used as an input material

- C17 Cement is a binder substance and is rarely used on its own. It is a key ingredient of concrete products. Cement is produced in two steps:
 - C17.1 First, raw materials (eg, limestone and clay) are crushed, blended, and heated to extremely high temperatures to produce an intermediate product called clinker.
 - C17.2 Next, Clinker is cooled and ground with additives to produce cement.
- Given the heat required, the process for producing clinker is extremely energy intensive. The grinding process is also energy intensive.

This case study focuses on the supply of bulk cement

- C19 Cement can be purchased in bulk, or in bagged units (eg, 20kg or 40kg). However, this case study does not specifically focus on the supply of bagged cement. Rather, it focuses on the supply of bulk cement. This is because:
 - C19.1 most cement in New Zealand is supplied in bulk, rather than in bags; 1007, 1008
 - C19.2 bagged cement appears to largely target DIY, or other small-scale customers, rather than the residential construction sector; and
 - C19.3 bulk cement is a key input into RMX production, for which bagged cement is not a practical substitute. 1009

Most concrete is sold as ready-mix

- C20 This case study focuses primarily on ready-mix concrete (RMX), rather than other concrete products. This is because most of the concrete in New Zealand, measured by volume, is sold as RMX. RMX production is also the key driver of cement demand. 1010
- C21 Additionally, many of the key participants in the RMX market are also large suppliers of other concrete products. This means the findings set out in this attachment regarding RMX may also provide some insight into these other concrete products.
- C22 These other precast concrete products used in the building envelope include:
 - C22.1 concrete walls (often referred to as tilt-slabs or tilt-up concrete); and
 - C22.2 masonry products (eg, concrete bricks and blocks).

Ready-mix concrete uses and substitutability of concrete products

C23 Foundation and flooring are the main uses for RMX in construction of the building envelope. This means precast concrete products appear unlikely to be direct substitutes for RMX, given they are typically used for walling or reinforcing.

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Deloitte (in a 2018 report) stated >80% of wholesale cement supply was bulk cement, Deloitte Access Economics "Cost of residential housing development: A focus on building materials" (December 2018) at 84, available at: https://www2.deloitte.com/content/dam/Deloitte/nz/Documents/Economics/nz-en-DAE-Fletcher-cost-of-residential-housing-development.pdf.

This is consistent with the approach taken by the UK Competition Commission. In a 2014 market investigation it defined bagged cement as a separate product market due to the lack of demand-side substitutability between bulk and bagged cement, CMA "Aggregates, cement and ready-mix concrete market investigation – Final report" (14 January 2014) at [20(b)] of summary, available at: https://assets.publishing.service.gov.uk/media/552ce1d5ed915d15db000001/Aggregates final report.pdf.

1010 [

- C24 Pre-mixed bagged concrete is also sold (eg, a 20kg dry mix of cement, aggregates and additives). Additionally, concrete can also be made by separately purchasing aggregates (often sold bagged as 'builder mix') and cement and mixing with water. While these products may be substitutable for RMX for some uses, the degree of substitutability appears to be low for foundation and flooring uses.
- C25 Substituting other building materials for concrete does not appear to be a material threat to concrete suppliers. For example, one RMX producer considered crosslaminated timber (CLT) to be the most likely substitute for concrete. 1011 However, CLT could, at most, replace a third of the concrete used in a residential building.

How ready-mix concrete is made

- C26 RMX is produced by mixing coarse and fine aggregates (eg, sand and gravel), water, cement and additives (known as admixture). RMX is generally produced in purposebuilt plants, typically capable of producing between 10,000m³ and 100,000m³ per year. These production plants are the key capital cost to producing cement. Energy, concrete trucks, and truck drivers are also key variable cost inputs to RMX, in addition to the raw materials noted above.
- C27 RMX is highly perishable and is typically required to be poured within 90 minutes to remain compliant with the relevant NZ Standard. 1012 However, additives can be used during the production process to extend the life of RMX. Given the added cost, these additives are only used when required.

Industry structure

The cement market is highly concentrated

C28 The bulk cement market consists of three participants. Two firms, Golden Bay Cement (GBC) and Holcim, supply between 75 and 95% of the bulk cement market. Table C1 below provides an overview of cement suppliers in New Zealand.

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1011]. NZS 3104:2021 at [2.10.2.2]; [

Table C1 Overview of cement participants in New Zealand

Supplier	Supply model	Approximate share of supply to RMX market in 2020-21 ¹⁰¹³	Key products	Overview
Golden Bay Cement (GBC)	Fully integrated domestic manufacturer	45-60%	General purpose (GP) cement High early strength (HE) cement Supplementary Cementitious Materials (SCMs) (fly ash and silica fume)	GBC manufactures cement in Whangārei, and has multiple distributions points throughout the country. It is the only domestic manufacturer of cement in New Zealand. Has been operating since 1909, and owned by Fletcher Building since 1988.
Holcim (New Zealand) Limited (Holcim)	Imports cement from Japan	30-45%	GP cement HE cement SCMs (fly ash and micro-silica)	Holcim has import terminals in Auckland and Timaru. It previously manufactured cement in Westport, but switched to import model in 2016. It is part of Holcim Group, one of the world's largest cements.
HR Cement	Imports clinker to grind domestically	5-10%	GP cement	HR Cement grinds imported clinker into cement at one site in Mount Maunganui. It entered the market in mid-2012.
Other importers		0-5%	Various	Other firms, such as Cemix and (until it went into receivership in 2020) Drymix, import cement to sell as bagged cement via merchants. However, in some cases these firms have also supplied bulk cement to RMX manufacturers. We also understand that some RMX producers have in the past self-supplied cement by importing it directly. However, we are not aware of any who currently do this.

Source: Commerce Commission analysis of market participant and public data. 1014

C29 Throughout the past decade, GBC's share of supply to the RMX market has remained consistently between approximately 45% and 60%.

Market shares are provided as ranges based on Commerce Commission analysis of data provided by market participants and publicly available data, [].

Commerce Commission analysis of market participant and publicly available data, [].

356

- C30 HR Cement's share grew between 2012 and 2018, remaining between 5-10% since then. 1015 However, this appears to be due to production capacity constraints; in 2019 the firm signalled its plan to expand its production facilities. 1016
- C31 This concentration is not inhibiting workable competition in the supply of cement. Rather, this concentration appears driven by economies of scale enabling larger firms to operate more efficiently in the cement market. For GBC, these economies of scale are gained in its manufacturing processes. For Holcim, they are gained in its import terminal infrastructure.
- C32 Our view is that this concentration is not inhibiting workable competition in the supply of cement. However, it may make the market vulnerable to accommodating behaviour. We discuss these risks at paragraph C112 below. New Zealand is a comparatively small market, which may limit the number of cement firms which can operate sustainably. However, this does not necessarily mean the sustainable market structure is limited to two or three large players, now or in the future.
- C33 Given that demand for RMX (and therefore cement) is expected to continue to grow in line with population growth, this may increase the viability of a new entrant. Additionally, we have heard HR Cement already acts as an efficient competitor in the upper North Island, indicating economies of scale can be achieved regionally.
- C34 GBC, Holcim and HR Cement all compete directly with each other to supply downstream RMX producers. However, as discussed below, HR Cement is unlikely to be a viable competitor in all regions, as it only has one distribution centre.

There are only two national suppliers of ready-mix concrete

C35 Although there are numerous RMX suppliers in New Zealand, only two operate nationally. These are Firth Concrete and Allied Concrete. Table C2 below provides an overview of the key participants operating in the New Zealand RMX market.

Commerce Commission analysis of market participant and publicly available data, [1016 Concrete NZ "HR Cement's Point of Difference" https://concretenz.org.nz/page/HR Cement.

Table C2 Overview of ready-mix concrete participants in New Zealand

Supplier	Number of plants	Approximate share of RMX supply in 2020-21 ¹⁰¹⁷	Overview
Firth Concrete (Firth)	70+	30-40%	Firth operates nationwide, and is a division of Fletcher Concrete and Infrastructure Limited. It sells a range of RMX products, including a foundation system called RibRaft. It also sells bagged concrete (under the Dricon brand) and precast masonry products.
Allied Concrete (Allied)	50+ (and eight mobile batching plants)	20-30%	Allied operates nationwide. It consists of two entities: 1. Allied Concrete Limited, which operates 10 plants in the South Island, and is owned by the HW Richardson Group (HWR). 2. AML Limited, which operates 40 plants in the North Island, and is a joint venture between Holcim and HWR. 1018 Both entities are operated by HWR, which owns the Allied brand, under the same management structure. Given this, Allied refers to both entities together, unless otherwise noted.
Bridgeman Concrete	6	3-8%	Operates in Waikato, Bay of Plenty, Hawke's Bay and Auckland. Sister company to HR Cement.
Atlas Concrete	7	5-10%	Operates in Auckland region. Holcim has a minority stake in Atlas; however it is independently operated.
Other firms		20-30%	There are more than two dozen local and regional RMX suppliers around the country. Each have between 1-5 plants (and/or operate under plant-share arrangements), and between 0-5% market share each. These include Stevenson Concrete, Christchurch Ready Mix, Tt Concrete, Ocean Concrete, Higgins.

Source: Commerce Commission analysis of market participant and public data. 1019

Market shares are provided as ranges based on Commerce Commission analysis of data provided by market participants and publicly available data, [].

AML Limited also operates Ashby's Ready Mixed in Canterbury.

Commerce Commission analysis of market participant and publicly available data, [].

- C36 However, there are many regional RMX suppliers, particularly in densely populated regions. There are a particularly large number of RMX producers operating within, and between, Auckland, Hamilton, and Tauranga. This is driven by a high level of economic and residential construction activity in these regions. For example:
 - C36.1 53% of national RMX production in 2021 was produced in these regions; ¹⁰²⁰ and
 - C36.2 these regions together account for a large proportion of annual building consents issued nationally. 1021
- C37 We have also heard of many small producers entering the market in recent years. 1022 For example, Concrete NZ estimated 20% of current RMX suppliers have entered in the last 10 years. 1023
- C38 For entry or expansion to be viable, there needs to be a customer base of sufficient size to enable a plant to earn a return which justifies the investment. Given the regional location has little impact on the cost of developing a RMX plant, areas with minimal construction activity are therefore relatively unattractive options for development. 1024
- Given this, there are fewer competitors in less densely populated areas. Our understanding is there are typically fewer RMX competitors in provincial and sparsely populated regions. However, Allied and Firth both operate nationally and there is still typically at least one supplier in each area.
- The minimum efficient scale of an RMX firm appears to be small. We understand many firms enter or expand in the market through plant-share or tolling arrangements. Plant-share arrangements allow firms to "rent" portions of a plant from one another. Tolling arrangements allow firms to purchase RMX in bulk from the plant to then sell to their own customers. Incumbents have told us firms operating under these arrangements price competitively and often win customers from larger players. 1025

Vertical integration is a common feature of the sector

C41 It is common for cement firms to have a level of ownership in RMX firms in New Zealand. However, the reverse is not necessarily true. This type of industry structure is common in cement and RMX markets globally.

Commerce Commission analysis of Statistics NZ ready mixed concrete production statistics, [].

See, for example: Stuff "Golden Triangle dominates property development numbers"

https://www.stuff.co.nz/business/300412874/golden-triangle-dominates-property-development-numbers.

[].

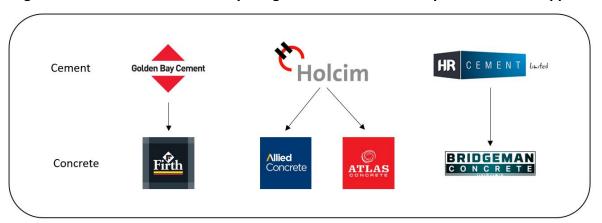
Concrete NZ "Submission on preliminary issues paper" (4 February 2022) at 4.

[].

1024 [].

- C42 We consider it would be challenging to enter the New Zealand cement market without the firm also simultaneously entering, to some degree, in the RMX market. ¹⁰²⁶ This is because, due to the volume required to gain economies of scale in the cement market, dependable RMX customers are a key strategic requirement for cement producers.
- C43 Vertical integration appears to be a common way of ensuring this customer base. However, cement suppliers may also achieve this by competing to provide a consistent service and product to win customers. Additionally, exclusive supply agreements (discussed below) may also provide this surety.
- C44 Figure C1 below provides an overview of the ownership relationship of the key cement and RMX suppliers in New Zealand, exemplifying the degree of vertical integration in the sector.
- C45 However, this ownership structure does not necessarily determine who RMX suppliers purchase their cement from, or who cement suppliers sell their cement to. Firth, Allied Concrete and Atlas Concrete are not exclusive to their respective owner, and they purchase from their upstream competitors where economically practical. Rather, it may be that ownership in these RMX firms act as 'backstops' for cement firms to move volume when they need to do so.

Figure C1 Overview of vertically integrated cement and ready-mix concrete suppliers



Source: Commerce Commission analysis of public data. 1027

- As noted, cement producers achieve this secure volume, in part, by vertically integrating with RMX producers. This has the potential to affect the nature of competition in both cement and RMX markets.
- In the cement market, this may have the effect of reducing the 'contestable' RMX market, limiting the volume any new entrant may be able to compete to supply.

As noted above, Holcim's relationship with Allied and Atlas is via a joint venture and a minority equity stake, respectively, [].

This view is supported by industry participant [].

C48 In the RMX market, it may increase concentration. However, we have not observed this occurring in the past decade. Our conclusion is that vertical integration is not affecting competition in the RMX markets.

Cement and ready-mix concrete are not usually sold via merchants

- C49 Cement, given its nature as an input product, is typically sold in bulk to producers of RMX, or other concrete products (eg, masonry). Bagged cement is sold by some suppliers via merchants. However, bagged cement is typically targeted towards DIY customers, rather than residential builders.
- C50 RMX is typically sold direct-to-trade. Merchants do not physically stock RMX, given its bulky and perishable nature. Although 10% to 20% of RMX volume is sold via merchants, the customer will still often coordinate with the RMX producer directly. We understand this arrangement is to minimise administrative costs for the end customer. 1028

Annual ready-mix concrete production has more than tripled in the past 30 years

- Industry participants note the demand for cement and RMX is cyclical. However, in the C51 medium term it is driven by population growth (which itself is likely to be a key driver of building consents). 1029 Given this, growth of demand for cement and RMX is expected to continue.
- C52 Annual RMX production has more than tripled over the past 30 years. This growth, as shown in Figure C2 below, appears to be correlated with the level of residential construction activity.
- C53 This growth may improve the viability of firms entering or expanding in the cement and RMX markets. Both industries are process-driven and characterised by economies of scale, meaning securing volume improves firms' cost position. This growing demand may provide more confidence to potential entrants that there are sufficient customers to compete for. This may particularly be the case where current suppliers are at capacity, and unable to quickly scale up supply.

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¹⁰²⁸ For example, some customers prefer to be billed for all products through a merchant, rather than managing accounts with multiple suppliers.

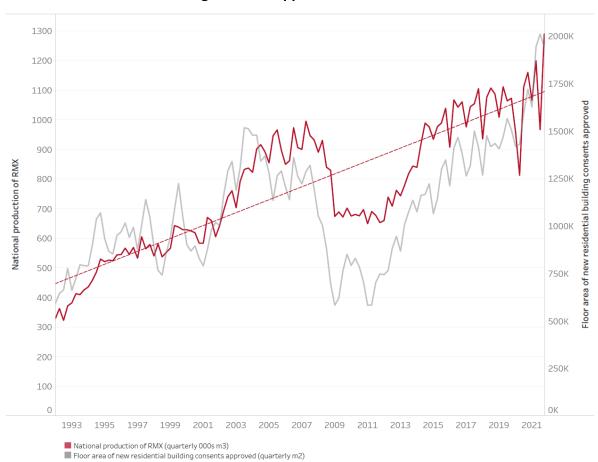


Figure C2 National production of ready-mix concrete and floor area of new residential building consents approved from 1992-2022

Source: Commerce Commission analysis of Statistics NZ data. 1030

The effect of the building regulatory system on competitive dynamics

NZ Standards do not appear to be a barrier to competition or innovation

- C54 Our view is that regulatory requirements for cement and relevant standards do not materially constrain the entry or expansion of cement suppliers.
- C55 We have heard the levels of New Zealand's cement standards are more stringent than many international standard specifications. This means, while the performance measures may be the same, New Zealand's standard may require a higher level of performance. For example, the European Standard for cement allows a soundness measure of up to 10mm. The New Zealand standard allows a measure only up to 5mm. 1032

¹⁰³⁰ [].

Soundness refers to the volume change which occurs as the cement sets and hardens, *EN 197-1:2011*, Table 3.

NZS 3122:2009, Table 1.

- C56 Nevertheless, New Zealand's required performance measures and levels are consistent with some jurisdictions. This means there are some geographically proximate countries where cement meeting the New Zealand standards can be, and is, imported from. For example, Holcim currently imports cement from Japan and HR Cement imports cement and clinker from Thailand. 1034
- C57 This enables cement importers to act as viable competitors against domestic manufacturers. Additionally, it may also have the effect of setting a 'price ceiling' on domestic cement prices. 1035
- C58 Similarly, based on our analysis to date, the building standards requirements for concrete in residential buildings do not appear to be operating as a barrier for those seeking to enter and expand in the market.
- C59 The applicable standards for concrete depend on how the concrete is being used in a residential building. It may be used in a slab format for walls, or it may be used in foundations. The relevant requirements are prescribed by B1 Structure, of the Building Code.
- C60 As outlined above, in order to demonstrate compliance with Clause B1, a residential building can comply with Acceptable Solution B1/AS1.
- C61 B1/AS1 prescribes the design requirements for simple residential buildings. It incorporates a range of relevant standards, and one of these is *NZS 3604:2011 Timber-framed buildings*. Timber-framed buildings are very common in New Zealand.
- C62 NZS 3604:2011 prescribes methods of complying with the Building Code requirements for the structure of residential buildings, including their foundations, framing layout, member sizes, bracing systems, fixings and connectors (when read along with the Acceptable Solution B1/AS1).¹⁰³⁶
- C63 *NZS 3604:2011* specifies the requirements for concrete in residential buildings. This standard, in turn, refers to the following concrete specific standards:
 - C63.1 NZS 3104:2003, which specifies the requirements for RMX production at batching plants, as well as precast concrete. Note, NZS 3102:2022 was published in April this year. At this point in time, both standards remain "current";

¹⁰³³ [];

A large quantity of cement is also imported from Vietnam. World Bank "New Zealand (whether or not coloured) imports by country in 2019", available at:

https://wits.worldbank.org/trade/comtrade/en/country/NZL/year/2019/tradeflow/Imports/partner/ALL/product/252310.

For example, it may prevent cement suppliers from being able to successfully raise prices above what it would cost customers to import cement themselves.

NZS 3604:2011, https://www.standards.govt.nz/shop/nzs-36042011/.

- C63.2 *NZS 3101* parts 1 and 2:2006 (Inc A1, A2 A3), which specifies the requirements for concrete structures;
- C63.3 *NZS 3109:1997*, which specifies the requirements for concrete construction, to meet the requirements of *NZS 3101:2006*;
- C63.4 *NZS 3112.2:1986*, which specifies the methods of testing for concrete tests relating to the determination of strength of concrete; and
- C63.5 *NZS 3101* is compatible with loading standards *AS/NZS 1170* and *NZS 1170.5*. These two standards set up the pathways for Code compliance in relation to loading due to wind actions and earthquakes (respectively).
- C64 NZS 3122:2009 specifies the requirements and methods for testing hydraulic cement consisting of Portland cement, or mixtures of Portland cement and Supplementary Cementitious Materials (SCMs).
- These standards are primarily performance based. Performance-based standards state the characteristics desired by users (eg, strength) without prescribing the specific means to be used when producing the product (eg, the type or amount of cementitious material). 1037
- For example, NZS 3104:2021 sets out the requirements for RMX. To comply with NZS 3104:2021, the producer must prove its RMX achieves the minimum compressive strength requirements, among other things. However, the producer is able to choose how it formulates its RMX. This includes deciding factors such as:
 - C66.1 the proportion and amounts of aggregates used;
 - C66.2 the water/cement ratio and cementitious content; and
 - C66.3 the suitability and quantity of any admixture used. 1039
- C67 Additionally, the standard enables producers to use a range of materials in producing the RMX. For example, a RMX producer may use SCMs such as fly ash or pozzolans, recycled aggregates and/or recycled water, if it wishes. 1040
- Given these standards are not prescriptive as to inputs or method, these standards may enable, or even encourage, innovation. ¹⁰⁴¹ For example, as noted above, RMX producers can use SCMs in their mixes, which lowers the embodied carbon of the concrete. This can enable producers to compete by innovating in the formulation of their products.

NZS 3122:2009 at 12.
 NZS 3104:2021 at [2.4.1.4].
 NZS 3104:2021 at [2.11.1].

¹⁰⁴⁰ N/7C 2104:2021 at [2:11:1

The Emissions Trading Scheme has the potential to distort the competitive dynamics of cement

- C69 Our view is that the ETS does not currently appear to be distorting competition. However, carbon-reduction policies, such as the ETS, have the potential to do so, and any policy changes should have regard to competitive dynamics.
- The ETS puts a price on greenhouse gas emissions. Its purpose is to incentivise businesses producing goods in New Zealand to reduce their emissions. For example, for every tonne of carbon a domestic producer emits, it must surrender an equivalent carbon credit (referred to as New Zealand Units (NZUs)). However, importers are not required to surrender NZUs for emissions from products made outside of New Zealand, and then imported.
- C71 This means, where a product is imported from countries with less stringent emissions schemes than New Zealand's, importers may face lower (or no) carbon-offsetting costs than domestic manufacturers. This could result in importers of cement and clinker being able to offer customers lower prices than domestic manufacturers.
- C72 GBC considered that its requirements under the ETS make it harder for it to compete with suppliers of imported cement. GBC told us the ETS presents domestic manufacturers with two disadvantages relative to cement importers:
 - C72.1 the need to recover compliance costs (through either higher costs or lower margins); and
 - C72.2 a lower return on capital employed, due to having to invest capital in emission reduction activities.
- C73 However, Holcim considered that domestic producers can currently benefit from the ETS scheme. This is because domestic manufacturers currently receive a free allocation of NZUs as it is an Emissions Intensive Trade Exposed (EITE) businesses. ¹⁰⁴³ For GBC, the number of NZUs it receives is set relative to a baseline study of sector emissions conducted prior to 2016. Holcim also received a free allocation of NZUs up until it stopped domestic manufacture in 2016. ¹⁰⁴⁴
- C74 This means, if GBC's carbon emissions are 89% or less of its baseline emissions, it currently faces no net cost under the ETS. If it emits less than this amount, it receives a net benefit as it can sell unused NZUs (or retain them for future use).

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EITE businesses involve production processes that use significant fuel, energy and produce emissions. They usually either export product, or are exposed to competition from imports, Castalia "Emissions Intensive Trade Exposed Businesses' Contribution to New Zealand's Low Emissions Economy" (May 2019), available at: https://www.businessnz.org.nz/ data/assets/pdf file/0003/169194/EITE-Report-Final.pdf.

Environmental Protection Authority, Te Mana Rauhī Taiao "Final industrial allocation decisions since 2010" https://www.epa.govt.nz/industry-areas/emissions-trading-scheme/industrial-allocations/decisions/.

- C75 However, these dynamics will change over the medium term:
 - C75.1 First, GBC's free allocation of NZUs is set to reduce annually over the next 30 years, until it receives zero NZUs. This will slowly increase GBC's cost of compliance with the ETS. This may reduce its competitiveness if imports do not face a commensurate change.
 - C75.2 Secondly, the Ministry for the Environment is currently considering reform of the mechanism for allocating NZUs to EITE businesses. It has signalled this could include a "re-baselining" of these allocations. This would be likely to reduce the number of NZUs GBC is eligible to receive. 1045
- C76 The Emissions Reduction Plan (ERP) has identified the cement sector will be used as a test case for investigating solutions to address emissions leakage, including the possibility of a carbon border adjustment mechanism similar to the European Union. 1046 This may see an increase in the cost of imported cement from countries with weaker climate policies.
- C77 The purpose of the EITE scheme is to ensure domestic producers are not competitively disadvantaged by their obligations under the ETS. 1047 We agree with this policy intent. Our view is that Government should continue to have regard to any potential competitive effects of these reforms, minimising competitive distortions where possible. 1048

How cement and ready-mix concrete are specified and purchased

Customer drivers when selecting a cement supplier

C78 Based on our analysis, product quality seems to be an important consideration for customers when selecting a cement supplier. Overall, customers appear generally satisfied with the level of quality offered by incumbents.

1045 [1046 Ministry for the Environment, Manatū Mō Te Taiao "Aotearoa New Zealand's first emissions reduction plan" (May 2022) at 107, available at: https://environment.govt.nz/assets/publications/Aotearoa-New-<u>Zealands-first-emissions-reduction-plan.pdf</u>. See also, Council of the EU "Council agrees on the Carbon Border Adjustment Mechanism" (March 2022), available at: https://www.consilium.europa.eu/en/press/press-releases/2022/03/15/carbon-border-adjustmentmechanism-cbam-council-agrees-its-negotiating-mandate. 1047 For example, because they compete with overseas suppliers who do not face the same costs, Environmental Protection Authority, Te Mana Rauhī Taiao "Industrial allocations" https://www.epa.govt.nz/industry-areas/emissions-trading-scheme/industrial-allocations/. 1048 This is consistent with the view expressed by the Infrastructure Commission in its 2021 Infrastructure Resources Study report. This report recommended the Government's climate change policies ensure domestically produced cement is not at a competitive disadvantage to imported cement and clinker due to the differences in the way carbon costs are accounted for, Te Waihanga, New Zealand Infrastructure Commission "Infrastructure Resources Study" (11 November 2021) at 12, available at: https://www.tewaihanga.govt.nz/assets/Infrastructure-Resources-Study-11-Nov-21.pdf.

C79 Some customers have also expressed an unwillingness to switch cement suppliers unless they are able to offer a product with a comparable level of embodied carbon. The final section of this attachment explains how firms are responding to this demand.

Competing cement products are substitutable

C80 While there are characteristics which mean customers prefer a certain cement brand, comparable cement products are substitutable. As discussed above, this is in part enabled by New Zealand's cement standards.

However, ready-mix concrete producers prefer to remain with one supplier-per-plant

C81 While cement products are substitutable, RMX producers prefer not to switch frequently. This is driven by a preference to maintain consistency of their RMX 'recipes'; cements may have slightly different properties.

Location is a driver for selecting a cement supplier

- C82 The cost of obtaining cement depends where in the country the customer is located. Regions, such as Southland and the West Coast, which are far away from key distribution points tend to have higher priced cement than other areas.
- C83 This appears to be primarily driven by a higher cost-to-serve, rather than a weak competitive process: cement firms' margins also appear to be lower in these higher priced regions. This indicates that firms are facing competitive pressure to absorb some of these higher costs, rather than passing the full cost on to customers.
- One RMX producer told us it does not see HR Cement as a viable option for supply, as its Mount Maunganui distribution centre is too far away from the Auckland market. Price (due to the higher cost-to-serve) appears to be a key factor for this view.
- C85 However, proximity to cement distribution is also important to RMX producers to ensure consistency of supply. RMX producers often require frequent deliveries of cement, sometimes even multiple deliveries in a day. Ensuring consistency in this supply is crucial, given cement's role in RMX production. We understand managing this consistency becomes significantly more challenging the greater the distance to supply.

Foundation systems are sometimes specified by brand in building consents

In some cases, foundation systems (of which, RMX is a key component) are specified by brand in building consents. This can make it harder for firms to compete for these jobs. This is because it makes switching away from the specified brand less attractive, due to the time and cost of obtaining a variation to the building consent.

1049 [].
1050 [].

- C87 For example, one RMX supplier told us that RibRaft (a trademarked Firth brand of concrete foundation) is sometimes specified in the building consent plans. Additionally, half of respondents to our specifier survey said foundation materials (concrete, timber, and steel joists) are sometimes, or always, specified by brand.
- C88 While specification of building products by brand can make product substitutions hard, this practice appears to be less common for foundations than for other categories of building materials. This issue is discussed further in Chapter 5.

Service and quality are key factor when selecting a ready-mix concrete supplier

C89 We understand the most important factors for RMX customers are that the product arrives on site, in good condition, and that the product is of a consistently high quality. Suppliers resolving issues in an effective and timely matter was also identified as being an important factor.

Price does not appear to be the most important factor for ready-mix concrete customers

- C90 While price is important to RMX customers, it appears to often be secondary to other factors. One RMX supplier said the primary driver for customer selection is the timing and availability of product, rather than the price. Similarly, we understand approximately one third of RMX customers do not consider competitive pricing to be extremely, or very, important. 1054
- C91 Nevertheless, this indicates a material proportion of customers consider price to be a key factor. Competition to win these price-sensitive consumers may also benefit those less price-driven unless RMX firms can offered targeted pricing or discounts.

 Additionally, as discussed below, there appear to be other supply-side constraints that prevent RMX suppliers from raising prices.

Ready-mix concrete markets are highly localised

- C92 Plant location, relative to the work site, is a key driver in the options available to customers selecting a RMX supplier. RMX producers typically service customers within 30km of the nearest production site. 1055
- This is largely driven by the NZ Standard requirement (discussed above) which typically requires RMX to be poured within 90 minutes of manufacture. However, transport and labour costs are also a factor. Serving customers further away incurs these direct costs (some of which may be absorbed by the firm), but also an opportunity cost (ie, trucks and employees are unable to serve other customers while serving long-distance customers).

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1052	Ī];	
	[].	
1053	[].	
1054	[].	
1055	[]. See also:
	[].	

Pricing practices and vertical arrangements

Cement prices have reduced over the past 10 years

- C94 The real price of cement (ie, adjusted for general inflation) in New Zealand has reduced over the past 10 years. This trend appears to have been driven by competitive dynamics. 1056 In particular:
 - C94.1 HR Cement's entry and expansion in the upper North Island; and
 - C94.2 Holcim's switch to an import model, which enabled it to increase its capacity.

Pricing for cement varies significantly throughout regions

- The price paid for cement varies depending on the region. Cement is typically cheaper in high-volume areas (eg, Auckland). Conversely, it is usually more expensive to supply customers in locations more distant from the manufacturing or distribution point, and/or lower volume areas, such as parts of the South Island.¹⁰⁵⁷
- C96 This pricing pattern may be, in part, driven by more intense competition in these high-volume areas. However, significant difference in the cost-to-serve throughout the country also appears to be a key driver of this variation.
- C97 Firms' average sales prices tend to be lower the closer they are to their respective manufacture or import sites. 1058 This indicates firms face competitive pressure to pass through these lower costs to its customers.

This dynamic also has an impact on margins

Generally, firms' margins on cement are lower the further away they are from their manufacture/distribution point. This indicates that, while some of this increased cost-to-serve is passed on to customers in the form of higher prices, firms are also absorbing some of this increased cost by lowering their margins.

The price of ready-mix concrete has increased more slowly than other residential construction costs

C99 Figure C3 below shows the indexed price of RMX has increased significantly more slowly than residential building construction prices more generally. Price trends on their own do not provide any definitive findings about how competition is working. However, this does appear to support our qualitative evidence about the competitive constraint on price increases in the RMX markets.

1056	[];[1.];
1057 1058] [l. 1.	

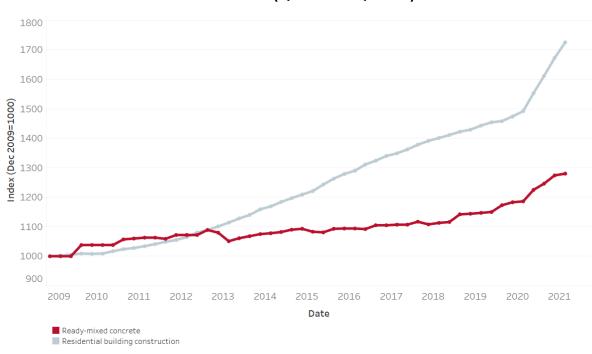


Figure C3 Residential construction price index and ready-mix concrete price index (Q4 2009 to Q1 2022)

Source: Commerce Commission analysis of Statistics New Zealand data. 1059

However, concrete in New Zealand is more expensive than many other countries

- C100 Concrete appears to be more expensive in New Zealand than many other jurisdictions. Suppliers told us this price differential could be driven by higher inputs costs (ie, cement), and higher distribution costs of RMX in New Zealand. 1061
- C101 RMX firms have told us there are regulatory factors in New Zealand which limit the efficiency with which they can operate, potentially increasing the cost of RMX. For example, some firms told us:
 - C101.1 axle-weight requirements for trucks are more stringent in New Zealand than comparable countries. These requirements mean they are unable to transport as much product per truck as in other countries; and
 - C101.2 council by-laws prevent the production and/or delivery of RMX outside of certain hours, limiting the number of loads producers can deliver in each day.

Deloitte Access Economics "Cost of residential housing development: A focus on building materials" (2018) at 68, available at:

https://www2.deloitte.com/content/dam/Deloitte/nz/Documents/Economics/nz-en-DAE-Fletcher-cost-of-residential-housing-development.pdf.

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C102 We have not verified whether New Zealand RMX producers do face more stringent operating conditions than comparable countries. However, these anecdotal examples indicate that there may be factors other than competition which influence the price of RMX in New Zealand relative to other countries.

Exclusive cement supply is common, but appear to be driven by efficiency considerations

- C103 Based on our analysis of cement supply agreements, forms of exclusive supply arrangements or minimum volume requirements appear common.
- C104 These might be implemented in a range of ways. For example, the agreement might:
 - C104.1 require the RMX firm to purchase all of its cement from the cement supplier, either for all of its plants or some specified plants;
 - C104.2 give the cement firm right in priority to supply a specified proportion of the RMX firm's cement requirements; or
 - C104.3 require the RMX firm to purchase all of its cement from the cement supplier to retain the agreed pricing.
- C105 However, we have heard these clauses are often driven by mutual efficiency benefits. For example, many RMX plants have small silos, requiring multiple daily cement deliveries. This requires close coordination with its suppliers to ensure they can continue production.
- C106 These arrangements often have price competitiveness clauses and provide RMX suppliers with a degree of negotiating power. Additionally, the lengths of these contracts are often 12 months, or 24 months, with the ability to renegotiate periodically. RMX producers have told us they typically do not have supply agreements with their customers. Rather, they compete on price and service to win customers. ¹⁰⁶³

Tiered rebates are uncommon in the cement and ready-mix concrete markets except to merchants

- C107 Based on the cement, RMX and other concrete product supply agreements we reviewed, tiered retroactive rebates do not appear to be a common element of cement or RMX supply arrangements.
- C108 For cement customers, rebates may not be required to encourage loyalty, given the prevalence of exclusive (or minimum quantity) supply agreements, and the preference of customers to not switch suppliers too frequently. We understand the pricing in these contracts is negotiated to the reflect the volume purchased. For RMX customers, supply agreements themselves appear uncommon, limiting the scope for the use of rebates.

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- C109 The supply agreements which did contain tiered retroactive rebates were almost all between suppliers and merchants (rather than end-user agreements). These agreements tended to be for dry mix concrete or cement.
- C110 The level of retroactive tiered rebates offered to the merchants in these agreements was very high (up to 30% in some cases). Although the level varied, these rebate tiers were some of the highest of all supply agreements we reviewed. As discussed in Chapter 8, we consider these types of rebates have the potential to harm competition between suppliers. However, this potential harm may be less where suppliers have other distribution options. This appears to be the case for concrete, given the small proportion of concrete products sold through merchants.

The ability to raise ready-mix concrete prices appears to be constrained by competition

C111 Perceived competitive pressure appears to limit RMX firms' abilities to raise prices. For example, an internal survey of staff from one RMX firm showed most employees felt the company was prevented from increases in prices due to the threat of losing customers and/or market share. 1064

Structural factors and firm conduct have the potential to soften cement price competition

- C112 Some features of the cement market suggest it may be vulnerable to tacit coordination (also referred to as accommodating behaviour). Our merger guidelines explain the factors likely to make accommodating behaviour more or less likely in a particular market. ¹⁰⁶⁵ In the cement market, these include:
 - C112.1 a relatively concentrated market;
 - C112.2 relatively homogenous products;
 - C112.3 repeated interaction and transactions between competitors; and
 - C112.4 firms have some ability to observe each other's volumes and/or prices. 1066
- C113 We have not seen evidence of accommodating behaviour in the cement market, to date.

Upstream suppliers receive competitive information about downstream competitors

Vertically integrated cement producers also supply to RMX producers which compete with their downstream RMX businesses. These trade relationships may provide competitive or strategic information about the RMX markets. For example, supply agreements indicate some cement suppliers meet with their customers quarterly to discuss demand forecasts. However, these agreements also contain clauses restricting the use of this competitively sensitive information for other purposes.

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Commerce Commission "Mergers and acquisitions guidelines" (July 2019) at [3.89], available at: https://comcom.govt.nz/ data/assets/pdf file/0020/91019/Mergers-and-acquisitions-Guidelines-May-2022 pdf

For example, through monthly data on cement and clinker imports published by Statistics NZ.

Innovation and building for climate change

- C115 The embodied carbon framework of MBIE's BfCC programme looks to first measure and report, then place caps on the embodied carbon of new buildings. Concrete contributes a significant portion of a residential building's overall embodied carbon. Concrete is largely used in the foundations of standalone homes and is also used for structural elements of medium-density housing.
- C116 Embodied carbon measurement and reporting requirements will include a mechanism that considers the quality of information sources. Where data quality is poor (for example, for cement imported from countries with weaker emissions policies), an embodied carbon penalty may apply. 1068
- C117 As caps are introduced, the building sector will be required to innovate to reduce the total embodied carbon of buildings. This will likely see innovations in cement manufacturing that reduces embodied carbon through the use of SCMs. Alternatively, builders may consider alternative foundation solutions for standalone buildings such as timber piles, or to replace structural elements of medium-density housing with engineered timbers.
- C118 The timeframes of the impacts of BfCC are unclear. While reporting requirements are likely to be introduced by 2025, the timing for introducing embodied carbon caps is not yet determined, nor are the levels at which caps may be set.

Product innovation is centred around reducing embodied carbon

- C119 In a workably competitive market, we would expect to see firms innovating to win customers. Where competition is not working well, innovation may languish. We understand cement suppliers are currently working to respond to market demand for low-embodied carbon products. This suggests competition is working well.
- C120 The level of investment in this innovation appears high and is focused on the use of SCMs. SCMs reduce the amount of cement required (and therefore the amount of embodied carbon) per cubic metre of concrete.

Innovation on low-embodied carbon cement appears to be lagging compared to other countries

C121 The current level of SCM uptake in New Zealand is low, compared to other comparable countries. The substitution rate of SCMs is about 1% to 2% in New Zealand, compared to about 25% in Australia. 1069

					
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- C122 However, it is not clear that a lack of competition is the driver of this lagging innovation. Factors such as low consumer demand, and challenges accessing SCMs, may be more important. Participants in New Zealand have told us:
 - C122.1 while end users are becoming more interested in low-embodied carbon cement and RMX, sales growth is slow relative to demand;¹⁰⁷⁰ and
 - C122.2 some participants have told us there is a lack of cost-effective, or accessible, SCMs in New Zealand. 1071

The Emissions Trading Scheme appears to have some effect on incentives to innovate

- C123 We have heard differing arguments about what effect the ETS, particularly the allocation of NZUs to GBC, has on incentives to innovate:
 - C123.1 GBC argued it provides them strong incentives to innovate in carbon-reducing activities. As discussed at paragraph C74 above, if it reduces its carbon emissions below its free allocation, it can sell the unused NZUs, or retain them for future use.
 - C123.2 Holcim argued the uptake of carbon-reducing products (such as SCMs) is dampened by the free allocation policy. ¹⁰⁷² This is because the domestic producers' allocation of NZUs means they do not face the full cost of their emissions.
- C124 Our view is that the ETS does incentivise GBC to invest in carbon-reducing activities. While GBC may not face the full cost of its carbon emissions, it still faces financial incentives to reduces its emissions through the ability to sell or retain unused NZUs.
- C125 GBC's incentive to innovate may, in turn, drive other firms to innovate. For example, other firms may work to reduce their embodied carbon. However, they may also respond by improving other dimensions of their offering.

Conditions of entry and expansion

- C126 The markets for cement and RMX are both characterised by structural barriers. However, while regulatory and strategic barriers are present, these do not appear to be as high as we have observed in the case of other residential building supplies (eg, plasterboard).
- C127 Our views are:

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Ministry for the Environment, Manatū Mō Te Taiao "Reforming industrial allocation in the New Zealand Emissions Trading Scheme: Summary of submissions" (March 2022) at 17, available at:

https://environment.govt.nz/assets/publications/Reforming-industrial-allocation-in-the-NZ-ETS-summary-of-submissions.pdf.

- C127.1 high structural barriers make the entry of a second domestic cement manufacturer unlikely;
- C127.2 entry into the cement market as an importer of cement is possible, although there are some barriers;
- C127.3 barriers to entering the RMX market are low, due to, for example, the viability of plant-share arrangements;
- C127.4 however, the challenges in finding suitable land for a RMX plant may inhibit expansion of smaller players in the market.

Entry into domestic manufacture of cement practically unviable

- Our view is that the entry of a second domestic manufacturer of cement appears highly unlikely. This is primarily because New Zealand's market size does not appear large enough to sustain two cement producers. Incumbents told us the accepted view is that a cement manufacturer needs to produce at least 920K tonnes of cement per year to be viable; New Zealand currently consumes approximately 1,600K tonnes of cement per year. 1073
- C129 However, the New Zealand market did previously sustain two domestic producers, before Holcim ceased operation of its Westport cement works in 2016.
- C130 Potential domestic manufacturers may also face structural and regulatory barriers. These include:
 - C130.1 high, and rising, domestic input costs (eg, electricity, labour);
 - C130.2 limited ability to achieve economies of scale (as export is not economically viable); and
 - C130.3 compliance with the ETS.
- C131 GBC's ability to compete as a commercially viable domestic producer appears largely due to historical and structural factors. For example:
 - C131.1 it has a highly capital-intensive manufacturing plant and distribution network;
 - C131.2 it has been in the market for more than 100 years, enabling it to invest capital and grow scale slowly; and
 - C131.3 this time in the market also likely gave it a unique opportunity to acquire key strategic sites over time. 1074

¹⁰⁷³

For example, it has a large source of limestone near its Whangarei manufacturing plant, which is a key input to cement.

C132 These are unique factors which any new entrant would be unlikely to easily replicate. We understand replacement of a cement manufacturing plant, like GBC's, is likely to exceed \$500 million dollars. Given this, GBC considered the capital required alone makes domestic entry improbable.

Structural barriers to importing cement are lower

- C133 Our view is that the barriers to importing cement are low. However, any small-scale entrant is most likely to be a RMX producer (or a group of producers) initially self-supplying, before expanding to public sales. This is due to the need to ensure downstream sales to RMX suppliers.
- C134 There are two main ways cement can be imported: bulk shipping, and containerised shipping.

Bulk shipping has high barriers to enter

- C135 Bulk shipping cement has high fixed costs but enables low variable costs. This means the firm needs large volume for the method to be economically viable. However, if this volume is achieved, it enables the firm to secure a low per-unit cost.
- C136 Bulk-shipped cement is transported in the hull of a ship. This requires specialised handling systems to load and unload the cement. For example, Holcim bulk ships its cement from Japan to two purpose-built import terminals which cost approximately \$50 million each. 1075

Barriers to importing containerised cement are significantly lower

- C137 Conversely, containerised shipping (or "bulk bag" importing) requires minimal capital expenditure but has higher variable costs. 1076
- C138 The method has lower barriers to entry, as it requires little supply chain infrastructure and can be shipped in smaller quantities. This means a small amount of capital is needed to establish supply, with less complexity. 1077
- C139 However, it is typically a more expensive import method than bulk shipping. The input cost of cement is higher (eg, due to the exporter needing to package the cement). There are also higher handling costs (eg, de-bagging the cement once imported). These factors may limit the ability for firms to lower their per-unit cost by increasing volume.

- C140 Additionally, we understand the viability of this method may be limited currently due to the spike in container shipping costs during the COVID-19 pandemic. 1078
- C141 Nevertheless, if container shipping costs return to prices similar to before 2020, it may be a viable way to obtain cost-effective cement supply.

However, there may be other barriers to effectively importing cement

- C142 One RMX producer told us that they had previously considered self-supplying cement but considered it unattractive to do so.¹⁰⁷⁹ This is because:
 - C142.1 large capital investment would be required to develop import terminals and develop the supply chain;
 - C142.2 exposure to global markets (eg, shipping and production costs, exchange rates) could create unwanted uncertainty and resilience risks; and
 - C142.3 vertical integration would introduce unwanted complexity and costs into the business and shift its focus away from competing effectively in the RMX market.
- C143 This appears consistent with the view of the large cement firms. One told us that, while RMX producers could import cement if they chose, it usually makes more commercial sense to purchase from a supplier. 1080

There are some general structural barriers to entering the cement market, regardless of supply model

- C144 Some barriers are general to both importers and domestic manufacturers of cement.

 These include:
 - C144.1 the physical properties of cement requiring specialist transport, storage and logistical solutions; and
 - C144.2 large economies of scale required to achieve ROI in supply chain.

While bulk-shipped cement is also exposed to this risk, it is likely to be mitigated somewhat as the method generally relies on longer-term and larger-scale arrangements, rather than spot prices.

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Necessary capital expenditure may be a barrier to entry and expansion of ready-mix concrete firms

- One RMX producer told us the capital barriers to entering the RMX market are relatively low. The cost of a new plant can range from \$1 million to \$10 million, depending on the size. However, plants in New Zealand can also exceed costs of \$10 million. 1082
- C146 However, plant-share arrangements may ease these capital barriers. Some competitors have told us new RMX entrants operating under a plant-share model often exert competitive pressure on incumbents.

Access to and/or availability of suitable ready-mix concrete sites appears to slow entry and expansion

- C147 Identifying, and obtaining, suitable sites appears to be a key challenge for RMX producers wanting to enter or expand in the market.
- C148 In general, a site for a RMX plant would be expected to:
 - C148.1 be of a suitable size;
 - C148.2 be near current and/or future construction activity;
 - C148.3 be near an arterial road (eg, a motorway);
 - C148.4 have a suitable degree of access for heavy vehicles;
 - C148.5 have a low consenting risk (ie, is likely to meet resource consent requirements); and
 - C148.6 be suitably zoned to comply with local planning regulations. 1083
- C149 This narrow set of requirements likely significantly limits the number of suitable sites available for RMX producers.
- C150 For example, we heard from one RMX operator in the Auckland region who had identified an area they wished to expand into, but it took them multiple years to find, and purchase, a suitable site on which to set up a plant. For this firm, the challenges were primarily due to:
 - C150.1 the scarcity of suitable located and zoned sites; and

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C150.2 the capital-intensive nature of developing a site.

Strategic factors at the cement level

Our view is that strategic factors, or conduct by incumbents, are not posing an undue barrier to entry or expansion by other firms. As discussed above, exclusive supply agreements are common, but appear to be driven by mutually beneficial efficiency gains.

Obtaining reliable ready-mix concrete customers is crucial to achieving scale as a cement supplier

C152 The ability for a cement supplier to enter or expand in the market relies on the existence of a contestable (ie, independent) RMX customer base. 1085

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Attachment D Supplier survey

- D1 This attachment provides further information about our supplier survey.
- D2 Our survey was aimed at suppliers (ie, domestic manufacturers and importers) of key building supplies. We conducted the survey to help to build our understanding of how well competition is working for key residential building supplies and to provide suppliers an opportunity to share their own views. We sought information on a range of topics including:
 - D2.1 the nature of competition in individual key building supply markets;
 - D2.2 how suppliers make business decisions such as pricing and distribution strategies;
 - D2.3 how suppliers vary in terms of product mixes and regional presence; and
 - D2.4 any obstacles that make it difficult for suppliers to enter and compete in the markets for key building supplies.
- D3 We received 22 responses to our supplier survey. These respondents supplied a range of different key building supplies and varied significantly in size and business models.
- D4 The sections in this attachment are:
 - D4.1 how we designed and conducted this survey;
 - D4.2 our approach to confidentiality of information;
 - D4.3 who responded to our supplier survey;
 - D4.4 how we have used the results of our supplier survey; and
 - D4.5 a question script for the survey.

How we designed and conducted the survey

- Our supplier survey was conducted online and hosted on SurveyMonkey. The survey was available from 12 April to 9 May 2022.
- It included 30 questions in total. Respondents were first given the opportunity to select up to three key building supplies that they supply. They were then asked a set of 12 questions for each building supply selected, followed by a single set of 14 general questions applying to their whole business.
 - D6.1 Respondents who selected one key building supply were asked 30 questions.
 - D6.2 Respondents who selected two key building supplies were asked 42 questions (because 12 questions were repeated for their second key building supply).

- D6.3 Respondents who selected three key building supplies were asked 54 questions (because 12 questions were repeated for each of their second and third key building supplies).
- D7 After selecting their key building supplies, respondents were asked about:
 - D7.1 their role in the supply chain and the locations in which they operate;
 - D7.2 access to inputs and distribution channels;
 - D7.3 the substitutability of their products;
 - D7.4 the negotiating power and preferences of their customers;
 - D7.5 the obstacles for businesses looking to enter or expand in their markets;
 - D7.6 their sales and profit made on each of their key building supplies;
 - D7.7 the factors they consider when setting prices;
 - D7.8 vertical arrangements used by themselves and their competitors; and
 - D7.9 their overall views on competition in their markets.
- D8 We sought to frame the questions using neutral language, to allow respondents to freely provide their views.
- D9 The questions were mainly multiple choice with some opportunities to input information and/or provide explanatory text.
- D10 Every question was optional, so respondents were free to skip as many questions as they wanted.
- D11 We promoted the survey to seek input from a wide range of suppliers. Strategies to promote the survey included publishing a media release, adding a link to the survey on the homepage of our website, and emailing a link to the survey to 492 suppliers of key building supplies that we had identified as potential respondents.

Our approach to confidentiality of information

- D12 We were conscious that some of the information respondents may have wanted to share with us could be confidential.
- D13 Respondents were able to either complete the survey anonymously or share their details with us. Of the 22 responses received, 9 provided their details and 13 remained anonymous.
- D14 We implemented additional information handling measures for information provided to us by respondents, including restricting the number of our staff who have access to the information.

Who responded to our supplier survey

D15 Structural timber was the most common key building supply that our respondents supplied. Table D1 below provides a full breakdown of the key building supplies provided by respondents. Note that the total adds up to more than 22, because each respondent was able to select up to three key building supplies.

 Table D1
 Breakdown of respondents to our supplier survey

Which key building supplies do you provide?	Number of respondents
Structural timber	8
Doors and door joinery	3
Fibre cement	3
Insulation	3
Other cladding	3
Plasterboard	3
Cement	2
Clay brick masonry	2
Concrete masonry	2
Engineered timber	2
Other timber	2
Other weatherboard	2
Timber cladding	2
Concrete	1
Frame and truss	1
Plywood	1
Roofing tiles	1
Steel roofing	1
Wet wall lining	1
Windows and window joinery	1

How we have used the results of our supplier survey

- D16 Our supplier survey enabled us to seek the views of a range of suppliers of key building supplies, and provided suppliers with an opportunity to comment on any competition issues they have observed.
- D17 Because of the relatively small number of responses, we did not produce any statistics or otherwise conduct any quantitative analysis of the results.

D18 However, we conducted a qualitative review of the written responses which informed our understanding of various topics. Some of the written responses have been referenced (anonymously) in this report.

Copy of questions

This survey asks questions about the building supplies your company provides and competition in each market.

It will take you around 10 to 20 minutes to complete.

Your response will be used by the Commission to inform our competition study into residential building supplies.

You are not required to provide your name or business name when completing this survey, so that your response can be anonymous.

You can skip questions that you do not want to answer.

We will not share your individual response with third parties unless required to do so by law.

We will not publish individual responses but may publish a summary of responses on our website.

The survey is open until 9 May 2022.

Your privacy is important to us

If you wish to use another process to provide the Commission with confidential, commercially sensitive or personal information, please email us at buildingsuppliesmarketstudy@comcom.govt.nz to ask to speak with someone from the project team.

We recognise the need to ensure that you can have confidence in our use and retention of information, and we are committed to respecting any privacy, confidentiality, or commercial sensitivity attached to your information where possible.

The survey asks questions about the supply of key building supplies. The following table describes the types of building supplies within the scope of the study:

Table 1: Preliminary list of building supplies in scope

Major components of residential buildings	Building supplies in major components
Foundation	Concrete, timber, steel reinforcing
Flooring	Concrete, particleboard, strandboard
Roof	Steel roofing, other sheet metal roofing, metal and concrete tiles, shingle and membrane roofing
Walls (structural/framing)	Timber framing, laminated veneer lumber (LVL), steel framing, concrete masonry, polyblock, rammed earth framing
Walls (exterior/cladding)	Weatherboard (timber/fibre-cement/uPVC), clay and concrete bricks, metal cladding, non-weatherboard fibre-cement, plywood, stucco, sheet steel
Walls (interior)	Plasterboard, wet lining
Walls (interior/exterior)	Window/door framing (aluminium, timber, composite, uPVC, fibreglass, and steel), glazing, doors
Insulation	Walls and ceiling: Glass wool and polyester Floor: Underslab, polystyrene, glass wool, polyester, perimeter edge, under footing

This section asks questions about the specific **key building supplies** you provide.

Please use the drop down menus below to select up to three products you provide from the following list:

- Cement
- Clay brick masonry
- Concrete
- Concrete masonry
- Doors and door joinery
- Fibre cement
- Insulation
- LVL/engineered timber
- Medium-density fibreboard (MDF)
- Particleboard
- Plasterboard
- Plywood
- Roofing tiles
- Steel framing
- Steel reinforcing
- Steel roofing
- Strandboard
- Structural timber
- Timber cladding (incl. timber weatherboard)
- Wet wall lining
- Windows and window joinery
- Other weatherboard (eg, PVC)
- Other cladding
- Other key building supplies (please specify)

You will	be asked	a set of c	uestions fo	or each	product.
I C G VV III	DC GSRCG	4 30 0 0		, cacii	pi oaact.

Note:

- If you are only providing feedback on one or two products, leave the other field(s) blank.
- If you select "Other key building supply", please specify what that is.

1.	Product #1
	\$
2.	Product #2
	\$
3.	Product #3
	\$
4.	If you supply more than three of the key building supplies above and want to answer questions on the others, please provide your email address below and we can send you a separate question list for each additional key building supply.
Ema	ail address:
Key	building supply questions
sele	te: In the live version of the survey, questions 5-16 were repeated for each key building supply ected in questions 1-3. The placeholder [KBS] was automatically filled with the name of each key lding supply.
We	are now going to ask you some detailed questions about [KBS]
5.	Regarding your supply of [KBS], which of the following options best describes your role in the supply chain?
	 Manufacture key inputs/materials (used to make [KBS]) Import key inputs/materials (used to make [KBS]) Manufacturer of [KBS] in New Zooland
	 Manufacturer of [KBS] in New Zealand Offshore manufacturer and importer into New Zealand of [KBS]
	Importer of [KBS] onlySeller of [KBS] (sell directly to builders, developers or other consumers)

	Other (ple	rase explain)
6.	-	any difficulty in accessing inputs/materials required to manufacture [KBS], because of a third party?
	YesNoNot applic	cable
If y	ou selected 'ye	s', what types of inputs and materials have you had difficulty accessing and why?
7.	Can any of yo	our [KBS] products be substituted for alternative materials?
(Fo	r example, we	understand builders and developers often have a choice of different cladding types.)
	○ Yes ○ No	
If y	es, please desc	ribe the substitute materials and which products they are substitutes for.
8.		le percentage estimates of how much quantity of your supply of [KBS] is sold through ollowing channels.
Ple	ase check that	the percentages you input total to 100%.
Pla	jor merchants cemakers,	(i.e.
Bur	ters, nnings, Mitre and ITM)	
Inst	tallers	
-	ecialist rchants	

Directly to				
builders or developers				
Other merchants and distributors (please specify below)				
9. If you provide specify them b		or "Other merchants	s and distributors" above, ple	ase
	d any difficulty in accession of the difficulty in accession o	ng the distribution ch	nannels below, please explair	ı the
Major merchants (i.e. Placemakers, Carters,	Bunnings, Mitre 10,	and ITM)	
Installers				
Specialist merchan	ts			
Directly to builders	or developers			
Other merchants a	nd distributors			
	gotiating power do the cur pricing and/or supply de		listributors) of your [KBS] hav	∕e to
SignificantSomeLittleNone				
Please explain				
i icase expiairi				

12. In general, what are the most significant obstacles for new businesses looking to enter into or expand their presence in New Zealand's [KBS] market?

Please rank in order of most significant obstacle (1) to least significant obstacle (8), and tick N/A beside any that do not apply.

 Use the comment box below 	v if you l	have a reason	not provided.
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- You can drag and drop the options to your desired position – ranking
--

	◆ Meeting regulatory requirements	□ N/A
	Obtaining product assurance	□ N/A
	Behaviour of consenting bodies	□ N/A
	♦ Behaviour of specifiers	□ N/A
	Securing capital investment	□ N/A
	Strategic responses of competitors	□ N/A
	Access to inputs/raw materials	□ N/A
	Access to distribution channels	□ N/A
	s the estimated initial set up cost (in NZD) to begin operating	
○ \$10 ○ \$50 ○ \$1n	s than \$100k 10k-\$500k 10k-\$1m n-\$5m n-\$10m	
O \$10	n-\$10m lm-\$20m lm-\$50m	

16.		g your supply of [KBS] in e of your sales and profit	•	ded 2021, approximately w	hat was the				
Sal	es								
Gro	Gross profit								
Ge	neral quest	ions							
	Where in ect only on	New Zealand do you sup e.	oply key building sup	pplies to?					
	O North	e country Island only Island only							
18.	What fact	cors do you typically cons	sider when setting th	ne prices of your key buildi n	ng supplies?				
Rai app		of importance with '1' be	ring the most importe	ant, and tick N/A beside an	y that do not				
		ment box below if you ha and drop the options to		ided. n – rankings will auto-popu	late.				
	■ •	Available supply ca	pacity		□ N/A				
1	■ •	Pricing of competito	ors		□ N/A				
:	■ 🔷	Changes in input co	ost		□ N/A				
:	■ •	Customer demand			□ N/A				
19.	If you wo number r		ot provided above, p	lease state it below with yo	our ranking				
20.		ey building supplies you post important when choo		s do you think your custom	ers consider to				

Rank in order of importance with '1' being the most important, and tick N/A beside any that do not

- Use the comment box below if you have a factor not provided.

apply.

- You can drag and drop the options to your desired position — rankings will auto-populate.					
≡ •	Price				
■	Reliability of delivery				
■ •	Quality of product				
≡ •	Brand name				
≡ •	Meeting of product appraisal				
≡ •	Familiarity of specifiers				
■ •	Familiarity of consenting bodies				
21. If you wou number ne	Id like to add a factor not provided above, please state it below with your ranking ext to it.				
22 Which of t	ne following strategies, if any, do you use in selling your key building supplies ?				
□ Vo □ Exc □ Sys and □ Mi □ Loy □ Tra	lume-based rebates clusivity requirements stems or product tying (i.e. specifying or requiring certain products to be purchased d/or used together) nimum orders (quantity or dollar value) valty scheme nining or marketing support ne of the above her strategies (please specify and describe)				
23. Tell us why	you use each strategy selected above.				
Volume-based rebates					
Exclusivity requirements					

Systems or product tying (i.e. specifying or requiring certain products to be purchased and/or used together)	
Minimum orders	
(quantity or dollar value)	
Loyalty scheme	
Training or marketing support	
None of the above	
[Insert text from Other]	
□ Volu □ Exclu □ Syste and/ □ Mini □ Loya □ Train	e following strategies, if any, do you see being used by others in your markets? me-based rebates usivity requirements ems or product tying (i.e. specifying or requiring certain products to be purchased for used together) mum orders (quantity or dollar value) lty scheme ning or marketing support er strategies (please specify and describe, including any implication for you)
25. Tell us why y question.	ou think others in your markets use the strategies you selected in the previous
Volume-based rebates	
Exclusivity requirements	

Systems or product tying (i.e. specifying or requiring certain products to be purchased and/or used together)	
Minimum	
orders (quantity or	
dollar value)	
Loyalty scheme	
Training or	
marketing support	
[Insert text from	
Other]	
	what could be done to improve competition for the supply of key building supplies ? any other comments you'd like to make? If so, please share them with us below.
Your company in	formation
	ur company's approximate annual operating revenue in New Zealand in the most cial year? (NZD)
Less than \$100k-\$56 \$500k-\$1 \$1m-\$5m \$5m-\$10r \$10m-\$20 \$20m-\$50	OOk m n Dm

OPTIONAL

You are not required to provide your name or business name w	vhen completing this survey, so that your
response can be anonymous.	

29.	What is your o	company name?
30.	contact detail	py for us to contact you to discuss any aspects of the survey please provide your s below. These contact details will only be used for the Residential Market Studies act you for follow up about this survey.
Nan	ne	
Email Address		
Pho	ne Number	

Thank you for taking the time to complete our survey. Your response will assist our study into whether competition is working well for the residential building supplies sector.

If you want to be kept up to date with progress on the study please subscribe to our mailing list.

More information on our market study can be found on our <u>website</u>.

Attachment E Builders/specifiers survey

- E1 This attachment provides further information about our specifier survey.
- We conducted the survey to help build our understanding of how well competition is working for key residential building supplies. We sought views on the factors that influence the decisions on which key building supplies are specified in plans and are purchased for residential building work.
- We received 105 responses to our specifier survey. 1086 The respondents were largely builders who source building supplies for the build stage and/or have some input into the products specified in plans, and specifiers of building supplies at the design stage. Respondents varied significantly in size, as measured by the number of employees and experience in the sector.
- E4 The responses we received have informed our analysis of decision-making behaviours.
- E5 The sections in this attachment are:
 - E5.1 how we designed and conducted our specifier survey;
 - E5.2 our approach to confidentiality of respondents' information;
 - E5.3 who responded to our specifier survey;
 - E5.4 how we have used the results of our specifier survey; and
 - E5.5 question script for our specifier survey.

How we designed and conducted our specifier survey

- Our specifier survey was conducted online and hosted on our website. The survey was available from 18 March to 9 May 2022.
- E7 It included 45 questions in total. Respondents who specify and purchase key building supplies had the opportunity to answer all questions.
 - E7.1 Respondents who indicated that they only specify key building supplies were asked 24 questions.
 - E7.2 Respondents who indicated that they only purchase key building supplies were asked 36 questions.
- E8 The initial questions sought to discover who makes the final decisions on types of key building supplies to use, the brand to use and where supplies are purchased. Tick-box options were provided for these questions.
- E9 Topics covered in questions for respondents who are specifiers included:

1086	[1.

- E9.1 reasons for specifying key building supplies;
- E9.2 specification by brand;
- E9.3 use of alternative products; and
- E9.4 sources of product information.
- E10 Tick-box options were provided with some free text boxes where reasons were requested.
- E11 Topics covered in questions for respondents who are purchasers included:
 - E11.1 where and how supplies are purchased;
 - E11.2 reasons for these decisions;
 - E11.3 sources of product information;
 - E11.4 switching suppliers;
 - E11.5 using alternative products; and
 - E11.6 pricing to customers.
- E12 We sought to frame the questions using neutral language, to allow respondents to freely provide their views.
- E13 We promoted the survey to seek input from a wide range of specifiers and purchasers including publishing a media release and adding a link to the survey on the homepage of our website.
- We also engaged with peak bodies, industry associations and other stakeholders to help promote the survey through their communication channels.

Our approach to confidentiality of information

- We were conscious that some of the information respondents may have wanted to share with us could be confidential.
- Respondents were able to either complete the survey anonymously or share their details with us. Of the 105 responses received, 20 provided their details and 85 remained anonymous.
- We implemented additional information handling measures for information provided to us by respondents, including restricting the number of our staff who have access to the information.

Who responded to our specifier survey

Of the respondents, 62% indicated they were builders, 19% indicated they were architects or designers, 5% engineers, 2% quantity surveyors and 12% others (such as project managers and developers). The categories of respondents are shown in Table E1 below.

Table E1 Breakdown of respondents to our specifier survey

What sector of the building industry does your business currently work in?	Number of respondents		
Building and construction	40		
Architectural design	12		
Other	8		
Engineering design	3		
Quantity surveying	1		
No response	41		

How we have used the results of our specifier survey

- Our specifier survey enabled us to seek the views of a wide range of specifiers and purchasers of key building supplies. We were able to identify common themes by reviewing the responses received. These themes are described in Chapter 5 of this report, as part of our analysis of decision making for the specification and purchase of building supplies.
- E20 The survey was not designed to be statistically representative. Rather, it was intended to be a simple way of gathering the views of a range of industry participants within a short period of time.
- Follow-up meetings were held with some respondents to our specifier survey to seek clarification or further details regarding comments they had made. We were not able to meet with all survey respondents, so we met with a sample of respondents of different sizes where they wished to engage further with us.

Copy of questions

This survey asks some questions about how key building supplies are specified in residential building plans and how they are purchased.

Your response will be used by the Commission to inform our competition study into residential building supplies.

You are not required to provide your name or business name when completing this survey, so that your response can be anonymous.

We will not share your individual response with third parties unless required to do so by law.

We will not publish individual responses but may publish a summary of responses on our website.

We expect this survey will take you around 10 to 20 minutes to complete. Feedback is open until **9 May 2022**.

Your privacy is important to us

If you wish to use another process to provide the Commission with confidential, commercially sensitive or personal information, please email us at buildingsuppliesmarketstudy@comcom.govt.nz to ask to speak with someone from the project team.

We recognise the need to ensure that you can have confidence in our use and retention of information, and we are committed to respecting any privacy, confidentiality, or commercial sensitivity attached to your information where possible.

The survey asks some questions about how key building supplies are specified in residential building plans and how they are purchased. The following table describes the types of building supplies within the scope of the study:

Table 1: Preliminary list of building supplies in scope

Major components of residential buildings	Building supplies in major components		
Foundation	Concrete, timber, steel reinforcing		
Flooring	Concrete, particleboard, strandboard		
Roof	Steel roofing, other sheet metal roofing, metal and concrete tiles, shingle and membrane roofing		
Walls (structural/framing)	Timber framing, laminated veneer lumber (LVL), steel framing, concrete masonry, polyblock, rammed earth framing		
Walls (exterior/cladding)	Weatherboard (timber/fibre-cement/uPVC), clay and concrete bricks, metal cladding, non-weatherboard fibre-cement, plywood, stucco, sheet steel		
Walls (interior)	Plasterboard, wet lining		
Walls (interior/exterior)	Window/door framing (aluminium, timber, composite, uPVC, fibreglass, and steel), glazing, doors		
Insulation	Walls and ceiling: Glass wool and polyester Floor: Underslab, polystyrene, glass wool, polyester, perimeter edge, under footing		

For the residential projects you work on and for the key building supplies used, who usually makes the final decision on:

1.	The	types	of key	building	supplies	to use:
		Arch	itect			

□ Engineer

☐ Quantity surveyor

 □ Draftsperson □ Local builder □ Group home builder □ Homeowner/homebuyer/client □ Other (please specify): 			
2. The brand of building supplies to use: Architect Engineer Quantity surveyor Draftsperson Local builder Group home builder Homeowner/homebuyer/client Other (please specify)			
3. Where the key building supplies are purchased from: Architect Engineer Quantity surveyor Draftsperson Local builder Group home builder Homeowner/homebuyer/client Other (please specify)			
Product specification This section relates to the planning stage of residential projects. We are still asking only about 'key building supplies' (see previous table).			
 * 4. Does your business ever specify key building supplies? ☐ Yes ☐ No 5. What are the top 5 reasons for specifying particular key building supplies for the major components 			
of residential buildings? Please rank in order of importance.			

Please note:

- You only need to rank from 1 – 5

 Use the comment box in Q6 	if you have a reason no	provided below.
---	-------------------------	-----------------

	-	Mobile users:	rankinas	will auto-	populate,	you can drad	and drop	the option	ns to voui	r desired	position.
--	---	---------------	----------	------------	-----------	--------------	----------	------------	------------	-----------	-----------

±	From a list in a design package
1	Product is likely to be accepted by a consenting authority
	Product meets the Building Code
$\bar{\updownarrow}$	Product is certified e.g. CodeMark
<u></u>	Product has been appraised e.g. by BRANZ
Ţ	Product has a warranty
†	Product has been used before and is reliable
Ţ	Product will be readily available
Ť	Product is within budget
Ť	Based on other available product information
Ť	At the request of the homeowner/ homebuyer/client
Ť	Product has a desirable attribute e.g. eco-friendly or new type of product
	Product is the cheapest
<u> -</u>	
- 6. If yo	u would like to add a reason not provided above, please state it below with your ranking er next to it.
- 6. If yo	

8. Which key building supplies are commonly specified by brand?

Foundation	
Concrete, timber, steel joists]
Flooring	
Concrete, particleboard, strandboard]
Roof	
Steel roofing, other sheet metal roofing, metal and concrete tiles,	
shingle and membrane roofing	
Walls (structural/framing)	
Timber framing, laminated veneer lumber (LVL), steel framing,	Answer choices:
concrete masonry, polyblock, rammed earth framing)	☐ Always
Walls (exterior cladding)	☐ Sometimes
Weatherboard (timber/fibre-cement/uPVC), clay and concrete bricks,	□ Rarely
metal cladding, non-weatherboard fibre-cement, plywood, stucco,	□ Never
sheet steel)	☐ Don't know
Walls (interior)	☐ Not applicable
Plasterboard, wet lining	''
Walls (interior/exterior)]
Window/door framing (aluminium, timber, composite, uPVC,	
fibreglass, and steel), glazing, doors)	
Insulation	1
Walls and ceiling: Glass wool and polyester	
Floor: Underslab, polystyrene, glass wool, polyester, perimeter edge,	
under footing)	
making the plans? Very easy Somewhat easy Neither easy nor difficult Somewhat difficult Very difficult Please explain why you selected this option.	
 10. If you answered 'somewhat difficult' or 'very difficult', what are the n Potential liability risk for specifier Client resistance Consenting authority resistance Other (please specify) 	nain difficulties?
11. What sources do you get product information from before specifying all that apply.	key building supplies? Select
Product supplierMerchant(s)	

	Government (eg, MBIE)	
	Product certification (eg, CodeMark)	
	Product certifier (eg, BRANZ)	
	Trade association	
	Others in the trade	
	None	
	Other (please specify)	
	w often does your business use alternatives to the key building supplies (products) that illy specify?	you
	Always	
	Often	
	Sometimes	
	Rarely	
	Never	
Please	explain why you selected this option. If your answer varies by product, please explain.	
12 110	us door your business find out about now key building supplies entering the market? Co	lost all
that a	w does your business find out about new key building supplies entering the market? Se	iect aii
	Product suppliers	
П	Own research	
П	Merchants	
П	Trade association	
П	Others in the trade	
	Other (please specify)	
Produc	ct purchasing	
* 14. C	Ooes your business purchase key building supplies?	
	Yes	
	No	
15. Wh	nere does your business purchase most of its key building supplies?	
	Direct from a New Zealand supplier	
	Direct from an overseas supplier	
	Major merchants (Bunnings, Carters, ITM, Mitre 10, PlaceMakers)	
	Specialist store(s)	
	Other (please specify)	
1		

	inking about where key building supplies are purchased, which of the following best describes
_	usiness:
	We use one supplier/merchant for the majority of our purchases
	We use two supplier/merchants for majority of our purchases We use three or more supplier/merchants for majority of our purchases
	Other (please specify)
	Other (please specify)
	nat is important to your business when deciding where to purchase key building supplies? Selec
all tha	t apply.
	Price
	Trade account with a supplier, merchant or specialist store
	Rebates, discounts and/or loyalty benefits
	Product warranty
	Availability of product
	Specialist services eg, after-sales support
	Product information
	Location
	Personal relationship with supplier
	No other choice of supplier
	Other (please specify)
18. Wł	nich is most important? (from the previous question)
	you seek quotes from different suppliers or merchants before deciding which one to purchase
from?	
	Always
	Often
	Sometimes
	Rarely Never
Ш	Never
20. Wł	nere does your business access the information you need to seek different quotes? Select all
that a	орју.
	Information from merchant
	Information from product manufacturer
	Price comparison website(s)
	Talking to others in the trade
	Other (please specify)

21. How do you select a supplier based on different quotes. Please rank in order. Use the comment box below if you have a reason not provided.

positio	r users. Fullkings will duto-populate, you can aray and alop the options to your desired
•	rrice
<u>↓</u>	Availability
<u>¥</u>	Delivery
<u>↓</u>	After sales service
$\stackrel{\searrow}{\longrightarrow} \stackrel{\swarrow}{\longrightarrow} \stackrel{\swarrow}{\longrightarrow} \stackrel{\swarrow}{\longrightarrow} \stackrel{\swarrow}{\longrightarrow}$	Better product
₹	Better product
-	ou would like to add a reason not provided above, please state it below with your g number next to it.
* 23. h	low often does your business change suppliers of key building supplies? Always Often Sometimes
	Rarely Never
Please	explain why you selected this option.
24. Ple	ase rank the top 5 reasons for changing supplier for any given key building supply?
Please	
	only need to rank 1 – 5
	he comment box below if you have a reason not provided.
	le users: rankings will auto-populate, you can drag and drop the options to your desired position. Better prices
<u>±</u>	Superior product
<u>*</u>	Product availability
<u>*</u>	Product warranty
<u>*</u>	Better terms eg rebates/discount/loyalty benefits
<u>*</u>	More product information
<u>*</u>	After sales support
<u>*</u>	A new supplier entering the market
<u>*</u>	A supplier leaving the market
<u>*</u>	Product would be approved by the consenting authority
<u>*</u>	Eco-friendly product
$\longleftrightarrow \longleftrightarrow \longleftrightarrow \longleftrightarrow \longleftrightarrow \longleftrightarrow$	Product is quality assured e.g. has CodeMark certification or appraisal from BRANZ for example
-	ou would like to add a reason not provided above, please state it below with your
rankin	g number next to it.
1	

26. Ple	ase select any factors which make you keep your current main supplier? Select all that apply
	Price
	Product quality
	Product availability
	Product warranty
	Supply terms e.g. rebates/discount/loyalty benefits
	Product information
	After sales support
	Good working relationship
	Products available as part of a bundle
	Other
	ng now about when you receive design plans
* 27. A	re specific brands of key building supplies commonly specified in the design plans?
	Always
	Sometimes
	Rarely
	Never

Product purchasing – Product

28. **Which** key building supplies are commonly specified by **brand**? *Only provide answers for those which apply to your business.*

[T 1
Foundation	
Concrete, timber, steel joists	-
Flooring	
Concrete, particleboard, strandboard	-
Roof	
Steel roofing, other sheet metal roofing, metal and concrete tiles,	
shingle and membrane roofing	4
Walls (structural/framing)	Answer choices:
Timber framing, laminated veneer lumber (LVL), steel framing,	
concrete masonry, polyblock, rammed earth framing)	☐ Always
Walls (exterior cladding)	☐ Sometimes
Weatherboard (timber/fibre-cement/uPVC), clay and concrete bricks,	□ Rarely
metal cladding, non-weatherboard fibre-cement, plywood, stucco,	□ Never
sheet steel)	☐ Don't know
Walls (interior)	☐ Not applicable
Plasterboard, wet lining	-
Walls (interior/exterior)	
Window/door framing (aluminium, timber, composite, uPVC,	
fibreglass, and steel), glazing, doors) Insulation	-
Walls and ceiling: Glass wool and polyester	
Floor: Underslab, polystyrene, glass wool, polyester, perimeter edge,	
under footing)	
29. Where key building supplies are specified by brand, do the design plato be selected and substituted?YesNo	ans allow equivalent products
If not, why not?	
30. How easy does your business find suggesting alternative key building detailed in the plans? Very easy Somewhat easy Neither easy nor difficult Somewhat difficult Very difficult Very difficult	; supplies to those already
	31.
answered 'somewhat difficult' or 'very difficult', what are the main diffic	

	Specifier resistance	
	Client resistance	
	Consenting authority resistance	
	Other (please specify)	
		32.
		J 32. How
does y	our business find out about key building products that are new to the market? Select all	
apply.		
	Product manufacturer	
	Own research	
	Merchants	
	Trade association	
	Architects	
	Industry contacts	
	Others in the trade	
	Other (please specify)	
		٦
		33.
c .		How
	do you consider or try building products that are new to the market?	
	Always	
	Often	
	Sometimes	
	Rarely	
	Never	
And fo	or which building product(s) and why?	
	2	
Pricing	g	
34. Ple	ease tell us how your business usually sets the project build price for customers.	
	Fixed price	
	Cost plus margin	
	Other (please specify)	
	ow often are any discounts, rebates or loyalty benefits received from suppliers of key built	ding
	es passed onto clients/homeowners/homebuyers as part of the project build price?	
	Always	
	Rarely	
	Sometimes	
	Never	

	Not applicable	_
Genera	a l	
	competition is working effectively, businesses face pressure to deliver the right prices, nge to satisfy a diverse range of customer preferences.	quality
36. Do	you think competition for key building supplies is working effectively at the moment betants?	ween
	Yes No	
Tell us	why.	7
		37.
-	etition for key building supplies working effectively at the moment between product facturers?	」Is
	Yes	
	No	
Tell us	why.	
		38.
	do you think would improve competition in the market for key residential building suppli all that apply.	es?
	Allowing for substitute like-for-like products to be readily accepted by consenting auth Faster approval for certified products	orities
	Wider product assurance options	
	More product information More information from architects on specified products	
	More suppliers of products	
	Transparency in regard to loyalty and discounting programs	
	Improvements to supply chain logistics	
	Other (please specify)	
		39.
		ا Are
		there
		any other
	ents you would like to make on competition in the market for key residential building supplease share your views with us below	oplies?

Demographic Information

40. What sector of the building industry does your business currently work in?

	Architectural design	
	Engineering design	
	Building and construction	
	Quantity surveying	
	Other (please specify)	
		41.
long ha	ave you been working in the current sector?	How
	Less than 1 year	
	1-2 years	
	3-5 years	
	6-10 years	
	More than 10 years	
	more than 10 years	
42. In v	what region(s) does your business operate? Select all that apply.	
	Northland	
	Auckland	
	Waikato	
	Bay of Plenty	
	Gisborne	
	Hawke's Bay	
	Taranaki	
	Manawatu-Wanganui	
	Wellington	
	Tasman/Nelson	
	Marlborough	
	West Coast	
	Canterbury	
	Otago	
	Southland	
	Other (please specify)	
	Cities (piease speemy)	
	w many employees does your business have?	
	1 (sole trader)	
	2-9	
	10-49	
	50-99	
	100+	
44 \\/	nat is your business' annual revenue?	
77. VVI	Less than \$2M	
П	\$2 – 9.9M	
П		
П	\$50M +	
П	Rather not say	
	nather not say	

45. If you would like us to contact you to discuss any aspects of the survey please provide your contact details below. These contact details will only be used for the Residential Building Supplies Market

Studies Team to contact you for follow up about this survey.			
Note, we will not p	ublish individual responses but may pub	lish a summary of responses on our website.	
Name			
Email Address			

Thank you for taking the time to complete our survey.

Your response will assist our study into whether competition is working well for the residential building supplies sector.

If you want to be kept up to date with progress on the study please subscribe to <u>our mailing list</u>.

More information on our market study can be found on our website.

Attachment F Regulatory and standards system survey

- F1 This attachment provides further information about our survey on the building regulatory system.
- We conducted the survey to help to build our understanding of the barriers to entry and expansion in residential building supplies markets. We sought views on different elements of the building regulatory system that could impact competition in the markets for key building supplies.
- F3 The key elements of the building regulatory system we sought feedback on include the:
 - F3.1 Building Code;
 - F3.2 Building consent system;
 - F3.3 Standards NZ system; and
 - F3.4 CodeMark product certification.
- F4 We received 136 responses to our survey on the building regulatory system. These respondents were largely builders who navigate the process of obtaining building consent and a code of compliance certificate from a Building Consent Authority.
- The responses we received have informed our analysis of the extent to which the building regulatory system may be a barrier to entry or expansion in residential building supplies markets.
- F6 The sections in this attachment are:
 - F6.1 how we designed and conducted our survey on the building regulatory system;
 - F6.2 our approach to confidentiality of respondents' information;
 - F6.3 who responded to our survey on the building regulatory system;
 - F6.4 how we have used the results of our survey on the building regulatory system; and
 - F6.5 question script for our survey on the building regulatory system.

How we designed and conducted the survey

- F7 Our survey on the building regulatory system was conducted online and hosted on our website. The survey was available from 29 April to 23 May 2022.
- F8 It included 20 questions in total. Respondents who navigate the building regulatory system for key building supplies had the opportunity to answer all questions.

- F9 The initial questions sought to discover which elements of the building regulatory system may be having an impact on the markets of key building supplies. Ranking options were provided for these questions.
- F10 Topics covered in the survey included:
 - F10.1 The extent to which each of the four elements of the building regulatory system (see paragraphs F3.1 to F3.4 above) impact competition in the markets for key building supplies;
 - F10.2 Which aspects of each of the four elements are impacting competition, if any, including the reasons why; and
 - F10.3 How the four elements could be changed to enhance competition in residential building supplies markets, including why.
- F11 Tick-box options were provided for the initial question, with free text boxes where an explanation was requested.
- F12 We sought to frame the questions using neutral language, to allow respondents to freely provide their views.
- We promoted the survey to seek input from a wide range of parties who navigate the building regulatory system for key building supplies, including publishing a media release, sharing the survey on social media and adding a link to the survey on the homepage of our website.

Our approach to confidentiality of information

- F14 We were conscious that some of the information respondents may have wanted to share with us could be confidential.
- Respondents were able to either complete the survey anonymously or share their details with us. Of the 136 responses received, 112 provided contact details and 24 remained anonymous.
- F16 We implemented additional information handling measures for information provided to us by respondents, including restricting the number of our staff who have access to the information.

Who responded to our survey on the building regulatory system

F17 Of the total responses (note responders were able to select more than one category, we received 153 responses), 37% indicated they were builders or group home builders (GHBs), 3% indicated they are architects or designers, 7% engineers, 7% work at a BCA or Council and 16% supply product (wholesalers, domestic manufacturers and importers). The categories of responses are shown in Table F1 below.

Table F1 Breakdown of total responses to our survey on the building regulatory system

What sector of the building industry does your business currently work in?	Number of respondents
Builder	50
Group home builder	7
Architect	5
Building Consent Authority/ Council	11
Engineer	10
Retailer/Merchant	9
Wholesalers	5
Domestic manufacturer	10
Importer	7
Other	39

How we have used the results of the survey

- F18 Our survey enabled us to seek the views of a wide range of persons involved in the building regulatory system and the supply or use of key building supplies. We were able to identify common themes by reviewing the responses received. These themes are described in Chapter 4 of this report, as part of our analysis of decision making for the specification and purchase of building supplies.
- F19 The survey was not designed to be statistically representative. Rather, it was intended to be a simple way of gathering the views of a range of industry participants within a short period of time.

Copy of questions

This survey asks questions about the role of the regulatory and standards system in the residential building sector and its impact on competition in the markets for residential building supplies.

If you are able to do so, please provide real world examples with reference to specific building supplies.

It will take you around 10 minutes to complete.

We acknowledge the important role the regulatory and standards system plays in ensuring New Zealand residential buildings are safe and well built. The questions we are asking are intended to understand how, given this important role, the regulatory and standards system works for competition in the supply of building materials in New Zealand.

Your response will be used by the Commission to inform our competition study into residential building supplies.

You are not required to provide your name or business name when completing this survey, so that your response can be anonymous.

Only the first two questions require answers. Thereafter, if there's a question you don't want to answer, you can skip it.

We will not share your individual response with third parties unless required to do so by law.

We will not publish individual responses but may publish a summary of responses on our website.

The survey is open until 23 May 2022.

Confidential information

If you wish to use another process to provide the Commission with confidential, commercially sensitive or personal information, please email us at buildingsuppliesmarketstudy@comcom.govt.nz to ask to speak with someone from the project team.

We recognise the need to ensure that you can have confidence in our use and retention of information, and we are committed to respecting any privacy, confidentiality, or commercial sensitivity attached to your information where possible.

This survey covers four parts of the regulatory and standards system relevant to residential building supplies in New Zealand:

- 1. Building Code;
- 2. Building Consent System;
- 3. Standards NZ;
- 4. Codemark product certification.

When we refer to 'competition', please consider:

What effective competition looks like

☐ Wholesaler

When competition is working effectively, businesses face pressure to deliver the right prices, quality and range to satisfy a diverse range of customer preferences.

This section asks you to identify where you fit into the residential building sector and where you are located.

* 1 What ic v	your role within the residential building supplies sector in NZ?
•	5
(Select al	l that apply)
	Builder
	Group home builder
	Architect
	Building Consent Authority/Council
	Engineer
	Retailer/Merchant

	Domestic manufacturer Importer
	Other (please specify)
	New Zealand do you operate? (Select all that apply) All of NZ
	Auckland
	Bay of Plenty
	Canterbury
	Gisborne
	Hawke's Bay
	Manawatū-Whanganui
	Marlborough
	Nelson
	Northland
	Otago
	Southland
	Taranaki
	Tasman
	Walkato
	West Coast
	West Coast Other (please specify)
	C this (piccos spectry)
Building code	
	cally about the Building Code – including the regulation that sets out building quirements, and the acceptable solutions and verification methods that are one way of compliance.
markets? Negativ No imp	ret does the Building Code have on competition in residential building supplies re impact on competition act on competition impact
Please tell us w	hv
ricase tell as w	

4. Please describe any areas of the Building Code that are **impacting** competition in the residential building supplies markets.

Please also include why you think these areas are impacting on the market.			
5. How could the Building Code be changed to enhance competition in residential building supplie markets?			
Please also include why you think the changes should be made.			
Thease also include why you think the changes should be made.			
Building Consent Process			
Now thinking about the Building Consent Process.			
The consent process covers applying for a building consent from a Building Consent Authority, inspections and the issuing of a code compliance certificate.			
 6. What impact does the Building Consent System have on competition in residential building supplies markets? Negative impact on competition No impact on competition Positive impact on competition Don't know 			
Please tell us why			
7. Please describe any areas of the Building Consent System that are impacting competition in residential building supplies markets.			
Please also include why you think these areas are impacting on the market.			

8.	How could the Building Consent System be changed to enhance competition in residential building supplies markets?
Plea	ase also include why you think the changes should be made.
Sta	ndards NZ
Sys	v thinking specifically about Standards New Zealand's regulatory framework (Standards NZ tem), including the process to update a standard referred to in the Building Code, an acceptable ution or verification method.
9.	What impact does the Standards NZ System have on competition in residential building supplies markets? Negative impact on competition No impact on competition Positive impact on competition Don't know
Plea	ase tell us why
10.	Please describe any areas of the Standards NZ System that are impacting competition in residential building supplies markets.
Plea	ase also include why you think these areas are impacting on the market.

11. How could the Standards NZ System be changed to **enhance** competition in residential building supplies markets?

Please also include why you think the changes should be made.			
CodeMark product certification			
Now thinking specifically about CodeMark product certification.			
 12. What impact does CodeMark product certification have on competition in residential building supplies markets? Negative impact on competition No impact on competition Positive impact on competition Don't know 			
Please tell us why			
13. Please describe any areas of CodeMark product certification that are impacting competition in residential building supplies markets.			
Please also include why you think these areas are impacting on the market.			
14. How could CodeMark product certification be changed to enhance competition in residential building supplies markets?			
Please also include why you think the changes should be made.			

Other areas

Please describe any other areas of the regulatory system, not covered in the previous questions, that you think		
15.	Are impacting competition and tell us why.	
16.	Could be improved to enable easier use of new or innovative building products and tell us why.	
 17.	Could be improved to enhance competition and <i>tell us why</i> .	
18.	If there's anything else you'd like to tell us about the role of the regulatory and standards system in the residential building sector and its impact on competition, please provide it below.	
Υοι	r company information	
OP	TIONAL	
	are not required to provide your name or business name when completing this survey, so that your ponse can be anonymous.	
19.	What is your company name?	

20. If you are happy for us to contact you to discuss any aspects of the survey please provide your

contact details below. These contact details will only be used for the Residential Market Studies Team to contact you for follow up about this survey.			
Name			
Email Address			
Phone Number			

Thank you for taking the time to complete our survey.

Your response will assist our study into whether competition is working well for the residential building supplies sector.

If you want to be kept up to date with progress on the study please subscribe to our mailing list.

More information on our market study can be found on our website.

Attachment G Additional maps of merchant stores

- G1 This attachment includes additional maps showing the location of major merchant stores that sold key building supplies during 2021. Chapter 7 includes similar maps showing merchant store locations for the North Island and South Island. 1087
- G2 Figure G1 below shows the locations of the five major building supplies merchants' stores in in Auckland.

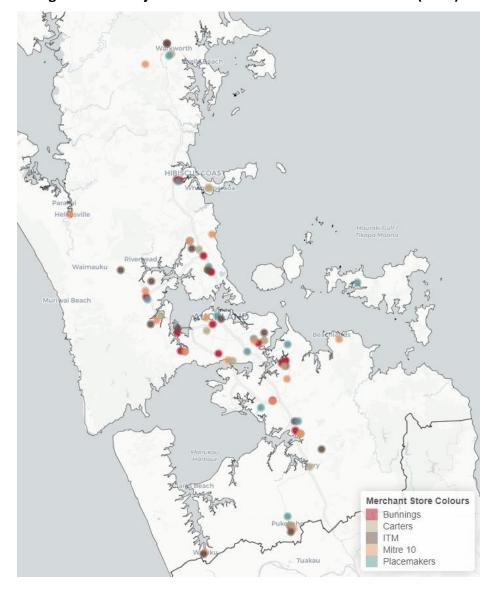


Figure G1 Major merchant store locations in Auckland (2021)

Note: In areas with multiple stores in close proximity, the markers may overlap and hide some store

Source: Commerce Commission analysis of information provided by the major building supplies merchants. 1088

These maps do not capture store openings or closures during 2022.

G3 Figure G2 below shows the locations of the five major building supplies merchants' stores in Wellington.

MAUNGARAKI LOWER HUTT BROADMEADOWS **Merchant Store Colours** Bunnings Carters MELROSE 6 MTI Mitre 10 Placemakers

Figure G2 Major merchant store locations in Wellington (2021)

Note: In areas with multiple stores in close proximity, the markers may overlap and hide some store locations.

Source: Commerce Commission analysis of information provided by the major building supplies merchants. 1089

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Figure G3 below shows the locations of the five major building supplies merchants' stores in Christchurch.

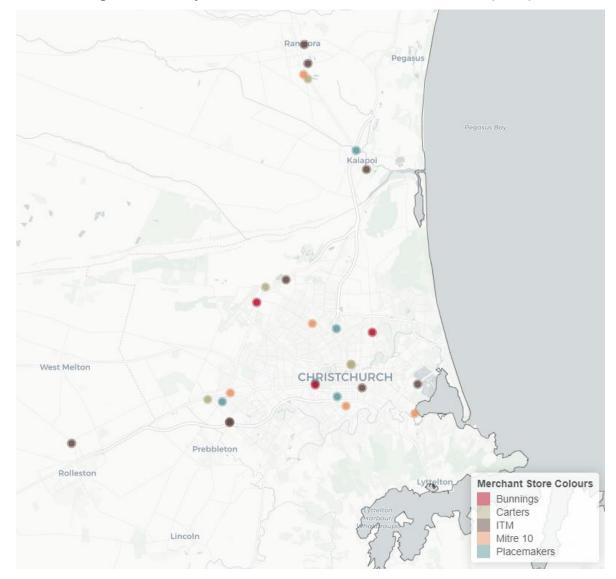


Figure G3 Major merchant store locations in Christchurch (2021)

Note: In areas with multiple stores in close proximity, the markers may overlap and hide some store locations.

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Source: Commerce Commission analysis of information provided by the major building supplies merchants. 1090

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G4 Figure G4 below shows the locations of the five major building supplies merchants' stores in Dunedin.

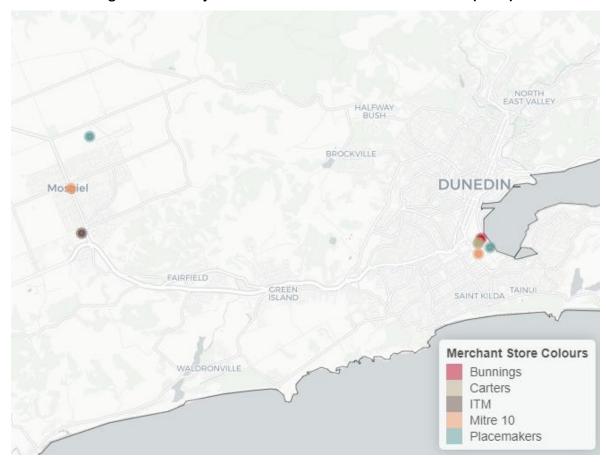


Figure G4 Major merchant store locations in Dunedin (2021)

Note: In areas with multiple stores in close proximity, the markers may overlap and hide some store locations.

Source: Commerce Commission analysis of information provided by the major building supplies merchants. $^{\rm 1091}$

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Rebates – stylised example Attachment H

- H1 As noted in Chapter 8, rebates offered to distributors by a supplier with a large market share can harm competition by reducing its competitor's ability to compete effectively. Some rebate schemes may induce strong incentives for distributors to achieve a minimum level of sales of the supplier's products, or a given market share. They may even encourage quasi or full exclusivity. This can hinder smaller competitors from competing by raising their costs and restricting their access to sufficient distributors, and ultimately customers, to achieve economies of scale. 1092
- H2 This attachment illustrates the way that different rebate structures can impact merchant decisions using hypothetical examples. For confidentiality reasons we do not use an example from an actual agreement between a supplier and merchant. However, we have observed similar rebate structures for key building supplies.
- H3 This attachment sets out hypothetical examples of:
 - H3.1 a tiered retroactive rebate scheme;
 - H3.2 a share of wallet rebate scheme; and
 - a tiered incremental rebate scheme. H3.3

Example of tiered retroactive rebate scheme

- Н4 Tiered retroactive rebates are agreements for suppliers to pay a merchant a rebate based on the total volume of the merchant's purchases from the supplier. The level of rebate varies according to the total volume purchased by the merchant in a set period. These rebate structures can strongly incentivise merchants to stock a smaller range of products, due to the incentives they create at the sales thresholds.
- H5 For example, suppose there is a good that can be purchased from a number of suppliers. The price of a unit of a good is \$10. There is a rebate arrangement between a particular supplier and the merchant for the purchase of the good with the following structure:
 - H5.1 At the end of each year, the supplier will pay the merchant a rebate of:
 - 10% on all purchases of the good if the total value of the merchant's H5.1.1 purchases of the good in the year are below \$10 million;

¹⁰⁹² See also, for example, the OECD roundtable discussion, which 'compares the incentives facing a target buyer under two types of discount scheme – incremental and rollback rebates. It also considers how the use of sliding scale discounts with rollback schemes can extend a dominant supplier's influence over a buyer. It argues that rollback rebate schemes provide more scope for profitable foreclosure than incremental rebate schemes.', OECD "Policy Roundtables - Loyalty and Fidelity Discounts and Rebates (2002) at Appendix 1, available at: https://www.oecd.org/daf/competition/abuse/2493106.pdf.

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- H5.1.2 11% on all purchases of the good if the total value of the merchant's purchases of the good is above \$10 million but below \$20 million;
- H5.1.3 13% on all purchases of the good if the total value of the merchant's purchases of the good are above \$20 million but below \$30 million;
- H5.1.4 15% on all purchases of the good if the total value of the merchant's purchases of the good is above \$30 million.

Table H1 below shows the cost to the merchant of buying one extra unit which would take them over each rebate tier threshold. It shows that this rebate structure creates strong incentives for the merchant to make additional purchases of the good when making marginal purchasing decisions around the step levels. This is because once the merchant exceeds the tier threshold, it is paid a higher rebate on all prior purchases, not just the additional volumes. It shows that when approaching each tier, the merchant will often face a negative marginal cost. For example, in the hypothetical example, this means that once the merchant has reached the \$10 million threshold, the decision to buying an extra unit may result in a reduction in total costs of \$99,991 rather than an additional \$10.

Table H1 Hypothetical example of negative price incurred at rebate tier levels

Purchase Value	Rebate level	Marginal cost of buying one additional unit at tier level ¹⁰⁹³
0	10%	
\$10,000,000	11%	-\$99,991
\$20,000,000	13%	-\$399,991
\$30,000,000	15%	-\$599,991

Source: Commerce Commission analysis. 1094

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For example, at the \$10,000,000 purchase value threshold, \$9,999,990 of purchases would cost: $$9,999,990 \times 0.9 (10\% \text{ Rebate}) = $8,999,991$. However, if we increased purchases by 1 unit to \$10,000,000 of purchase value, this would cost \$10,000,000 $\times 0.89 = $8,900,000$. The difference in cost is \$99,991, so the marginal cost of that unit is -\$99,991. This calculation has been repeated for the other two purchase value thresholds.

Table H2 Example of merchant making purchasing decision at the margins

	Case 1	Case 2
Units purchased	2,999,000	3,000,000
Purchase Value (Units x \$10 Unit Cost)	\$29,990,000	\$30,000,000
Rebate (Purchase Value x Rebate level)	-\$3,898,700	-\$4,500,000
Purchase Cost (Purchase Value – Rebate)	\$26,091,300	\$25,500,000
Difference		-\$591,300

Source: Commerce Commission analysis. 1095

- Table H2 above continues the hypothetical example and shows how the rebate structure influences decision making where the merchant has already purchased 2,999,000 units of the good from the supplier and is now considering the purchase of an additional 1,000 units. If the merchant buys the additional 1,000 units from its current supplier, it will reach a new rebate tier (15%) and which applies retroactively to all their purchases, not just the additional 1,000 units. Therefore, even if it does not need these extra units, or could obtain those units from other suppliers, the merchant is strongly incentivised to make additional purchases from the supplier with whom it has a retroactive rebate arrangement. This is because purchasing an extra 1,000 units will decrease the total cost of the merchant's purchases of the good. In the above example, purchasing 1,000 additional units decreases overall purchase costs by \$591,300.
- To induce the merchant to switch the additional 1,000 to another supplier, that supplier would not only have to match the rebate tier, but also compensate the merchant for the loss of the retroactive rebate that it would have received had it not switched.
- The effect of the retroactive rebate structure on a merchant's decision making and the ability of alternative suppliers to compete also depends on the volume of the merchant's total purchases of the good that are contestable by other suppliers; that is, the share of total purchases that the merchant is willing to shift to other suppliers. The proportion of sales that are contestable can also affect the incentives created by a particular rebate structure and the extent to which an alternative supplier would need to compensate the merchant for the lost rebate.
- H10 We illustrate these effects by continuing with the hypothetical example.

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- H11 We assume that the merchant forecasts demand at 3.1 million units (at a purchase value of \$31 million), and that due to the entrenched position of the incumbent, the merchant is unlikely to be able to switch all the stock to an alternative supplier. 1096
- H12 Assuming the merchant can switch 1.2 million units of purchases (that the contestable share is just under 40%, at a purchase value of \$12 million), the merchant would consider the impact of lost rebates when deciding which supplier to purchase these units from. The merchant would lose the following rebates if it switches to an alternative supplier:
 - H12.1 15% discount on the 1.2 million units no longer sold; and
 - H12.2 an additional 4% lost on the remaining 1.9 million units.
- H13 The merchant may switch supplier if that supplier is able to compensate the merchant for the lost rebates. However, the alternative supplier faces a disadvantage as they need to compensate for the discount on both lost rebates. An alternative supplier first has to make a 15% discount on the first 1.2 million units to compete with the first lost rebate. There is no asymmetry between the incumbent and the alternative supplier on this rebate.
- H14 However, to compensate for the lost 4% discount on the additional 1.9 million units of sales, the alternative supplier would have to offer a relatively higher discount (around 6%) on the first 1.2 million units than the incumbent supplier offers the merchant.
- H15 This means that unless the alternative supplier is able to offer a rebate of at least 21% on the 1.2 million units, the merchant is unlikely to be incentivised to stock the product (all else equal), which tilts competition in favour of the incumbent.
- H16 In practice, the impact of the rebate tiers varies depending on the expected share of sales the entrant is looking to win (or the merchant is looking to switch away), as well as the forecast for overall sales.
- H17 Figure H1 below shows, for our stylised example, the level of rebate an alternative supplier would need to offer to match the effective discount provided by the incumbent for different contestable shares of supply. If the contestable share of supply is small, the lost rebate can be relatively large due to the contestable share moving total purchases into different tiers.

¹⁰⁹⁶ We assume that both firms have identical cost structures, and that marginal cost is below average cost. If both firms had marginal cost equal to average cost for the additional units, the entrant would be able to compete with the incumbent's price.

60%

50%

40%

10%

10%

10%

15%

20%

25%

30%

35%

40%

45%

50%

55%

60%

65%

70%

75%

contestable share

discount required to compensate for rebate based on addittonal 5% share

discount required to compensate for rebate based on addittonal 5% share

Figure H1 Stylised example, showing the different discounts required for different contestable share levels assuming estimated total purchases are \$31 million for the period

Source: Commerce Commission analysis. 1097

H18 Figure H1 shows the merchant's expected purchases were 3.1 million with the example rebate structures in place set out in paragraph H5 above. If the contestable share was 5% (that is; a merchant would only ever consider switching 0.155 million units), an alternative supplier would have to compensate for the loss of the additional 2% rebate level across all sales equivalent to approximately \$822k. Since this large cost has to be spread over a relatively small purchase value, an alternative supplier would have to offer a rebate of over 50% to be cheaper than the incumbent's offering.

Example of share of wallet rebates

- A share of wallet rebate is an agreement between a supplier and merchant where the supplier agrees to pay the merchant a percentage rebate based on the total share of purchases from a category that the merchant made from the supplier. The rebate level applies to the total volume of purchases from the merchant in a given period.
- H20 For example, a share of wallet rebate might state that:
 - H20.1 a rebate of 4% will be given if a merchant makes at least 60% of its category purchases from the supplier party to the agreement;
 - H20.2 a rebate of 8% will be given if a merchant makes at least 80% of its category purchases from the supplier party to the agreement; and
 - H20.3 a rebate of 10% will be given if a merchant makes at least 95% of its category purchases from the supplier party to the agreement.

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- H21 Share of wallet rebates have a similar effect on merchants' incentives as retroactive tiered rebates. They can also make it harder for alternative suppliers to compete.
- To see this, using a similar example as above, suppose a merchant's total demand was 3 million units with a unit cost of \$10. If the merchant purchased all units from one supplier, they would get a rebate of \$3 million. If they were considering switching 0.3 million units of their purchases to another provider, their rebate would drop to 8% across all purchases. This would mean that the rebate payments would fall to \$2.16 million, a decrease of \$0.84 million. An alternative provider would need to compensate the merchant for this lost rebate which implies a rebate equivalent to 28% to compensate for the lost rebate.
- H23 On the other hand, share of wallet rebates set lower than 100% provide some headroom for merchants to consider alternative suppliers and some ability for those suppliers to compete for small shares of sales. For example, in this case the merchant would be able to switch just under 5% of their sales to another provider without being affected by the rebate structure.

Example of tiered incremental rebates

- H24 Tiered incremental rebates are agreements for suppliers to pay different levels of rebates back as a merchant reaches different volume levels. Unlike retroactive rebates, the higher tier is only payable on incremental sales above the threshold rather than the entire volume of sales. For example, such an arrangement might state that a supplier each year will pay:
 - H24.1 5% rebate back on all sales up to \$10 million;
 - H24.2 10% rebate back on all sales above \$10 million but below \$20 million; and
 - H24.3 15% rebate back on all sales above \$20 million.
- In this example, if a merchant were to purchase \$25 million of product, they would receive back \$500k rebate on the first \$10 million of sales, \$1 million back on the next \$10 million, and \$750k on the last \$5 million.
- Incremental rebates do not create the same very sharp incentives around tier points as tiered retroactive rebates do. If a merchant with \$22 million of total purchases was considering switching \$4 million to an alternative supplier, the alternative supplier would only have to match the weighted average discount from the proportion of sales across the relevant tiers covered by the contestable share to provide an equivalent price. In this case that would be 12.5%. While there is still some asymmetry, as the incumbent's average rebate discount across all sales is still lower than the rebate the alternative provider needs to provide for the contestable share, the differences are likely to be smaller than if this applied retroactively to all sales.

^{15%} for the \$2m of sales which had been above the \$20m volume threshold, and 10% for the \$2m of sales below the \$20m volume threshold.