

THE TOWN OF FORT FRANCES

August 19, 2014

Report To: Mayor & Council

From: Doug Brown, Manager of Operations & Facilities

SUBJECT: July 2014 Drinking Water Systems Monthly Summary Report



Please find attached the July 2014 Summary Report on the drinking water systems, prepared by Randy White, Senior WTP Operator.

Your Administration recommends that Operations & Facilities Executive Committee accept the July 2014 report as presented.

Respectfully submitted,
Operations & Facilities Division

Doug Brown

Doug Brown, P. Eng.
Manager of Operations & Facilities

Council approval of this report will accept the July 2014 Drinking Water Systems Monthly Summary Report and approve the report prior to it being made available to the general public.

c.c. – Doug Herr, Environmental & Facilities Supt.
Randy White, Senior WTP Operator

07Council Water ReportJuly 2014.doc

RECOMMENDED
SEP 03 2014
DIV. MISC. *Daya*
EXECUTIVE COMM. *R. White*



July, 2014

**Monthly Summary Report
Water Systems**

**Prepared by: Randy White, ORO
Senior Water Treatment Plant Operator**

Dated: August 15, 2014

1) **Introduction -**

This report contains the major maintenance activities and operational events that occurred during the month of July 2014 at the Water Treatment Plant - Water Works # 220000978 and the Airport Groundwater Well Water Works # 26002736. This information report has been prepared for Council to better understand how the water systems they own and operate are maintained on a monthly basis. Also, this report will assist Council as Directors of the Corporation in exercising its obligation to meet a reasonable Standard of Care as outlined in Section 19 of the Safe Drinking Water Act.

2) **Flow Data**

Water Treatment Plant: See attached spreadsheet. No flow data for Airport groundwater well.

3) **Microbiological (Health Related) Water Analysis– Main Water System #220000978**

Water Treatment Plant (treated): 5 samples taken no adverse results

Water Treatment Plant (raw): 5 samples taken no adverse results

Water Distribution System: 20 samples taken where 25% of samples were tested for heterotrophic plate count HPC no adverse results

We take microbiological samples on a weekly basis, which includes 1 raw sample, 1 treated sample and 4 distribution samples. The 4 distribution samples are taken at different locations throughout the distribution system.

4) **Microbiological (Health Related) Water Analysis– Airport Groundwater Well # 26002736**

No samples taken.

The Airport has signs posted in the men's and women's washroom stating that the water has not been tested or treated for drinking purposes in accordance with the Health Protection and Promotion Act – Section 7 of the Small Drinking Water Systems Regulation, O. Reg. 318/08 (*Amended to Safe Drinking Water Act, 2002 - Section 6 of Ontario Regulation 252/05*). The operators do a visual inspection of the warning notices at a minimum of once per week to ensure that they are legible and comply with Ontario Regulation 318/08, Section 7(5).

5) Free Available Chlorine Residual (FAC) – Main Water System – #220000978

FAC residuals are taken at a minimum daily at both the Water Treatment Plant and within the Water Distribution System.

6) Free Available Chlorine residual (FAC) – Airport Groundwater Well System # 26002736

Signs posted, exempt from testing.

7) Maintenance Activities at the WTP

- | | |
|-----------------------|---|
| July 3 rd | - repaired level indicator on No. 2 Clear Well.
- cleaned top and bottom tanks on the poly unit.
- cleaned all 4 check valves on the poly unit. |
| July 9 th | - repaired the Water Tower chlorine pump. |
| July 10 th | - worked on Sunny Cove Water System. |
| July 11 th | - calibrated filter turbidity meters. |
| July 17 th | - greased and adjusted clarifier chains and gears. |
| July 22 nd | - calibrated distribution chlorine analyzer. |
| July 25 th | - cleaned top and bottom tanks on the poly unit.
- cleaned all 4 check valves on the poly unit. |
| July 29 th | - worked on Clarifier No. 2 rake drive. |
| July 30 th | - calibrated Alum and Soda Ash feeders.
- flushed poly line No. 2 to the clarifier. |
| July 31 st | - flushed poly line No.1 to the clarifier.
- calibrated Alum and Soda Ash feeders. |

8) Water Complaints:

- Poor Pressure – 0 complaints.

- Water quality – 0 complaints.

9) **Other Miscellaneous Information:**

- July 2nd - routine micro sample collection.
- valve replacement samples - Third St. E. and Crowe Ave. - 1st set.
- July 3rd - valve replacement samples - Third St. E. and Crowe Ave. - 2nd set.
- July 7th - routine micro sample collection.
- July 14th - routine micro sample collection.
- July 15th - took micro sample at Sunny Cove.
- July 16th - Q.M.S. meeting at water plant.
- July 21st - routine micro sample collection.
- July 22nd - Q.M.S. review on Risk Assessment.
- July 23rd - course at Library - Working Under Pressure.
- July 24th - course at Library - Leak Detection.
- July 25th - valve repair samples - Phair Ave. (Dead End) - 1st set.
- July 28th - routine micro sample collection.
- July 29th - valve repair samples - Phair Ave. (Dead End) - 2nd set.

10) In order to acknowledge that all levels of responsibility within the Corporation of the Town of Fort Frances have received and reviewed this monthly report, it is necessary to sign-off in the appropriate location below:

- Randy White, ORO, Senior WTP Operator: Brad Webb
- Doug Herr, Environmental & Facilities Supt.: Dzh H-
- Doug Brown, Manager of Operations & Facilities: Doug Brown
- Mark McCaig, CAO: Mark McCaig
- Rick Wiedenhoef, Chair O & F Exec Committee: Rick Wiedenhoef
- Roy Avis, Mayor: [Signature]
- Paul Ryan, Councillor: Paul Ryan
- John Albanese, Councillor: _____
- Andrew Hallikas, Councillor: _____
- Doug Kitowski, Councillor: _____
- Ken Perry, Councillor: Ken Perry

Note: Once all signatures have been obtained, the report will be distributed and made available to the public. If you have any questions, please feel free to contact myself or Randy White, Senior WTP Operator at 274-2325.

Monthly Report July 2014

Flow Data	JULY	Units	2012		2013		2014	
			Day of the Month		Day of the Month		Day of the Month	
Total Raw Water		m ³		246920		180670		168590
Raw Maximum Day		m ³	Monday 16th	8910	Sunday 04th	7320	Friday 25th	6470
Raw Minimum Day		m ³	Monday 09th	6660	Tuesday 27th	3790	Sunday 06th	4480
Raw Average Daily Consumption		m ³		7970		5830		5440
Total Treated Water		m ³		176020		134850		129810
Treated Water Maximim Day Consumption		m ³	Friday 13th	7740	Sunday 04th	5780	Thursday 31st	5540
Treated Water Minimim Day Consumption		m ³	Saturday 07th	4040	Tuesday 27th	2360	Wednesday 02nd	3350
Treated Water Average Day Consumption		m ³		5680		4350		4190
Daily Average Per Household Consumption Rate		m ³		1.50		1.15		1.11
* Daily Average Per Person Consumption Rate		m ³		0.71		0.54		0.52
Monthly Averages - Operating Parameters WTP:								
FAC Residual - Treated Water		mg/L		2.07		1.83		1.83
Total Chlorine Residual - Treated Water		mg/L		2.29		2.12		2.16
Aluminum Sulphate - Raw Water		mg/L		34.1		34.0		36
Aluminum Sulphate - Treated Water Residual		mg/L		0.06		0.06		0.05
Fluoride - Treated Water		mg/L		0.64		0.61		0.59
Soda Ash - Raw Water		mg/L		34		34		36
PH - Adjusted		mg/L		7.17		7.12		7.15
Temperature		C		23.4		21.4		18.8
Quantity of Chemical Used:								
Aluminum Sulphate		kg		8431.8		6142.8		6069.2
Polyelectrolyte		kg		75		75		75
Chlorine Gas		kg		1068		800		797
Soda Ash - Used for PH Adjustment		kg		8395.3		6142.8		6069.2
Fluoride		kg		690		453		408

* The Canadian Average is 450 Litres (0.45 m³) per day.

* Population is 7986

* Number of Households is 3783

Town of Fort Frances - Water treatment Plant - Water Works # 220000978
Monitoring Record
July 2014

[illegible]