

# Introduction to building blocks – in the context of fibre regulation

### Stakeholder workshop

**10 December 2018** 

Fibre regulation team



#### Overview



#### We propose to apply the Building Blocks Model (BBM) to the fibre regime



What do we mean by Building Blocks Model (BBM)?



How will BBM apply to the regime for fibre?





What we have said in our proposed approach paper on BBM



An explanation of the key components of BBM





## Part 6 of the Telecommunications (New Regulatory Framework) Amendment Act 2018



#### 162 Purpose

The purpose of this Part is to promote the long-term benefit of end-users in markets for fibre fixed line access services by promoting outcomes that are consistent with outcomes produced in workably competitive markets so that regulated fibre service providers—

- (a) have incentives to innovate and to invest, including in replacement, upgraded, and new assets; and
- (b) have incentives to improve efficiency and supply fibre fixed line access services of a quality that reflects end-user demands; and
- (c) allow end-users to share the benefits of efficiency gains in the supply of fibre fixed line access services, including through lower prices; and
- (d) are limited in their ability to extract excessive profits.





### What do we mean by Building Blocks Model (BBM)?



#### **Working definition for today**

Method for calculating the revenues or profitability for a regulated firm from the sum of their their actual and forecast costs for a period

#### Things to note for todays session

Based on conventional regulatory accounting

- Utility style regulation
- Applied in our regulation of Energy Networks and Airports under Part 4 of the Commerce Act 1986

Assumes an allowance for the firm to have the opportunity to earn a normal return

- In line with the purpose statement of Part 6 of the Telco Act
- In line with the economic principles outlined in our proposed approach paper

Includes a 'rolled forward regulated asset base'

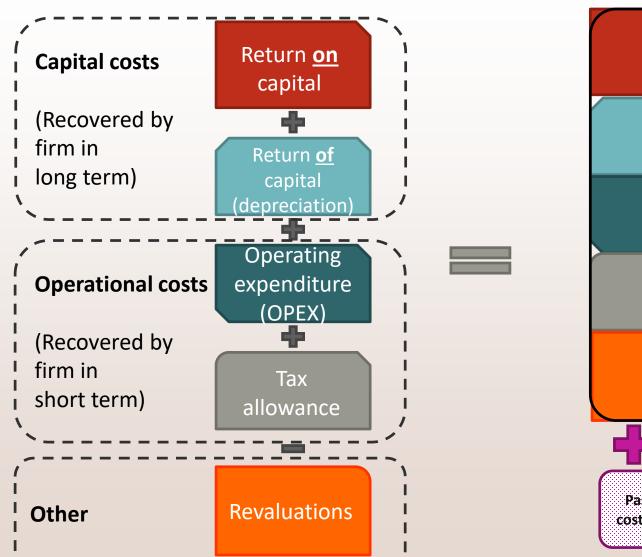
- Capital expenditure recovered over time, and carried between regulatory periods
- Operational costs allowed for in the short term

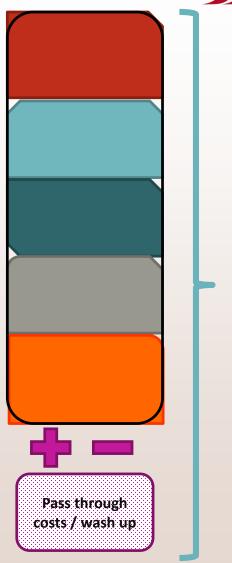




#### Overview - BBM







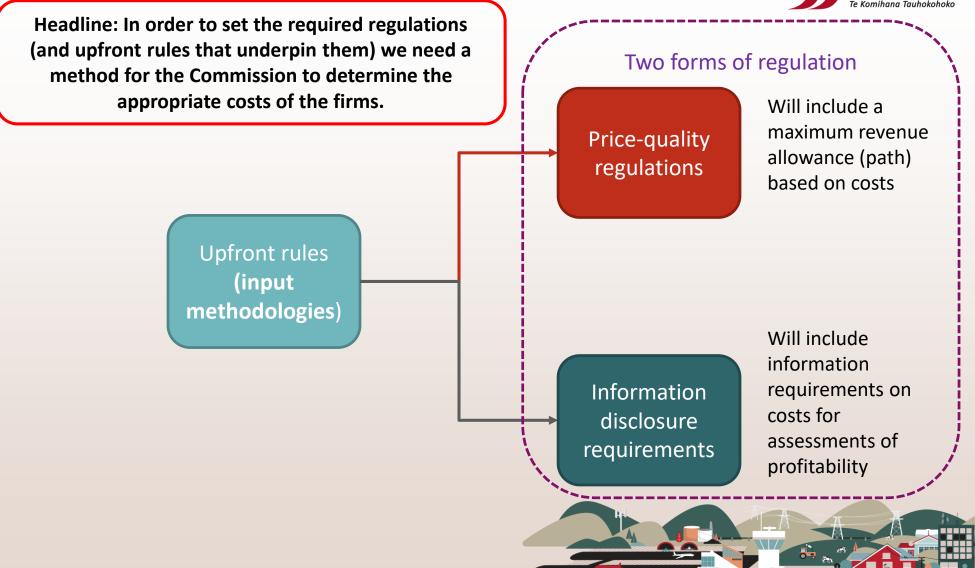
Revenues





### How will BBM be applied?







# Price-quality regulation — Example COMMERCE COMMISSION From Electricity Transmission



ISSN 1178-2560 Decision Series Project no. 14.11/14120

Transpower Individual Price-Quality Path Determination 2015

[2014] NZCC 35

The Commission:

P Duignan Dr S Gale

Date of determination: 28 November 2014

ISSN: 1178-2560

Regulation Branch, Commerce Commission

Wellington, NEW ZEALAND

28 November 2014

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	2015/16	2016/17	2017/18	2018/19	9 2019/20	RCP2 TOTA	
	(\$m)	(\$m)	(\$m)	(\$m)	(\$m)	(\$m)	%
Building blocks							
Capital charge (based on RAB value and WACC rate)	332.7	339.2	342.8	346.1	346.8	1,707.6	36.
Depreciation allowance	234.0	240.0	253.1	245.8	246.9	1,219.8	26.
Combined revenue effect of capex building blocks	566.7	579.2	596.0	591.9	593.7	2,927.4	62.
Opex allowance	277.7	285.7	293.5	295.1	297.5	1,449.4	31.
Tax	39.0	39.6	48.2	48.3	51.5	226.5	4.9
TCSD	2.6	2.6	2.6	2.7	2.7	13.1	0.3
EV adjustments	(4.2)	11.6	11.6	11.6	11.6	42.0	0.9
Forecast MAR	881.6	918.6	951.8	949.4	956.8	4.658.3	



	2015/16	2016/17	2017/18	2018/19	2019/20	RCP2 TOTAL	
	(\$m)	(\$m)	(\$m)	(\$m)	(\$m)	(\$m)	%
Forecast MAR	881.6	918.6	951.8	949.4	956.8	4,658.3	

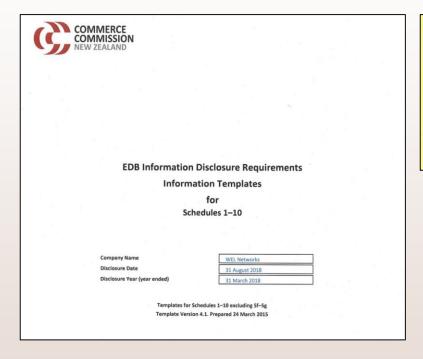
Revenues





# Information disclosure requirements – Example from Electricity Distribution





(iv): Composition of regulatory income		
	(\$000)	% of revenue
Operational expenditure	24,956	22.14%
Pass-through and recoverable costs excluding financial incentives and wash-ups	31,513	27.95%
Total depreciation	18,992	16.85%
Total revaluations	5,823	5.17%
Regulatory tax allowance	11,096	9.84%
Regulatory profit/(loss) including financial incentives and wash-ups	32,004	28.39%
Total regulatory income	112,738	

1	
Leverage (%)	445
Cost of debt assumption (%)	4.809
Corporate tax rate (%)	289

**Profitability** 





## What we said in our paper – Building Blocks Model





We note that the use of the buildings blocks model (**BBM**) is not explicitly prescribed by the Telecommunications Act 2001 (**Act**). Although it has been included in MBIE consultation documents.



Our decisions, including methods for implementing regulation (PQ + ID) must be chosen to best give effect to the purpose statement in the Act.



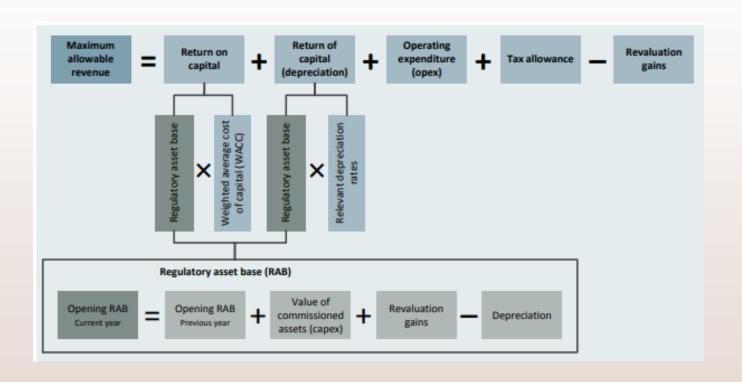
Our preliminary view is that the BBM approach with a 'rolled-over Regulatory Asset Base' would likely give best effect to the objectives of Part 6 of the Act.





## Building Blocks – as set out in our paper



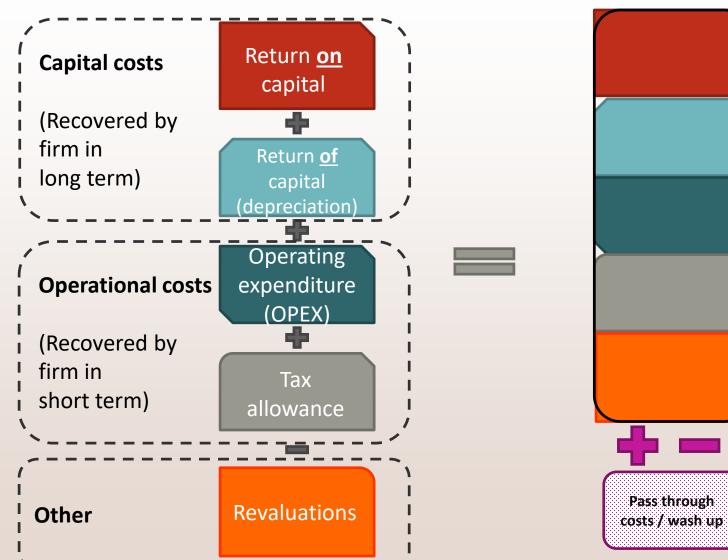


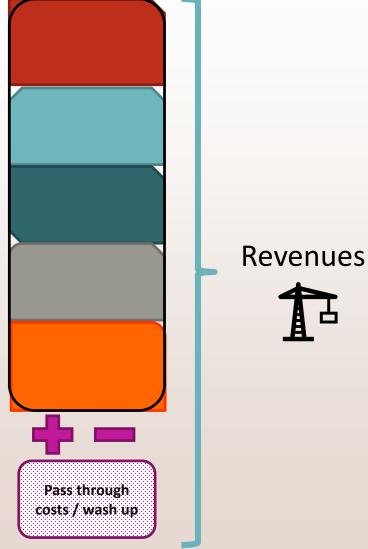




#### Overview - BBM









### Capital costs – what are they?



Both of these cost components are based on the value invested in assets. In order to calculate them, we need to use the value of the Regulated Asset Base (RAB) as an input.

Regulatory asset base (RAB)



Weighted average cost of capital (WACC)

Return <u>on</u> capital

The return <u>on</u> capital is the amount needed to cover the ongoing costs of investment in the firms assets.

Regulatory asset base (RAB)



Return <u>of</u> capital

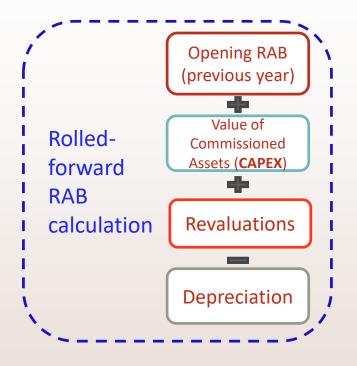
The return <u>of</u> capital is the diminution in asset values over time (known as depreciation).





### Regulated Asset Base - RAB





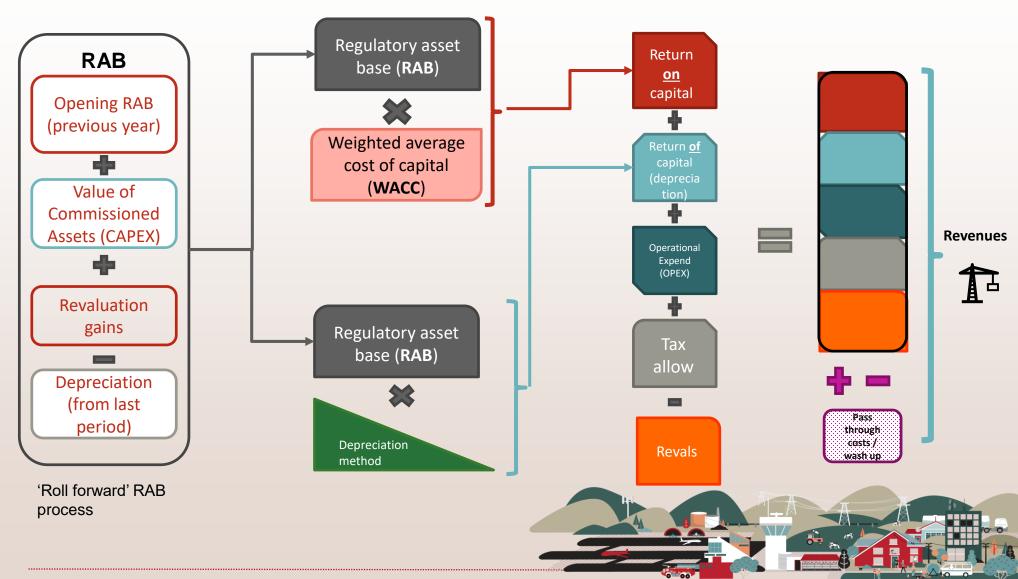
Regulatory asset base (RAB)





### Building Blocks Model (BBM) – Price-quality regulation

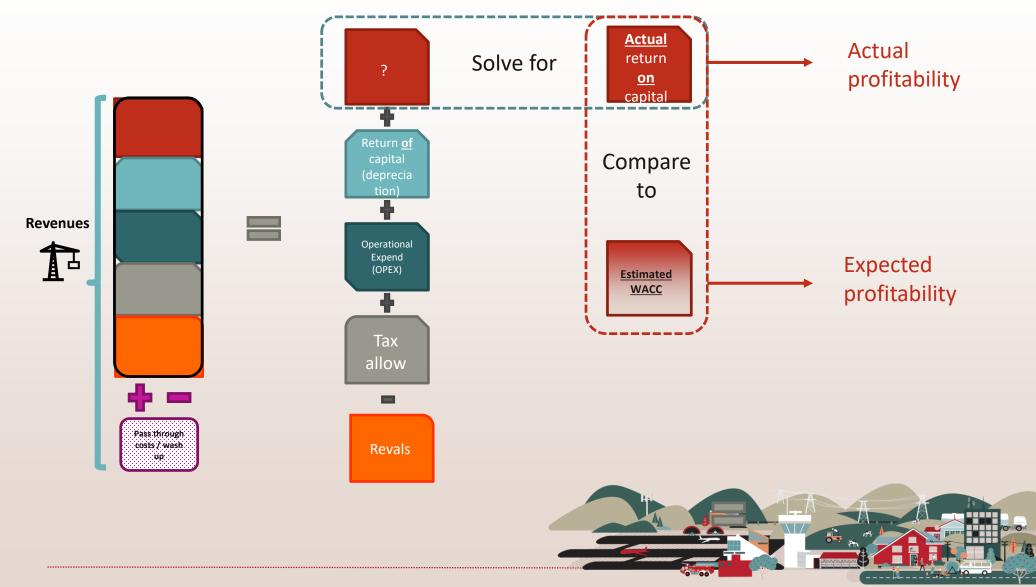






### Building Blocks Model (BBM) – Information disclosure – profitability assessments







### Building blocks model - how it links to input methodologies



The legislation requires the Commission to develop upfront rules called input methodologies – how do these relate to BBM?

Input methodologies we will determine	Relevant building blocks (indicative)
Cost of capital	Weighted average cost of capital (WACC)
Asset valuation	Regulatory asset base (RAB)  Depreciation method  Revaluations
Allocation of common costs	Regulatory asset base (RAB)  Operational Expend (OPEX)
Taxation	Tax allowance
Quality dimensions	Additional adjustments – incentives?
Rules and processes	All – Cross-cutting
Capital Expenditure	Regulatory asset base (RAB)

### What we have covered today



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# **Appendix:** Weighted average cost of capital (WACC)



In our proposed approach paper, we are proposing to use the Part 4 cost of capital input methodologies as our starting point

#### **Key components of Part 4 cost of capital input methodologies**

