

**GRAY WATER DISTRICT
WORKSHOP MEETING
MDOT Office 51 Pleasant Hill Rd
Scarborough, ME 04074
March 27th, 2019**

Re: Increasing Sodium and Chloride Concentrations in Gray Water District (GWD) Wells

Present: GWD: Bruce Sawyer, Steve Dunn, Andrew Edson, Joe Murray and Superintendent Jim Foster. Sevee & Maher Engineers (SME): Bruce Fowler. MDOT: Dwight Doughty, Brian Burne, Kyle Hall, David Bernhardt. MTA: Peter Merfeld, John Cannell. Town of Gray: Doug Webster. Meeting commenced at 3:37 pm.

On March 27, 2019, members of the Gray Water District (GWD) and the Town of Gray (Town) met with representatives of the Maine DOT and the Maine Turnpike Authority to discuss the problem of and possible solutions for increasing road salt concentrations observed since 2008 in the GWD source of supply wells located off Route 26.

Sodium and chloride data plots for area monitoring wells, prepared by SME, were reviewed and discussed. In all instances, recent and historical data point to the Route 26 bypass as the most likely recent source of additional road salt in the watershed in proximity to the GWD wells.

Dwight Doughty of the DOT stated that, in his opinion, the majority of the watershed monitoring wells are not positioned properly for evaluation of road salt contamination, and therefore the interpreted groundwater contours and wellhead protection boundaries are not correctly interpreted or illustrated.

No constructive proposals were brought forth by the DOT in spite of direct questioning from GWD directors. Instead, the DOT's argument focused on three areas in the Town as the source(s) of the road salt problem:

- The Middle School;
- The former Town landfill, and
- The Town maintenance yard.

To put the DOT's argument in perspective, these three "potential" road salt sources are long-standing entities in the GWD watershed. The problem of road salt contamination in GWD source wells has been identified only in the wake of the construction of the Route 26 bypass.

At the close of the meeting, the following agreements had been made by the four parties:

1. Cost and schedule a program to collect water levels in existing monitoring wells across the watershed to redefine the watershed boundaries and flow contours, in light of increased pumping that may be occurring in the GWD source wells since the 2005 Wellhead Protection Zone was established.
2. Consider conducting possible additional investigations to better define contributing sources of road salt in the area of the Town maintenance yard and the Middle School,

including adding monitoring wells on abutting private and public property and sampling the kettlehole above the former Town landfill.

3. Evaluate the opportunity wherein the DOT and the Town of Gray would swap responsibilities for the management of Route 100 and Route 26 bypass during the winter months; going forward, the DOT would assume responsibility for Route 100 and the Town for the Route 26 bypass. Because the Town, unlike the DOT, has the flexibility to use aggregate as well as road salt, this action may reduce road salt loading presently occurring along the Route 26 bypass.

We will meet in a couple months to discuss progress.

Meeting ended at approximately 5:20 pm

Respectfully submitted,

Sudiek Lester