## STAFF REPORT

**TO:** Chairman and Members, Engineering Services Committee

**FROM:** Jeff Cuthbertson, Utilities Manager

**DATE:** 6 April 2010

SUBJECT: UTILITIES MANAGEMENT REPORT – RESC10-04-04

Report prepared for meeting of 15 April 2010

#### 1 UTILITIES GENERAL

Council's utilities maintenance contractor, Downer EDi Works has continued to maintain Council's assets to an acceptable standard and issues have been attended to in a timely manner. The most recent audits conducted on the contractors performance resulted in audit scores ranging from 90-96% and were well above the 80% minimum requirement.

A monthly contract 688 meeting was held on 19 March. The contractor has achieved a 98% job completion rate which meets the target criteria. This is pleasing given the relatively high volume of jobs last month (350), primarily due to the high number of incidents occurring in relation to rural water supplies.

Additional maintenance works in the last month have included the installation of extra odour control measures at critical wastewater pump stations in Golden Bay, leak detection and fixing of pipeline breaks in Tapawera as well as Dovedale and Redwoods rural water schemes.

Extra wastewater chemical dosing units have been installed at Delaneys and Burnside pump stations. The system continues to be monitored for the levels of hydrogen sulphide to optimise chemical agent dosing rates.

Contract negotiations relating to the second operations period of contract 688 have been completed. A report confirming the recommendation to rollover the contract into the second separate period, commencing July 2010 is included in the agenda.

The telemetry network continues to show a reduction in communications issues as problematic sites are improved. Ongoing issues at sites containing both analogue and digital units are being investigated for the most practical option for resolution.

### 2 WATER

#### 2.1 General

Generally, the water schemes continued to operate at the upper limits of their capacity during the high demand period. Some systems have continued to be affected by minor telemetry communication faults. Significant issues continue to be experienced on rural schemes, with the Dovedale scheme the most commonly affected by ongoing pipe bursts and leaks and subsequent system air-locks. Lack of significant periods of rain have resulted in water rationing.

No significant issues were experienced in the Redwoods rural supply scheme with only a few relatively minor repairs required.

On the Dovedale scheme, more effective coarse screening has been installed at the lower Humphries Creek intake, to reduce the effect of debris at the intake point.

# 2.2 Water Capital Projects

#### Wakefield Reservoir

Tasman Civil has completed all concrete work required for the reservoir and remaining site contouring and finishing works are on track. Some minor defects continue to be monitored. The contractor is expected to be granted practical completion on remedy of outstanding defects by the completion date of late-April.

## Water Renewal Projects 2009/10

Work has commenced on portions of the Water Renewal Programme. Water meter replacements and rider-main renewals in Murchison are almost complete. Work in Bryant Road, Brightwater is also complete.

#### 3 STORMWATER

#### 3.1 General

No significant rainfall events have occurred in the last period. Routine and proactive maintenance of all coastal outlets was carried out in accordance with the contract schedule as a precaution prior to significantly high spring tidal events. Many of the heavy rain warnings have not resulted in the predicted rainfall occurring.

## 3.2 Stormwater Capital Projects

## Salisbury Road Stormwater Upgrade

Tasman Civil Ltd is near completion of the main portion of scheduled works in Salisbury Road and has been awarded a variation to the contract for an extension of approximately 65m of 900mm diameter pipe. This will bring the works to the southern boundary of Waimea College and is scheduled to be complete prior to the start of the school term.

## Ruby Bay

Flood modelling is complete and cost estimates have been prepared for three options for stormwater improvements in the Broadsea Avenue–Crusader Drive area. The works may include a new discharge to the coast, for which resource consent will be sought.

## Mapua (Seaton Valley Stream)

Contract 762 was awarded to Tasman Civil in November last year for the installation of an additional stormwater culvert through the Toru Street causeway at Mapua. This work is programmed to commence in late April, at the conclusion of the busy summer period.

Contract 777 (for the construction of a single box culvert on the Seaton Valley Stream) was advertised in November last year and tenders closed on 2 December 2009. A preferred tenderer has been identified for the work and approved by the Tenders

Committee. All landowner approvals have now been received and the contract will be awarded.

Detailed design for a second box culvert (adjacent to the Mapua School) is complete and contract documentation prepared. Landowner approvals are currently being sought for this work.

#### Motueka

Contract 780 (Old Wharf Road stormwater improvements) was awarded to Ching Contracting Ltd. The work includes 170m of 825mm and 750mm diameter concrete pipe, nine sumps and manholes and a new outlet structure to the existing open channel.

The work is due to start in the week of 26 April and conclude on 4 June.

# Brightwater

Taylors Contracting Ltd are near completion of stream widening work at Jeffries Creek, Brightwater (Contract 779). Bulk earthworks and channel widening are complete with concrete, rock and pipework currently in progress.

# • Richmond

The Bird/Elizabeth Street stormwater upgrade (Contract 727) has an unresolved issue that the contractor has now indicated he wishes to take to mediation. Mediation for this matter has been scheduled for mid-May 2010.

#### 4 WASTEWATER

#### 4.1 General

All treatment plants were routinely checked during the month and extra odour control has been installed at critical sites. There were a number of issues during the last period which were attended to and rectified promptly. Wastewater treatment plants were operated in compliance with resource consent requirements apart from Tapawera which recorded a temporary low level of dissolved oxygen.

Exception incidents included:

- Bursts occurred on the 100mm main at 654 Abel Tasman Drive and subsequent overflows were cleaned up and the site disinfected.
- Maintenance on an aerator and the UV system was carried out at Collingwood wastewater treatment plant.
- Blockages occurred at the Motueka Dump-station site.
- Rising Main burst on Abel Tasman Drive near Four Winds pump station was isolated and repaired

## 4.2 Capital works

# Delaneys Pumpstation and Rising Mains, and Collingwood Motels Pumpstation

Ching Contracting Ltd have nearly completed this contract. The Collingwood Motels upgrade work is complete. The gravity and pressure sewer mains in Abel Tasman Drive have also been completed. Completion of work at the new Delaneys pump station site is all that remains and the contract is on schedule for an end of April completion.

#### Motueka Sewermain Renewals

The sewer upgrade which will be constructed in conjunction with the proposed New Zealand Transport Agency reconstruction of High Street from Whakarewa to Tudor Streets has commenced within the last month.

# Rabbit Island Rising Main

Ching Contracting Ltd continues to make steady progress installing the PE rising main along Rabbit Island. The night-time installation of pipe work crossing Ken Beck Drive is planned for the week of 12-16 April. Junction chambers have been installed in sequence with the pipeline and no issues have occurred so far to hinder progress. The expected project completion date is late August 2010.

# Headingly Lane Pump Station

Registrations of Interest for tender shortlisting have been called for this contract and detailed design is due to be completed this month.

• Motueka Wastewater Treatment Plant Rapid Infiltration Basin (RIB) trial
The initial results of the RIB trial have been encouraging with the RIB performing well and
showing little detectable impact on the groundwater environment. The testing has
confirmed a complex interaction of the tide with the groundwater system beneath the site

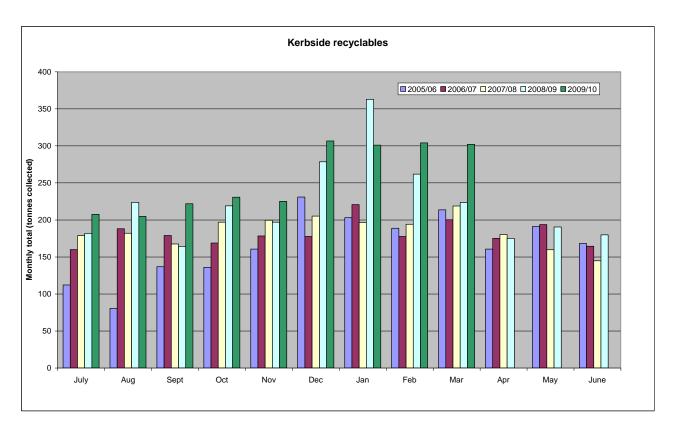
## 5 SOLID WASTE

## 5.1 Kerbside recycling and bag collection

and the testing programme is to continue for 12 months.

Kerbside recycling volumes have remained unusually high into February and March of this year (refer figure below) and the performance of the contractor has slipped as a result of this.

Staff have been working closely with the contractor to achieve contracted performance and are confident that the contractor is motivated to make improvements. Additional vehicles have been allocated for collections and the contractor has introduced weekend and night shifts for the processing of materials.



# 5.2 Resource Recovery Centres

Site activity remained busy over the reporting period. Sales volumes and refuse quantities in the last quarter (Jan-March) have recovered and are now up 4% overall on the previous year.

As estimates for the current year projected an increase of approximately 3% on last year, an income shortage remains for the current financial year. As a result of this shortfall (and a larger shortfall from special waste) some general-rate-funded capital works have been suspended. These include additional public place recycling and refuse drop off facilities. Some additional general-rate-funded capital works have commenced (Rototai landfill and Murchison monitoring bores) and staff will shortly seek approval for a change of funding arrangements for these works (by transferring loans approved for other solid waste capital works).

Detailed design is now complete for improvements to the refuse pit and bin handling area at Richmond with tenders to be advertised shortly. Building consent has been received and resource consent is being processed for the new reuse shop in Fittal Street, Richmond.

# 5.3 Eves Valley Landfill

While waste-to-landfill from Resource Recovery Centres increased for the quarter, special wastes continue to decline. Quantities for February and March were 8-9% below the equivalent period last year. As indicated above, this has created a significant income shortfall which staff are working to minimise through delaying of non-essential work.

A tender document has been prepared for Contract 781, for refuse haulage and operation

of the Eves Valley landfill for a two year period (with two possible extensions of one year). Council is continuing discussions with the current contractor for the transfer of the assets used for the current contract to the new contract.

The existing contract has been extended for a period of two months to 31 August 2010.

## 5.4 Rototai Closed Landfill

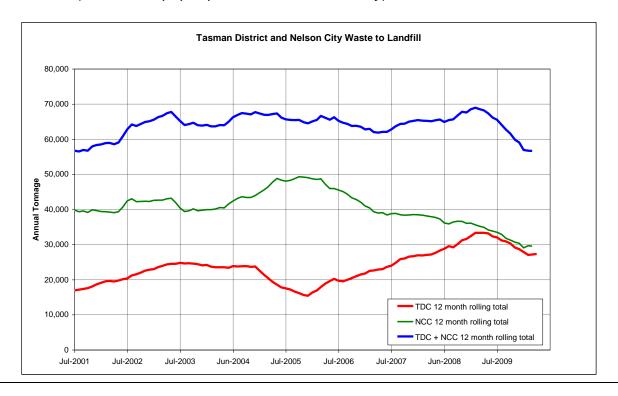
The Rototai landfill operated for approximately 40 years serving Takaka and Golden Bay until closing in 1994, when the Resource Recovery Centre (transfer station) opened at Scotts Road. The site has been inspected on a regular basis and inspections have indicated a need for additional capping material over the northern site.

An opportunity to complete the capping was identified last year with the tendering of a roading contract (782 Totaranui/Pupu Springs slip repairs). Excess slip material from the two slip sites is being used as additional cover for the landfill. The additional cost of the carting slip material to the site (where required) is being covered by scheduled capital budgets for closed landfill improvements. The total cost of the works is expected to be \$52,000.

# 5.5 Waste Minimisation Act 2008 and joint Tasman District Council/Nelson City Council Waste Management Plan

On 25 March Nelson City Council adopted a joint Tasman-Nelson Waste Assessment (prepared by staff, consultants and a joint working party) and approved work to develop a joint Waste Management and Minimisation Plan with Tasman District.

The Waste Assessment will be presented at the Engineering Services Committee meeting and is included in the agenda. The paper will be presented by Nelson City and Tasman District staff (as was the paper presented to Nelson City).



# 6 TENDERS

No.	Contract name	No. of tenders	Successful tenderer	Amount	Highest amount	TDC estimate	Budget for this item
780	Old Wharf Road – Stormwater Renewal	4	Ching Contracting	\$211,719	\$356,424	\$227,360	\$218,909

# **7 RECOMMENDATION**

THAT the report be received.

Jeff Cuthbertson Utilities Asset Manager