<u>Submission by Paul Robertshawe on the Telecommunications Act Review: Options Paper</u>

Submitter details:

I am a public servant but the views expressed in this submission are mine and not those of the agency I work for.

Context of this submission

I have been an institutional investor analysing listed companies and managing equities portfolios in New Zealand for 20 years. I set out in this submission my personal views on how assets such as those owned by Chorus and the other LFC's need to be treated to ensure investors earn an adequate return for risk (and therefore support continued investment by telecommunications infrastructure companies), consumers are protected from monopoly rents and all parties are protected from unnecessary risk and volatility created when a regulatory regime produces outcomes that are economically unsustainable.

Introduction and summary

This submission considers the key issues, from a listed equity market investors' perspective, that need to be addressed in finalising the regulatory framework for fixed line telecommunications post 2020.

My primary concern is that any regulatory framework should be principled, consistent with the regulation of other network assets, economically sustainable and that the outcomes are fair and equitable such that they are not framed in an asymmetric way to favour an incumbent, a new entrant, or a new technology.

In addition, where a Retail Service Provider (RSP) is vertically integrating into the provision of distribution infrastructure (yet a current infrastructure provider is precluded from becoming a retail service provider), then the regulatory settings need to address both the threat of "cherry picking". If cherry picking is particularly successful such that it takes material market share, regulation applied to the current fixed line networks needs to be wound back.

I favour a building blocks approach as the final regulatory setting, as I believe it can meet most of my objectives in the paragraphs above.

Asset Value

Any asset value for Chorus in the initial period post 2020 must reflect the reality of the current situation where the significant infrastructure overbuild has been created by Government incentives.

Without such incentives, the fibre network would have been built over a much longer time period and would have been demand led. Looking forward over a long period of time (or quicker if network migration incentives are created) there will once again be only one fixed line network, but it will still likely be a composition of fibre and copper assets.

I note that this overbuild of a "brand new" network has had strong commercial incentives to be built in an efficient and optimised manner (within the constraints of the UFB Government requirements). This "brand new" network will however not be the physical manifestation of the hypothetical Modern Equivalent Asset as valued under the current TSLIRIC framework. That hypothetical asset does not and will never exist.

I strongly disagree with any assertion that the copper and other network assets (owned by Chorus) in UFB areas should be valued at Nil and therefore unable to earn a return on their written down value of the capital deployed.

These copper assets are required to provide regulated services and meet regulatory obligations. It is therefore disingenuous to assert they have no asset value and rely on Chorus to continue to operate them on a "least bad" outcome basis based on sunk costs and maintenance of at least some ongoing cash flow. When Chorus (or Telecom NZ) took on these obligations, there was little likelihood of scale overbuild of the assets required to discharge them.

If such a regulatory outcome were to eventuate, my investor view would be that Chorus should immediately separate its copper assets in UFB areas into a separate company, "Copper Co". For the copper network to have no value, then it must follow that almost all of the revenues earned on this network would be unregulated. The Telecommunications Service Obligations (TSO) would be met by the local UFB provider (who could subcontract to Copper Co for customers not yet on fibre). My assertion would be that Copper Co would have a materially different value from zero, whilst the Regulated Asset Base of the fibre entity would be barely affected. The WACC of the fibre based entity would no doubt be materially higher however in such a competitive environment.

The value underpinning Copper Co would be supported by:

- Some customers will not require high speed fibre services for many years
- Retail service providers may find some customer segments unattractive to convert to fibre due to their product mix and monthly spend; or at the very least not target them for early conversion. Servicing economically marginal customers was part of the rational for the TSO in the first instance.

Clearly a number of copper assets will be required into the foreseeable future and the owner of those needs to earn a return on that investment, recognising that some process of optimisation and/or accelerated depreciation will be required to recognise the steady erosion of connections and volumes on that network.

Even without an ideal methodology to optimise the overbuilt copper network, competition from fibre and other technologies will restrict any period of over-recovery of economic returns by the asset owner.

The methodology to value such assets, and there useful lives, can be reviewed at a later date if a forced migration or shut down date for the copper network is announced by the government.

The Fibre Assets should be relatively easy to value based on actual costs incurred over the past five and next four years until 2020.

The copper assets are more difficult to value and there are a number of alternatives. I offer some possible approaches here.

- Create an ODV handbook, with reliance on the values applied to the "similar" assets used by electricity distribution networks and guided by recent actual copper capital expenditure.
 - O It would be difficult for an investor to understand how depreciated asset values for similar assets in the Electricity and Telecommunications networks could be included in Regulatory Asset Bases at materially different valuations. This would ultimately be unsustainable.
- You could use a previous valuation of the copper network, as completed
 many times by Chorus, and before them, Telecom NZ, around such issues
 as Operating Separation and the calculation of the Telecommunications
 Service Obligation.
- Perhaps the date of one of these prior valuations can be used for the ODV handbook application and then rolled forward (add Capex, deduct depreciation and the annual value of the government incentives), if that was the preferred methodology.
- The cost base for key assets, including in an ODV framework, such as trenching need to reflect the real cost of providing those services, based on recent competitive tenders for scale delivery of such assets across different geographies. These contracts can then be reviewed for delivery against budget. We cannot see any reason why these costs would not be economically efficient as the commercial objectives of all parties are aligned towards minimising costs.

Competition

There is mandated fixed line competition between Chorus' copper network and the other Local Fibre Companies, but this is not the only competition that the fixed line owners face, as new technologies emerge to create bypass risk. Indeed, there are already mobile only households in a copper world.

The regulatory framework should therefore consider the best way to deal with competition. The key issues I would like to see addressed include:

- The cost of capital (asset beta) of a network owner facing competition from both fixed line overbuild and fixed line bypass is materially higher than a monopoly provider of such services.
- All of the network owners face completion from integrated retail providers looking to bypass their service either via mobile, fixed wireless or competing cable investments yet the network operators are not allowed to compete for retail customers. Such imbalances need to be reflected in the assumption set used to value the network, and ultimately allowing the fixed line networks to vertically integrate also.
- The regulatory framework needs to ensure the integrated retail players do not have an unfair advantage when it comes to attracting valuable traffic and connections to their networks. Whilst current traffic demand is strong, this cannot be assumed into perpetuity given bypass risk.

• Whilst sudden technology change and obsolescence may not be reflected in historic observed beta's, when that new technology is already in market competing for customers and further iterations are in laboratory testing, the risk around future cash flows will be reflected in investors return requirements. For example if there is a 20% chance of the asset life halving due to technology change, the investor will require a higher return on capital today to hold that asset, relative to a monopoly asset not currently facing technology bypass risk. This one-sided risk of obsolescence is not captured in a WACC framework, as WACC provides a discount rate to value the expected value of future cash flows and does not therefore take account of how one sided risks would lead investors to conclude that the weighted average rate of future cash flows will be lower than an inflation adjusted extrapolation of current cash flows.

Consistent regulatory framework

In addition to the issue of vertically integrated competitors noted above, the regulatory framework should be consistently applied to all players in the industry and be comparable to NZ regulation of other such network businesses.

At this stage, that would lead me to favour the following points being included in the final regulatory settings.

- Merits review of some regulatory decisions should be allowed
- The cost of capital applied needs to allow for incentives to innovate, including the potential for the fixed line networks to have a regulated cost of capital different to the midpoint estimate under the inputs methodology.
- A revenue cap will likely deal with some of the competition and bypass issues more easily than a price cap.
- Over or under recovery of returns should be treated equally for all LFC's, and be comparable with other regulated networks in NZ. Specifically, over-recovery and under recovery of returns in a regulatory period should be treated consistently and not with the network providers only facing downside.
- To help avoid underinvestment, all of the fixed line owners should also meet specified, measureable and appropriate quality thresholds.
- A clear delineation, with periodic review, of services which fall outside the scope of the regulation, such that their revenues are excluded from regulatory income.
- Chorus uniquely is faced with a sub optimal cost and forward looking capital expenditure framework, given it is required to operate both copper and fibre networks until the customer transition from copper to fibre is complete. The full and fair operating and future capital costs of operating and maintaining the overbuilt copper network need to be recoverable from the customer base.

Transition Period

My preliminary view is that movement to a building blocks model that fully captures the above matters would lead to a material change in the asset base, the recoverable costs and the costs of capital for the fixed lines operators. As such, regulators may consider a glide path to limit single period impacts.

Any such glide path needs to recognise the under (or over) earning this creates for the network owner. This potential loss (or gain) needs to be recovered (including the cost of capital) over a reasonable period. Given the potential for technological dislocation, this recovery period should not be elongated.

Should the average monthly line charge increase materially, I believe it will incentivise innovation and accelerate the adoption of new technologies. This will both ensure the fixed line providers are as efficient as they possibly can be, and benefit consumers in terms of differentiated product offers.

If alternate technologies develop at a faster rate than fibre enhancements, I can foresee an environment where the fixed line operators no longer need to be regulated at all.