

Advice to Wellington City Council (WCC) Regarding Three Waters Services Capital Expenditure (CAPEX) Delivery Plan for the Financial Years 2022/23 and 2023/24 (Y2&3 CDP)

ТО	Siobhan Procter, Council Client Representative, WCC
COPIED TO	Chris Matthews, Manager Water & Waste, WCC
	Zac Jordan, Julie Alexander, Mark Ford, Tonia Haskell
FROM	Susannah Cullen, Manager Programme Practice
DATE	13 June 2022

Action sought

	Action sought	Deadline
Siobhan Procter Council Client Representative, WCC	Approve this memo as final, incorporating actions from initial meeting (02/05/2022) and subsequent communications.	17 June 2022

Contact for telephone discussion (if required)

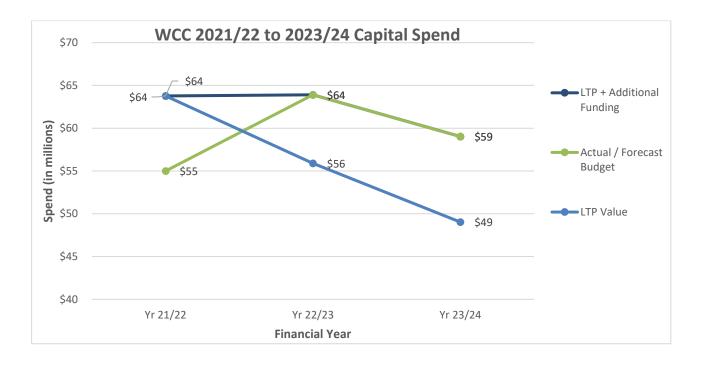
Name	Position	1st Contact	
Tonia Haskell	Group Manager Network Development & Delivery, Wellington Water	027 496 1970	
Susannah Cullen	Manager Programme Practice, Wellington Water	021 927 942	✓

Purpose of this advice

- 1. This paper provides a high-level summary of the capital delivery plan (CDP) Wellington Water plans to deliver in Year 2 of the LTP (FY22/23).
- 2. An indicative plan for delivery in Year 3 (FY23/24) is included for information, noting this will be further refined throughout Year 2.
- 3. Where significant risks or opportunities have been identified, these are outlined in the following sections.

Summary

- 4. The budget approved by WCC for Year 2 and Year 3 is **\$63.9M** and **\$59.0M** respectively.
- 5. The approved LTP value for Year 2 is \$55.9M and the approved LTP value for Year 3 is \$49.0M (note these are inflated values, as provided by WCC 2/07/2021).
- 6. WCC have brought forward and approved \$18M of LTP growth funding to support delivery of the CBD Wastewater Package (Taranaki St WW Pump Station and Rising Main). Wellington Water have proposed this being assigned as \$8M in Year 2 and \$10M in Year 3. These are included in the budgets presented at Item 4.
- 7. The total value of the project works proposed is \$79.1M for Year 2 and \$74.9M for Year 3. A detailed breakdown of how this spend aligns with the WCC LTP Council Budgets is presented at Appendix A. Further information is provided in the spreadsheets provided as Annex A (20220602 WCC Projects List).
- 8. The projects value comprises **124%** of the approved budget for Year 2 and **127%** for Year 3. This overprogramming against the approved budget has been purposefully introduced to mitigate delivery risks and optimism bias in delivery capacity.
- 9. It is the intention of Wellington Water to manage the delivery of these projects within the budget envelopes noted at Item 4, using Delegated Authorities within both Wellington Water and WCC to manage movements between Council Budgets and/or Activities.
- 10. Progress will be reported throughout FY22/23 via the monthly finance and programme reports and meetings.
- 11. Works to begin delivery of some projects identified through the Very High Criticality Assets (VHCA) assessment programme have been introduced into the Year 2 plan (FY22/23) and will continue to be developed throughout FY22/23.
- 12. Wellington Water will work with WCC during Year 2 to optimise the Year 3 programme within the approved budgets to reflect project progress and any changes in prioritisation of works required.



Introduction

13. Wellington Water has been working to improve the effectiveness of what we are delivering, what we mean by this is having a focus on delivering the right assets at the right time; whether that be a renewal, level of service increase or to support growth, although our current emphasis is on renewals. We are also working to improve the efficiency of our programme delivery and beginning to bring in projects from the VHCA assessment programme will contribute to improving our effectiveness.

WCC Capex

- 14. The confirmed WCC LTP CAPEX investment is **\$63.9M** and **\$59.0M** for Year 2 and Year 3 respectively.
- 15. The allocation of works for each council project codes is shown at Appendix A and further breakdown of the projects and funding allocations are provided in Annex A (20220608 WCC Project List file).
- 16. We have proposed 122 projects with a total value of \$79.1M in Year 2 (noting our intention to manage delivery of these projects within the approved budget as set out at Item 14) including:
 - 9 Major Projects = \$26.3M; of these, 7 projects comprise the CBD Wastewater Package
 - 45 other capital projects = \$35.1M
 - 7 land development projects = \$1M
 - 8 RMA consenting projects = \$0.5M
 - Operations delivered minor works and reactive capex = \$16.1M.
- 17. It is noted that the Reservoirs Package (Bell Road and Moe-i-te-Ra) is NOT included in the proposed projects. The next step for this package of work is to present the findings from the review and recommended next steps to WCC. Funding for the Reservoirs package will be presented to WCC independently of the annual planning process for Year 2.
- 18. The programme has many smaller, single projects which provides flexibility in delivery, but introduces high resource demand for managing large numbers of projects.
- 19. There are now two catchment renewal programmes, which will improve deliverability.

Risks & Opportunities

- 20. **Delivery of Proposed Y2&3 CDP** historically, Wellington Water has underspent capital against council budgets. We have worked to mitigate this risk by over-programming against the LTP across the three years.
- 21. **Delivery of the VHCA Renewal Programme** initial works to identify the VHCA renewal programme of works is underway, and an allowance has been made for scoping and planning some projects in Year 2, but the full scale of the works required is not yet fully understood. Wellington Water will provide updates on the programme as it develops.
- 22. **Resource and Supply Chain Constraints** there is currently an industry wide constraint in availability of resources (both materials and personnel) which may impact the delivery of projects. To mitigate the likelihood and impact of this risk, we have worked with Consultants and Contractors to apply a deliverability lens across the projects proposed i.e., to only propose projects that we are confident we can deliver within the current known constraints.
- 23. Large Number of Smaller Projects there is a risk that the inefficiencies of delivering large volumes of small projects reduces productivity of resources available, potentially compounding the risks highlighted with resource constraints.
- Over-Subscription for Year 3 the current proposed projects result in a forecast over-spend in Year
 Further work will be required throughout Year 2 to prioritise project delivery for Year 3.
- 25. **Opportunity to Work with Other Wellington City Major Projects** there is an opportunity for Wellington Water to work with WCC to co-ordinate proposed works with other major projects to maximise delivery efficiency. For example, aligning the proposed Victoria Street East works with the wider Convention Centre Works, our teams are already trying to work towards realising these opportunities, but there will continue to be room for improvement.

Next steps

- 26. Agree the final, optimised programme of works within existing agreed budgets.
- 27. Once the Year 2 and 3 Capital Development Plan is agreed with WCC, we will communicate the plan with Wellington Water Groups, the Consultant Panel and Contractor Panel, and commence delivery.
- 28. Delivery against the agreed budget will be monitored throughout Year 2 and progress updates communicated to the council established monthly finance and programme meetings.
- 29. We will adjust the proposed Year 3 plan through Year 2 (based on Year 2 delivery) and submit the final Year 3 capital delivery plan at the start of Q4 FY22/23.

Recommended action

- 30. This paper is for discussion purposes, we ask that you:
 - a **agree** the proposed methodology of oversubscription of projects against the agreed council LTP to mitigate potential risk of underspending against the council budgets
 - b **agree** the proposal to optimise delivery within the approved budgets utilising the established process of WCC and Wellington Water delegated authorities
 - c **note** the proposal to work with WCC to continue to optimise the Year 3 programme during Year 2.

Wellington Water

Appendix A – Budget Breakdown by Council Project

			FY22/23		FY22/23			
Activity Description	Project	Project Description	LTP Year 2	WWL Year 2	Year 2	LTP Year 3	WWL Year 3	Year 3
Stormwater - Network upgrades	2008062028	WCC SW Network Upgrades	3,586,827	1,800,000	50%	4,338,823	3,534,000	81%
Stormwater - Network renewals	2008082029	WCC SW Network Renewals	4,034,882	9,457,000	234%	4,250,141	4,545,000	107%
Stormwater - Network upgrades	2010582028	WCC SW Network Growth	168,480	-	0%	173,534	-	0%
Water - Network renewals	2008002013	WCC PW Network Renewals	8,398,168	13,917,500	166%	10,197,821	10,155,000	100%
Water - Network upgrades	2008032016	PW Network Upgrades	1,244,843	2,655,000	213%	5,953,652	1,355,000	23%
Water - Reservoir renewals	2008092019	WCC PW Reservoir Renewals	881,341	782,000	89%	4,342,645	1,073,000	25%
Water - Reservoir upgrades	2008102020	WCC PW Reservoir Upgrades	1,738,630	2,175,000	125%	1,210,872	3,612,000	298%
Water - Network upgrades	2010592016	WCC PW Network Growth	617,760	825,000	134%	702,707	472,000	67%
Water - Reservoir upgrades	2010602020	WCC PW Reservoir Growth	14,527,262	10,200,000	70%	-	900,000	0%
Wastewater - Network upgrades	2008052024	WCC WW Network Upgrades	2,070,016	5,920,000	286%	797,911	8,570,000	1074%
Wastewater - Network renewals	2008072023	WCC WW Network Renewals	13,965,894	17,332,000	127%	13,881,772	27,816,000	200%
Wastewater - Network upgrades	2010612024	WCC WW Network Growth	4,673,086	10,980,000	235%	3,181,036	12,147,000	382%
New	New	New	-	3,038,500	-	-	723,000	-
Additional Funding for Major Projects		8,000,000	-	-	\$		-	
		63,907,189	79,082,000	124%	59,030,913	74,902,000	127%	



Appendix B – Proposed Projects List

Project Name	LGA Classification	Year 2 Budget (\$)
Omaroro Reservoir (Prince of Wales - POW)	Growth	10,200,000
Taranaki Pipes	Growth	4,540,000
Taranaki St new PS	Growth	4,290,000
WCC Water Reactive Network Renewals	Renewal	3,500,000
Wakefield St East - New Rising Main	Level Of Service	3,340,000
Allington Road Culvert Replacement	Renewal	2,750,000
Agra Crescent (5-10A) Stormwater Renewal	Renewal	2,750,000
Agra Cres WM Renewal (PK)	Renewal	2,250,000
WCC Wastewater REACTIVE Renewals	Renewal	2,000,000
WCC Moa Pt WWTP PLANNED Renewals	Renewal	2,000,000
Stebbings Wastewater Upgrade Stage 1	Growth	2,000,000
Hinau St Wastewater Upgrade and McLennan St Cross Connection	Level of Service	2,000,000
(SWS) WCC PW Pressure Management	Level Of Service	2,000,000
Pembroke Road (Huntingdon St - Mairangi Rd) Watermain Renewals (PK)	Renewal	1,750,000
Karori Wastewater Network Improvement Plan	Level of Service	1,600,000
[Package] FT WCC Watermain Renewals 21-27	Renewal	1,500,000
Main Road (68-Redwood Ave) Water Network Renewals (PK)	Renewal	1,400,000
Main Road (68-74) Tawa Stormwater Improvement	Level of Service	1,200,000
Middleton Road (Halswater Dr-Westchester Dr) Watermain Renewal (PK)	Renewal	1,100,000
Featherston St (Whitmore St to Waring Taylor St) Rising Main Renewal	Renewal	1,100,000
Victoria St Rising Main renewal	Renewal	1,050,000
WCC Western WWTP PLANNED Renewals	Renewal	1,000,000
WCC Stormwater REACTIVE Renewals	Renewal	1,000,000
Huntingdon Street Watermain Renewal (from Pump Station to Mt Wakefield Reservoir) (Lining)	Renewal	1,000,000
Cable St (6-21) Wastewater Pipe Renewal	Renewal	900,000
Wrights Hill Reservoir Seismic Improvements	Level of Service	860,000
[Package] Pitt, Stratford, and Wilton Wastewater Renewal	Renewal	850,000
Ngaio Reservoir Seismic Improvements	Level of Service	800,000
WCC WW manhole cover safety improvements	Level of Service	700,000
Hania Street (3-18) - 60 Kent Terrace Wastewater Renewal	Renewal	700,000
WCC Water Network modelling	Growth	675,000
Waikare St (4-7) Stormwater Renewal	Renewal	650,000
Torrens Terrace (2-48), Arlington Street (6-14, 24-31) and Hopper Street (20-70) Wastewater Renewal	Renewal	638,000
Pump Stations 1 - 7 Upgrades	Renewal	630,000
Shirley Street (37-39) to Hurman St (2) Stormwater Upgrade	Renewal	600,000
Wakefield St West of Taranki St Renewal	Renewal	550,000
[Package] WCC Wastewater Renewals - Newtown - 21-24	Renewal	500,000
WCC-CPX-Tawa Beauchamp Collins SW Upg	Level Of Service	500,000
WCC-WW-VHCA Pipe Renewal Programme	Renewal	500,000
Grenada North Reservoir Seismic Strengthening	Level of Service	500,000
Murphy Street	Renewal	500,000
WCC Reservoir VHCA Remedial Works	Renewal	500,000
WCC Moa Pt WWTP REACTIVE Renewals	Renewal	500,000
WCC Wastewater Pump Stations PLANNED Renewals	Renewal	500,000

Project Name	LGA Classification	Year 2 Budget (\$)
Ross St (43-45) Stormwater Renewal (with Yule WW)	Renewal	500,000
Hawkestone Street (6-27) and Molesworth Street (79-83) Wastewater Renewal (with SW)	Renewal	500,000
Karori Road (357a) Stormwater Renewal (with WW)	Renewal	500,000
Cambridge Terrace (58) Buckle Street to Sussex Street (2) PS3 Rising Main Renewal (NZTA Project)	Renewal	470,000
Maida Vale Road Wastewater Pipe Renewals	Renewal	450,000
Waikare St (4-7) Wastewater Renewal	Renewal	400,000
WCC-PW-VHCA Pipe Renewal Programme	Renewal	350,000
Karori Road (357a) Wastewater Renewal (with SW)	Renewal	350,000
Bluebelt Wastewater Modelling	Level of Service	350,000
Landfill Road Manhole Rehabilitation (Careys Gully Centrate Line rehab) - Stages 1 to 3		300,000
WCC Climate Change Stormwater Modelling	Level of Service	265,000
WCC Management of Fire Hydrant Use	Level of Service	250,000
Hawkestone Street (6-27) and Molesworth Street (79-83) Stormwater Renewal (with WW)	Renewal	250,000
WCC-SW-VHCA Pipe Renewal Programme	Renewal	200,000
WCC Warwick Street Pump Station Pump replacement	Renewal	200,000
Oxford Street (Main St- Surrey St) Watermain Renewal (PK)	Renewal	150,000
Aro Valley Wastewater Renewals (Adams Aro Holloway Maarama Fairlie Landcross Streets)	e Renewal	150,000
WCC District meter area PLANNED renewals	Renewal	150,000
Drinking Water Development Projects - Reactive	Growth	150,000
WCC Wastewater Development Projects - Reactive	Growth	150,000
Kent Tce Rising main renewal	Renewal	140,000
Wastewater network overflow consent	Level of Service	135,000
WCC-CPX-WW Overflow Consent Moa Pt	Level Of Service	135,000
WCC-CPX-WW Overflow Consent Western	Level Of Service	135,000
WCC-CPX-Global SW Consenting	Level of Service	125,000
WCC Water Reactive Pump Station Renewals	Renewal	120,000
Eastern trunk main and PS23 rising main upgrade	Renewal	100,000
Danube St (9-14) to Rhine St (48) Sewer	Renewal	100,000
Kingsbridge Place WW Renewal	Renewal	100,000
Willeston and Harris WW Renewal	Renewal	100,000
WCC Commercial Meter Renewal	Level of Service	100,000
Wellington Hospital water supply (Howard St/Tasman St intersection to Riddiford Rd/Regina Tce intersection)		100,000
Central Tawa Catchment Stormwater Improvements	Level of Service	100,000
Parade, Island Bay WW Renewals	Renewal	100,000
WCC Reservoir Reactive works - Health and Safety Improvement	Renewal	100,000
Rolleston St WW Renewal	Renewal	80,000
WCC Commercial Meter REACTIVE Renewals	Renewal	80,000
WCC Urgent Renewals - Reservoirs	Renewal	78,000
District Meter Area (DMA) meter fleet	Level of Service	75,000
Montgomery Avenue Pump Station Renewals - Pumps and Electrical Panel	Renewal	75,000
WCC PW Control Systems Renewals	Renewal	60,000
WCC Stormwater Development Work - Reactive	Renewal	60,000
Beacon Hill Pump Station Renewals	Renewal	60,000
(WSP_02.1) Reservoir leakage remediation - WCC	Renewal	54,000
Tawa Street (Main Rd - Duncan St) Watermain Renewal (PK)	Renewal	50,000

Project Name	LGA Classification	Year 2 Budget (\$)
Kemp St WW Renewal	Renewal	50,000
Pahia St WW Renewal	Renewal	50,000
Seatoun WW Renewals	Renewal	50,000
(WSP_03.2) Water take sites - WCC	Level of Service	50,000
WCC Western WWTP REACTIVE Renewals	Renewal	50,000
LGWM - Renewals - PW	Renewal	50,000
LGWM - Renewals - SW	Renewal	50,000
LGWM - Renewals - WW	Renewal	50,000
WCC Reactive Works - Water Meters	Renewal	50,000
WCC-CPX-Reservoir Leakage Renewals	Renewal	50,000
WCC PW Control Systems Upgrades	Level of Service	45,000
WCC WW Control Systems Renewals	Renewal	44,000
WCC WW Control Systems Upgrades	Level of Service	40,000
Amritsar Street (84-107) Firefighting - (DFR)	Level of Service	25,000
WCC-CPX-SW-Global Ops Works Consent	Level of Service	20,000
WCC SW Control Systems Upgrades	Level of Service	17,500
WCC Security Locks Reservoirs	Level of Service	15,000
WCC - Battery replacements Base stations (all councils)	Renewal	12,500
Solar power plant installation on Moa point roof. Wastewater - Upgrade	Level of Service	10,000
WCC-PW - Reactive Renewals Controls	Renewal	10,000
WCC - New Smart Services	Level of Service	10,000
GWRC and 4 Cities SCADA network rationalisation	Level of Service	6,000
WCC-WW - Reactive Renewals Controls	Renewal	5,000
WCC-SW - Reactive Renewals Controls	Renewal	2,000
Wastewater network overflow reduction strategy	Level of Service	-
Wastewater network overflow reduction strategy Moa Point	Level of Service	-
Wastewater network overflow reduction strategy Western Karori	Level of Service	-
Tawa The Drive Stormwater upgrade	Level of Service	-
Reservoir roof waterproofing - Broadmeadows	Level of Service	-
Reservoir roof waterproofing - Brooklyn No. 2	Level of Service	-
Buller Street (27) - Vivian Sreet (175) Wastewater Renewal	Renewal	-
Severn Street Wastewater Renewal - Portion 2 (CIPP)	Renewal	-
Yule Stoke Tainui and Broomhedge Wastewater Renewals	Renewal	-

Annex A – 20220608 WCC Project List (MS Excel file)