Developing a Comprehensive Strategy to Reduce Lead at the Tap in Canada

Historically in Canada, there has been very little research conducted regarding lead occurrence and control in drinking water and systematic health studies. Limited research has been conducted by utilities, however the data collected has not typically been statistically analyzed, nor have sampling protocols. All of this may be due to the fact that there have been no stringent regulations in Canada regarding lead sampling. The general objective of this research is to provide utilities, regulators and the public with a better understanding of the issues related to lead in drinking water and to develop a comprehensive strategy to help reduce lead in tap water in Canada.

Our objectives are to fulfill the following:

(1) Assess the exposure to lead from tap water and resulting blood lead levels for selected target populations.

(2) Develop and validate lead sampling protocols and assess the occurrence to better understand the cause of lead at the tap.

(3) Develop decision supporting tools to identify the most cost effective strategies and solutions to reduce lead levels at the tap.

Following completion of this study and transfer of knowledge to utilities and regulators, a heightened ability to anticipate and solve the challenges of lead in drinking water shall be gained; sustainable and cost effective means of addressing lead issues, while meeting regulations will also be achieved.