



**CITY OF PORTSMOUTH  
PUBLIC WORKS DEPARTMENT - WATER DIVISION  
APPLICATION FOR IRRIGATION METER  
CITY OF PORTSMOUTH  
680 Peverly Hill Road  
Portsmouth N.H. 03801  
(603) 427-1530 FAX (603) 427-1539**

## **POLICY**

The City of Portsmouth City Council recently voted on May 2, 2016 to revise the sewer ordinance related to irrigation meters. This revision expanded the availability of irrigation to all customer categories. Additionally, the ordinance now includes provisions for assuring that new irrigation systems are installed to use water in an efficient manner.

## **REQUIREMENTS AND PROCEDURES**

Only a landscape irrigation system designed and installed by an Environmental Protection Agency Watersense Certified Irrigator in accordance with the criteria set forth in this section shall be deemed to be in compliance with subparagraph (a) of this section. The Certified Irrigator must certify in writing to the Water Division that the landscape irrigation system has been designed and installed in accordance with subparagraph (a) of this section. This certification shall be provided to the Water Division at the time of requesting final inspection of the system.

(a) Automatic irrigation systems shall:

- (1) Be maintained in compliance with the provisions of this section;
- (2) Be rendered inoperative by or at the direction of the irrigation system owner or operator pending repairs if damaged in a manner that results in leakage or excessive discharge of water from broken components;
- (3) Include rain sensors to be installed and maintained on all irrigation systems equipped with automatic irrigation controllers and set to render the irrigation system inoperative at  $\frac{1}{4}$  inch of moisture or more;
- (4) Include freeze sensors to be installed and maintained on all irrigation systems equipped with automatic irrigation controllers, which will render the system inoperative at 35 degrees Fahrenheit or lower;
- (5) Be designed so that spray or rotary heads are at least four (4) inches inside from any curbing, sidewalk, fencing, or building;
- (6) Be designed so that heads spray only towards pervious surface or landscaped area;
- (7) Be designed to include a zonal irrigation system; and
- (8) Be designed to include a master valve.

(b) Operation of irrigation systems or devices.

From April 1 to September 30, landscape irrigation utilizing water, in whole or in part, obtained from the City water system, is prohibited except during the times between 6:00 p.m. and 10:00 a.m. The City Manager, or his or her designee, may further restrict landscape irrigation to specified days of the week or otherwise restrict the irrigation schedule as circumstances dictate.

By affixing my signature below, the undersigned does hereby declare that the irrigation system criteria for new homes, as specified in the WaterSense New Home Specification and the Irrigation Audit Guidelines for WaterSense Labeled New Homes, have been met and, if requested, will provide the necessary supporting documents.

Certified Irrigation Professional Name:	Company Name:
Signature:	Date:

Item	Criterion	Yes	No	NI
Application	An "Application for Second Meter", must be filled out and submitted to the Water/Sewer Billing Foreman for approval. The application must list all uses of water for which the second meter is being requested. The customer is responsible for obtaining all permits required by the City of Portsmouth's Inspection Department.			
Customer	<p>The customer shall hire a certified irrigation professional to install a separate water line which will service the allowed uses under this policy. The certified irrigation professional is required to obtain a plumbing permit before work begins. This second metered service shall be tapped off before the existing water meter. This second metered service shall include ball valves, water meter, and approved dual check backflow preventer as detailed in the Portsmouth Residential Water Meter and Remote Wire install sheet.</p> <p>The meter shall be purchased through the Water Division and installed by the Water Division. The customer is responsible for all costs. The meter will be wired to the outside and a remote box will be installed for the City to obtain readings. The customer is responsible to drill a 3/8" hole through the wall at the location of the existing water service remote. The City, will be responsible for running the wire and installation to the reading device next to the current reading device.</p>			
Design and installation	Designed or installed by certified irrigation professional Name of professional:			
	Waiver provided for design/installation Name of designer/Installer:			
Service	This service is effective the date the water meter is installed by the City. No adjustments will be made to this service for leaks or unwanted water usage. The second meter will have a separate account from the domestic meter and will be billed in the same cycle as the household meter. Consumption charges will be applied to the separate account. The customer will be charged for all water usage as set forth <u>in the City of Portsmouth</u> . The second meter is for the purpose of watering lawns, watering gardens or washing cars or other uses of water where it is reasonable to conclude that the water will not be discharged into <b>pools are not a permitted use of</b>			

	<b>the second meter</b> . No use of the second meter is permitted except as listed in the application. <u>Water Tariff (Page 16 and 16A)</u>			
Item	Criterion	Yes	No	NI
Leaks	System operates without leaks (checked during the audit)			
Overspray	System prevents runoff and overspray from leaving the property (checked during the audit)			
Rain shut-off device	System includes a technology that inhibits or interrupts operation of the irrigation system during periods of rainfall or sufficient moisture (e.g., rain sensors, soil moisture sensors, that sense any period that precipitation is greater than 1/4 inch in 24 hour period.)			
Irrigation controller	<p>WaterSense labeled weather-based controller or soil moisture sensor-based controller with the following capabilities in both smart and standard mode:</p> <p>The controller shall be capable of preserving the contents of the irrigation program settings when the power source is lost and without relying on an external battery backup.</p> <p>The controller shall either be capable of independent, zonespecific programming or storing a minimum of three different programs to allow for separate schedules for zones with differing water needs.</p> <p>The controller shall be capable of indicating to the user when it is not receiving a signal or local sensor input and is not adjusting irrigation based on current weather or soil moisture conditions.</p> <p>The controller shall be capable of interfacing with a rainfall device.</p> <p>The controller shall be capable of accommodating watering restrictions as follows:</p> <p>Operation on a prescribed day(s)-of-week schedule  Either even-day or odd-day scheduling, or any day-interval scheduling between two and seven days  The ability to set irrigation runtimes to avoid watering during a prohibited time of day (e.g., between 10:00 a.m. and 6:00 p.m.)  Complete shut-off (e.g., on/off switch) to accommodate outdoor irrigation prohibition restrictions</p>			

	<p>The controller shall include a percent adjust (water budget) feature.</p> <p>If the primary source of weather or soil moisture information is lost, the controller shall be capable of reverting to either a proxy of historical weather data or a percent adjust (waterbudget) feature.</p> <p>The controller shall be capable of allowing for a manual operation troubleshooting test cycle and shall automatically return to smart mode within some period of time as designated by the manufacturer, even if the switch is still positioned for manual operation.</p>			
Item	Criterion	Yes	No	NI
Sprinkler heads	Have a 4-inch or greater pop-up height and matched precipitation. Note: This excludes components of a microirrigation system.			
Sprinkler irrigation	Not installed on plantings other than turfgrass other than as part of a micro-irrigation system			
Sprinkler irrigation	Not used on strips of turfgrass < 4 feet wide or on slopes > 4:1 other than as part of a micro-irrigation system			
Micro-irrigation system	Includes a pressure regulator, filters, and flush end assemblies			
Schedule	Two seasonal water schedules (initial grow-in period and established landscape) are posted at the controller.			
Verification of system operating pressure	Station or zone pressure within 10% of manufacturer recommended operating pressure			
Notes on Irrigation System Criteria				

**Section 11.216: SEWER USER CHARGES/RECORDS/HOOK-UP (last updated 8/18/2016)**

- A. All industries discharging into a public sewer shall perform such monitoring of their discharges as the Superintendent of Public Works or duly authorized employees of the City may reasonably require including installation use and maintenance of monitoring equipment, keeping records and reporting the results of such monitoring to the Superintendent of Public Works. Such records shall be made available upon request by the Board to other agencies having jurisdiction over discharges to the receiving waters.
- B. The owner of any house, building, or property used for human occupancy, employment, recreation or other purposes which is connected to a public sewer shall pay a sewer user charge. The sewer user charge shall be established by the City from time to time to defray the cost of management, maintenance, operation and repair, including replacement, of the municipal waste water system. Sewer user charges shall be based upon water use whenever possible. No allowance shall be made for watering lawns or watering gardens, except for customers who have installed at their cost an approved irrigation system and a second water meter, meeting the specifications determined by the Water Department to measure water use which is reasonably calculated not to be discharged into the sewer system. Where such second meters have been installed, a separate account will be established and no sewer charges will be applied to this usage. A monthly service fee shall be charged for each irrigation meter in addition to the consumption charge, said fee to be determined by the City Council during its annual budget process.

Users of the City of Portsmouth's water system may request a permit for the installation of an irrigation system and irrigation meter. An application must be completed and submitted to the Water Department for the installation of an irrigation system and irrigation meter prior to the issuance of an irrigation permit. The Water Department may deny the issuance of a permit for an irrigation system or irrigation meter when the existing water main does not provide sufficient water volume/pressure to support the demands of an irrigation system without causing unacceptably low water pressure for other customers on the same water main.

Irrigation service lines and meters shall be installed not more than four feet from the prime meter and shall be installed parallel to the prime meter. Sewer charges shall not apply to water amounts measured by irrigation meters. Shut off valves are required ahead and behind the irrigation meter and must be within one foot of the meter. A back flow preventer (approved by the City) to protect against contamination of the water system must be installed behind the irrigation meter.

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- (4) Include freeze sensors to be installed and maintained on all irrigation systems equipped with automatic irrigation controllers, which will render the system inoperative at 35 degrees Fahrenheit or lower;
- (5) Be designed so that spray or rotary heads are at least four (4) inches inside from any curbing, sidewalk, fencing, or building;
- (6) Be designed so that heads spray only towards pervious surface or landscaped area;
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If records of metered water use are not available or do not reasonable reflect the quantity of waste discharged into the sewage system, the sewer user charge shall be based upon estimated water use or on actual measurement of the volume of waste discharged into the sewer system. Sewer surcharges shall be levied upon users whose waste characteristics are found to be above normal strength. For the purpose of evaluating waste characteristics, the terms of the Report on the Proposed Rates and Charges for Sewer Services by the City of Portsmouth, prepared by Coffin and Richardson, dated June 15, 1976, are incorporated herein by reference.

- C. Owners of all houses, buildings, or properties used for human occupancy, employment, recreation or other purposes situated within the City and not connected into a public sewer, if found to be in violation of Section 11.203, Paragraph C or Section 11.204, Paragraph H of this Ordinance shall pay sewer user charges as if connected to a public sewer.
- D. In the event that the owner or owners of a business which is commercial or industrial can clearly define and separate a portion of the potable water entering the business establishment which is totally consumed in process, the owner or owners may, at their own expense, install and maintain an A.W.W.A. approved water meter in the line supplying the portion of the water consumed in process. This meter shall be considered to be a deduct meter; the volume of water flowing through the deduct meter shall be subtracted from the volume measured by the primary water metering device located on the premises for the purpose of computing the sewer fee charge.

## **Fees**

Water Service Application Fee	\$ 150.00
Labor & Equipment	\$ 75.00

Meter:

5/8"	\$ 74.85
1"	\$ 155.13
1 1/2"	\$ 300.00

Automated Reading Device	\$ 88.00
Plumbing Permit	\$ 20.00

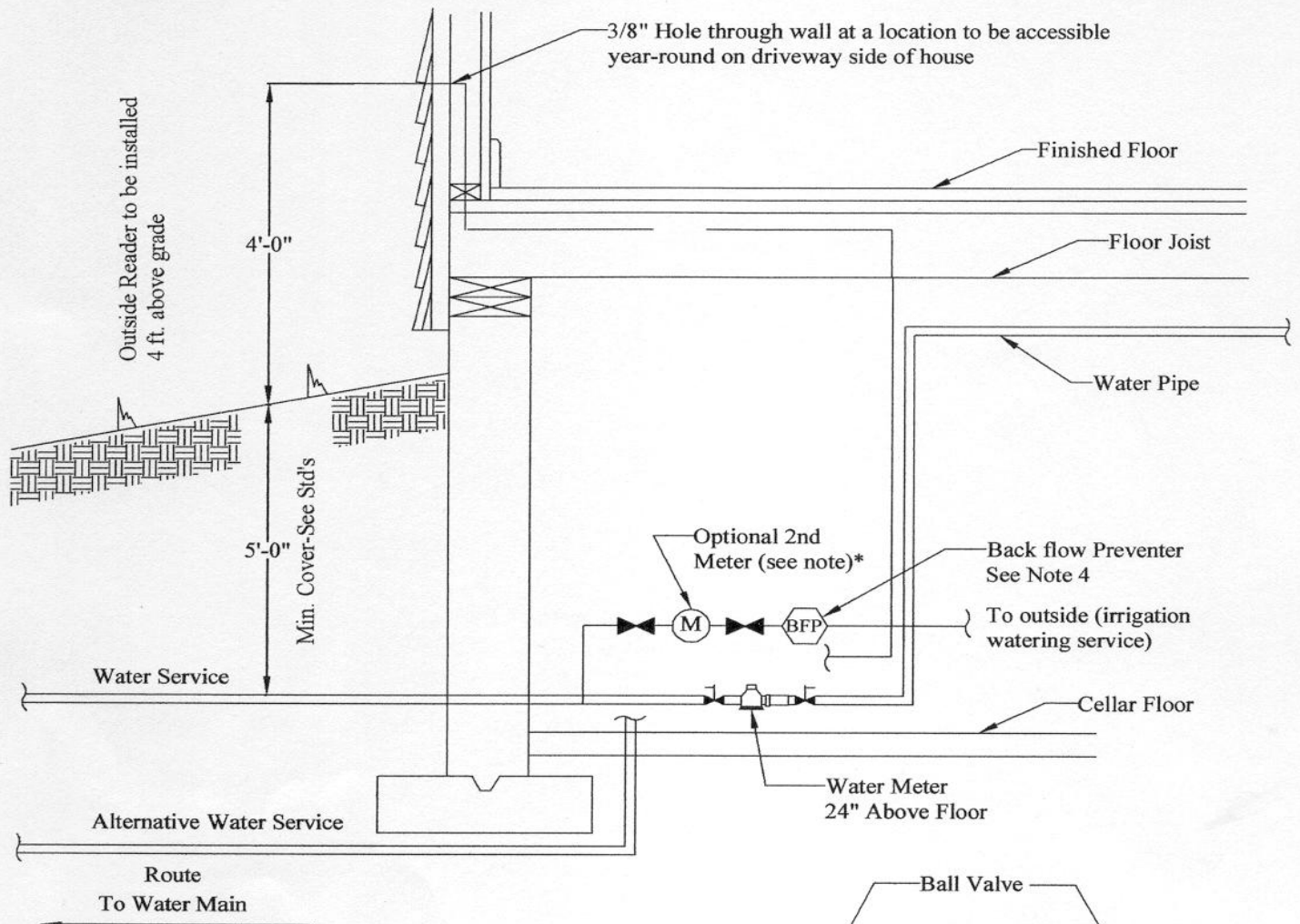
Monthly Meter Fee	Current Monthly Cost
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<u>Current</u> Consumption Fee	\$ 5.20 per unit
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0 – 10 Units \$ 5.20 per unit

10 – 20 Units \$ 9.81 per unit

Over 20 Units \$ 12.11 per unit

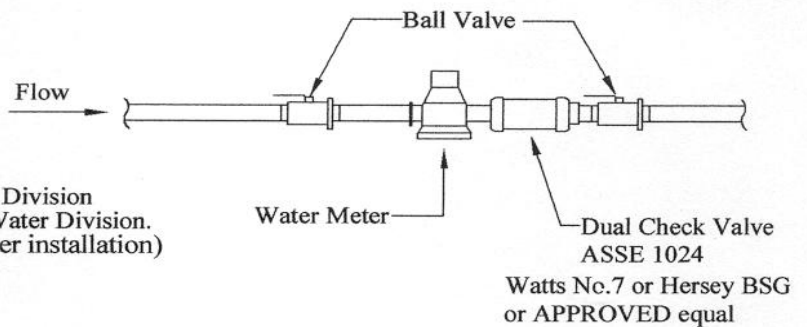


**NOTE TO INSTALLER:**

1. All meters are to be installed horizontal.
2. Meter spuds or flanges supplied by Portsmouth Water Division with meter. Plumber may pick up spuds or flanges at Water Division. (there is no delivery of spuds or flanges prior meter installation)
3. Laying Length of meter's
  - 5/8" = 7 1/2" + meter spuds
  - 1" = 10 3/4" + meter spuds
  - 1 1/2" = 13" + meter spuds

**NOTE \***

2nd meter for purpose of separating lawn and garden water and car washing. Shall be installed in accordance with sewer ordinance Chapter 11 Article II Section 11.216



**NOTE 4:**

1. If outside water use in faucets only (no underground irrigation) a watts No. 7 or hersey BSG Dual Check Valve or approved equal (meeting ASSE 1024 STDs.) shall be installed.
2. If outside water use includes an underground irrigation system, then a pressure vacuum breaker (PVB) shall be installed outside on irrigation system in addition to the Dual Check Valve indicated in 4(1). The PVB shall be installed according to Water Division STDs. ( Call 766-1413 for a copy )

APPROVED:

**PORTSMOUTH WATER DIVISION  
RESIDENTIAL WATER METER  
AND REMOTE WIRE INSTALL**

REV 1.  
DATE  
6/03

STD. NO.  
780931-0





# PUBLIC WORKS DEPARTMENT

CITY OF PORTSMOUTH  
680 Peverly Hill Road  
Portsmouth N.H. 03801  
(603) 427-1530 FAX: (603) 427-1539

## **IRRIGATION METER APPLICATION**

(return this completed form and page 2 only for approval process)

Application No. \_\_\_\_\_

Irrigation Meter Account No. \_\_\_\_\_  
(To be assigned by Billing Office)

### CUSTOMER SERVICE INFORMATION:

Date: \_\_\_\_\_ Domestic Account No. \_\_\_\_\_

First Name: \_\_\_\_\_ Last Name: \_\_\_\_\_

Address: \_\_\_\_\_ Telephone No: \_\_\_\_\_

Water Use for Second Meter: Lawn Watering \_\_\_\_\_ Gardening \_\_\_\_\_ Other: \_\_\_\_\_

### WATERSENSE CERTIFICATION AND SERVICE INFORMATION:

Name: \_\_\_\_\_ Company Name: \_\_\_\_\_ Address: \_\_\_\_\_

City: \_\_\_\_\_ State: \_\_\_\_\_ Zip: \_\_\_\_\_ Telephone No. \_\_\_\_\_

Certification No. \_\_\_\_\_ Certification Authorized by: \_\_\_\_\_

Size: \_\_\_\_\_ Date of Installation: \_\_\_\_\_

METER INFORMATION: (To be filled out by City)  
City)

BFP INFORMATION: (To be filled out by the.

Size: \_\_\_\_\_ Meter No. \_\_\_\_\_ Type: \_\_\_\_\_ Mfg: \_\_\_\_\_

Meter Reading: \_\_\_\_\_ Date: \_\_\_\_\_ Model No. \_\_\_\_\_ Size: \_\_\_\_\_

Installer: \_\_\_\_\_

I agree that the installation of the water service and second meter is for the purpose of watering lawns, watering gardens or washing cars as stated in the City of Portsmouth Sewer Ordinance, Chapter 11, Article II, Section 11.216 Sewer User Charges/Records/Hook-up. Any 'Usage not allowed per this ordinance shall lead to termination of the second service and prosecution for theft of services. Meter Questions: 766-1443

Owners Signature \_\_\_\_\_ Date: \_\_\_\_\_

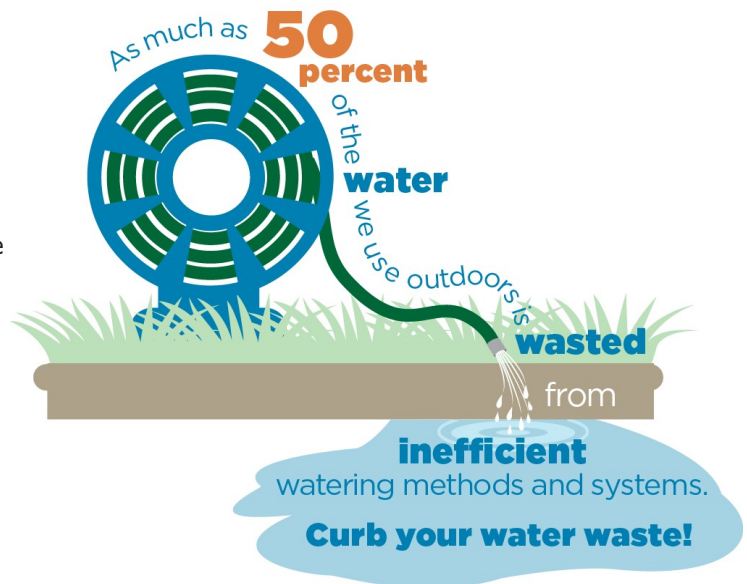
## Reduce Your Outdoor Water Use

The average American family uses 320 gallons of water per day, about 30 percent of which is devoted to outdoor uses. More than half of that outdoor water is used for watering lawns and gardens. Nationwide, landscape irrigation is estimated to account for nearly one-third of all residential water use, totaling nearly 9 billion gallons per day.

### Why Save Water Outdoors?

Outdoor water use varies greatly depending upon geographic location. In dry climates such as the Southwest, a household's outdoor water use can be as high as 60 percent. In addition, some experts estimate that as much as 50 percent of water used for irrigation is wasted due to evaporation, wind, or runoff caused by inefficient irrigation methods and systems.

It's usually not necessary to water grass every day. Instead, test your lawn by stepping on a patch of grass; if it springs back, it doesn't need water. Further your water savings by using regionally appropriate plants to create a water-smart landscape that is both beautiful *and* efficient to achieve the curb appeal you desire. Once established, native plants require little water beyond normal rainfall.



### WaterSense Savings

The U.S. Environmental Protection Agency's (EPA's) WaterSense® program labels professional certification programs that advance water-efficient irrigation techniques and practices. If homeowners with irrigation systems hired irrigation professionals certified through a WaterSense labeled program to perform regular maintenance, each household could reduce irrigation water by 15 percent, or nearly 9,000 gallons annually.

### Look for the WaterSense Label!

Acting like a thermostat for your sprinkler system, WaterSense labeled irrigation controllers tailor watering schedules to local weather conditions. The average family can save nearly 9,000 gallons of water annually by replacing a standard clock timer controller with a WaterSense labeled model.

EPA is also considering developing a specification for soil moisture-based control technologies, which water plants based on the amount of moisture in the soil and adjust irrigation schedules accordingly.

<https://www3.epa.gov/watersense>