

**WILLOW BEACH AND LAKE SIDE
COMMUNITIES WATER AND SEWER
PROJECT**



**WATER AND SEWER HOOK-UP
GUIDELINES**



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The following information is provided as a **general guideline** for installing the water and sewer lines from the property line into a dwelling. It is strongly recommended that a licensed plumber and/or licensed drain contractor make the pipe connections. There may be additional code requirements in order to complete the work. Please read the following guidelines and direct your inquiries to the contacts provided. **If the owner of the property decides to install their own services, please advise staff at time of application.**

A. HOW TO PREPARE FOR WATER AND SEWER HOOK-UP:

Once you have located the water line and the plumbing stack inside the building perimeter, the following must be taken into consideration:

The Type and Depth of the Foundation Supporting the Building:

Since water and sanitary lines must be installed 1.5 m (5') below grade or frost protected, lines will be entering the foundation at that level or deeper. Lines located parallel to the foundation and running deeper than the footings/piers/slab may undermine the foundation and cause structural damage to the house. When planning the location of the hook up, try to locate the lines perpendicular to the foundation and minimize the excavation area under the foundation.

Evaluate the Existing Plumbing: Some older homes or cottages may have had the plumbing installed improperly, without permits or inspections. The existing water lines in the dwelling must be able to handle up to 150 psi pressure when hooked into the municipal system. It is advisable to contact a licensed plumber to evaluate the plumbing system to avoid problems at installation time.

Lots With More Than One Residential Dwelling: All property owners with more than one detached residential dwelling located on the property are to contact a Zoning Examiner at the following numbers **(905) 476-4301**: extensions **282** or **277**. Only one dwelling unit will be allowed to connect unless there is approval under the Town of Georgina Zoning By-law 500 for the connection of any additional units. *Plumbing to accessory buildings must be cleared through the Building Division prior to any permits being issued. Only one service lateral will be installed per property.*

B. REQUIRED PERMITS:

Permits are required to connect to the municipal water and sewer services and these can be obtained at the Civic Centre, 26557 Civic Centre Road, as follows:

1. A **Permit to Connect** authorized by the Department of Engineering and Public Works will be required. The Engineering Department is located on the second floor. There is no fee for the Permit to Connect.
2. A **Plumbing Conversion Permit** must be obtained from the Building Division following issuance of the "Permit to Connect". There will be no charge for the Plumbing Conversion Permit to connect to the new system for one year from the

date that the property owner receives notice requiring them to connect to both the water and sewer systems. Although there will be no fee for the permit, inspections must be called for as per the instructions that will be provided with the permit. The Building Division is located on the third floor. All plumbing upgrades from the water meter into the building will require a separate **Plumbing Permit, along with the applicable fee.**

3. Upon installation of the water service, inspection and final approval by the Building Inspector will be required before the water services can be turned on. **Only the Waterworks Supervisor or designated staff shall turn on the water at the street.**
4. The applicant/homeowner must contact Neptune at 1-800-667-4387 to set up an appointment to have the water meter installed within two (2) weeks of the final plumbing approval by the Building Division. The Town pays for the cost and installation of the water meter. Failure to have the meter installed will result in the water being turned off at the street without notice.

C. EARLY CONNECTION TO THE WATER SYSTEM

In areas where the water system will be available before the sanitary system is operating, the owner of the property may opt to hook up to the municipal water line. The Permit to Connect and the Plumbing Conversion Permit are required as previously set out. The owner has two options:

1. Install the water line only.
2. Install the water line and sanitary.

Connection of the sanitary pipe to the building is not permitted until the Town's Engineering Department gives notice.

If the property owner opts to install the sanitary line in a common trench (see water line installation on page 3), the water line can be permanently connected to the dwelling. The well lines must be disconnected from the building's water system. The Building Division will be inspecting all connections to the system and at the same time confirm the well has been disconnected for the building's water system. This inspection must be complete prior to the water being turned on at the curb by the Waterworks Department.

Where the owner chooses to install the sanitary sewer service to the outside of the home at the same time as the water service, the owner may do so subject to the following:

- a) The sewer pipe may be installed to the point of connection outside the home where a 90 degree elbow shall be installed bringing the pipe one (1) metre out of the ground. The pipe shall have a thread on cap installed for inspection purposes.

- b) The Building Inspector and the Waterworks Supervisor shall confirm inspection of the sewer pipe and place a seal on the pipe/cap. The pipe shall remain visible for routine inspection until such time as connection to the municipal sewer system is permitted.

D HOOK UP SPECIFICATIONS

1. WATER LINE:

Materials:

$\frac{3}{4}$ " (19mm) copper type K soft certified as ASTM-B88 "Seamless Copper Water Tube". This standard is stamped on the pipe as well as on the container. Type K "soft" copper is used because minor ground settlement will not adversely affect it.

Plastic Pipe meeting standards CAN/CSA-B137.1 may also be used for underground installations and must be approved for 150 psi.

Installation:

The water service may be placed in the same trench as the sanitary sewer line if the water service pipe is constructed of a single run of pipe with no joints or fittings between the shut off valve and the inside face of the building. A single run of pipe will prevent contamination of the water supply if there is a break in the sewer pipe.

If the water pipe has joint connection(s), it must:

- a) Have a 2.4 m (8 foot) separation from the sewer pipe, or
- b) Be placed on a shelf 500 mm (20") above the sewer line.

Frost Protection:

Where piping may be exposed to freezing conditions it must be protected from frost. Thermal insulation or trace wires may protect water pipe, which is not buried below frost level (1.5 m or 5 feet).

Tracer Wires:

A 14 gauge TW solid copper coloured plastic coated tracer wire must be attached to every non-metallic water service pipe, unless the pipe is detectable without the tracer wire. Should repairs be necessary after the pipe is buried, the pipe can be located with a metal detector.

Stop and Waste Control Valve:

A minimum $\frac{3}{4}$ " (19mm) Stop and Waste Control Valve must be installed where the pipe enters the building.

2. SANITARY PIPES:

Materials:

The sewer pipe must have a minimum nominal diameter of 4" (100mm). Underground sewer pipes are usually PVC or ABS. All PVC lengths of pipes and fittings must be stamped with in accordance with CAN/CSA-B182.1, Plastic Drain and Sewer Pipe and

Fitting. All ABS lengths of pipes and fittings must be stamped with in accordance with CAN/CSA-B181.1 "Plastic Drain and Sewer Pipe and Fitting. The markings indicate the pipe material meets the minimum standards of the Ontario Building Code.

Solvents:

Solvents or glue used for joints in the pipe are specific to the material used. PVC solvent must meet CAN/CSA-B181.2 and ABS requires solvent standard CAN/CSA-B181.1. Check with the supplier before purchasing.

Installation:**Base Support:**

Underground pipe must be supported on a base that is firm and continuous under the entire length of the pipe. All building sewer pipe must be supported to prevent sagging. A compacted depth of 6" (150mm) is generally sufficient bedding thickness. Crushed $\frac{3}{4}$ " (19mm) clear stone clear provides good support that does not require compaction and provides protection for the pipe prior to backfill.

Slope:

The pipe slope should be at least 1% slope (1/8"/foot or 10mm/m) and directed away from the building and towards the municipal sewers.

Cleanouts:

Every sanitary building drain must have a cleanout that is located as close as possible to the place where the drain leaves the building or can be located outside the building to facilitate access. Where there is a change in direction greater than 45 degrees in the sanitary sewer, a cleanout must be installed at each change in direction. A cleanout is also required every 49' (15m) on the horizontal sewer pipe.

The cleanout must be 4" (100mm) in diameter and consists of a wye and pointing towards the direction of flow. The cleanout must have a readily replaceable airtight cover that provides access for cleaning the drain.

Frost protection:

Pipes exposed to freezing conditions must be protected from frost in order to maintain their alignment. This may be achieved by:

- a) Installing the pipes below the depth of frost penetration, or
- b) Covering the pipes with thermal insulation.

Backfill:

Where the piping is installed underground, the backfill shall be carefully placed and tamped to a height of 1 foot over the pipe. It is recommended the pipe be covered and surrounded by $\frac{3}{4}$ " (19mm) clear stone prior to backfill. The backfill on the pipe shall be free of boulders, large stones, cinders and frozen earth.

E TESTING EXISTING PLUMBING

Once the water is turned on, it is advisable to check the existing plumbing for leaks. This may be an opportune time to update the water and drainage system in the house.

Consult with a professional plumber to evaluate the existing plumbing. A separate Plumbing Permit will be required for any upgrades, additional fixtures and installing stack vent and fixture traps. The minimum cost for a Plumbing Permit is \$50.00.

F STACK VENTING AND TRAPS

All plumbing systems require venting and fixture traps. Where a stack vent is being installed in an existing building, the stack vent may be erected outside the building provided.

Venting and traps are extremely important. The traps prevent odours and methane gas from being released inside the dwelling. The stack vent releases any odours and methane gas in the pipes to the outside of the building. The stack vent allows atmospheric pressure into the system and balances the system. A balance system eliminates clogs forming in the pipes and makes for a quieter running system. Materials used are the same as the PVC or ABS sanitary pipes as described on page 3.

E. DECOMMISSIONING SEPTIC SYSTEMS AND HOLDING TANKS

All **holding tanks** and **septic tanks** must be properly decommissioned. The property owner must arrange to have the tank pumped dry by a licensed pumping contractor and have the receipt or a copy of the receipt to give the Building Inspector at the time of inspection. The building drainpipe running from the house to the tank is to be disconnected and sealed. This will prevent problems of odours and back drainage to the building's weeping tiles or sump pits. Knock holes through the concrete tank for drainage, crush top of tank into tank and fill the tank with acceptable granular material such as sand or native soil. All steel tanks are to be crushed. If possible, existing leaching bed stone and distribution pipes are to be left undisturbed. Any tanks and/or leaching bed components excavated and removed must be disposed of at a hazardous wastes disposal site.

Decommissioning of the septic tank should be completed as soon as possible after the services have been hooked up. Failure to abandon sewage disposal systems will create a hazard to the health of the homeowner and the public.

F WELLS

It is recommended that dug and bored wells be properly abandoned. Older wells, that may not have been constructed to today's standards and have deteriorated over time, are now considered to be substandard. A substandard well may contribute to the continued contamination of the ground water aquifer.

A licensed well installer is authorized by the Ministry of Environment to abandon wells. Once the well has been abandoned, the property owner must give a copy of the abandonment report to the Building Division. **All pipes between the well and the building's water system must be disconnected.**

If the well complies with the Ontario Water Resources Regulation 903 or is a properly maintained well, a well installer can certify the well's compliance. **All pipes** between the well and the building's water system **must be disconnected**. The owner is responsible for the safety and upkeep of a private well. The enforcement of wells is under the jurisdiction on the Ministry of Environment.

For more information of wells, please contact the Ministry of Environment, WellAware or the Ontario Ground Water Association.

Ministry of Environment

www.ene.gov.on.ca

P: toll free (800) 565-4923

WindFall Ecology Centre

www.wellaware.ca or www.windfallcentre.ca

500 Water St.

Newmarket, ON L3Y 1M5

P: (905) 898-1926 or toll free (866) 260-4431

F: (905) 722-6344

Ontario Ground Water Association

www.ogwa.ca

CONTACTS:

The Town of Georgina has a web site, www.georginawater.ca, which gives contact numbers, updates on construction and general information.

Attached is a list of plumbers registered with the Town's consultant, KMK.

Roger Embree, Resident Project Coordinator for KMK, can be reached at Phone: 905-722-9499 and Fax: 905-722-8146

Call before you dig: Ontario Hydro:1 800 400-2255
 Enbridge Gas:1 800 400-2255
 Bell Canada1 800 400-2255

Ministry of Labour: 905 715-7140

Please contact the Building Division if you have any questions at

dbuck@town.georgina.on.ca or call 905 476-4301, 905 722-6518 or 705 437-2210, extensions: 252, 263 or 254.

The following is an alphabetical list of plumbers and contractors who have expressed interest in installing water and sewer services. This list is not a rating of the contractor and is not an endorsement or recommendation. Homeowners are advised to check with references prior to hiring any contractor.

Dan Allison Plumbing and Drain Service	South Lake Simcoe Area	905 722-500
Bedford Plumbing & Heating	414 Lake Drive South	905 476-2236
Berger Plumbing Ltd	P.O. Box 1041 Sutton, Ontario L0E 1R0	905 722-7473
Briggs Plumbing & Heating	Box 44 Baldwin, Ontario	905 476-6466
DJM Plumbing & Drains	85 Lake Drive North Keswick, Ontario	905 476-3010
Holder Bros. Ltd	5239 Baseline Road Sutton, Ontario	905 722-5113
Ron Ince Construction Excavation - Sewer & Water Lines	28 Canal St. Keswick, Ontario L4P 1K5	905 989-1865
Tim Macrae Plumbing	8281 Morning Glory Road	705 437-1787
John Mercier Plumbing	19 Maple Ave. Sutton, Ontario	905 722-8392
Millenia Contracting (John Hall)	27018 Kennedy Rd Box 344 Willow Beach L0E 1S0	905 722-5005
PTM Safety Inc. Peter Juras peter@ptmsafety.com	60 Pippin Rd Unit 133 Concord, Ontario	905 761-0361 www.ptmsafety.com
Len Westcott Plumbing	Sutton Keswick	905 722-5163 905 476-1547