

Your property is in a Wellhead Protection Area

What is a Wellhead Protection Area?

A wellhead is simply the physical structure of a well above the ground. A wellhead protection area is the area surrounding the wellhead, through which contaminants are reasonably likely to move toward or reach the well. The various zones that make up a wellhead protection area are based on how long it would take a contaminant to get to the well.

Ridgetown Water Supply System

The Ridgetown water supply system has six wells in two well fields. The wells supply 2,782 m³/day, and serve a population of about 3,450.



Open House

Wednesday, November 18, 2009
3:00 p.m. - 7:00 p.m.
Rudy Brown Building
Room 110 - Syngenta Classroom
University of Guelph - Ridgetown Campus
Ridgetown, On

Plan to attend this Open House to learn more about your local Wellhead Protection Area (WHPA) and see detailed maps showing what properties are within the zone.

What is a Drinking Water Threat?

A drinking water threat is an "activity or condition that adversely affects or has the potential to adversely affect the quality or quantity of any water that is or may be used as source of drinking water". As part of the study of the Ridgetown Well Head Protection Area, locations where potential significant threats could occur were enumerated. The table below indicates the number of locations where potential significant threats could occur. Note that numbers are yet to be determined for the activities pertaining to the application of agricultural and non-agricultural source material to land, and the application of commercial fertilizer to land and road salt.

Ridgetown Water Treatment Plant – Erie Street System	Number of locations of Potential Significant Threats
Well Head Protection Area-A	30
Well Head Protection Area-B	2

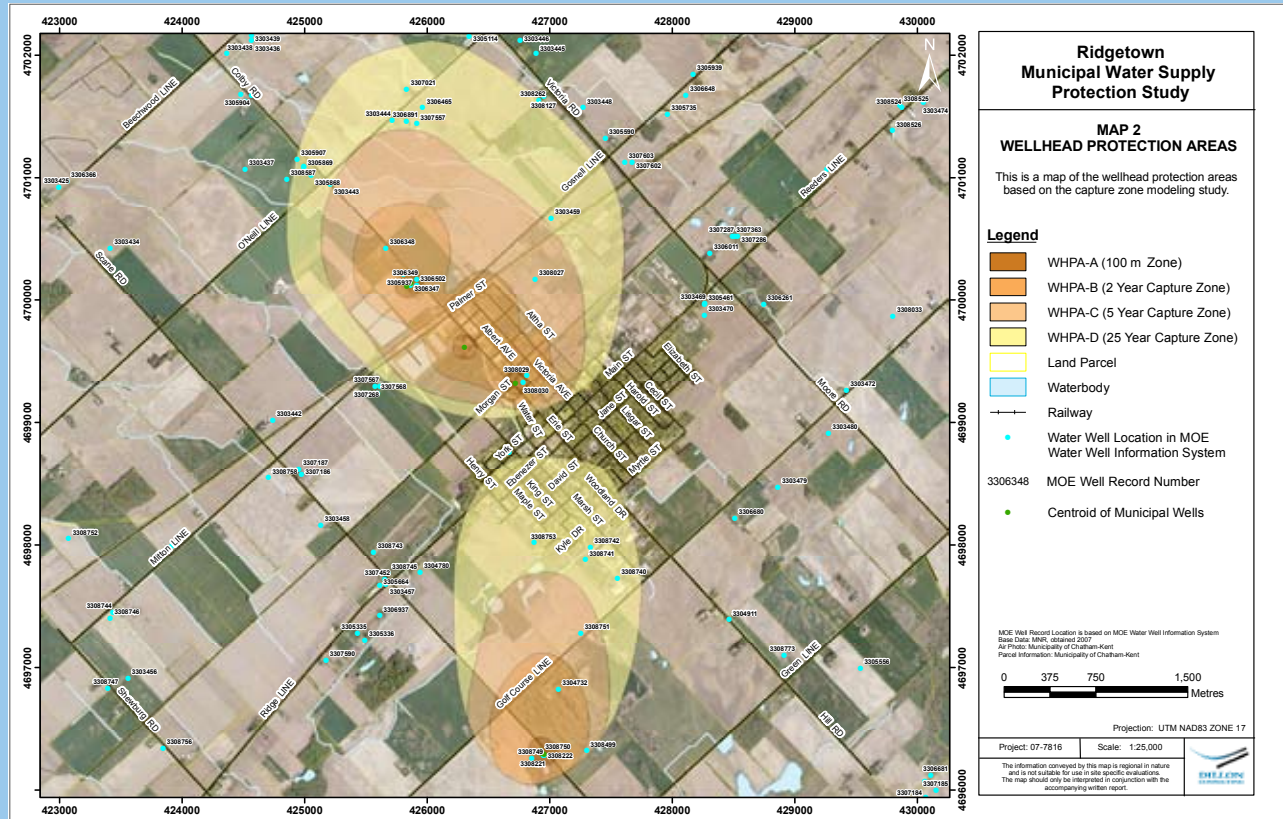
Ridgetown Water Treatment Plant – Scane System	Number of possible locations of Significant Threats
Well Head Protection Area-A	1
Well Head Protection Area-B, C and D	0

What is a Drinking Water Issue?

Under the Clean Water Act, drinking water quality issues must be identified. A drinking water quality issue is a physical, chemical, radioactive or microbial (eg. bacteria) parameter or other pathogenic (disease causing) organisms shown to deteriorate, or trending towards a deterioration, of raw (untreated) water quality for the purposes of drinking. The parameters which can be considered are identified in the Safe Drinking Water Act. The area and the activity contributing to a drinking water quality issue must also be identified. Identifying issues is a key step in the overall process of protecting drinking water quality. Should an issue be identified, the activities that contribute to this issue become a significant risk and must be dealt with through the source protection plan. Identifying issues involves a review of raw (untreated) water quality data, consideration of existing water treatment plant capabilities to deal with any potential problems and discussions with the plant operating authority. At the Ridgetown Water Treatment Plant, no drinking water quality issues (for untreated water) as a result of land use activities were identified.

The amount of land involved in a wellhead protection area is determined by a variety of factors, such as the way the land rises or falls, the amount of water being pumped, the type of soil and rock surrounding the well, and the direction and speed that the groundwater travels.

The green circles on the map show the locations of the wells. The coloured areas show the extent of the preliminary wellhead protection areas.



A wellhead protection area includes different zones that indicate the length of time it takes for water to travel through the ground to the well.

- **WHPA - A (100 metre area)** - the area where the risk to the well is highest, and the greatest care should be taken in handling any potential contaminant
- **WHPA - B (2 year time of travel zone)** - bacteria and viruses from human and animal waste are a concern, as are hazardous chemicals
- **WHPA - C (5 year time of travel zone)** - biological contaminants are less of a concern, but chemical pollutants remain a concern
- **WHPA - D (25 year time of travel zone)** - the most persistent and hazardous pollutants remain a concern

For more information contact your local Conservation Authority or visit our website



519-354-7310



519-245-3710



519-451-2800



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www.sourcewaterprotection.on.ca