



Report No:	RESC12-04-06					
File No:						
Date:	10 April 2012					
Information Only – no decision						
required						

# REPORT SUMMARY

**Report to:** Engineering Services Committee

Meeting Date: 26 April 2012

**Report Author** Jeff Cuthbertson, Utilities Asset Manager

Subject: Utilities Report

# **EXECUTIVE SUMMARY**

This report provides a summary of the Utilities activities for March 2012.

Despite the weather events and ongoing related issues in January and February, Downer maintained their level of performance with all proactive, routine and non-routine maintenance on the water and wastewater treatment plants, pumpstations, reservoir sites and stormwater assets as scheduled.

In solid waste operations, contractors are performing well, with volumes to landfill consistent with forecasts and comparable to actual quantities delivered at the same time last year, but with expenditure tracking over budget.

Capital projects are generally on track but priority, timing and expenditure requirements for some projects are being reassessed due to the flooding events of December.

### **RECOMMENDATION**

That the report be received.

#### **DRAFT RESOLUTION**

THAT the Engineering Services Committee receives the Utilities Report, RESC12-04-06.



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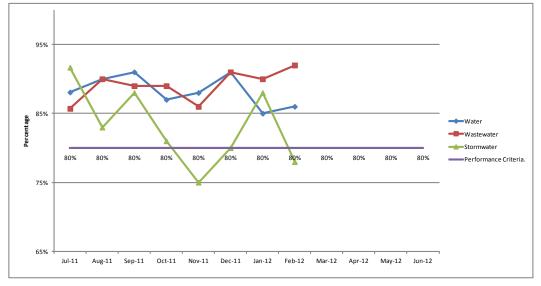
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### 1. Utilities General

- 1.1 Downer undertook all proactive, routine and non-routine network maintenance on the water and wastewater treatment plants, pumpstations, reservoir sites and stormwater assets as scheduled and required within their programme.
- 1.2 MWH carried out audits across all areas of the utilities network on both ongoing and completed work. Downer has continued to provide a consistent level of response and ownership of network issues after the cleanup that resulted in the months following the rainfall events in December 2011. Due to some outstanding flood-related project work, some routine work on stormwater assets has not been achievable.
- 1.3 Contractor Performance and Performance Standard Measurements Monitoring As required under Contract 688, MWH undertook a random selection of audits on various portions of the Water, Wastewater and Stormwater networks. The Contractor performed well in the Water and Wastewater areas, but dropped below the required standard on maintenance of the Stormwater system. This has resulted in a deduction in the performance based payment and is identified in the detail below:

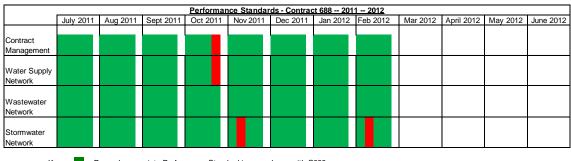
		Contract 666 Ferrormance Measurement Addit scores July 2011 to June 2012										
	Jul-11	Aug-11	Sep-11	Oct-11	Nov-11	Dec-11	Jan-12	Feb-12	Mar-12	Apr-12	May-12	Jun-12
Water	88%	90%	91%	87%	88%	91%	85%	86%				
Wastewater	86%	90%	89%	89%	86%	91%	90%	92%				
Stormwater	92%	83%	88%	81%	75%	80%	88%	78%				
Performance Criteria.	80%	80%	80%	80%	80%	80%	80%	80%	80%	80%	80%	80%

Contract performance standard measurement target requirement is to achieve a minimum score of 80% in any one discipline





# 1.4 Contract 688 Overall Performance Standard Summary



ey: Passed appropriate Performance Standard in accordance with C688

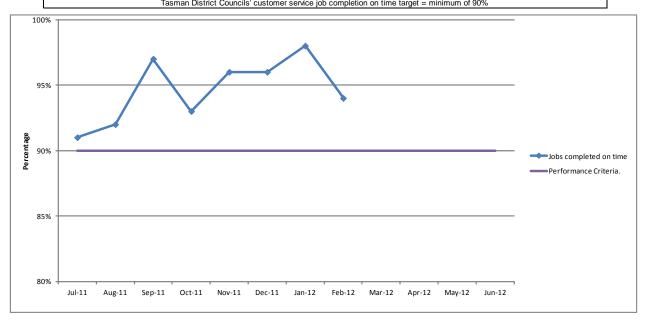
Not achieved appropriate Performance Standard in accordance with C688

Reason	Amount Deducted
Numerous weekly exception and sewer overflow reports not recieved on time	\$1,201.65
Upper Takaka UV plant out of operation for 2 to 3 days, could have been avoided with more pro-active maintenance.	\$1,969.99
Stormwater maintenance score of 75% on assets audit in November 2011, excess vegetation / weed growth in the SW channels.	\$843.92
Stormwater maintenance score of 78% on assets audit in February 2012, excess vegetation / weed growth in the SW channels.	\$1,092.75
Total Dadustions to date 2014 2012	\$5.108.31
	Numerous weekly exception and sewer overflow reports not recieved on time Upper Takaka UV plant out of operation for 2 to 3 days, could have been avoided with more pro-active maintenance. Stormwater maintenance score of 75% on assets audit in November 2011, excess vegetation / veed growth in the SW channels. Stormwater maintenance score of 78% on assets audit in February 2012, excess

# 1.5 Customer Services - Job Completion Summary

Targets for Tasman District Council Customer Services and requirements under Contract 688 are for the Operations and Maintenance Contractor to achieve 90% or above for completion on time. Downer achieved 94% for Feb 2011

	Contract 6	88 Perform	ance Mea	surement	scores acl	nieved July	/ 2011 to J	une 2012 -	Jobs comp	oleted on t	ime	
	Jul-11	Aug-11	Sep-11	Oct-11	Nov-11	Dec-11	Jan-12	Feb-12	Mar-12	Apr-12	May-12	Jun-12
Jobs completed on time	91%	92%	97%	93%	96%	96%	98%	94%				
Performance Criteria.	90%	90%	90%	90%	90%	90%	90%	90%	90%	90%	90%	90%
Penormance Chiena.		90%]								90%	90%	

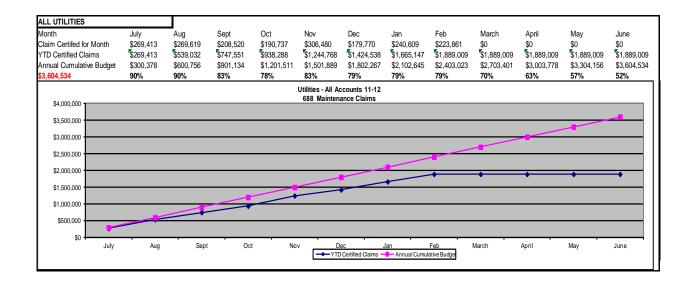




1.6 The above data confirms that the contractor has been able to maintain the required response times in the months following the Dec 2011 rainfall events.

#### 1.7 Financial Performance

The Utilities budgets to date for the 2011/2012 financial year are shown below. To date the information is only available up to the end of February 2012 as the March 2012 claim is currently being assessed and processed. It is likely once the work involved during the rainfall event is claimed the total will be in line with the budget.



#### 2. Wastewater Networks

## 2.1 Operations and Maintenance

Overall the wastewater networks have performed well during the last reporting period, from late February and throughout March.

- 2.2 There was a breach in the discharge consent at the Takaka Wastewater Treatment Plant relating to a rainfall event on 22 February 2012. Otherwise the reticulation and wastewater treatment plants have performed well over the February period assisted by a relatively dry month.
- 2.3 The contractor was proactive in the cleaning of pumpstations and water-blasting some pipelines and there appears to be fewer ongoing sewer blockage issues since the flooding events.

#### 2.4 Wastewater Exceptions

As the table below indicates a variety of faults occurred over this period, some requiring further follow up work to prevent recurrence.



Location	Date	What	Overflow	Why	Remedial Action
Commercial Street, Takaka	24/02/12	Pipe blockage	No overflow	Blockage caused by fat build up	Attended to by contractor
Sewer main, Abel Tasman Drive	24/02/12	Overflow	Yes – 0.5m³ of discharge	Blown rising main	Attended to by contractor
Dump site, Collingwood	27/02/12	Overflow	Yes – unknown discharge	Due to peak period	Attended to by contractor
688 Main Road, Riwaka	27/02/12	Blockage and Overflow	Yes – Unknown discharge	Heavy rain causing blockage	Attended to by contractor
Ledger Goodman Park, Motueka	28/02/12	Bad odour	No overflow	Due to bio filter not working properly	Bio filter was checked by contractor
124A Queen Street, Richmond	29/02/12	Overflow	Yes – unknown discharge	Sewerage was backed up	Attended to by contractor
Tarakohe Sewer Pump Station, Pohara	29/02/12	Switchboard box damaged	No overflow	Ran over by front end loader	Attended to by contractor

- **2.5** Wastewater Treatment Plant (WWTP) Compliance During February environmental and performance monitoring was routinely undertaken at all Council WWTPs.
- 2.6 The table below indicates whether full compliance with resource consent conditions was achieved at each WWTP. Where full compliance was not achieved, the likely factors contributing to the non-compliance event are listed.

WWTP	Compliance	If "no", What	Why	Remedial Action
Collingwood	Yes			
Motueka	Yes			
St Arnaud	Yes			
Tapawera	Yes			
Takaka	No	22 February 2012: Flow limit to WWTP breached. 1730 m <sup>3</sup> of wastewater discharged to Takaka WWTP compared to limit of 1680m <sup>3</sup> /day	Heavy rainfall, high flows	TDC Compliance notified
Upper Takaka	Yes			

# 2.7 Capital Projects

Sewer renewal contracts for Motueka have progressed well. Courtney Street and Grey Street works have been completed. Work is almost complete on the final length along High Street.



### 2.8 Mapua Wharf Wastewater Pumpstation Upgrade

Ching Contracting has continued work on site since 1 March 2012. Some potential delays have been incurred due to archaeological finds and the associated processes required by the Historic Places Trust. The project is expected to be largely completed by 30 June 2012 but some items of work may extend beyond that date.

#### 3. Water Networks

### 3.1 Operations and Maintenance

The majority of the urban water supply networks have performed well.

- 3.2 Downer has installed seismic valves and associated pipework and chambers at the Valhalla Lane reservoir site as part of improvement works under the 2011/2012 renewals programme and are completing the installation of the control cabinet.
- 3.3 Tenders for improvements to the Pohara Valley water supply closed on 4 April 2012 and the tender is expected to be awarded by end of this month, following approval by the Environment and Planning Department of the outline plan.
- 3.4 Proactive water meter replacements have commenced along selected streets.

  Programmed work is complete in Motueka and in Richmond and now underway in Tapawera.
- 3.5 Summer water supply monitoring has commenced and water use is relatively stable. With the ongoing periods of rain the level of demand has not reached its typical summer peaks although minor/lesser peaks were evident during the Easter break.
- 3.6 Pohara Valley Leak detection survey revealed two large leaks which were repaired, reducing daily volume from around 200m³ to 30m³ per day.
- 3.7 Water supply exceptions are noted in the table below:

Date	Location	What	Why	Remedial action
8 Mar	Gladstone Road, Richmond	Water Lateral damage	Roading contractor	Repair completed
21 Mar	Main Road Hope	Leak on lateral connection	Faulty ferrule	Repair completed
22 Mar	Gibbs Valley	Leak on feeder line	Broken feeder	Repair Completed

- 3.8 Water service connections were as follows:
  - One in Brightwater
  - One in Motueka
  - Eight in Richmond
  - One in Mapua



### 3.9 Capital Projects

- 3.10 Detailed design continues on the pipe reconfiguration and treatment process as well as on the proposed site for the Richmond Water Treatment Plant. An additional report updating the Committee on this project is also presented at this meeting.
- 3.11 Arbitration to resolve the supply agreement dispute between Council and the three major industrial water users (Nelson Pine Industries, Alliance Group and ENZA Foods) has been set down for the week of 2 July 2012.

#### 4. Stormwater Networks

# 4.1 Operations and Maintenance

February was a reasonably dry month aside from a significant rainfall event occurring on 22 February 2012. Pre-storm checks were undertaken as a precaution but in general the Tasman District Council owned stormwater systems coped well. The Motueka Wharf Road tide gates were also closed during this event.

4.2 Due to ideal vegetation growing conditions, some ongoing flood damage yet to be remediated, and temporary resourcing issues there are some stormwater drains throughout the region where maintenance is overdue. The contractor is working to get these drains back to a well maintained condition.

# 4.3 Capital Projects

The Ruby Bay Stormwater contract (Tait Street and Stafford Drive – Ching Contracting) is now completed. There are further separable portions to the contract that are being considered but may not proceed this financial year depending on the outcomes of reprioritisation decisions following the December 2011 rainfall event.

## 5. Telemetry

- 5.1 The analogue telemetry network has performed during this reporting period.
- 5.2 The base station server software is nearing its limit for digital sites so an additional licence is required to allow a greater number of sites to be catered for.
- 5.3 Work has commenced to upgrade 88 Valley sites to digital telemetry as well as a link to the Wai-iti Dam.

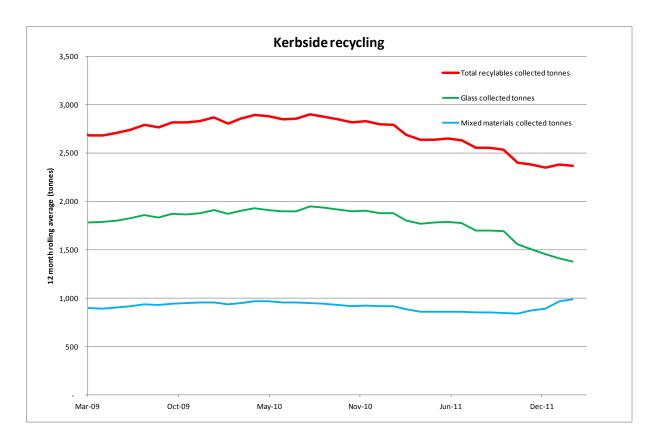
#### 6. Solid Waste

### 6.1 Kerbside Recycling and Bag Collection

Kerbside collections continued through the period with the contractor performing well.



6.2 Kerbside recycling volumes have now steadied from earlier falls. Analysis indicates recent reductions have been primarily due to falling glass volumes, and this is consistent with trends in other Councils.



# **6.3 Resource Recovery Centres**

Waste tonnages at Resource Recovery Centres are on target overall with volumes rising at Richmond and Mariri and falling at Takaka, Collingwood and Murchison. While income for the year to date is at 98% of budget, expenditure at some sites is tracking above budget due to unexpected maintenance and operational requirements.

- 6.4 Construction of a recycling loop at Mariri is now complete, with only signage and minor landscaping outstanding. Included in the works has been the relocation of bunkers for the storage of colour separated glass, which will enable export of this material to Auckland for recycling. The new layout has improved operations and site tidiness and customer feedback has been almost universally positive.
- 6.5 Installation of new site signage is now scheduled for all remaining sites (Takaka, Murchison and Collingwood), as well as other minor civil and mechanical works. A video surveillance camera has now been installed at the Murchison site primarily in order to monitor after hours activities at the site.

#### 6.6 Closed landfills

Capital works at the closed Rototai landfill (Golden Bay) remain deferred as the long term future of the site is considered in light of flood events.



6.7 Minor maintenance at the Waiwhero site is largely complete and work at other sites will be progressed as funds allow.

## 6.8 Eves Valley Landfill

Installation of telemetry equipment at the Eves Valley landfill is now complete allowing for remote monitoring of rainfall, leachate flows and stormwater levels at this site. It is anticipated that this equipment will assist in the better management of leachate flows from the landfill which have recently been greater than expected and caused additional operating expense.

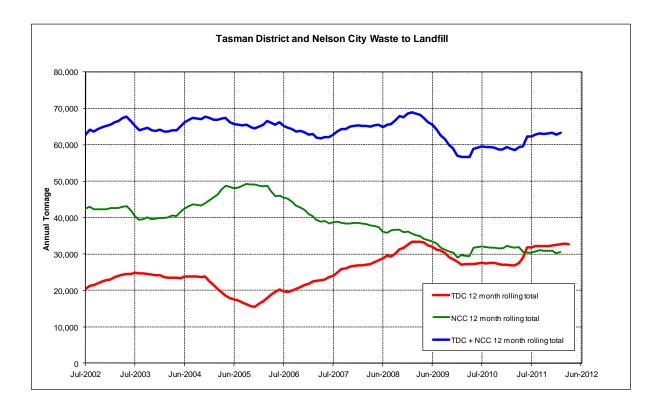
- 6.9 Data for the first half of the year indicate landfill tonnages at Eves Valley are on target for the year and tracking slightly over those from the same time last year. Expenditure at this site is above budgeted levels due to additional operating and monitoring requirements.
- 6.10 Disposal of treated material from the Mapua pump station site commenced during March and has progressed without incident. Disposal of this material has been approved by the Council's Compliance Coordinator as a "case-by-case" exception to the landfill acceptance criteria.

# **6.11 Regional Waste Minimisation**

The proposed Nelson-Tasman Joint Waste Management and Minimisation Plan (JWMMP) was released for public consultation on 9 December 2011 and the period for submissions closed on 31 January 2012. A total of 17 submissions were received, and a hearing of submissions was held on 19 March.

6.12 The proposed Joint Waste Management and Minimisation Plan is presented for adoption by the Committee as a separate paper on this agenda. It is due to be considered by the Nelson City Council on the same date (26 April 2012).





# 7. Motueka Water Consent - Environment Court Hearing

7.1 Council's case to extract 16,000 m<sup>3</sup> of water per day from the Motueka Plains to supply Motueka and the Coastal Tasman Area was heard in the Environment Court over three days in late February. We are awaiting a decision on this matter.

# 8. Recommendation

8.1 That the report be received.

#### 9. Draft Resolution

9.1 THAT the Engineering Services Committee receives the Utilities Report RESC12-04-06.