

RIVERSMART PERC TEST WORKSHEET

Name:	Address:

Overview: A percolation test, or perc test, determines how quickly water drains from the soil at a project site. If the soil does not drain within 36 hours, the project will not function properly and may lead to flooding on the property. Please follow steps 1-5 and fill out the *Perc Test Table* below. Avoid doing the perc test when raining. If the entire yard is paved, the test should be conducted as close to the project site as possible.

Materials Needed:

- Digging tool (shovel or post-hole digger)
- Measuring tool (yard stick/ruler & reference stick)
- Water source (hose or bucket of water)
- Data collection tools (this worksheet & a pencil)

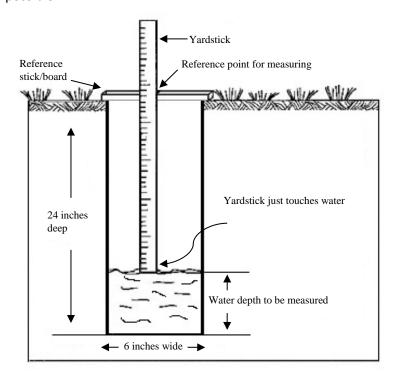
Caution: Make sure you know where utilities are before you start digging! Call Ms. Utility within 48 hours of digging to be sure.

Step 1: Dig a hole that is 24 inches deep and 6 inches wide in the area where the project will be installed.

Step 2: Fill up the hole with 12 inches of water and let it drain completely.

Step 3: Within 12 hours of the first fill, fill the hole again with 12 inches of water. Use the yardstick and reference stick/board to measure the water height every hour for 6 hours and record results in table.

Step 4: Follow the directions in the Perc Test Table to calculate the infiltration rate.



Step 5: Check the next day to make sure that the second filling has drained within 24-36 hours. An optimal infiltration rate is 1.2 inches per hour and minimum acceptable infiltration rate is .3 inches per hour – if the hole has not drained within 36 hours a rain garden or permeable paver project is not possible.

PERC TEST TABLE

	Elapsed Time (hours)	Depth of Water (inches)	Total Change in Water Level (inches)	Percolation Rate (inches per hour)
First Fill	0	12	12 inches – water depth at hour 6:	Total change in water level ÷ 6 hours:
Second Fill	1			
:	2			
:	3			
:	4			
:	5			
:	6			
:	24		Water drained completely after :	hours

