

Appendix B1

EDS - Summary of evidence – Economics – Bill Kaye-Blake

Outstanding issue	Summary of EDS evidence	Reference
EIA v CBA	<ul style="list-style-type: none"> • Full cost-benefit analysis (CBA) appropriate tool as allows systematic approach to identifying and valuing costs and benefits • Puts environmental impacts on equal footing with economics (commensurability) • Lack of certainty re offsets can be accounted for in CBA – potential for actual costs to outstrip benefits over 100 years. • Economic research is available on value of environment, social impacts and value of amenity and heritage impacts which could assist Panel. <p>Comment on MGL response:</p> <ul style="list-style-type: none"> • Better informed if economic understanding of value of non-market impacts provided. • Re double-counting concern, it is possible not to assess impacts both quantitatively and qualitatively 	Paragraphs [27]–[41], [94] – [104]
Missing information	<ul style="list-style-type: none"> • Insufficient detail provided for peer review • Ratios, modelling, relevant data not available to enable full assessment. • GDP not discounted <p>Comment on MGL response:</p> <ul style="list-style-type: none"> • GDP now discounted 	Paragraphs [53] – [56]
Economic dislocation	<ul style="list-style-type: none"> • No detailed assessment of potential economic dislocations • Low unemployment/ tight labour market means potential to displace other economic activity 	Paragraphs [57] - [67], [69] – [73]

	<ul style="list-style-type: none"> • Multiplier analysis does not capture these effects – CEG better model in this situation • CBA useful to estimate opportunity cost of moving resources from other economic activity to BOGP • Geographical designation may obscure potential difficulties sourcing labour. <p>Comment on MGL response:</p> <ul style="list-style-type: none"> • Economic resources on Cromwell basin constricted – labour, commercial space • Assessment does not account for adjustment mechanisms (higher prices, unavailability of workers and housing) and adjustment period 	
Indirect / induced impacts	<ul style="list-style-type: none"> • Little analysis of indirect effects • Not clear whether indirect effects are local, regional or international 	Paragraph [68]
Regional benefits	<ul style="list-style-type: none"> • Regional benefits are overstated • GDP approach may not reflect regional benefit <p>Comment on MGL response:</p> <ul style="list-style-type: none"> • A table that lists and quantifies expected benefits to Central Otago, Inland Otago, Otago and New Zealand which also lists the potential disbenefits would best summarise MGL economic claims. • Key concerns are negative impacts (disbenefits, costs, adverse impacts) are mostly highly localized while benefits are distributed more widely. Should make geographic distribution explicit. 	Paragraphs [74] – [76]
Sensitivity analysis	<ul style="list-style-type: none"> • Assessment does not account for risks • Taranaki VTM Panel sought sensitivity analysis that considered all inputs together to show best and worst-case scenarios <p>Comment on MGL response:</p>	Paragraphs [77] – [82]

	<ul style="list-style-type: none"> • Some one-by-one adjustments made but combined effects of several adjustments should be calculated • Crown revenue partly a residual calculation, therefore more variable than revenue. Because focus has been on one scenario, rather than a range of scenarios, the range of potential residual values has not been explored. 	
Social impacts	<ul style="list-style-type: none"> • Insufficient work undertaken to understand social impact • Impacts on housing potentially downplayed • Assessment does not account for additional infrastructure that may be required – no investment by applicant, no calculation of social cost 	Paragraphs [105] – [118]
Bond	<ul style="list-style-type: none"> • Little/ no information provided on consequence and probability of risk, expected value of risk, effectiveness of mitigation controls, long-term environmental impacts • Not able to determine monetary value of risk <p>Comment on MGL response:</p> <ul style="list-style-type: none"> • Issues with tailings dam may be low-risk, but they are high-impact, therefore have high expected value and should be economically valued 	Paragraphs [119] – [128]