

East Rotoiti and Rotoma Sewerage – Community Update

➤ **OUTLINE OF PROGRESS**

- Progress has been made on the proposed East Rotoiti and Rotoma Sewerage Scheme. A local site for the treatment plant has now been obtained. Work is now being done on detailed plant design and a Resource Consent, including cultural assessments. The location of the Biolytix trial for Rotoiti is now finalised, and a recommendation has been made about how to deal with Ngamotu (Doctors Point).

Purpose of the sewerage scheme:

- To help protect the mauri of the lakes - to keep the lakes clean
- To protect the health of the people
- To avoid the issues of OSET compliant units at every house
- To make good use of available subsidies



➤ **COMMUNITY MEETINGS AND HUI**

You are invited to the community meetings and hui below, to hear about and discuss progress.

10.00 a.m. Sunday, 10 January 2016 Rotoiti Sports Club
1.00 p.m. Sunday, 10 January 2016 Rotoma Community Hall

➤ BACKGROUND

The Rotoma Rotoiti Sewerage Steering Committee (RRSSC) was formed in December 2014.

The following work was done:

- The community, Rotorua Lakes Council and Bay of Plenty Regional Council, worked together to plan the scheme.
- A workshop was held.
- A Technical Advisory Group investigated many options.
- The community was consulted.

Unanimous RRSSC agreement was reached on a **preferred option** which:

- Would meet the deadlines for the subsidies on offer.
- Would allow the Biolytix units, which some iwi favoured, to be tried.
- Was a compromise, agreed to by all parties so as to get a sewerage scheme.

The compromise recommended to Rotorua Lakes Council as the Preferred Option was:

- A sewerage treatment plant (MBR) and land treatment system in the scheme area.
- Houses at Rotoma connected to the piping system by grinder pumps.
- A trial of Biolytix units at Rotoiti:
 - If trial is successful, houses at Rotoiti to connect through Biolytix units (or similar) to the piping system and the treatment plant.
 - If the trial is unsuccessful, grinder pumps to be used at Rotoiti to connect.
- If a local site for treatment and discharge is not found, sewage to be piped back to the Rotorua Wastewater Treatment Plant, and houses connected by grinder pumps to the piping system.

COSTS AND SUBSIDIES

➤ COST OF SCHEME

Total cost - **\$31.7 million**

➤ SUBSIDIES

- Ministry of Health – MoH
- Ministry for the Environment – MfE
- BOP Regional Council BoPRC
- Rotorua Lakes Council – RLC
- Total subsidies - **\$24.4 million**

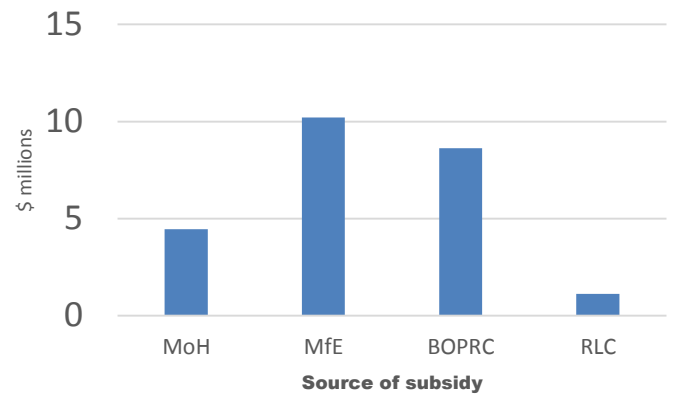
➤ COST PER PROPERTY

Payment plans available:

- Lump sum
- Spread over 25 years

Alternative is OSET

Subsidies



	Capital cost	Spread cost	Annual operating charge*	Total cost per year
Lump sum	\$12,178	-	\$389	\$389
Spread 25 years	-	\$998	\$389	\$1,387

*Charge averaged over all sewerage schemes in Rotorua District (Costs GST incl.)

RLC LTP*
\$29.324M cost included

Overwhelming community submissions in support

BOPRC LTP*
\$4M extra subsidy
(total subsidy \$8.6m)

Councils' support greatly appreciated

* LTP: Long Term Plan

PROPOSED SEWERAGE SCHEME

• Piping System

From Rotoma hills to
Curtis Road –

- and side roads (but not
Kennedy or Otautu Bays)

Wahi tapu respected



• Rotoma

Houses connect to piping with grinder
(LPG) pumps

Similar to other lakeside communities



(Source : RLC website)

• Rotoiti

Trial of Biolytix units at Ruato Bay and
Gisborne Point

If successful, Biolytix units will connect to
piping system

Otherwise grinder pumps will be used



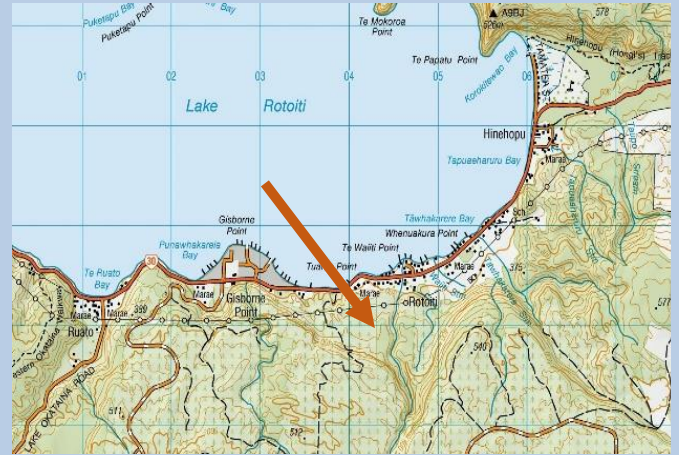
(Source : Biolytix website)

• Treatment Plant Site

We have a site for the treatment plant
- thanks to owners of Haumingi 9B3B

It is on a plateau behind Emery's store

Note: the previous site became unavailable



• Treatment Plant

A modern MBR (membrane bioreactor) plant

Human wastes are digested
- and pass through a very fine filter

Alum added to remove phosphorus (P)

Almost all nitrogen (N) removed

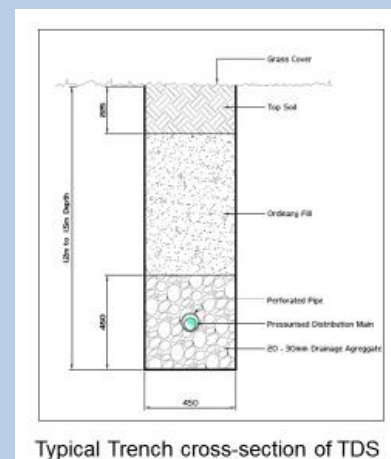


• Land Disposal

Outflow nearly pure when discharged

Trenches in pumice

Well away from the lake



NGAMOTU PROPOSAL

• Ngamotu (Doctors Point)

Land owned by Rotoma No.1 Incorporation

20 houses

Holiday use only

No road access



• Ngamotu Options

Option 1 - Connect to Rotoma

- pipe under the Lake

Option 2 - Connect to Rotoma

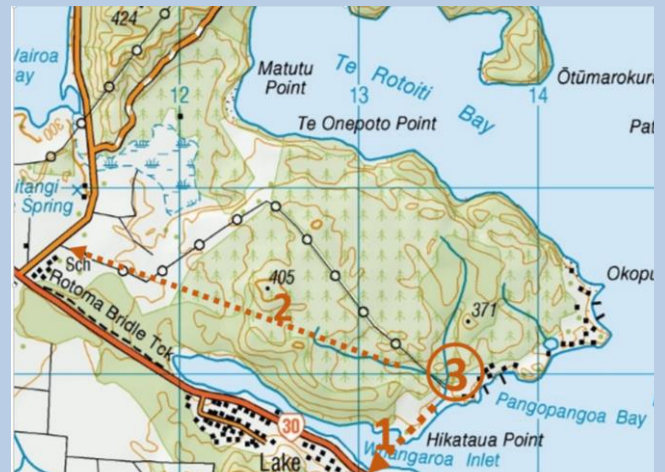
- pipe through Forest

Option 3 - Local treatment and disposal

- MBR + LTA

Option 4 - 'OSET' system for each property

Plan B - Composting Toilets and Greywater System



• Ngamotu Costs

(GST excl.)

	Option	Capital cost	Operating cost p.a.
1	Pipe under the lake	\$1.24M	\$9,500
2	Pipe through forest	\$2.91M	\$64,400
3	Local Treatment Plant & disposal	\$0.99M	\$10,900
Plan B	Composting Toilets & Greywater Systems	\$0.48M	\$3,300
4	OSET system for each property	\$0.45M	\$13,000

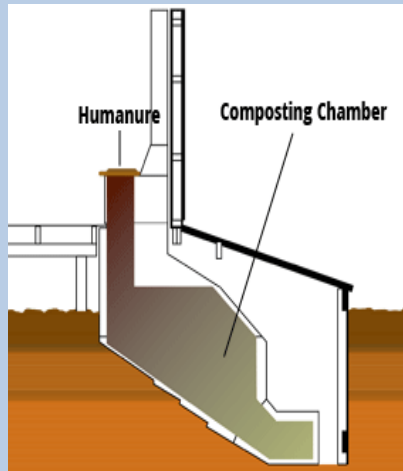
• **Ngamotu Preferred Option**

Plan B - Composting Toilets and Greywater System

Part of Scheme

RLC install and maintain

Pay same charges as rest of community



Next steps

Treatment plant site - full geotech investigation

Cultural Impact assessments

Preliminary design of plant etc.

Assessment of Environmental Effects

Apply for Resource Consent

Rotoehu

RLC has scoped options

Community have indicated support for sewerage

Next step, detailed consultation on options

Not part of East Rotoiti Rotoma scheme
- could feed into it if necessary

**Development
awaits funding
in RLC LTP**

Project Timeline

Rotoma

- November 2015** ● **Owners agreement on Haumingi 9B3B (15 November 2015)
COMPLETED**
- April 2016** ● **Detailed investigation of site done**
- October 2016** ● **Resource Consent Application and approval**
- April 2017** ● **- Detailed design and tender (WWTP + LDS)
- Detailed design and tender (Rotoma piping systems)**
- August 2018** ● **- Construction and commissioning (WWTP + LDS)
- Commissioning (Rotoma piping systems)**

Rotoiti

- November 2015** ● **Agreement on Biolytix Trial (Ruato Bay etc.)
COMPLETED**
- January 2016** ● **Detailed design of trial**
- March 2016** ● **Resource Consent for trial site**
- June 2016** ● **Trial site construction**
- June 2017** ● **Trial carried out**
- May 2018** ● **Detailed design and tender (Rotoiti piping systems)**
- July 2019** ● **Commissioning (Rotoiti piping systems)**

For more information, please contact:

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