Added Item # 7.2
What has been tested?

• 25 water wells tested for;
  – 13 variants of Perfluoroochemicals, which includes PFOS.
  – 3 different types of Glycols, which includes Propylene glycol.
  – Wells were selected in consultation with the MOE.

• 6 ponds and 1 swimming area have been tested for the same parameters.

• 5 ponds remain to be tested.
What are acceptable levels of PFOS in drinking water?

- No Guidelines in Canada for PFC’s in drinking water.
- Minnesota Department of Health Health Risk Limit (HRL) for PFOS and PFOA is 0.3 ug/L
- US EPA Provisional Health Advisory (PHA) for PFOS is 0.2 ug/L and PFOA is 0.4 ug/L
What are the effects of exposure to PFC’s

- PFCs have been linked to many health effects in animal studies, but often at higher exposure levels than are found in people.
- Extrapolating animal study results to humans is difficult.
- Few human health studies of PFCs have been conducted in the general population.
- Of the few human health studies done to date, some do show an association between PFC exposure and health effects.
What are the results?

Wells

- 25 wells tested; 9 dug; 15 drilled, 1 bored.
- 2 of 9 dug wells had trace levels of PFOS and PFOA; 0.04ug/L and 0.03ug/L.
  - The two (+) dug wells were not being used for drinking purposes at the time of sampling
- 0 of 15 + 1 drilled and bored wells had PFOS detected.
- The minimum detection limit is 0.02 micrograms per litre (ug/L or ~ppb).
- Bacteria were detected in approximately 1/3 of the wells.
- All owners and users of wells have been informed of the test results.
What are the results?...cont

Ponds/Swimming Area

• 4 of 7 surface water samples had PFOS and PFOA detected of varying proportions.
  – Two ponds did not have PFOA detected.
• Total concentration of PFC’s (PFOS + PFOA) range between 0.03 and 0.23 ug/L
• Minimum detection limit is 0.02 micrograms per litre (ug/L or ~ppb).
Locations of City of Hamilton Public Health Well and Irrigation Pond Sampling for PFOs and Propylene Glycol
What does this mean?

• Consumption and contact with well water does not represent a health risk from PFC’s.
• Contact with surface water does not represent a health risk from PFC’s.
• The irrigation ponds are not likely to represent a health risk. These ponds are used to irrigate a nursery, golf course, and sod farms.