

CENTRAL OTAGO DISTRICT COUNCIL

THREE WATERS INFRASTRUCTURE COMMITTEE

NOTICE is hereby given that a meeting of the Three Waters Infrastructure Committee is to be held in Council Chambers, William Fraser Building, 1 Dunorling Street, Alexandra on Wednesday, 15 May 2019 commencing at the conclusion of the Roading Committee.

MEMBERS: Councillor M Topliss (Chair), Councillor L Claridge (Deputy), His Worship the Mayor T Cadogan, Councillors V Bonham, S Calvert, S Duncan, N Gillespie, S Jeffery, N McKinlay, M McPherson and B Wills

APOLOGIES: His Worship the Mayor T Cadogan and Councillor V Bonham

IN ATTENDANCE: S Jacobs (Chief Executive Officer), J Muir (Executive Manager - Infrastructure Services), L van der Voort (Executive Manager – Planning and Environment), Saskia Righarts (Chief Advisor) and P Singleton (Governance Support Officer)

A G E N D A

19.4.1 **Confirmation of Minutes** **6 - 7**

RECOMMENDED that the minutes of the Three Waters Infrastructure Committee meeting held on 20 March 2019 be received as a true and correct record.

19.4.2 **Declaration of Interest** **8 - 10**

Members are reminded of the need to be vigilant, stand aside from decision making when a conflict arises between their role as a member and any private or other external interest they might have.

19.4.3 **Chair's Report** **11**

RECOMMENDED that the Chair's report be received.

19.4.4 **Clyde Wastewater Project - Gateway Review before Proceeding with Construction of Rising Main (Doc id 378341)** **12 - 23**

Attached is a report from the Executive Manager – Infrastructure Services to consider the current status and updated estimates of the Clyde Wastewater Project, and determine if the project should proceed to construction stage.

RECOMMENDED that the report be received and the recommendations therein be adopted.

19.4.5 **Lake Dunstan Water Supply Project - Gateway Review before Proceeding with Construction of Main Pipeline (Doc id 378432)** **24 - 34**

Attached is a report from the Executive Manager – Infrastructure Services to consider the current status and updated estimates of the Lake Dunstan Water Supply Project, and determine if the project should proceed to the construction stage.

RECOMMENDED that the report be received and the recommendations therein be adopted.

COMMITTEE IN CLOSED MEETING

RECOMMENDED that the public be excluded from the following part of the proceedings of the meeting, namely Item number 19.5.6

The general subject of each matter to be considered while the public is excluded, the reason for passing this resolution in relation to each matter, and the specific grounds under section 48(1) of the Local Government Official Information and Meetings Act 1987 for the passing of this resolution are as follows:

	General subject of each matter to be considered.	Reason for passing this resolution in relation to each matter.	Ground(s) under Section 48(1) for the passing of this resolution.
19.4.6	Contract for Lake Dunstan Water Supply and Clyde Wastewater Pipeline Construction	To enable Council to carry out, without prejudice or disadvantage, commercial activities (The premature disclosure of the financial information would detrimentally affect the Council's position in the negotiation)	Section 48 (1) (a)

This resolution is made in reliance on section 48(1)(a) of the Local Government Official Information and Meetings Act 1987 and the particular interest or interests protected by section 6 or section 7 of that Act or section 6 or section 7 or section 9 of the Official Information Act 1982, as the case may require, which would be prejudiced by the holding of the whole or the relevant part of the proceedings of the meeting in public are as shown above (in brackets) with respect to each item.

NOTE:

Section 48(4) of the Local Government Official Information and Meetings Act 1987 provides as follows:

- "(4) Every resolution to exclude the public shall be put at a time when the meeting is open to the public, and the text of that resolution (or copies thereof) -
- (a) Shall be available to any member of the public who is present;
 - and
 - (b) Shall form part of the minutes of the local authority."

ITEM TO BE CONSIDERED WHILE THE PUBLIC IS EXCLUDED

19.4.6 **Contract for Lake Dunstan Water Supply and Clyde Wastewater Pipeline Construction (CON 05-2018-04)** **36 - 54**

Attached is a report from the Executive Manager – Infrastructure Services to approve the award of a contract for the operation, design and construction of the Lake Dunstan Water Supply and Clyde Wastewater Pipelines.

RECOMMENDED that the report be received and recommendations therein be adopted.

COMMITTEE IN OPEN MEETING

RECOMMENDED that the public be readmitted.

CENTRAL OTAGO DISTRICT COUNCIL

THREE WATERS INFRASTRUCTURE COMMITTEE

MINUTES of a meeting of the Three Waters Infrastructure Committee held in Council Chambers, William Fraser Building, 1 Dunorling Street, Alexandra on Wednesday, 20 March 2019 commencing at 11.40.am.

PRESENT: Councillor M Topliss (Chair), His Worship the Mayor T Cadogan, Councillors V Bonham, S Calvert, N Gillespie, S Jeffery, N McKinlay and B Wills

APOLOGIES: M McPherson, L Claridge and S Duncan

RESOLVED that the apologies be accepted

Bonham / Jeffery

IN ATTENDANCE: S Jacobs (Chief Executive Officer), J Muir (Executive Manager - Infrastructure Services), L van der Voort (Executive Manager – Planning and Environment), R Williams (Governance Manager) and P Singleton (Governance Support Officer)

Note: M De Cort (Communications Coordinator) was also in attendance.

19.3.1 **Confirmation of Minutes**

RESOLVED that the minutes of the Three Waters Infrastructure Committee meeting held on 27 February 2019 be received as a true and correct record.

Wills / Calvert

19.3.2 **Chair's Report**

Councillor Topliss reported on the following:

- Thanked the Executive Manager – Infrastructure for her work leading up to the awarding of the wastewater pipe contract. The tender was under budget and additional sites were included
- Work has started on site at Naseby for water treatment

- Council staff and elected members met at Ripponvale to discuss the water scheme. Demand has doubled
- There are likely to be many more discussions with Council as a result of the changed drinking water legislation
- Visited St Bathans. That will probably be an area that will need to be included
- Work is being carried out to ensure the fences around the oxidation ponds are childproof
- The new Capital Projects Programme Manager will commence work in April.

RESOLVED that the Chair's report be received.

Topliss / Calvert

The meeting closed at 11.47 am.

CHAIR / /

Unconfirmed

Name	Member's Declared Interests	Spouse/Partner's Declared Interests	Council Appointments
Victoria Bonham	<ul style="list-style-type: none"> • STOP Trashing our Planet S.T.O.P. • NZ First (member and Chair of Waitaki District Electorate) 		<ul style="list-style-type: none"> • Manorburn Recreation Reserve Committee
Tim Cadogan	<ul style="list-style-type: none"> • Alexandra Musical Society (member) • Breen Construction Company (family Connection) • Otago Chamber of Commerce Central Otago Advisory Group member 	<ul style="list-style-type: none"> • Victim Support Worker • Trustee of the Otago Suicide Prevention Trust 	<ul style="list-style-type: none"> • Airport Reference Group • Maniototo Curling International Inc (Board member) • Eden Hore Steering Group • Tourism Central Otago Advisory Board
Shirley Calvert	<ul style="list-style-type: none"> • Central Otago Health Services Ltd (Employee) • Cromwell Rotary (member) 		<ul style="list-style-type: none"> • Central Otago Wilding Conifer Control Group • Cromwell and Districts Promotion Group • Creative Communities NZ Committee
Lynley Claridge	<ul style="list-style-type: none"> • Affinity Funerals (Director) • Central Otago Chamber of Commerce (Advisory Panel) 	<ul style="list-style-type: none"> • Affinity Funerals (Shareholder) 	<ul style="list-style-type: none"> • Central Otago Health Inc.
Stuart Duncan	<ul style="list-style-type: none"> • Wedderburn Cottages (Owner) Dairy Farm (Owner) 	<ul style="list-style-type: none"> • Maniototo Hospital Board (Board member) • Wedderburn Cottages (Owner) 	<ul style="list-style-type: none"> • Maniototo Ice Rink Committee
Neil Gillespie	<ul style="list-style-type: none"> • Contact Energy (Project Manager) • Clyde & Districts Emergency Rescue Trust (Secretary and Trustee) • Cromwell Volunteer Fire Brigade (Deputy Chief Fire Officer) • QLDC District Licensing Committee member • Rural Advisory Forum - Fire Emergency New Zealand 		<ul style="list-style-type: none"> • Lowburn Hall Committee • The Cromwell Property Development Sub-committee

Name	Member's Declared Interests	Spouse/Partner's Declared Interests	Council Appointments
Stephen Jeffery	<ul style="list-style-type: none"> • Fairview Orchard (Partner) • Fairview Roxburgh Ltd (Director) • Fairview family Trust. (Trustee) • G & S Smith family Trust (Trustee) • K & EM Bennett's family Trust (Trustee) • Roxburgh Gorge Trail Charitable Trust (Chair) • Roxburgh and District Medical Services Trust (Trustee) • Central Otago Clutha Trails Ltd (Director) • Teviot Prospects (Trustee) • Teviot Valley Community Development Scheme Governance Group • Central Otago Queenstown Network Trust 		<ul style="list-style-type: none"> • Teviot Prospects
Nigel McKinlay	<ul style="list-style-type: none"> • Transition To Work Trust (Board member) • Gate 22 Vineyard Ltd (Director) • Everyday Gourmet (Director) • Central Otago Wine Association (member) 		<ul style="list-style-type: none"> • Bannockburn Community Centre Management Committee • Bannockburn Recreation Reserve Management Committee • The Cromwell Property Development Sub-committee
Martin McPherson	<ul style="list-style-type: none"> • Alexandra Blossom Festival (Employee) 	<ul style="list-style-type: none"> • CODC (Employee) 	<ul style="list-style-type: none"> • Creative Communities NZ Committee
Malcolm Topliss			<ul style="list-style-type: none"> • Alexandra District Museum Inc • Ophir Welfare Association Committee (Treasurer) • Omakau Recreation Reserve Committee • Airport Reference Group • Central Otago Heritage Trust

Name	Member's Declared Interests	Spouse/Partner's Declared Interests	Council Appointments
Barrie Wills	<ul style="list-style-type: none"> • Central Environmental Services (Principal) • Coastguard Clyde (Secretary) • Central Otago Underwater Club (Secretary) • Roxburgh Gorge Trail Charitable Trust (Secretary) • Manorburn Curling Club and Combined Curling Club (Secretary) • NZ Association of Resource Management (member) • NZ Grassland Association (member) • Central Computer Consultants (Partner) • B&B Portfolio Co Ltd (Director) • Central Boers (member) • NZ Rhododendron Society (member and Editor) • Central Otago Astronomical Society (Secretary) • Clutha Mata au River Parkway Group (Forum member) • Otago Polytech Permanent External Advisory Committee (Natural Resources Rep) • Jolendale Park (Trustee) • Guardians of Lake Wanaka (member) • Central Otago Clutha Trails Ltd (Director) 	<ul style="list-style-type: none"> • Keep Alexandra Clyde Beautiful (member) 	<ul style="list-style-type: none"> • Otago Regional Transport Committee • Alexandra District Historical Association Inc • Manorburn Recreation Reserve Committee • Alexandra Suspension Bridge 1882 Working Group • Keep Alexandra Clyde Beautiful

**Three Waters Infrastructure Committee
15 May 2019**

Report for Decision

**Clyde Wastewater Project – Gateway Review Before Proceeding
With Construction of Rising Main (Doc id 378341)**

Purpose of Report

To consider the current status and updated estimates of the Clyde Wastewater Project, and determine if the project should proceed to the construction stage.

Executive Summary

The Clyde Wastewater Project was consulted in the 2018 Long Term Plan (LTP) process. The community supported proceeding with a staged approach to implementation. Wastewater will be piped from Clyde to Alexandra and treated at the existing Alexandra wastewater treatment site. Tenders for the construction of the wastewater gravity main, and the Lake Dunstan Water Supply pipelines between Clyde and Alexandra have now closed. Award of this contract will commit Council to significant expenditure on the wastewater project.

A review of the revised estimates against the LTP budgets indicates that the project is likely to cost more than was provided for in the budgets. Based on the tender price for the pipeline, costs of completed design and investigation work, and revised engineers estimates, the final cost is expected to be \$1.9 million more than the LTP budget for stage 1.

Stage 1 components	LTP Budget	Revised Estimate
Rising Main and pumpstation	\$5.5 million	\$7.1 million
Reticulation	\$4.6 million	\$6.0 million
Alexandra treatment site	\$1.6 million	\$0.5 million
Total	\$11.7 million	\$13.6 million

Recommendations

- A. **Recommended** that the report be received and the level of significance accepted.
- B. **Authorise** proceeding with construction of the gravity main between Clyde and Alexandra.

- C. **Approve** an over-expenditure of \$1.9 million on Stage 1 of the Clyde wastewater project, to be funded from
- a. \$780,000 under-expenditure on the 2018/19 wastewater improvement projects
 - b. Income from the sale of the Bannockburn Wastewater site, expected to be within \$300,000 – \$500,000.
 - c. The remaining costs will be included in the 2020/21 Annual Plan Budget.
- D. **Note** the reticulation is still to be designed and therefore has a higher degree of risk associated with the cost estimates.

Better Business Case Review

Investing in, and managing successful investment requires robust planning, analysis, decision making, implementation and review. Council staff are utilising the Better Business Case process to provide Council with a framework to achieve this.

The process ensures that all the key aspects of a proposal are considered and supported by evidence, and that they support Council’s strategic objectives.

The Business Case framework is a five stage process and provides evaluation of the project against the original expected outcomes, and continuing evaluation at key points during project development and delivery. This is shown on the table below.

Business Case Development Framework						
	Stage 0	Stage 1	Stage 2	Stage 3	Stage 4	Stage 5
Major policy/strategy objectives	Determining the strategic context	Scoping the proposal	Planning the scheme	Procuring the solution	Implementation	Evaluation
Major Product	Strategic Outline Programme	Strategic Outline Case	Outline business Case	Full Business Case		
Strategic Case	1. Ascertaining strategic fit	2. Making the case for change	Revisiting the case for change	Revisiting the case for change		
Economic Case		3. Exploring the preferred way forward	4. Determining potential VfM	Revisiting the preferred option 8. Procuring the VfM solution		
Commercial Case		Assessment of attractiveness to suppliers	5. Preparing for the potential deal	9. Contracting for the deal		

Financial Case		Capital and revenue constraints; stakeholder support	6. Ascertaining affordability and funding requirements	Set out the financial implications of the deal		
Management Case		Stakeholders; capability and capacity; delivery strategy	7. Planning for successful delivery	10. Ensuring successful delivery		
Gateway Review	Gate 0 Strategic fit	Gate 1 Business justification	Gate 2 Delivery strategy	Gate 3 Investment decision	Gate 4 "Go Live"	Gate 5 Benefits assessment

Design and tendering of the wastewater rising main between Clyde and Alexandra was accelerated to enable this to be tendered and constructed with the Lake Dunstan Water Supply Pipeline.

Tenders have been received for construction of the wastewater rising main and the Lake Dunstan water supply pipeline. The rising main has now reached the Gateway 3 review point. While other components of the project are still entering the design stage, Councillors need to review the overall project before providing approval to proceed with construction of the rising main which will commit Council to significant investment.

Project Background

The Clyde Wastewater Project was consulted in the 2018 Long Term Plan process. The community supported proceeding with a staged approach to implementation. Wastewater will be piped from Clyde to Alexandra and treated at the existing Alexandra wastewater treatment site.

Stage	Timing	Estimated Cost in LTP (+/- 30%)
Stage 1: the commercial and heritage precinct, and all properties between Sunderland Street and the Clutha River. It includes Dunstan Hospital, and the Clyde camping ground. This will address all existing individually consented commercial properties, and the older septic tanks.	2018-2021	\$11.7 million
Stage 2: the area not in stage 1, between Sunderland Street, Hazlett Street and Orchard Street. This area was largely developed prior to 1997 when changes to the requirements of septic tanks were introduced. This stage will also include upgrades to the Alexandra Treatment Plant to accommodate the additional flow, and improve discharge quality.	2028-2033	\$15.9 million (excl escalation)
Stage 3: the remaining residential area between Hazlett Street, Orchard Drive, and State Highway 8.	2038-2042	\$6.4 million (excl escalation)

The existing resource consent for the Alexandra wastewater treatment site expires on 1 August 2038. A condition on the existing consent requires council to investigate new and alternative technologies and land based disposal options prior to 2033.

The existing consent also has conditions regarding the maximum volume of the discharge, and the quality of the discharge.

The current application for a variation to the existing consent proposes that Council will investigate new and alternative technologies and land based disposal options five years prior to the anticipated discharge volumes reaching the consent limit.

It is expected that the combination of growth, and connection of stage 2 will result in the maximum consented volumes being reached. This means that upgrading of the treatment plant, and a new consent will be required prior to connection of stage 2. This will bring forward the 2038 upgrade to coincide with stage 2, with review being undertaken by 2023.

The volume of waste going through the Alexandra treatment plant is continually recorded using the Scada system. This is monitored against forecast volumes to ensure that upgrading of the treatment plant occurs in time to meet future demand requirements.

Progress

An indicative business case was completed prior to the project being included in the Long Term Plan. A review of options for addressing the problems were identified and assessed against the project objectives. The option to treat Clyde wastewater at the Alexandra treatment plant, and implement the project in stages was identified and confirmed as the preferred option.

Consenting, investigation, and design work has been underway in the period since 1 July 2018.

- Resource consent requirements

A variation is required to the existing resource consents for the Alexandra wastewater treatment plant, to enable Clyde wastewater to be treated at the Alexandra site. Council lodged the application for the variation with the Otago Regional Council (ORC) on 21 December. The processing time for the consent started on 10 January in accordance with legislation. The ORC have had a peer review undertaken to confirm that the Alexandra treatment site can take the Clyde wastewater and continue to meet the existing consent limits.

The peer review was completed and provided to ORC on 14 February. Several requests for further information from ORC have been responded to within a timely manner. Council is still waiting on the ORC to complete the processing of this consent. A recommending report is now expected to be provided by ORC to the council on 2 May. Council staff will then review the proposed conditions and return the report with confirmation of the conditions to the ORC. The recommending report will then be reviewed internally by ORC before issuing a consent.

A further consent application was lodged at the same time for the main pipeline crossing of the Waikerikeri Valley Stream and the Manuherikia River. ORC processing of this consent

was delayed waiting affected party approval. All affected party approvals were subsequently received by the 12 March. The recommending report for this consent is yet to be received.

- Land access

The New Zealand Transport Agency have provided agreement in principle to locate the main wastewater pipe in State Highway 85, along Tarbert Street. Final approval will be provided when construction drawings are submitted.

Contact Energy have an easement from LINZ for the Manuherikia River bed. Contact Energy have also been an affected party for the resource consent for crossing the Manuherikia River. Detailed design drawings are required before Contact Energy will provide approval of the proposed pipe location in the Manuherikia river bed. A key issue for Contact Energy is how the pipe will be protected during gravel extraction in the Manuherikia, and co-ordination with Contact Energy work.

Once Contact Energy consent has been provided, Land Information NZ will provide an easement for the pipe across the river.

A concession from the Department of Conservation (DOC) is required to locate the main pipeline within the rail trail. Council staff have been engaging with DOC since June 2017. DOC have provided agreement in principle to allow the pipeline to be within the rail trail reserve. The formal concession couldn't be provided until the design drawings were available. The formal concession application was lodged in December 2018, and formal approval is expected by the end of April.

Landowners along the rail trail have been advised of the proposed construction and location of the pipe. This has included a site visit with landowners who had fences within the rail trail corridor which will be affected by the pipeline.

Manuherikia Irrigation have been consulted as the main pipeline will be constructed adjacent and under the water race in place.

- Archaeological Authority approval

An archaeological assessment has been prepared and an archaeological authority has been provided by Heritage NZ for the pipeline route.

A separate archaeological assessment has been undertaken for reticulation in the Clyde township and an archaeological authority has been provided for this.

- Topographical survey

A contract was let to collect topographical information to enable the reticulation design to be undertaken. Landpro were the successful contractor and have completed this work.

- Ground investigations

A contract was let to collect geotechnical information to inform the reticulation design. Geosolve were the successful contractor and have completed this work.

- Ecological investigation

E3Scientific have undertaken an ecological survey of the main pipeline route. This included a lizard assessment of the pipeline route by Wildland Consultant Ltd. This identified sites on the banks of the Manuherikia River which contain threatened lizard species. This assessment will enable a planned approach to mitigate any potential threats that could be caused by the construction work.

- Peak population information

Analysis of cell phone data to provide information regarding peak population has been purchased from Qrious. This uses mobile data from Spark and Skinny SIM's, which is scaled based on external information such as market share. This identifies the split between locals, domestic and international day and overnight visitors. Data for December and January, for 2016/17, 2017/18 and 2018/19 has been analysed.

This information has been purchased for the Cromwell, Clyde, and Alexandra areas and will be used to inform infrastructure design which is highly dependent on peak population estimates. It has also been shared across Council, and to external organisations.

- Consultation with Iwi

Council staff have been working with Aukaha, the Dunedin based development arm of Ngai Tahu, regarding resource consent applications and the Department of Conservation concession. Staff have been meeting with Aukaha throughout the concept and planning stages.

- Design

The main pipeline between the proposed pumpstation on Sunderland Street and Rivers Street Alexandra has been designed. Further work is still required to complete the main pipeline design between Rivers Street and the treatment plant on Graveyard Gully. The proposal is that the pipeline will cross the Manuherikia River in the vicinity of the Linger and Die area. Further test pits and Contact Energy approval need to be completed before the location of the river crossing can be finalised.

Design of the pumpstation is underway. A separate report will be provided to Council regarding options for capacity of the tanks to meet current and future needs, and emergency storage.

Design of the reticulation has not yet commenced. The tender document is currently being finalised for the reticulation design, and will be ready for tendering in May. It is expected that the reticulation design will commence in early July.

- Tendering and construction of main pipeline, pumpstation, and reticulation.

Construction of the main pipeline between Clyde and Rivers Street has been tendered with the pipeline for the Lake Dunstan Water Supply. The tenders have been evaluated, and a separate report will be considered by Council regarding awarding this contract. The contract award will be subject to the outcome of this gateway review.

The construction of reticulation will involve a high degree of uncertainty relating to the individual property connections, and dealing with the existing septic tanks which will need to be disinfected and removed or punctured and filled. This work will require significant property

owner liaison. A separate report will be presented to the June Council meeting outlining contracting options for this component.

Financial Implications

The budgets provided for the Clyde Wastewater Project in the Long Term Plan were set based on estimates provided by Stantec in the report “Clyde Wastewater Study Stage 2 - Clyde Wastewater Collection and Wastewater Treatment at Alexandra, August 31 2017”. The following summary has been taken from this report.

Summary of Indicative Estimate of Costs

Description	Stage 1 CBD	Stage 2 Old Clyde and internal developments	Stage 3 Newer Clyde and urban expansion	Totals
Timing	2018 to 2023	2023 to 2033	2038 to 2043	
Wastewater Collection of Clyde	\$4.6M +/- 30% (\$3.2M-6.0M)	\$2.6 M +/- 30% (\$1.8M-3.3M)	\$4.3M +/- 30% (\$3.0M-5.6M)	\$11.5M +/-30% (\$8.1M-\$15.0M)
Main Pump station and rising main	\$5.5M +/- 30% (\$3.9M- \$7.2M)			\$5.5M +/- 30% (\$3.9M- \$7.2M)
Alexandra WWTP upgrade	\$1.67M consenting and engineering Excluding operational changes to comply with existing Consent.	\$9.7M		\$11.4M +/- 30% (\$8M – \$14.8M)
Total	\$11.7M +/- 30%	\$12.3M +/- 30%	\$4.3M +/- 30%	\$28.4M +/- 30% \$20M - \$37M
<p>MWH/Stantec warrants only that they have exercised the reasonable skill, care and due diligence of a Consulting Engineer in the preparation of their professional opinion of any costs of construction estimates. MWH/Stantec has no control over costs of labour, materials, competitive bidding environments and procedures, unidentified field conditions, financial and/or market conditions, or other factors likely to affect the probable cost of the construction of the Works, all of which are and will unavoidably remain in a state of change. MWH/Stantec cannot and does not make any warranty, promise, guarantee, or representation, either express or implied, that proposals, bids, project construction costs, or costs of operation or maintenance will not vary substantially from its good faith cost estimate.</p>				

Main Pumpstation And Rising Main From Clyde To Alexandra Treatment Plant

A revised engineers estimate has been provided by Stantec in November 2018 for the pump station and rising main. This revised the cost estimate for these components from an upper limit of \$7.2 million (including a +30% contingency) to \$9.2 million.

A tender price has now been received for construction of a significant section of the pipeline. Consenting and design for this component are also now well advanced. Council staff have revised the expected costs to the complete rising main and pumpstation from \$5.5 million to \$7.1 million. This includes a contingency figure of +10%, rather than the +30% included in the revised engineers estimate.

	LTP Provision +/- 30%	Revised estimate
Rising Main – Clyde to River	\$3.3 million	\$3.34
Rising Main - River to Treatment Plant		\$0.523 million (Still to tender)
Main Pumpstation	\$0.974 million	\$2.202 million (Still to tender)
Consenting, investigations & design	\$0.71 million	\$0.40 million
Contingency (10%)	\$0.52 million	\$0.61 million
Total	\$5.5million	\$7.1 million

The current information from the recommended tender for construction of the rising main, and the updated engineers estimate for the remaining work indicates that the costs for the main pumpstation and rising main will be **\$1.6 million** over the LTP budget.

This cost increase is largely due to the revised estimate relating to the main pumpstation and provision of storage at Clyde.

Reticulation

The budget provided in the LTP for the reticulation component of the project is \$4.6 million. The breakdown of this budget is shown on the following table. Detailed design is still to be undertaken for this component of the work.

	LTP Provision +/- 30%
Minor pumpstations	0.81
Rising Main	0.165
Gravity Main	1.85
Manholes and chambers	0.285
Property connections	0.035
Pumped lots	0.125
establishment	0.265
Consenting, investigations & design	0.69
Contingency	0.375
Total	\$4.6 million
Range	\$3.4 – 6.0 million

Council staff believe it is unlikely that the costs for constructing reticulation in stage 1 will come in under budget. This stage will involve construction in a historic commercial area which will require great care and potentially reduce productivity. It is likely that the costs for this work will be at the upper end of the range and it would be prudent to base the current estimate on \$6 million rather than \$4.6 million.

Alexandra Treatment Site

A budget of \$1.6 million was provided to cover business case development, consent, investigation, and engineering costs associated with connecting Clyde wastewater to the Alexandra wastewater site. The original estimate was based on the potential of needing to apply for a new consent, rather than a variation to the existing consent.

Significant saving has occurred as a result of the variation being progressed. The final cost for this component of the work is now estimated to be \$500,000, which will be \$1.1 million under the LTP budget.

Summary of Updated Estimates

	LTP Budget	Revised Estimate
Rising Main and pumpstation	\$5.5 million	\$7.1 million
Reticulation	\$4.6 million	\$6.0 million
Alexandra treatment site	\$1.6 million	\$0.5 million
Total	\$11.7 million	\$13.6 million

The revised estimate is \$1.9 million over the LTP budget.

2018-19 Wastewater Improvement Budgets

There is a forecasted underspend of \$780,000 within the Alexandra and Cromwell wastewater improvement budgets for the 2018/19 financial year. This is largely due to lower than expected costs to complete remediation at the Bannockburn wastewater treatment site.

Remediation of this site will be completed this financial year. This site will then be able to be sold. The estimated value of this site is \$300,000-\$500,000.

Options Considered

Option 1 – Proceed with the Clyde Wastewater Project (Recommended).

Advantages:

- will provide infrastructure that will ensure that discharges from residential and commercial properties do not pose a threat to the health or amenity of groundwater or surface water quality
- Address odour issues within the heritage precinct
- Address non-complying wastewater discharges which threaten the reputation of Clyde and Council
- Remove a barrier to possible future growth.
- Central Otago will maintain its reputation for clean lakes and rivers. This supports community health and wellbeing, and supports recreational opportunities
- Treatment will include nutrient removal and disinfection, resulting in reduced environmental impacts from discharges.
- Treatment at Alexandra will protect groundwater bores between Clyde and Alexandra.

- Delivers the project that was widely supported during consultation on the 2018 Long Term Plan.

Disadvantages:

- Considerable direct financial cost to the community

Option 2 – Do not proceed with the Clyde Wastewater Project

Advantages:

- Reduced direct financial cost to the community

Disadvantages:

- There is no certainty about the operating performance of existing private septic tanks, and their current density provides a high risk of groundwater and surface water contamination.
- ORC is expected to issue a Plan Change requiring urban areas to comply with nitrogen discharge limits to groundwater. Clyde, with a high density of septic tanks, would not comply with the new requirements.
- Issues with odour, public toilet capacity, and potential contamination of water courses will affect Clyde's reputation for residents and visitors.
- The community will have a low level of certainty regarding long term planning for Clyde, and potential for growth.

Proposal

It is recommended that Council proceeds with the Clyde Wastewater project. The increase in estimated costs of \$1.9 million be funded from the under-expenditure on the Cromwell wastewater upgrade.

The Cromwell wastewater project was completed \$2.9 million under the original budget. The unspent funds up until the 30 June 2018 have previously been reallocated. There is currently \$780,000 allocated to Cromwell wastewater improvement project in 2018-19 which will not be required.

Risk Analysis

The main pipeline between Clyde and Alexandra is a relatively low risk component, with the exception of the point where the pipe crosses the Manuherikia River. There is already one pipe in place, and it is expected that the second pipe can be installed in a similar manner. There is still some uncertainty regarding the final location of the crossing, and this will need to be confirmed with Contact Energy before proceeding.

Significant work has been undertaken on the design of the pumpstation, and the estimate has been revised to reflect changes recommended to mitigate risk related to this part of the work. Design of the reticulation is still to be undertaken. There has been no detailed investigations undertaken regarding the connections to the approximately 170 properties that will be included in stage 1. There is a high degree of risk associated with this work as it is located in the oldest part of the town, with much of the work to be undertaken in a heritage and commercial area.

There are three outstanding consents that present a risk to proceeding with awarding a tender for construction of the rising main. These are the variation to the ORC consent to allow treatment of Clyde wastewater at Alexandra, the ORC consent for the river crossings, and the DOC concession for locating the pipeline in the rail corridor. These three consents are all expected to be issued by the 15 May, and an update will be provided at the meeting.

The tendered price for the rising main construction is valid until the 24 May. If approval is not provided to proceed with awarding the tender by this date then the contract would need to be retendered, or a cost/time variation may be required.

Local Government Act 2002 Purpose Provisions

- (1) The Local Government Act states that the purpose of local government is—
- (a) to enable democratic local decision-making and action by, and on behalf of, communities; and
 - (b) to meet the current and future needs of communities for good-quality local infrastructure, local public services, and performance of regulatory functions in a way that is most cost-effective for households and businesses.
- (2) In this Act, good-quality, in relation to local infrastructure, local public services, and performance of regulatory functions, means infrastructure, services, and performance that are—
- (a) efficient; and
 - (b) effective; and
 - (c) appropriate to present and anticipated future circumstances.

This project will ensure that residential and commercial properties in Clyde are able to meet the required environmental standards relating to wastewater treatment and discharges.

The proposal represents the most efficient and cost-effective way of achieving the required standards in the long term.

Council Policies / Plans / Procedures

Councils 2018 Long Term Plan and Infrastructure Strategy were considered when preparing this report.

Implementation Plan

The timeline for the Clyde Waste Water Pipeline Construction is:

Award of contract	17 May 2019
Commence construction	20 May 2019
Performance testing	August 2019 – June 2020
Completion of project scope	26 June 2020

The contract for design of the reticulation will be tendered in May. A report outlining the options for tendering of the reticulation construction will be presented to the Three Waters Committee in June. The target completion date for construction of the reticulation is 30 June 2021.

Consultation and Engagement

There has been significant public consultation and engagement with stakeholders to get the project to the current point. Ongoing engagement will continue to occur throughout the project.

Communication

Increased public messaging will need to occur to provide updates as construction proceeds. A high level of communication will also be required with individual property owners and the business community as the reticulation component of the project develops.

A dedicated communications professional has now been engaged to assist with public messaging for the remainder of the project.

A media statement has been prepared and will be released with the Council papers for the 15 May. A further media statement will be issued following the Council meeting on 15 May.

Report author:



Julie Muir
Executive Manager - Infrastructure
Services
29/04/2019

Reviewed and authorised by:



Sanchia Jacobs
Chief Executive Officer
6/05/2019

**Three Waters Infrastructure Committee
15 May 2019**

Report for Decision

**Lake Dunstan Water Supply Project – Gateway Review Before Proceeding
With Construction of Main Pipeline (Doc id 378432)**

Purpose of Report

To consider the current status and updated estimates of the Lake Dunstan Water Supply Project, and determine if the project should proceed to the construction stage.

Executive Summary

The Lake Dunstan Water Supply was consulted in the 2018 Long Term Plan (LTP) process. The community supported changing the upgrading of the treatment process from a two staged project to a single stage, to be implemented in 2020.

Filter trials have been underway to test different filtration systems. This has identified that the proposed cartridge filters are blocking within 24 hours rather than the expected 3-6 months. Investigations have confirmed the presence of Lindavia intermedia algae in Lake Dunstan.

Lindavia algae is the species responsible for making lake snow, a glue-like slime that blocks water inlets and water filters. This is the first time the algae has been found in the lake. It is not toxic and poses no known human health risk.

The project can produce higher quality water for Clyde and Alexandra through the addition of UV treatment, and improved chlorination and reduced lime in the water for Alexandra within the existing timeframe.

The presence of lindavia is however expected to delay construction of a filtration system to meet the New Zealand Drinking Water Standards for at least 12 months. The costs of implementing the filtration system are now unknown, and will not be able to be estimated until a solution is identified.

If this had not been discovered through filter trials then significant investment could have occurred which would not have been fit for purpose in a few years.

Recommendations

- A. **Recommended** that the report be received and the level of significance accepted.

- B. **Authorise** proceeding with construction of the main water pipeline between Clyde and the Alexandra Northern reservoir.
- C. **Agree** to continuing with investigations for a filtration process for the Lake Dunstan Water Supply which meets the requirements of the NZ Drinking Water Standards.
- D. **Authorise** proceeding with design of chlorination and UV treatment processes for the Lake Dunstan Water Supply which can be constructed to coincide with completion of the pipeline.

Better Business Case Review

Investing in, and managing successful investment requires robust planning, analysis, decision making, implementation and review. Council staff are utilising the Better Business Case process to provide Council with a framework to achieve this.

The process ensures that all the key aspects of a proposal are considered and supported by evidence, and that they support Council’s strategic objectives.

The Business Case framework is a five stage process and provides evaluation of the project against the original expected outcomes, and continuing evaluation at key points during project development and delivery. This is shown on the table below.

Business Case Development Framework						
	Stage 0	Stage 1	Stage 2	Stage 3	Stage 4	Stage 5
Major policy/strategy objectives	Determining the strategic context	Scoping the proposal	Planning the scheme	Procuring the solution	Implementation	Evaluation
Major Product	Strategic Outline Programme	Strategic Outline Case	Outline business Case	Full Business Case		
Strategic Case	1. Ascertaining strategic fit	2. Making the case for change	Revisiting the case for change	Revisiting the case for change		
Economic Case		3. Exploring the preferred way forward	4. Determining potential VfM	Revisiting the preferred option 8. Procuring the VfM solution		
Commercial Case		Assessment of attractiveness to suppliers	5. Preparing for the potential deal	9. Contracting for the deal		

Financial Case		Capital and revenue constraints; stakeholder support	6. Ascertaining affordability and funding requirements	Set out the financial implications of the deal		
Management Case		Stakeholders; capability and capacity; delivery strategy	7. Planning for successful delivery	10. Ensuring successful delivery		
Gateway Review	Gate 0 Strategic fit	Gate 1 Business justification	Gate 2 Delivery strategy	Gate 3 Investment decision	Gate 4 “Go Live”	Gate 5 Benefits assessment

Tenders have been received for construction of the Lake Dunstan Water Supply pipeline between Clyde and the Alexandra Reservoir, and the Clyde wastewater rising main. The main pipeline has now reached the Gateway 3 review point. While other components of the project are still entering the design stage, Councillors need to review the overall project before providing approval to proceed with construction of main pipeline which will commit Council to significant investment.

Project Background

The Lake Dunstan Water Supply Project was consulted in the 2015 Long Term Plan process.

The 2015 10-Year Plan provided for treatment to be implemented in two stages. This would involve constructing the chlorination part of the treatment process in Stage 1, and then the filtration and ultraviolet treatment parts in Stage 2 in 2027-29.

The proposal was:

- Extend the borefield at the Clyde water supply source.
- Build a single treatment facility at Clyde to service both the Clyde and Alexandra water supplies.
- Construct a pipeline between the Clyde treatment site and the Alexandra Northern Reservoir.
- Treat water by chlorination for bacterial contamination only in this stage of the project (treatment for protozoa and virus contamination would be undertaken in 2027).
- Comply with the New Zealand Drinking Water Standards at stage 2 completion in 2027.

Council revisited the proposal to implement the treatment in two stages following the Havelock North water contamination incident, and consulted in the 2018 LTP to construct the treatment process in a single stage. The scheme would then comply with the New Zealand Drinking Water Standards in 2020.

Construction of the pipeline has subsequently been delayed by one year to enable the wastewater pipeline between Clyde and Alexandra to be constructed at the same time as the water pipeline.

Progress

- Resource consent requirements

A consent application was lodged with the Otago Regional Council (ORC) on 21 December for the main pipeline crossing of the Waikerikeri Valley Stream, and the wastewater pipe across the Manuherikia River. ORC processing of this consent was delayed waiting affected party approval. All affected party approvals were subsequently received by the 12 March. The recommending report for this consent is yet to be received. Staff will provide a verbal update on this consent during the meeting.

- Land access

The New Zealand Transport Agency have provided agreement in principle to locate pipe in State Highway 8 down the Clyde hill. Final approval will be provided when construction drawings are submitted.

A concession from the Department of Conservation (DOC) is required to locate the pipeline within the rail trail. Council staff have been engaging with DOC since June 2017. DOC have provided agreement in principle to allow the pipeline to be within the rail trail reserve. The formal concession couldn't be provided until the design drawings were available. The formal concession application was lodged in December 2018, and formal approval is expected by the end of April.

Landowners along the rail trail have been advised of the proposed construction and location of the pipe. This has included a site visit with landowners who had fences within the rail trail corridor which will be affected by the pipeline.

Manuherikia Irrigation have been consulted as the main pipeline will be constructed adjacent and under the water race in place.

Project staff have been liaising with Council Parks and property staff, and the Salvation Army regarding the section of the pipeline which runs between the Alexandra Reservoir and Dunstan Road.

- Archaeological authority approval

An archaeological assessment has been prepared and an archaeological authority has been provided by Heritage NZ for the pipeline route. An archaeologist is required to be on site while construction occurs through the future cemetery site as this contains a historic water race.

- Topographical survey

A topographical survey was undertaken by Landpro.

- Ground investigations

Geosolve have undertaken ground investigations and provided a geotechnical report to inform the reticulation design.

- Ecological investigation

E3Scientific have undertaken an ecological survey of the pipeline route. Information regarding the local lizard population was provided by DOC for the rail trail corridor.

The ecological investigation has identified that the threatened species *Raoulia australis* located around the perimeter of the proposed water tank site on the Clyde hill. Consideration was made to relocating the tank, however there are other limitations dictating the location of this tank. To reduce potential damage to this species, plants will be marked on site by the ecologist, and protected by fencing. 500 native plants will also be planted in the vicinity of the water tank to mitigate ecological impacts of the project.

- Peak population information

Analysis of cell phone data to provide information regarding peak population has been purchased from Qrious. This uses mobile data from Spark and Skinny SIM's, which is scaled based on external information such as market share. This identifies the split between locals, domestic and international day and overnight visitors. Data for December and January, for 2016/17, 2017/18 and 2018/19 has been analysed.

This information has been purchased for the Cromwell, Clyde, and Alexandra areas and will be used to inform infrastructure design which is highly dependent on peak population estimates. It has also been shared across Council, and to external organisations.

- Consultation with Iwi

Council staff have been working with Aukaha, the Dunedin based development arm of Ngai Tahu, regarding resource consent applications and the Department of Conservation concession.

- Bores, and pipelines

The raw water pipeline between the bores and the proposed treatment site has been designed and included in the pipeline tender.

The main pipeline between the proposed treatment site at Clyde and the Northern Reservoir above the Alexandra Cemetery has also been designed and tendered. This includes a pipe to the Alexandra Airport. All components of the main pipeline have now been designed and tendered.

There was one existing bore feeding Clyde (Clyde Bore). A further three bores are planned over the life of this water supply. All three have been drilled, and one has been constructed with full headworks, and is now operational. The remaining two bores will be developed in the future when demand requires. The existing Clyde bore has been upgraded to connect to the new water supply. The electrical controls for the two bores have been constructed and are temporarily housed in a container on site. These will be relocated into a new steel framed building which will house the bore headworks and controls.

A new water tank (balance tank) will be constructed which provides the required 30 minutes for the chlorination to work before the water is distributed to the Clyde and Alexandra reservoirs.

- Water Treatment

Filter trials have been underway at the new bore headworks to test different filtration systems. This has identified that the proposed cartridge filters are blocking within 24 hours rather than the expected 3-6 months. Investigations have been underway to identify why the filters are clogging so quickly.

These investigations have confirmed the presence of a Lindavia Intermedia algae in Lake Dunstan. Lindavia algae is the species responsible for making lake snow, a glue-like slime that blocks water inlets and water filters. This is the first time the algae has been found in the lake. It is not toxic and poses no known human health risk.

Lindavia has caused issues by blocking domestic filters in Wanaka and has also been found in Lakes Wakatipu and Coleridge as well as several North Island locations. The quantities of Lindavia discovered at Lake Dunstan appear to be lower than initially found at Lake Wanaka.

Council is working with Stantec, Landcare Research and The University of Otago to isolate Lindavia on trial filters. Because Lindavia is a relatively new organism in New Zealand science, the industry is still learning about its lifecycle and prevalence with a scanning electron microscope.

Council staff are also working with Queenstown Lakes District Council staff on investigating filtration options which will be able to cost effectively filter the water to the standard required to meet the New Zealand Drinking Water Standards. At this stage a solution is not expected to be identified until at least November.

The presence of lindavia is expected to delay construction of a filtration system to meet the New Zealand Drinking Water Standards for at least 12 months. The costs of implementing the filtration system are now unknown, and will not be able to be estimated until a solution is identified.

- Tendering and construction of main pipeline.

Construction of the main pipeline between the bores and the Northern reservoir has been tendered with the pipeline for Clyde wastewater. The tenders have been evaluated, and a separate report will be considered by Council regarding awarding this contract. The contract award will be subject to the outcome of this gateway review.

- Tendering and construction of treatment plant.

The construction of the filtration system component of the treatment plant has a high degree of uncertainty relating to the presence of lindavia. Further investigations will be required over a period up to 12 months before a solution can be confirmed. Six options have been identified for the filtration, which will be trialled over the next six to nine months. A separate report will then be presented to Council outlining the final filtration options and associated costs.

The chlorination and UV treatment process are not affected by the presence of lindavia, and this part of the treatment process could proceed now. This would be a variation to the original 2015 proposal to construct the treatment in two stages, as the UV treatment would occur in the first stage, and only the filtration would occur in the second stage.

There are a number of options for installing the chlorination and UV as an initial temporary solution. These will be further investigated and a report will be presented outlining the options and costs.

Financial Implications

The budget available from the 2018 LTP, and the carry forward from 2017/18 to 2018/19 is shown on the following table.

Component	LTP Budget	Carry Forward	Total Budget
Bores and headworks	\$455,000	\$650,000	\$1,105,400
Raw water pipeline	\$849,000		\$849,000
Main trunk pipeline	\$6,312,000	\$340,000	\$6,652,000
Design costs	\$250,000	\$657,000	\$907,000
Water Treatment Plant	\$4,962,000		\$4,962,000
Total	\$12,829,000	\$1,647,000	\$14,476,000

The revised estimate for the bores and pipework following tendering is:

	LTP Budget	Revised Estimate
Bores and headworks	\$1,105,400	\$1,085,000
Raw water pipeline	\$849,000	\$675,000
Main trunk pipeline	\$6,652,000	\$6,475,000
Pipeline to Clyde reservoir		\$180,000
Design costs	\$580,000	\$580,000
Total for bores and pipeline	\$9,186,400	\$8,995,000

An updated estimate is unable to be provided for the water treatment plant until a filtration solution is finalised. It is likely that this will exceed the initial budget, which provided for cartridge filtration. A pre filtration process is now going to be required, and possibly membrane filtration which has a higher capital cost than the cartridge filtration system.

Estimated design costs for the treatment process have also increased significantly from \$390,000 to \$690,000.

	LTP Budget	Revised Estimate
Treatment design costs	\$320,000	\$690,000
Water treatment plant	\$4,962,000	To be advised
Total for treatment	\$5,282,000	To be advised

Options Considered

Option 1 – Proceed with the construction of the water main between Clyde and Alexandra, on the basis that the treatment process will be completed in two stages. (Recommended).

Under this option construction of the pipeline and the first stage of treatment would proceed with completion in 2020. The first stage of treatment would include chlorination which will treat the water for potential bacterial contamination, and UV which will treat the water for potential protozoa and virus contamination.

The second stage of treatment involving a filtration system would not be implemented until later. Stage 1 treatment would improve the water quality, but will not provide the multi barrier protection required to meet the NZ Drinking Water Standards.

Advantages:

- Alexandra will receive water that has less lime in 2020.
- There will be improved water quality and safety of the supply for Clyde and Alexandra through the provision of UV treatment.

Disadvantages:

- The water scheme will not fully meet the New Zealand Drinking Water Standards until a filtration system is completed.
- There may be a loss of economies of scale in construction of the treatment process by implementing the filtration system in a second stage.

Option 2 – Delay the entire project until a filtration solution is finalised.

This option would result in the pipeline, and water treatment being delayed until after a filtration solution is finalised.

Advantages:

- The entire treatment facility could be constructed in one stage which will provide some design and construction cost efficiency.

Disadvantages:

- The Clyde and Alexandra water schemes will continue to not meet the New Zealand Drinking Water Standards.
- There will continue to be public dissatisfaction regarding lime in Alexandra water supply
- Issues relating to chlorination contact times in parts of Alexandra will not be addressed
- The Lake Dunstan Water Supply and Clyde Wastewater pipeline contract would need to be retendered.
- There would be increased costs to construct the wastewater pipeline if the water pipeline is not constructed at the same time.
- Water supply to the Alexandra airport will be further delayed.

Discussion

While the discovery of lindavia in Lake Dunstan is disappointing, the presence in Lakes Wanaka and Wakatipu indicates this was inevitable at some point in the future. The discovery now ensures that the filtration system that is implemented will be able to accommodate lindavia. If this had not been discovered now significant investment could have occurred which would not be fit for purpose within a few years.

The work being undertaken to identify a solution for the Lake Dunstan Water Supply will also be able to be used for the Cromwell water upgrade which is programmed to commence in 2021.

Queenstown Lakes District Council and Central Otago District Council are working together and will share costs for identifying a solution.

Risk Analysis

Consideration has been given to proceeding with an alternative filtration process, such as membrane filters. There are significant risks associated with implementing an untested system due to the current lack of understanding regarding treatment of lindavia.

Trials of potential solutions will be undertaken over winter and summer months to ensure that the solution is fit for purpose, and future investment is efficient and cost effective.

There will be reputational risk to Council if an alternative water supply to address lime in Alexandra is not progressed soon.

Installation of UV treatment in stage 1 will reduce the risk of protozoa or viral contamination, and Council would be taking all practicable steps to provide a safe water supply within the current circumstances.

Local Government Act 2002 Purpose Provisions

The Local Government Act states that the purpose of local government is—

- (a) to enable democratic local decision-making and action by, and on behalf of, communities; and
- (b) to meet the current and future needs of communities for good-quality local infrastructure, local public services, and performance of regulatory functions in a way that is most cost-effective for households and businesses.

This project will ensure that Council is able to provide a safe water supply which meets the expected demand for water supply to the Alexandra, Clyde and Dunstan Flats area for the future.

The proposal represents the most efficient and cost-effective way of achieving the required standards in the long term.

Council Policies / Plans / Procedures

Councils 2018 Long Term Plan and Infrastructure Strategy were considered when preparing this report.

Proposal

The proposal is that council proceeds with construction of the main water pipeline between Clyde and the Alexandra Northern reservoir.

Treatment would proceed on the basis that it will be constructed in two stages, with chlorination and UV treatment processes constructed to coincide with completion of the pipeline. Staff will investigate the options for constructing this work and report back to the Three Waters Committee on these before proceeding with construction.

Investigations for a filtration process which can manage the presence of lindavia, and meets the requirements of the NZ Drinking Water Standards will continue. Staff will report back to Three Waters Committee on the outcome of these investigations, and likely cost implications for the solution before proceeding with detailed design.

Implementation Plan

The timeline for the pipeline construction is as follows:

Award of contract	17 May 2019
Commence construction	20 May 2019
Performance testing	August 2019 – March 2020
Completion of pipeline	31 March 2020

Council staff will investigate the options regarding implementing the first stage of the treatment process for chlorination and UV. A report will then be provided to the Three Waters Committee to approve the temporary solution. This will then be constructed to ensure that the initial treatment process is in place when the pipeline is completed.

Six possible solutions for the filtration system have been identified, and investigation and trialling of these will continue into summer. A report outlining options will then be provided.

Consultation and Engagement

There has been significant public consultation and engagement with stakeholders to get the project to the current point. Ongoing engagement will continue to occur throughout the project.

Communication

A media statement has been prepared and will be released with the Council papers for the 15 May. A further media statement will be issued following the Council meeting on 15 May.

Increased public messaging will need to occur to provide updates as construction proceeds. Public messaging regarding Lindavia is being prepared.

A dedicated communications professional has now been engaged to assist with public messaging for the remainder of the project.

Report author:



Julie Muir
Executive Manager - Infrastructure
Services
26/04/2019

Reviewed and authorised by:



Sanchia Jacobs
Chief Executive Officer
6/05/2019

COMMITTEE IN CLOSED MEETING

RECOMMENDED that the public be excluded from the following part of the proceedings of the meeting, namely Item number 19.5.6.

The general subject of each matter to be considered while the public is excluded, the reason for passing this resolution in relation to each matter, and the specific grounds under section 48(1) of the Local Government Official Information and Meetings Act 1987 for the passing of this resolution are as follows:

	General subject of each matter to be considered.	Reason for passing this resolution in relation to each matter.	Ground(s) under Section 48(1) for the passing of this resolution.
19.4.6	Contract for Lake Dunstan Water Supply and Clyde Wastewater Pipeline Construction	To enable Council to carry out, without prejudice or disadvantage, commercial activities (The premature disclosure of the financial information would detrimentally affect the Council's position in the negotiation)	Section 48 (1) (a)

This resolution is made in reliance on section 48(1)(a) of the Local Government Official Information and Meetings Act 1987 and the particular interest or interests protected by section 6 or section 7 of that Act or section 6 or section 7 or section 9 of the Official Information Act 1982, as the case may require, which would be prejudiced by the holding of the whole or the relevant part of the proceedings of the meeting in public are as shown above (in brackets) with respect to each item.

NOTE:

Section 48(4) of the Local Government Official Information and Meetings Act 1987 provides as follows:

- "(4) Every resolution to exclude the public shall be put at a time when the meeting is open to the public, and the text of that resolution (or copies thereof) -
- (a) Shall be available to any member of the public who is present;
 - and
 - (b) Shall form part of the minutes of the local authority."

COMMITTEE IN OPEN MEETING

RECOMMENDED that the public be readmitted.