



New regulatory framework for fibre: proposed approach

Cross-submission | Commerce Commission

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Executive Summary

As a retail service provider that is reliant on Chorus' fibre network for the mobile and fixed line services we provide to New Zealanders, Spark's priority in the Commission's Part 6 process is to ensure that the fibre regulatory framework designed by the Commission does not distort or foreclose competition in the markets we operate in. To that end, the issues we are materially concerned with are:

1. *How costs are allocated between the assets and services Chorus uses in competitive markets and the assets and services Chorus uses in regulated markets.* The Act tasks the Commission with designing clear allocation rules that ensure that Chorus does not foreclose or reduce competition by including assets and/or costs in its RAB that are part of its non-regulated competitive business.
2. *What principles the Commission sets to govern how Chorus must price services that support competing networks or services.* Chorus supplies, or will supply, a number of essential input services to networks and operators that compete with other Chorus services. The Act tasks the Commission with designing a framework that gives operators and end-users confidence that Chorus will not be able to undermine or foreclose competition in downstream markets through its pricing strategies.

In each of these cases, our principal submission has been that the Commission should prefer input methodologies with a greater level of prescription than it applied in the Part 4 process. In our view the extent of Chorus' involvement today in competitive markets, and the prospect of nascent competition emerging in Chorus' core markets, is sufficiently different to the competitive landscape within which Part 4 suppliers operate to justify a different approach.

Submissions support more specificity in the cost allocation IM and the creation of a Pricing IM

The majority of submissions received by the Commission supported this view, including submissions from Vodafone, Vocus, Trustpower and 2degrees.

In contrast, Chorus suggested that the Commission should leave much of the decision-making about how costs are allocated, and services prices, to Chorus. Chorus has clear commercial incentives to prefer allocations, and prices, that maximise financial returns to its shareholders, rather than long-term benefit to end-users. Its suggested approach usefully highlights exactly how these incentives will operate in the absence of clear Commission prescription. Chorus' submission reinforces our view that the Commission should set prescriptive cost allocation directions, and implement a detailed pricing IM covering:

- Pricing of anchor services and relativities between anchor and non-anchor services;
- Pricing of DFAS;
- Pricing of Layer 1 unbundled fibre services, and the relativities between layer 1 and layer 2 fibre services; and
- The processes by which Chorus will set and make changes to non-anchor prices.

Chorus is incorrect to suggest the Commission may only consider the promotion of competition in retail markets

Chorus also submits that in applying the fibre regulatory framework set out in the Act, the Commission may only consider the promotion of competition in retail markets rather than upstream markets (such as for the supply of intermediate wholesale input services). We see no evidence that the Act directs the Commission to consider specific markets, or to ignore others. Rather, we read the plain words of

the Act as directing the Commission to consider the promotion of competition in *any* relevant telecommunications market that is to the long-term benefit of end-users.

Accelerating particular input methodologies ahead of the rest is likely to create more uncertainty rather than resolve it

Chorus and other submitters also ask the Commission to determine particular Part 6 IMs ahead of others. Chorus, for example, suggests the Commission should determine RAB and WACC IMs early. While we have sympathy with submitters' desire for early certainty, in our view determining any IM early is unlikely to be realistic as it would trigger the appeals process from the time the determination is made and raise the prospect of parties being involved in appeals while the process to determine other IMs is ongoing. In our view any acceleration of particular IM ahead of others is more likely to create false impressions and/or result in misplaced reliance by investors when other important IMs (such as cost allocation and pricing) remain undecided. This will create more uncertainty, not less.

All of the available evidence suggests Chorus did not incur any actual losses in the period between 2011 and 2022 but in fact achieved an average return on equity in excess of any estimation of a normal return

Finally, other submitters also commented on the need for the Commission to include only those losses that were actually incurred by Chorus as an entity in the period prior to 2020.

Submissions received from a number of parties agree that these losses, if any, must be actual losses and that any returns referred to by the Act must be returns at a shareholder level. In each case, the Commission must consider Chorus's entire business when calculating these losses and unrecovered returns, rather than consider a "UFB-only" version of Chorus.

We see no rational basis for the proposition that Chorus either expected to, or in fact did, accumulate any losses from its fibre investments during the period prior to 2022. In fact, as Vodafone's submission identifies, Chorus' shareholders have received an average return on equity during the period in question of 24.4% - well in excess of any reasonable 'standard' measure of profit.

Indeed, it seems to us that the only way that one could feasibly arrive at the conclusion that Chorus expected to – and did – incur a financial loss is if artificial constraints are placed on the calculation itself. An obvious example is if the Commission either does not consider profits that Chorus has earned – and continues to earn – from copper services, or does not consider the funding provided to Chorus under the current regulatory framework that was designed specifically to enable Chorus to undertake fibre access network investment. Another is if the Commission inappropriately allocates common costs to fibre services, either creating or exacerbating financial losses in the process.

In our opinion, the estimation and application of what would, in truth, be an artificial/illusory financial loss would be most unfortunate. It would constitute a windfall gain to fibre operators that took money out of the pockets of end-users for no efficiency benefits whatsoever. The Commission must find a way to ensure that the rules it sets for Chorus' regulated fibre services under Part 6 do not allow Chorus as a whole to extract excessive profits to the detriment of consumers. In our view, an approach to calculating financial losses that did not take into account the factors listed above and others described in the Vodafone submission – including past excess profits – would clearly risk resulting in double-counting and over-recovery.

Given the weight of available evidence against the existence of any actual loss, we submit that the onus should be put on Chorus to show evidence of any actual losses incurred during this period.

Introduction

1. Thank you for the opportunity to comment on submissions on the Commission's proposed approach for developing and implementing the fibre regulatory regime set out in Part 6 of Act (**the approach paper**).
2. In our earlier submission we noted that the Part 6 framework and characteristics of our sector mean that, while the Commission can draw on relevant aspects of its Part 4 experience, it will need to take a fresh look at key aspects of its regulatory approach. In particular, we emphasised the relevance and importance of getting the promotion of competition and competitive outcomes right. Vodafone echoes these sentiments in its submissions and articulates crisply a number of relevant aspects to which the Commission is mandated to give consideration in order to meet the dual statutory competition purposes when implementing the new framework.
3. Submitters agree on many aspects of the proposed approach; including: that the promotion of competition is a key consideration; that Commission decisions will have material implications for competition; and that the assessment of past losses requires a different approach to that going forward. Retail service providers' submissions also highlight the importance of protecting and promoting competition in the Part 6 framework.
4. However, there are differing views on the nature of competition that should be promoted and how the model should apply in practice. These differences have significant implications for potential competition, the availability of innovative new services and end user prices.
5. In this submission we comment on the key issues raised in submissions:
 - a. The prioritisation of IMs and required prescription in key IMs;
 - b. Purpose statement and application of the FCM principle;
 - c. Pricing principles;
 - d. Issues relating to assessment of past losses; and
 - e. Other issues such as WACC parameters, cost allocation and scope of regulated services.

Process for developing fibre input methodologies

Prioritisation and bringing forward of specific IMs

6. Submitters have requested aspects of the regulatory framework be resolved early to provide certainty for parties. For example, Chorus has asked that the Commission prioritise and determine RAB and WACC input methodology (**IMs**) parameters early. It is understandable that Chorus wishes to see aspects of the regulatory framework resolved swiftly in order to provide greater certainty to its investors.
7. However, while it makes sense to prioritise and focus on some issues, it is difficult to see how any clear decision can realistically be made in advance of others.
8. Firstly, from a practical perspective, even if the Commission was inclined to entertain Chorus' request, it seems unlikely that it could feasibly quarantine the RAB and WACC IMs and determine them in isolation from other key aspects of the regulatory framework. There are crucial interdependencies with other aspects of the framework that would preclude such a sequencing including, for example:

- a. The initial RAB value would be influenced to a material extent by the applicable common cost allocation methodologies and the approach to past losses, yet these are complex and contentious matters that underly many aspects of the IMs; and
 - b. The WACC must be aligned to decisions relating to where key risks are born, and these risks will be related to other aspects of the model, i.e. forecasting and allocation of demand risk and how the wash-up will work.
9. The Commission recognised these interdependencies in its Part 4 approach. For example, it has observed in the past that it is the IMs in combination with each other, and with other requirements, that IMs will provide incentives to act in a manner consistent with the Part 4 purpose.¹
 10. Secondly, while the desires of investors are relevant, the Commission is tasked with promoting the interests of *end users*. Accordingly, when prioritising IMs the Commission's thought experiment arguably should not be: "what provides most certainty to Chorus' investors?" but, rather: "what would best promote competition or competitive market-like outcomes in the long-term interests of end users?"
 11. To that end, Vodafone proposes that the Commission focus on addressing fibre unbundling questions early - the nexus between the provision of this early guidance and the promotion of end users' interests seems clearer in this instance. However, practical questions again remain regarding the feasibility of providing the answers that Vodafone is seeking in isolation from other core aspects of the regulatory framework that may have a key bearing on those matters.
 12. Indeed, providing early information on certain aspects of the framework can have unintended and undesirable consequences. By way of illustration, Pat Duignan noted in his submission that the Commission may have cause to be concerned that any early RAB estimates might be misconstrued as indicating an emerging view. We agree with this reservation. Parties will want to know whether an early decision can be relied upon or whether it remains subject to amendment following inputs from subsequent decisions. Early Commission decisions may further (with or without formal publication in the Gazette) be seen as triggering the appeals notification process. Put simply, all information related to key matters such as RAB and WACC should be accompanied by suitably clear 'health warnings', lest the material be misinterpreted.
 13. Overall, we believe that prioritisation in terms of the provision of careful guidance and emerging views – and separate workstreams to consult on some aspects of IMs (as occurred under Part 4) - could be applied. However, we do not believe the Commission can realistically make IM decisions beyond setting out an emerging view in advance of other IM decisions.

A principle versus prescriptive IM

14. In its report prepared on behalf of Spark, Axiom Economics highlighted the strong commercial incentive that Chorus would have under the new framework to act in ways that would serve to hinder and foreclose potential rivals. It highlighted in particular the approaches that Chorus might seek to take to allocating common costs and the specification of pricing principles. Axiom consequently cautioned that the IMs would need to be sufficiently prescriptive to preclude Chorus from acting upon those understandable financial incentives.
15. Frontier Economics echoed similar concerns in its report prepared on behalf of Vodafone. It concluded that there is a strong case that the adverse consequences of any misallocation of common costs would be material in this instance. Like Axiom, Frontier noted, for example, that

¹ For example, see 2.4.13 in the 2010 Airport IM Reasons Paper.

Chorus has strong incentives to allocate as much of the common costs incurred to the regulated fibre services as possible.² The risks to which Axiom and Frontier alluded are reinforced by Chorus' submission. It has – entirely unsurprisingly – recommended an approach that:

- a. Potentially allocates a significant proportion of assets and operating costs to the regulated fibre network, while minimising the risks attributable to the non-regulated business; and
 - b. Reserves for itself a considerable degree of discretion that would enable it to act on its understandable financial incentives to leverage its substantial market power over FFLAS into adjacent and downstream markets.³
16. This proposal serves as a timely reminder that Chorus can, naturally, be expected to advocate approaches that promote its own financial interests. In this instance, for the reasons set out in the Axiom and Frontier reports, it would be inappropriate to extend to Chorus the discretion that it is seeking. Rather, in our view, it should heed the warnings articulated in those reports and err towards a more prescriptive regulatory approach when determining key IMs such as cost allocation, the RAB and pricing principles.
17. Further, a prescriptive approach will likely support the Commission achieving its tight timetable for Part 6 implementation. Decisions over key model parameters such as cost allocation and demand/revenue assumptions will make a significant difference to the MAR and prices. There have been significant differences between regulated firms proposed and regulator determined cost models in the past. For example, Analysys Mason developed a UCLL cost model for Chorus that suggested UCLL implied costs of over \$70 (the Commission eventually settled on \$30).⁴
18. Accordingly, from an implementation perspective, the Commission may wish to avoid an approach whereby Chorus has discretion over key parameters and puts a proposal to the Commission late in the process.

Purpose statement

19. A key aspect in submissions is the scope and relationship of the s162 and s166 purpose statements. Chorus has suggested that the Commission should prioritise competition in retail markets for FFLAS. We disagree with Chorus' proposed approach, which we interpret as a request that the Commission assume the existence of a structural wholesale monopoly. That is not a factually correct starting point nor an efficient assumption when required to promote competition and competitive outcomes. We read the Act as directing the Commission to consider the promotion of actual competition at all levels of the value chain, on the basis that competition at each level of the value chain can be expected to result in long-term benefits for end-users, even where they do not participate directly in the relevant intermediate markets.
20. Section 166(2) is clear that the s162 purpose and the promotion of competition across all telecommunications markets are equally important. While in some cases the Commission can determine that s166(2)(b) is not relevant, in practice we consider that there would be few situations where that is the case. As s166(2)(b) is equally important to s162 and applies across all

² Frontier Report [ref] page 18.

³ Under Chorus' proposed approach, for example, it would have discretion to consider and propose methodologies for allocating costs to competitive parts of its business and retain assets in the regulated RAB for which competition has developed.

⁴ See https://comcom.govt.nz/data/assets/pdf_file/0028/87580/Chorus-UCLL-TSLRIC-user-guide-1-December-2014-PUBLIC.PDF

telecommunications markets, we do not consider that there is a basis to find that retail competition for FFLAS should be prioritised.

21. For the same reason, we consider that in practice sections 162 and 166 are complementary. By ensuring that the regulatory settings do not distort or hinder the emergence of downstream competition, end users of FFLAS are the beneficiaries of that competition in the long term.
22. The Act does not specify the form of competition that it must promote - the Commission must be open minded in its consideration of outcomes that are in end user interests. In this case, we also note that:
 - a. The Part 6 framework is different to that applying to Part 4. In terms of Part 4 EDBs, the Electricity Authority 4 has complementary functions to promote efficiency and competition;
 - b. There are a number of open access wholesale only models applied in a number of jurisdictions. These models anticipate fibre being made available for deployment by competing providers;⁵
 - c. Infrastructure competition deeper in the network is generally seen as supporting investment and innovation. On the face of it, Chorus is asking the Commission to suppress what is generally seen as a preferred form of competition.
23. In our view, in any case, the interests of FFLAS end users are best promoted (s162) if potential competition (which will often require Chorus inputs) can develop unhindered. This is an example of the complementary nature of the s162 and 166 purpose statements. I.e. promoting competition in other telecommunications markets is likely to also be in the best interests of FFLAS end-users in the long term.

The relationship between s162 and s166

24. Chorus further suggests that the Commission adopt a limited application of s166 and find that s162 outcomes should have precedence or primacy over other considerations. We disagree with the view that the legislative history (spanning successive governments) requires subservience of section 166 to section 162. Rather, we see the sections as equally important and complementary. This is clear from the words used in section 166.
25. Section 166(2)(b) provides that a mandatory relevant consideration for the Commission prior to making a decision, is to consider whether a broader competition lens would deliver a different outcome. While we think there will be very few instances when a broader competition lens will produce a different outcome to what we'd expect to see when the 162 purpose is applied, the Commission will be required to recognise that this may occur, and it must accordingly consider the broader competition outcomes at the relevant juncture. This feature is materially different to the Part 4 considerations.

Applying the FCM principle

26. Chorus' submission highlights the difficulty of applying the financial capital maintenance (**FCM**) principle in our context and in a way supported by Part 6 of the Act.

⁵ For example, overseas models anticipate fibre being a neutral platform available to wireless and fixed line operators. See this WIK report: https://www.stokab.se/Documents/Nyheter%20bilagor/The%20role%20of%20wholesale%20only_WIK.pdf.

27. Chorus' proposals have the effect of applying the FCM principle narrowly to its fibre network, setting aside the contribution or efficiencies available to it as both a provider of copper based broadband and the Crown investment partner. In contrast to the Part 6 objectives to promote competition, Chorus would also be shielded from the impacts of competition and deregulation by retaining assets in the RAB.⁶
28. The proposed settings would inevitably overstate costs and fail to share efficiencies with end users. It is unlikely that Part 6 permits a regime that undermines or distorts beneficial outcomes in this way.
29. We believe the Commission should apply any FCM based principle with care, avoiding consideration of only a narrow and asymmetric range of costs and benefits. For example, the Chorus demerger scheme booklet sets out key factors in deciding to enter in to UFB arrangements (and commit to invest in UFB fibre) was to avoid a Crown subsidised competitor building an over-lay network and to reduce regulatory compliance costs.⁷ Investors' expectations were based on wider concerns than incremental fibre return in isolation.
30. Accordingly, as set out in our submission, FCM can't be applied mechanistically as proposed. It requires a pragmatic assessment of costs and risks faced by the regulated provider, and in light of the Part 6 framework and internally consistent with other regulatory settings, i.e. removing double recovery and consistent with incentive/risk allocation. This will require a wider perspective than Chorus' targeted/specific proposal.

Pricing principles

31. Our submission and the accompanying report by Axiom Economics explained why Chorus would have incentives to set its prices in ways that reduce or foreclose potential infrastructure- and access-based competition if the regime provides it with sufficient flexibility to do so. The Axiom report provided several examples of the potential for such harm, including the pricing of the DFAS and the relative pricing of layer 1 versus layer 2 services. We consequently concluded that:
 - a. It is imperative that the Commission uses its broad legislative discretion to set IMs to prepare a bespoke pricing principles methodology; and
 - b. When preparing any such methodology, the Commission should err on the side of more prescription rather than less, given the incentives that Chorus would have to exercise any residual discretion in ways that may compromise competition.
32. Given the very early stage in the process our submission did not offer an opinion on the precise form a pricing principles IM might take, or on the desired level of specificity. There is a spectrum of potential approaches that the Commission might feasibly employ in this regard. At one extreme, Chorus could be provided with carte blanche to set whatever prices it liked, i.e. no prescription whatsoever. At the other extreme, the Commission could mandate a highly prescriptive methodology that effectively removed all discretion from Chorus, i.e. the Commission could, in effect, set all prices for all services itself.

⁶ Chorus also argues that the regulated return should also reflect demand and stranding risk from potential competition. On the face of it, this appears to be doubling recovery with no apparent end user benefits.

⁷ As set out in the demerger booklet, key drivers for Chorus participation in UFB include avoiding competition and loss of customers (to an alternative Crown partner) and to reduce operational separation regulatory impost. An assessment of investor expectations would need to recognise all benefits. Further, the scheme booklet sets out that the post 2019 fibre price may very well be lower or reduce Chorus profitability. In other words, there was no expectation of a guaranteed return on investment above that expected from the prices negotiated with CIP (CFH) at the time.

33. In our opinion, neither of these extreme approaches would be appropriate in the current circumstances. The problems associated with allowing Chorus pricing freedom are well-cavvassed in Axiom's report and elsewhere (e.g. in Frontier's report for Vodafone), and a 'fully-prescriptive' approach is likely to be overly complex, costly and impractical. The right balance must therefore lie somewhere in between these polar examples. There are various ways in which more layers of specificity could be introduced into a methodology within these extremes. For example (note that this is by no means an exhaustive list):
- a. A methodology could be guided simply by a series of high-level principles, e.g. that prices be non-discriminatory and remain subsidy-free, thereby providing the business with a very broad degree of discretion when setting individual prices (the principles that are applied to regulated gas pipeline businesses provide one such example);
 - b. An approach could specify a particular pricing methodology (e.g. benchmarking), but leave the design and application of that approach largely at the discretion of the regulated business (the Commission's approach to common cost allocation under Part 4 – which requires an accounting-based allocation – bears some resemblance to this approach, albeit in a slightly different context);
 - c. A methodology could identify a particular pricing approach and also dictate the way in which certain aspects are to be undertaken, e.g. it might explicitly identify which costs are to be included in tariffs and how they are to be allocated (the Electricity Authority's various proposed reforms to transmission pricing over recent years exhibited this degree of prescription).
34. We do not currently have a firm view on how best to strike the right balance between principle and prescription. That said, we remain of the opinion that an approach that lies more towards the prescriptive end of the spectrum of options seems more likely to fulfil the applicable statutory purposes. For example, of the three approaches listed above, we believe that something resembling the third is most likely to be appropriate. Insofar as the scope of that methodology is concerned, we are again to arrive at a firm view. However, our preliminary thinking is that the approach would need to encompass, at a minimum:
- a. The pricing of anchor products, i.e. a relatively prescriptive specification of how Chorus is to set prices for these core services;
 - b. How Chorus should determine the relativities between prices of anchor and non-anchor services, i.e. even if the methodology does not prescribe particular prices for non-anchor services, it should at least specify how those differentials should be set;
 - c. The pricing of the DFAS and future backhaul services, especially in light of the potential for the price level of this service to impact upon competition from wireless technologies, i.e. there should be a detailed description of how Chorus should set the price for this component;
 - d. The pricing of layer 1 versus layer 2 services, particularly given the strong incentives that Chorus is likely to have to engage in price squeezes, or to apply the 'efficient component pricing rule' in ways that foreclose potential competition and future dynamic efficiency benefits.
 - e. The processes by which Chorus will set and make changes to non-anchor prices, i.e. the germane considerations, frequency and process for changing prices. Further, guidance should be provided on processes to ensure non-discrimination between access seeker and Chorus' own inputs may be required.

35. Other submitters expressed similar sentiments to those set out above. For example, Vodafone supported the inclusion of a pricing methodology and suggested that it could specify principles that could guide Chorus in setting the relativities of non-anchor products. It also emphasised the importance of the relative pricing of layer 1 and layer 2 services, given the stated intention of some providers – itself included – to procure dark fibre services. Vodafone notes that the existing EOI should be applied in a way that permits efficient layer 2 unbundling. We agree, although we note that Axiom has highlighted several complex issues that would need to be worked through in order to achieve that outcome [page 29].
36. Trustpower was also supportive of pricing principles. It suggested that the Commission set out, amongst other pricing related matters, the principles fibre providers need to apply when developing the pricing of wholesale services and the process by which price structures and quality dimension should be amended in response to changes in relevant markets and technologies [2.1.5]. We agree with these observations.
37. Further, the Commission should consider how pricing guidance or transparency can be achieved by LFCs subject to information disclosure. In terms of information disclosure (ID), LFCs should be required to explain the pricing methodologies they have chosen, and whether they are consistent with the pricing principles/methodologies established by the Commission. This could also be an ID requirement on Chorus to, in effect, prove compliance with any pricing methodologies.

Past losses

Chorus must provide clear evidence of a financial loss

38. In our opinion, the burden of proof should be squarely on Chorus to establish that it has suffered a financial loss during the initial period of the UFB build, and to provide compelling evidence of the quantitative extent of that loss. In the absence of that evidence, the assumed level of financial losses should be zero, i.e., there should be no presumption that losses exist. Indeed, there is very good reason to think that Chorus has suffered no financial detriment.
39. As Vodafone highlights in its submission, it is inconceivable that Chorus would have agreed to undertake the UFB build if it thought it would incur losses by doing so. Such an outcome would clearly not have been in the interests of its shareholders and can consequently be safely dismissed. Nor could Chorus rationalise such a decision by stating that it expected to incur losses but believed nevertheless that the regulatory framework would ultimately ‘make good’ on those outlays. Given the substantial uncertainty that existed surrounding the future design of the regulatory framework any such decision would have been financially reckless.
40. Accordingly, the logical assumption is that Chorus did *not* expect to incur financial losses when it contracted with (then) Crown Fibre Holdings to undertake the UFB deployment in its designated areas. It would certainly have expected to incur substantial costs but also to earn substantial revenues during a period of transition. More specifically, from an economic perspective, it can be presumed to have expected that the additional costs that it would incur from undertaking the roll-out would be outweighed by the revenues that it would receive. There is every reason to think that this core economic criterion has been met. As Vodafone highlights:
 - a. The incremental costs of the UFB build were largely known upfront, and in many cases actual costs incurred by Chorus are at the bottom end of forecasts;
 - b. Chorus can reasonably have been expected to have set prices so as to recover those up-front costs – any other approach would have been inexplicable;

- c. It is widely acknowledged that the deployment of the UFB was being at least partly funded through existing copper prices, i.e. for the UBA and UCLL services; and
 - d. The up-take of UFB services has exceeded everybody's expectations.
41. Against this background, it is very hard to imagine that Chorus either *expected* to make a financial loss when it initially contracted to provide UFB services, or that it has *actually made* a loss, given what has actually transpired in the meantime. The evidence of Chorus' outturn financial performance over this period provided by Vodafone appears to support this view. Vodafone has estimated that, post-structural separation, Chorus has earned an average return on equity of 24.4% - well in excess of any reasonable 'standard' measure of profit.
42. The altogether more likely scenario would therefore seem to be that Chorus has been earning – and continues to earn – significant excess profits on sales of its copper services. Chorus therefore anticipated the continuation of those returns during the UFB roll-out period which, as we noted above, would at least partly underwrite the incremental build costs. Those excess profits, when coupled with incremental fibre revenues would consequently be more than sufficient to cover the additional investment costs.
43. Indeed, it seems to us that the only way that one could feasibly arrive at the conclusion that Chorus incurred a financial loss is if artificial constraints are placed on the calculation itself. An obvious example is if the Commission either does not consider any excess profits that Chorus has earned – and continues to earn – from copper services or consider the funding provided to Chorus by the current regulatory framework which was designed to provide sufficient funds to Chorus to enable it to undertake fibre replacement investment. Another is if the Commission inappropriately allocates common costs to fibre services, either creating or exacerbating financial losses in the process.
44. In our opinion, the estimation and application of what would, in truth, be an artificial/illusory financial loss would be most unfortunate. It would constitute a windfall gain to fibre operators that took money out of the pockets of end-users for no efficiency benefits whatsoever. It is difficult to see how such an approach could be consistent with the requirement in s162(d), which directs the Commission to limit Chorus' ability to extract excessive profits. In our view, an approach to calculating financial losses that did not take into account the factors listed above – including past excess profits – would clearly risk resulting in double-counting and over-recovery.

Financial losses determination in practice

45. An underlying difficulty with assessing past financial losses is that it is inherently backward-looking. While Part 6 regulation applies to fibre services, we know that the costs and efficiencies relating to that service are derived from Chorus as a whole. We also know from Vodafone's submission that the current regulatory framework provided more than sufficient funding through the period of transitioning from copper to fibre network. It's difficult to see how financial losses can be identified under these circumstances.
46. Nonetheless, if despite the overwhelming evidence of no losses the Commission wishes to calculate a loss, then it will need to:
- a. Address the double recovery risk highlighted in submissions; and
 - b. If the Commission accepts Chorus' wider construction of the losses, it will further need to consider the significant benefits that accrued to Chorus from being a UFB provider.

47. A financial losses assessment that: ignores the contribution to costs inherent to the current framework; the efficiencies from operating and transitioning the broadband network; and high ongoing returns will inevitably lead to double counting and excessive profits.
48. A number of useful principles are emerging from submissions on what would be required in practice, i.e. the Commission should ensure there is no double counting, common costs should not be allocated to a new fibre network until it is profitable, losses must relate to actual losses incurred, and that the return on equity is the key outcome.
49. Pat Duignan observed, for example, that it is not obvious what the term “returns” in Part 6 could refer to other than returns to equity [page 2]. We agree with Mr Duignan that the methodology must remain focused on shareholder equity returns. Further, financial losses assessment must be based on actual financial losses incurred, avoiding illusory losses by, for example, creating a regulatory arbitrage or foregone super normal returns.
50. In addition to noting the logical inconsistency between Chorus UFB expectations and achieved returns and any losses, Vodafone notes that fibre services would not have been required to cover common costs. This is consistent with the Commission’s Part 4 approach (OVABAA) and supported by Commission expert advisors. We believe the current framework leaves Chorus fully funded and allocating already recovered common costs can only double count costs.
51. However, the Commission would need to go further than consideration of common cost allocation, it will need to address the double recovery that would result from applying regulatory pricing approaches in parallel and high returns observed by Vodafone over this period.

Crown funding

52. Chorus suggests that Crown financing adjustment should reflect the economic benefit to Chorus of financing received. Chorus argues that financing came with other obligations that should be considered as part of the funding cost, i.e. phasing and specification of the roll out, and the Crown step in option.
53. We can see practical difficulties with Chorus’ proposed approach. On the face of it s177(3)(b) provides a pointer that the focus should remain on *actual* funding costs incurred rather than wider costs or benefits brought about by funding arrangements.
54. Accordingly, in our view s177(3)(b) suggests a narrower assessment of funding, avoiding a wider and controversial debate over drawing a boundary around - and assessing - the value of UFB arrangements, i.e. consideration of whether step-in rights should be considered part of the funding cost and if so what its value is.
55. Nonetheless, we agree with Chorus that the UFB arrangements has wider benefits and costs, and that the commitment to invest in fibre infrastructure is part of the arrangements. For example, as set out in the scheme booklet, shareholders believed the UFB “business case” value included avoided over-build (by a Crown funded competitor) of the Chorus copper network with associated revenue loss and removal of costly operational separation obligations. These are significant benefits that would also need to be taken in to account alongside Chorus’ proposed costs.

Other

WACC

56. Chorus has proposed that the WACC recognise (claimed) higher levels of: systematic risk in UFB and greenfields; leverage; stranding risk and exposure to regulation. Chorus also suggest that an uplift is justified.

57. Chorus' proposed approach implies a fundamental and significant rethink of key parameters and would require detailed investigation. Even if the Commission had intended to predominantly adopt its past approach to WACC, this is unlikely to be possible in practical given Chorus' proposal. In which case, the Commission may wish to:
- a. Further develop means to promote end user engagement, for example:
 - i. Consider the options to more fully reflect New Zealand consumer concerns as set out in our earlier submission; and
 - ii. Reviewing concerns of overseas consumer group participating in similar exercises relating to the outcomes of these models, particularly as it relates to WACC parameters which are widely seen by consumers as over-stating the returns for regulated entities. For example, Australian consumer representatives have expressed concerns at the returns of such models and we see these concerns consistently across consumer groups.⁸ As Oxera note, there concerns are is growing public concern with the outcome of these models and that includes WACC outcomes;
 - b. Review in more detail recent thinking of overseas regulators and how this might apply to the New Zealand context. The WACC rates appear to be declining in overseas jurisdictions and regulators are considering the inefficient distortions resulting from currently determined WACCs. For example, the Australian Electricity Market Commission (**AEMC**) recently found that current approaches appear to overstate required returns and this can promote inefficient investment. In our context, this would have more significant impacts as the regulatory model is also more likely to promote inefficient expansion in to potentially competitive markets.

Cost allocation

58. Chorus has argued for cost allocation based on cost causality. Chorus further noted it is in the best position to identify appropriate allocators and should put this to the Commission as the first step. Chorus also intends by a dynamic approach being required to reflect changes in sharing over time.
59. These proposals would leave significant discretion with Chorus, which we do not believe is appropriate given Chorus' strong commercial incentives to foreclose competition where possible. Vodafone sets out a range of allocation options and notes potential concerns with some options that would be available to Chorus.
60. Further, we do not believe this uncertainty could be resolved by mandating that Chorus apply general accounting standards. Accounting standards are not intended to resolve cost allocation questions of this nature and leave significant discretion to the reporting firm. For example, firms will typically allocate costs for the purpose of facilitating the differing accounting treatment of operating versus capital costs or to provide investors better information relating to the firm's performance.⁹ These are different considerations to those required for regulatory pricing and the promotion of competition. The Commission has not relied on GAAP compliance for Part 4 and,

⁸ See the AER Consumer Challenge Panel summarises consumer concerns and regulator responses in its August 2018 presentation https://www.aer.gov.au/system/files/CCP16%20-%20Public%20forum%20presentation%20-%202020August%202018_0.pdf.

⁹ For example, the Conceptual Framework for Financial reporting notes that the purpose of financial reporting is to provide financial information about the reporting entity that is useful to existing and potential investors, lenders and other creditors in making decisions relating to providing resources to the entity [1.2]. <https://www.xrb.govt.nz/accounting-standards/conceptual-frameworks/>

given the significant concerns relating to Chorus incentives here, is unlikely to be sufficient in this case.

61. This is one of the areas where we consider that far greater prescription is required to achieve the purposes of Part 6 and where a broad set of principles like GAAP provides too much discretion for Chorus to game the regulatory regime.
62. Cost allocations on this basis can result in a range of outcomes, some of which will impact on competition. Further the dynamic model Chorus propose may result in transferring in copper costs. We've proposed a stand-alone cost cap be applied to allocations. In practice, this could be a principle that if any allocations exceed a benchmark level then the Commission will look closer at cap allocations.

Scope of regulated services

63. Chorus also argues that the ICABs service is not part of the regulated service. We use the ICABs service is often used for connecting, for example, a DFAS access tail (which is a connection to the local exchange) to an exchange with UFB handover points.
64. Chorus suggests that its view is supported by:
 - a. Comparison to Part 2 of the Telecommunications Act which differentiates between regulated access tail services and backhaul; and
 - b. The definition of *fibre handover point* which implies each end user location is associated with a single UFB handover point and, therefore, the regulated service does not extend to any other handover point. All other services are out of scope, including ICABs.
65. We don't support this approach – the Act does not limit FFLAS services that are supported by the fibre network. The definition of end user point and UFB handover point set the extent of regulation (together with a requirement that they are fibre services) not the nature of the services. Therefore, in our view it is open to the Commission to regulate service that interconnect with or provide access to the fibre network.
66. Nonetheless, we agree the Commission will likely need to consider the treatment of some ICAB routes. For example, some ICAB services may relate to exchanges and routes than could be deemed competitive. However, we don't believe the definitions in the Act in themselves support carving out services as Chorus propose. We are keen to avoid the Commission applying definitions that result in services that use components of the Fibre Network in parallel falling in and out of the scope of the regulatory model by virtue of regulatory definitions, i.e. both should have a cost or revenue accounted for in the BBM.
67. In any case, there is likely to be additional clarity on this point when draft regulations are released.

[END]