



APPENDIX O

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Haughton-Townsville Pipeline Stage 2 Detailed Business Case

Department of Infrastructure, Regional Development and Cities

Benefits Register

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Haughton-Townsville Pipeline Stage 2 Detailed Business Case

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Document history and status

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1a	10 May 2019	Draft	Michelle Freund	Matt Bradbury	Angus MacDonald

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Appendix S. Benefits Realisation Plan and Register

S.1 Key points

The Benefits Register records the benefits identified during development of the business case for the project. It relates to the benefits associated with addressing the identified problems as well as additional benefits that may arise from the project implementation.

The development of benefits and the Benefits Register has proceeded throughout the development of the business case. Details on benefit management are detailed in the environmental, social and economic chapters.

A separate benefits register has been prepared for each option.

S.1.1 Information recorded in the Benefits Register

The most robust benefits are those that can be measured and quantified so that measures and targets can be used to establish defensible and key performance indicators (quantitative benefits).

We have also included potential benefits identified by stakeholders which are more difficult to quantify (qualitative benefits). The performance of these benefits can be measured through means such as qualitative surveys, which can be developed if the option is progressed further.

Information is recorded in the Benefits Register under the following headings:

- Category—the category of the benefit.
- Benefit—the benefit the project is anticipated to realise.
- Benefit description—a description of how the benefit will address the service need.
- Related stakeholders—the stakeholders who are related to the benefit, either as beneficiaries or through implementation. Identifying the stakeholders is important so they can be considered in the project development to achieve each benefit.
- Potential beneficiary—the party expected to receive the benefit.
- Measure of realisation—the measure used to assess the realisation of the benefit and how well it responds to the service need.
- We have recorded the following additional information for quantitative benefits:
 - Baseline value (if known)—the measure of the benefit category in the base case; recording the baseline value allows measurement of the relative impact of the option
 - Incremental target value (if known)—the incremental impact of the benefit on the baseline sought through the implementation of the project
 - Unit – the unit of measurement used for qualitative benefits
- Chapter reference – a reference to the DBC chapter or appendix which provides additional information on the benefit.

Quantitative benefits register – Option 1 (from year 2022)

Category	Benefit	Description	Related stakeholder/s	Potential beneficiary	Relative importance	Measure of benefit	Baseline value	Target value	Unit	Chapter reference
Financial	Stage 1 pipeline avoided costs	Bringing forward Stage 2 pipeline means some of the costs of Stage 1 pipeline delivery are avoided	TCC Commonwealth Government	TCC	High	Change in Stage 1 costs tendered	215 million	160 million	\$ (2019 dollars)	Chapter 15
Economic - Agriculture	Additional water available for existing or new crops during peak demand periods	The project frees up Houghton Main Channel capacity for use by irrigators of new or existing crops	SunWater BRIA Local irrigators Local landholders	Landholders Agricultural labour	High	Change in peak flow entitlements delivered	587	623	ML/day	Chapter 15
Economic benefit - Agriculture	Increased irrigation value	Additional security of peak flow entitlements will provide for additional hectares of production, and an increase in production value	Landholders Agricultural labour	Landholders Agricultural labour	High	Annual agricultural net margin	TBD	Baseline + 1.9 million	\$ pa	Chapter 15
Economic and social - Employment	Agricultural employment (direct)	By stimulating the expansion of the existing irrigation sector, the project can increase agricultural labourer employment.	Landholders Agricultural labour	Agricultural labour	Medium	Agricultural employees	TBD	Baseline + 9	FTE	Chapter 15
Economic and social - Employment	Construction employment (direct)	During the construction stage there will be an increase in direct employment by the sector.	Construction workers Direct support services (engineers, designers, managers etc)	Construction sector labour	Medium	Number of employees during project delivery stage	0	199	FTE (average over delivery years)	Chapter 15

Qualitative benefits register – Option 1 (from year 2022)

Category	Benefit	Description	Related stakeholder/s	Potential beneficiary	Relative importance
Governance	Independence from SunWater and irrigators	Building a council owned pipeline will mean council will have full control over water distribution from the Burdekin River to Townsville, removing the need to share assets and governance arrangements with SunWater and irrigators	TCC SunWater Irrigators	TCC	High

Category	Benefit	Description	Related stakeholder/s	Potential beneficiary	Relative importance
Financial	Independence from SunWater charges	Building a council owned pipeline will mean council will have full power to manage pipeline costs, and pass on those costs to ratepayers in a manner it sees fit	TCC SunWater TCC ratepayers	TCC TCC ratepayers	High
Environmental	Avoided potential environmental issues raised in the community	Using a pipeline instead of increasing use of the channel will mean flow conditions near wetlands such as horseshoe lagoon will remain unchanged. This will allay community concerns that altered flow conditions will affect adjacent wetlands.	TCC SunWater Environment	Environment	Medium

Quantitative benefits register – Option 2 (from year 2034)

Category	Benefit	Description	Related stakeholder/s	Potential beneficiary	Relative importance	Measure of benefit	Baseline value	Target value	Unit	Chapter reference
Economic - Agriculture	Additional water available for existing or new crops during peak demand periods	The project frees up Haughton Main Channel capacity for use by irrigators of new or existing crops	SunWater BRIA Local irrigators Local landholders	Landholders Agricultural labour	High	Change in peak flow entitlements delivered	587	950	ML/day	Chapter 15
Economic - Agriculture	Increased irrigation value	Additional security of peak flow entitlements will provide for additional hectares of production, and an increase in production value	Landholders Agricultural labour	Landholders Agricultural labour	High	Annual agricultural net margin	TBD	Baseline + \$18.5 million	\$ pa	Chapter 15
Economic and social - Employment	Agricultural employment (direct)	By stimulating the expansion of the existing irrigation sector, the project can increase agricultural labourer employment.	Landholders Agricultural labour	Agricultural labour	Medium	Agricultural employees	TBD	baseline + 89	FTE	Chapter 15
Economic and social - Employment	Construction employment (direct)	During the construction stage there will be an increase in direct employment by the sector.	Construction workers Direct support services (engineers, designers, managers etc)	Construction sector labour	Medium	Number of employees during project delivery stage	0	198	FTE (average over delivery years)	Chapter 15

Qualitative benefits register – Option 2 (from year 2034)

Category	Benefit	Description	Related stakeholder/s	Potential beneficiary	Relative importance
Governance	Independence from SunWater and irrigators	Building a council owned pipeline will mean council will have full control over water distribution from the Burdekin River to Townsville, removing the need to share assets and governance arrangements with SunWater and irrigators	TCC SunWater Irrigators	TCC	High
Financial	Independence from SunWater charges	Building a council owned pipeline will mean council will have full power to manage pipeline costs, and pass on those costs to ratepayers in a manner it sees fit	TCC SunWater TCC ratepayers	TCC TCC ratepayers	High
Environmental	Avoided potential environmental issues raised in the community	Using a pipeline instead of increasing use of the channel will mean flow conditions near wetlands such as horseshoe lagoon will remain unchanged. This will allay community concerns that altered flow conditions will affect adjacent wetlands.	TCC SunWater Environment	Environment	Medium

Quantitative benefits register – Option 3

Category	Benefit	Description	Related stakeholder/s	Potential beneficiary	Relative importance	Measure of benefit	Baseline value	Target value	Unit	Chapter reference
Economic - Water saving	Reduced water consumption	Water tariff reform will likely result in a reduction in per capital demand	TCC Community	TCC	High	Per capita demand	562	530	l/c/day	Chapter 15
Financial	Delayed investment in next supply augmentation	Reducing demand will delay timing or scale of next supply augmentation	TCC Water customers	TCC Water customers State and Commonwealth government	High	Timing of next supply augmentation	2050	2053	year	Chapter 15

Qualitative benefits register – Option 3

Category	Benefit	Description	Related stakeholder/s	Potential beneficiary	Relative importance
Economic	Cost reflective price signal	Valuing water use to reflect costs will allow Townsville residents to balance the benefits of water use with the costs. This will allow infrastructure planning to reflect the value Townsville residents place on water.	TCC TCC ratepayers	TCC TCC ratepayers	High