Further advice on claw-back

Terms of reference

The terms of reference for this further note on claw-back were as follows:

1. Does any of the material contained in submissions change your previous advice?

We received expert submissions from NERA (for Orion), Incenta (Jeff Balchin, for Orion) and Castalia (for Vector). We also received an expert report from Marsh on insurance (for Orion). These submissions are attached to this e-mail.

Can you please review these submissions and:

- advise whether these submissions cause you to change your previous advice (dated 30 May 2013);
- explain the reasons why these submissions do, or do not, change your previous advice (as the case may be); and
- comment on the robustness of the points made in submissions.

We also received submissions from other parties (including Orion, Powerco, Unison, Vector, Wellington Electricity and the Electricity Networks Association). These submissions are available on the Orion CPP page of our website (under the heading "submissions on release of expert reports"). However, at this stage we are seeking your response to the expert submissions attached to this e-mail only.

2. Does viewing Orion's proposal from the perspective of limbs (a) to (d) of the Part 4 purpose statement change your previous advice?

Some submissions have referred to the importance of specifically considering the objectives contained in limbs (a) to (d) of the Part 4 purpose statement. The Part 4 purpose statement is quoted in full below.

> ***52A Purpose of Part 4***
>
> (1) The purpose of this Part is to promote the long-term benefit of consumers in markets referred to in section 52 by promoting outcomes that are consistent with outcomes produced in competitive markets such that suppliers of regulated goods or services—
>
> (a) have incentives to innovate and to invest, including in replacement, upgraded, and new assets; and
> (b) have incentives to improve efficiency and provide services at a quality that reflects consumer demands; and
> (c) share with consumers the benefits of efficiency gains in the supply of the regulated goods or services, including through lower prices; and

(d) are limited in their ability to extract excessive profits.

For example, Vector has argued that:

> …the Yarrow Report does not correctly apply the Part 4 purpose statement. The purpose of Part 4 is to promote outcomes consistent with workably competitive market outcomes such that objectives (a) to (d) are promoted. There is no discussion of outcomes (a) to (d) in the Yarrow Report. The Report considers workably competitive markets in the abstract and does not consider the impact of allocation of risk of catastrophic events on incentives to invest, including in replacement, upgraded and new assets (as per s 52A(1)(a)) which is highly relevant to a situation such as faced by Orion where substantial investment is required to repair the network.

The input methodologies reasons paper discusses our views on the Part 4 purpose statement (see the attached extract). Paragraph 2.4.6 states:

> The Commission's view is that the objectives in paragraphs (a) to (d) are integral to promoting the long-term benefit of consumers, and reflect the key areas of supplier performance that characterise workable competition (paragraphs 2.6.27-2.6.28). Unison submitted that "in order to determine whether the central purpose (long-term benefit of consumers) is to be fulfilled, one has to inquire whether outcomes consistent with outcomes produced in workably competitive markets are being promoted such that section 52A(1)(a) to (d) requirements are met". The Commission agrees. This is in fact how the Commission has interpreted and applied the purpose of Part 4.

We would like to test your views regarding the approach to applying the Part 4 purpose statement advanced in submissions. Specifically, can you please:

- advise whether viewing Orion's claw-back proposal from the perspective of limbs (a) to (d) of the Part 4 purpose statement causes you to change your previous advice (dated 30 May 2013);
- explain the reasons why viewing Orion's claw-back proposal from the perspective of limbs (a) to (d) does, or does not, cause you to change your previous advice (as the case may be); and
- discuss your observations regarding Orion's claw-back proposal in relation to each of limbs (a) to (d) of the Part 4 purpose statement.

Material in submissions

Having reviewed the submissions forwarded by the Commission, these documents do not cause me to want to make substantive changes to my previous advice (dated 30 May 2013).

They do however merit clarifications of, adjustments to and minor developments of some particular points in that earlier advice. It will, in my view, be most helpful to the Commission for me to focus on the submission by Castalia, on behalf of Vector, which I found to be the most balanced in its reasoning and the only one of the three economics reports that has sought to bring empirical evidence to bear on the issues (the Marsh reports on insurance issues also contains helpful empirical material).

The Castalia report starts with a reasonable summary of my advice, and the only possible quibble is with the suggestion that I believe that all efficiently incurred costs should be borne by consumers, and this in itself may simply be a matter of language rather than substance. Since NERA and Incenta also seem to be unclear about my view, let me restate it at the outset: expected (*ex ante*) efficiently incurred costs, including *ex ante* costs of risk borne by suppliers, should fall on consumers, but deviations of cost out-turns from expectations should fall chiefly on suppliers, unless explicitly specified otherwise. Chiefly does not mean exclusively, but it does imply that after-the-event adjustments in cost allocations should be kept to a minimum, to minimise the requirement for *ex post* regulatory assessments of business performance. As it is put in one of the citations from my previous work contained in the Incenta report, apparently with approval, such *ex post* assessments, which include the assessments necessitated by claw-back issues, have 'potentially toxic implications for regulatory policy'.

The evidence presented by Castalia relates to PPP contracts and, in particular, to the *force majeure* provisions of such contracts. This is an interesting area to explore, although two major limitations might be noted at the outset:

- Whilst the evidence relates to circumstances in which there is a degree of competition among providers, the single counter-party (to suppliers) is typically an arm of government. In a competitive market, however, we would expect to see multiple buyers, and public procurement is not necessarily either a close substitute for multiple, competing procurers, or a good indicator of what risk sharing arrangements might look like in a competitive market. For example, it is a standard argument in economics, made by Samuelson, Vickrey and Arrow among others, that governments may be able to bear risk at lower cost than most other counterparties because of their capacity to spread that risk over large communities.[1] Such a view would imply that a government might be expected to (efficiently) bear significantly more risk than a private buyer of services, including when entering into PPPs.

  More generally, the various economic factors that influence public procurement decisions are not necessarily similar to those that influence buying decisions in competitive markets. Having been involved in a number of such exercises, I can

[1] I say "may" because not all governments govern large populations.

testify that there can be numerous constraints on what can and can't be done which would be absent in the case of a commercial buyer.

- *Force majeure* provisions in contracts deal with circumstances which are beyond the control of the contracting parties (a condition certainly satisfied by an earthquake) and make it impossible for the affected party to fulfil its contractual obligations. What is still lacking is evidence to the effect that Orion would not have been able to carry on with its activities in the absence of additional revenue, or of the secure prospect of such additional revenue, from its customers. Whilst doubts have been expressed by submitters about the relevance of Orion's balance sheet, it seems to me obvious that it is a material factor in assessing whether it is impossible for the business to fulfil its obligations.

Notwithstanding these limitations, I think that the Castalia report is helpful. I am a longstanding advocate of the position that evidence that is far from ideal for purpose is not to be ignored on that basis, particularly in the absence of more compelling information. Weak evidence is still informative evidence, and it merits attention when seeking to balance counteracting factors.

On this basis, my reading of the Castalia report is that it comes to a conclusion not at all dissimilar to one that I had suggested in my advice, which is perhaps not particularly surprising since I had indicated to the Commission that the arguments for claw-back were strongest in circumstances that were similar to those that might be covered by *force majeure* provisions in commercial contracts. Thus, in the alternative arrangements, set out at section 3.3 of the Castalia report, claw-back is included as what is described as a "top-up" arrangement, linked to a light handed *ex post* prudency test.

That linkage goes to the heart of the issues. My view is that the greater the provision for such top-up, the less light handed the *ex post* assessment can reasonably be. My only disagreement with Castalia is when further, suggested rationales for such a top-up arrangement are added, based on: the self-insurance premium being insufficient, the expected cost (it is not clear of what) being greater, or the arrangement not being in place for a sufficient time. I think none of these justify claw-back. The first two are re-visitations of the past to correct mistaken expectations/forecasts, which is an argument that can be used much more broadly and is an open invitation to more intrusive regulation. The third does not fit with evidence from competitive markets, or from PPPs for that matter. I doubt, for example, that a Lloyds member would get away with not paying a catastrophic event claim on the argument that the catastrophe occurred only a short time after the contract was put in place, and that it was reasonable for the member to expect that, given the probabilities, the event would not occur for many years to come.

The second aspect of the evidence that is worth noting, and which is fairly cited by Castalia, is the EPEC finding, in a study of European PPPs, that *"Compensation does not typically provide for any loss of future income."* To the extent that the earthquakes can be regarded as equivalent to events that would trigger a *force majeure* clause in a commercial contract, the Orion claw-back application can be viewed as asking for compensation for income losses that, at the time of the events, lay in the future. The EPEC evidence therefore seems to me to count against the Orion application on this particular issue.

The point is worth emphasising because both NERA and Incenta argue strongly that revenue losses and additional costs should be treated in the same way. They do so largely on the basis that these different phenomena have similar effects on Orion's bottom line, but, in my view that is neither the only, nor even the primary consideration, that is relevant for the Commission in making its determinations. The regulatory arrangements are designed to promote long-term consumer benefits, and to do so in a way that is guided by references to outcomes in competitive markets. Ensuring recover of *ex ante* expected costs, including a normal rate of return on capital, is a means to an end, but it is not an end in itself.

The strength of the Castalia paper is that it seeks to address the relevant matter on the basis of evidence, and the evidence cited does indicate that revenue losses and cost increases are not treated identically in PPPs. This is consistent with material in the earlier Marsh report which pointed to the same conclusion (e.g. insurance against business losses had characteristics different from insurance against asset damage). It is always helpful to adjudicators when evidence from different sources 'stacks up' in this way.

Turning to the other papers, my first comment on the NERA report is that it appears to me to be less measured than its predecessor. Its first conclusion, for example, is that my analysis of risk allocation does not take account of the relationship between such allocation and consumer prices, which is wrong (and is a mistake not made by Castalia, for example).

There is no issue concerning whether or not the *ex ante* costs of risk borne by a supplier should be adequately compensated: it should. Rather the question of interest is the extent to which the pre-earthquake prices of Orion were sufficient to cover its *ex ante* costs, inclusive of costs of risk.

The false claim that I do not consider the linkage between consumer prices and the allocation of risk is repeated in later sections of the NERA report, compounded by other errors of interpretation such as that I take the view that a firm with a strong balance sheet will not require a cash flow to cover self-insurance. A strong balance sheet may indeed be a sign that a company has, in the past, achieved revenues that more than cover its costs, and in consequence is in a better position to withstand economic shocks, but, to repeat, my view is that regulated prices should be sufficient to allow recovery of efficiently incurred costs,

evaluated on an *ex ante* basis and including the costs of risk bearing, whether such risk bearing takes the form of explicit insurance cover or self-insurance or both.

The second NERA report neglects the *ex post* (prudency) review issues that are raised by claw-back assessments, and instead seeks to insinuate that there was a regulatory bargain that *uninsurable* risks costs/losses from catastrophic events would be allocated to consumers. The Commission will be in a much better position than I am to assess all aspects of the commitments made to EDBs over recent years, but I note that the NERA claim appears to be problematic on more than one account. The most obvious points are that:

- the most visible and high level aspects of the regulatory bargain are set out in the legislation itself,
- this legislation makes explicit reference to the promotion of outcomes to be expected in a competitive market, and
- there is no evidence on the table to suggest that, in competitive markets, uninsurable risks are allocated, in their entirety, to consumers.

Again, the evidence surveyed by Castalia is the nearest approximation that I have seen in the materials to which I have been directed, and this suggests that, if *force majeure* provisions in contracts are triggered, the outcome in PPP cases tends to be a renegotiation that shares the *uninsurable* losses between the parties.

The other major point is that there is a major issue concerning what risks are uninsurable, and an important point to note is that 'uninsurable' is not to be equated with 'expensive'.

According to Marsh, Orion used to take out external insurance cover for T&D assets until the demise of the TRIP scheme in 2001. The report mentions $41m of such cover in 1999 (presumably in money of the day, and likely significantly higher than that in today's prices). If I understand the situation correctly, the EDB subsequently cut back on this external insurance not because the assets became uninsurable, but rather because the cost of the external insurance rose steeply.

In the earlier period then (at least up to around 2001) there is no question that Orion bore the relevant *ex ante* costs of a substantial level of insurance cover (for T&D plus other coverage, for example linked to substations, stores and offices). That is, the costs of earthquake risk, at least up to a substantial level of cover, lay with Orion.

In the later period, Orion did not take out explicit, external insurance but, if it is being argued by submitters that the decision to cut back on external insurance meant that risk was henceforth being transferred to consumers, rather than being retained (but on a self-insurance basis in view of the sharp rise in external insurance rates), the Commission

should, I think, ask whether there are any documents of the time to show that consumers and other stakeholders were informed of this transfer of economic costs from one party to another, and whether there was an identifiable reduction in prices, to a level below where they would otherwise have been set, to reflect such a transfer of risk to consumers. It would be a funny kind of regulatory bargain whose terms could be changed unilaterally by one party without telling the counterparty of the change, and/or without seeking the agreement of the counterparty, and/or without compensating the counterparty.

It is also a little odd, that after the stated disagreements, the kind of regulatory bargain suggested by NERA is not very different from the suggestion in my advice of 30 May whereby cost risks up to a defined liability threshold (covered by a mix of insurance and self-insurance) lie with suppliers, and only costs in excess of the threshold are subject to claw-back assessments. An initial, 'sighting shot' of what such a threshold might look like could be provided by Orion's pre-TRIP external insurance cover, updated to current prices; and, for cost outcomes above this level, the Castalia evidence suggests some sharing of the burdens between suppliers and consumers.

I have commented on the distinction between revenue and cost effects of catastrophic events above, and add only one comment. The NERA report expresses surprise at my statement about economies of scale and density in electricity distribution networks, and even invents a "rebuttable presumption" concerning natural monopoly. The authors should look at the London distribution area, where high volumes and high consumer density co-exist with distribution costs that are higher than in other, lower volume, less dense areas of the UK.

It is difficult to say much about the Incenta Report, which in my view is rather stronger in its advocacy than can reasonably be sustained by the economics. I will simply note one or two points, which may have more general value.

First, there seems to be a general charge of inconsistency, which of course is not the greatest sin in the world[2], but which does not appear to me to follow from the various citations made. The central issue is claw-back, and the two citations from previous work that make reference to claw-back are as follows:

The relevant distinction – which is not always necessarily clear in practice – is between corrections that rebalance on a forward-looking basis (i.e. ensuring that past imbalances in the benefits from market participation are not continued), and retrospective adjustments ('claw-back') of past flows of funds among parties. Whist the latter may be relevant where

[2] "Consistency is the last refuge of the unimaginative" [Oscar Wilde] and "A foolish consistency is the hobgoblin of little minds" [Ralph Waldo Emerson].

wrongs have been done in the past, as, for example, occurs when competition laws have been violated, it is generally inappropriate in the context of price regulation, where public authorities have been heavily involved in price setting and where revisiting the past amounts to the revisiting of past regulatory decisions. Clearly, the prospect of such policy is liable to have toxic implications for regulatory policy, since the prospect of today's regulatory decisions being revisited tomorrow devalues today's commitments and promises.

For example, one risk is that such a rebalancing process might be taken too far, by setting the initial RAB in such a way that all past returns, up to the point of switching to the new pricing regime, are no more than normal. That is, the initial RAB might be set so that no economic profit (revenue in excess of all costs, including all capital costs) will have been made over the past period, i.e. any past, economic profit is 'clawed back'. Since capital markets might easily take the view that past economic losses would never likely be compensated for by this kind of retrospective adjustment, the danger of such ex post setting of net present value to zero (NPV = 0) is that it would contribute to a regulatory reputation for opportunism and for capital expropriation.

It seems clear from these citations, which could be reinforced by views expressed by the Irish Aviation Appeals Panel at a time when I was a member, that I consider there are very real problems associated with a propensity to have recourse to claw-back options in regulatory systems; and that is the advice I gave to the Commission in the 30 May 2013 document.

Second, as an example of the style of 'reasoning' in the Incenta Report, the following statement can be noted: *"In summary, it is sufficiently clear, to the extent it is my view beyond any doubt, that the regulatory contract between all controlled EDBs (including Orion) and the Commission, based on an expectation of the recovery of the efficient costs of supply, requires that costs that occur following a catastrophic event that have not already compensated ex ante, through external insurance or an explicit allowance for self-insurance, should be recovered ex post."* Given that no empirical example has been given of such compensation arrangements occurring in a competitive market, and given that references to outcomes in a competitive market are central to those 'high level' aspects of the regulatory bargain set out in legislation, it is difficult to see where this clarity and certainty come from. I note that it is claimed that the assertion is 'beyond doubt', not just beyond reasonable doubt. That is a chilling degree of certainty in an expert report on what is probably more of a legal issue than an economic one.

Third, it can be noted that section 3.3 of the report is headed "Compensation requires that an explicit allowance is provided", to which the answer is simply "no, it doesn't". Ensuring that expected (*ex ante*), efficient costs are recovered requires only that revenues cover those costs in their entirety, not that each and every item in costs and in allowed revenues

or prices be identified and linked. To identify and explicitly provide an allowance for each and every possible cost element, including costs of self-insurance against a wide range of contingencies (and not just earthquake risk), would not be administratively efficient, and price cap regulation of the type favoured in New Zealand has explicitly sought to avoid over-intrusive and disproportionate regulation. No price or revenue cap system with which I am familiar seeks to identify every possible cost component, and it is integral to these systems that individual revenue allowances are not ring-fenced for specific purposes. The key question for regulators is whether the price/revenue settlement as a whole will provide a reasonably efficient operator with the funds to cover the aggregate costs that it is expected (*ex ante*) the business will incur in meeting its obligations.

The Part 4 purpose statement

In providing my advice of 30 May 2013 I organised the discussion around the various questions that had been posed in the relevant Terms of Reference (ToR). Those ToR directed my attention to, among other things, the Part 4 purpose statement, which includes limbs (a) to (d) dealing respectively with: incentives to innovate and invest; improve efficiency and service quality; share efficiency gains with consumers; constraints on the ability to extract excessive profits. I therefore took these factors into account in drafting my response.

That advice was not provided in a way that involved sequential and separate discussion of each of the four limbs, which would not have been appropriate. From an economics perspective the limbs are not separable, and the discussion of one in abstraction from the others – and indeed from other things that might be important for the promotion of the long-term benefit of consumers (see further below) – would risk the introduction of error.

To illustrate, consider 52A(1), which concerns suppliers having "incentives to innovate and invest". In general terms, incentives can be stronger or weaker, depending, among other things, on associated risk sharing arrangements. Whilst a 'black letter' legal interpretation of limb (a), considered in abstraction from the other limbs, might point to a conclusion that the existence of <u>any</u> material incentives to invest, even if weak, would be sufficient to establish that (a) is satisfied, my own view is that this would be inconsistent with both economic logic and with the promotion of long-term consumer benefit.

Ultimately this is a matter for legal interpretation, but, from a strictly economic policy perspective, some of the fundamental points are as follows:

- Whilst it is to be expected that the four limbs correspond to outcomes that can be expected in competitive markets, it is a key feature of such markets that they also establish an appropriate, overall *balance* in the structure of incentives and (inseparable from incentive considerations) in risk or benefit sharing arrangements.

- As a matter of observation, the structure of incentives and risk sharing tends to vary across different markets, guided by what works well for long-term consumer interests in different sets of circumstances. For example, the scope for improving product quality and the associated costs may vary from one context to another, and hence the significance of this particular factor may vary when it comes to balancing judgements.

- The four limbs do not themselves exhaust the possible outcomes that might be produced by competitive markets and which might be of relevance for the long-term interests of consumers. An obvious example of an omitted factor is product variety, the demand for which will tend to reflect differences in the preferences of different consumers or of different types or groups of consumer. Perhaps more relevantly, (a) – (d) do not mention risk sharing, which tends to be a matter of great importance for consumer welfare in utility sectors and which obviously is a central issue in the context of the Orion claw-back application.

I think that there should be consensus on these points from those coming to the issues from economic and commercial perspectives (legal interpretations are matters for the Courts). The consultants' documents that I reviewed all gave prominence to issues of risk-sharing and insurance, notwithstanding that it is not a factor mentioned explicitly in limbs (a) – (d). This was, in my view, a correct approach, and it would have been artificial to do otherwise (e.g. by simply focusing on (a)-(d)). It was therefore also the approach adopted in my own response of 30 May 2013.

In relation to the specifics of each of the four limbs of 52A(1), these seem to me to be issues that were addressed in my earlier advice to the Commission, albeit the coverage of each varies significantly, reflecting my own views of the relative importance of each in the specific context of Orion's claw-back application. I therefore do not understand Vector's statement, cited in the Commission's ToR, that I did not consider the impact of allocation of risk on incentives to invest.

Thus, to repeat one of the central points of the advice, to reduce the risk borne by allowing *ex post* adjustments to allowable prices (i.e. 'claw-back') tends to lead to the introduction of *ex post* prudency reviews, and the greater the scale of the *ex post* adjustments the greater tends to be the scope of prudency reviews (the policy response tending to be proportionate to the size of the issues). Cross-country and historical experience suggests, however, that such reviews can, by increasing regulatory uncertainty, have adverse effects on investment.

Vector may, of course, disagree with this view, but it is hard to see any basis for a claim that I ignored 52A(1)(a).

Going further, the reason that, in regulatory practice, there is a linkage between *ex post* adjustments and prudency reviews is that regulators typically have duties to see that

investment expenditures are efficiently incurred. In New Zealand, this aspect of the investment issues is, I think, captured by limb (b) of 52A(1), which refers to the promotion of efficiency (although there is no specific reference to investment efficiency in the limbs).

The arguments here also link to the empirics of what is actually observed in workably competitive markets. I suggested in my advice that it would be helpful to the Commission if submitters could provide evidence from such markets in support of arguments, and one of the areas where this could be most helpful is in determining whether the promotion of efficient investment can be reconciled with substantial *ex post* adjustments in the amounts paid by consumers for goods or services. No such evidence appears to have been presented, although, as discussed above, the Castalia material is the best approximation available and, in my view, warrants the Commission's attention.

Turning to limb (c), a significant part of my discussion was concerned with Orion's decisions concerning the risk burden it bore. I noted that I had seen nothing in the evidence to suggest that Orion had been inefficient in this regard, and that it was my understanding that it had a strong balance sheet. It is to be expected, therefore, that the benefits of such efficiency would be shared with consumers, including through lower prices. The balance sheet arguments in particular are concerned with this point, since it can be argued that failure to make substantial use of balance sheet strength to absorb economic shocks amounts to a failure to share efficiencies with consumers to an appropriate extent.

(d) Finally, concern about potentially excess profits, whilst not the most important of the issues, underlies the references to the potential for double counting in the 30 May document. They also go to the question of whether Orion's historical prices were sufficiently high as to cover its expected costs overall, inclusive of annual expected costs of bearing earthquake risks. If they were, then allowing substantial claw-back is arguably equivalent to allowing excess profits in the pre-earthquake period.

Given the above points, my responses to the three bullet points in the ToR are:

- A re-organization of the material in my advice of 30 May so as to link particular aspects of the discussion to each of the four limbs (a)-(d) of the Part 4 purpose statement would not have led to substantive change in the advice given.

- The main reason for this is that the advice already takes account of limbs (a)–(d), and simply re-organising that material under different headings would have no effect on the substantive content of that advice. It would introduce an element of artificiality into the analysis, making it more difficult to discuss the relevant trade-offs in a way that reflects the relevant factual context. Like the consultants whose papers I reviewed, it would also not have prevented me from introducing considerations of efficient risk allocation into the discussion, even though risk allocation is not explicitly referenced in limbs (a) – (d).

- I have given examples above of how some of the main points in the advice relate to limbs (a)-(d), but stress again that, in determining the balance of incentives and risk sharing that best promotes long-term consumer interests, the Commission typically will have to grapple with the four limbs *simultaneously*. Each of (a)-(d) cannot properly be addressed separately, in abstraction from the others.

George Yarrow

4 August 2013