

Optimized Application of Imidacloprid 2F / 2L by Soil Drench

One gallon of 2F/2L concentrate contains 2 pounds (907 grams) of active ingredient and treats an average of 1,208 diameter inches.

Step 1. Refer to the Mixing chart below to make a master batch of treatment mixture. Put the amount of product shown in the left column into a mixing container. Add water to the mixing container to obtain the corresponding FINAL VOLUME of treatment mixture (Imidacloprid + water) shown in the right column.

Mixing the Master Batch	
Amount of Product (fluid ounces)	Final Volume of Treatment Mixture (fluid ounces)
4 ½ fl. oz.	32 fl. oz.
9 fl. oz.	64 fl. oz.
13 ½ fl. oz.	96 fl. oz.
18 fl. oz.	128 fl. oz.

Step 2. Measure the trunk diameter at breast height, referred to as “dbh.” To get the diameter, wrap a regular measuring tape around the trunk at 4 ½ feet above the ground and divide by π 3.14. Or you can use a diameter tape and read the diameter at the zero mark, not the metal tip; no math required.

Step 3. Scrape back any ground cover from the base of the tree so that bare soil is accessible. At a distance of **no more than 12 inches from the base of the tree**, use a thin piece of rebar to make one hole in the soil for each inch of trunk diameter. The holes should be evenly spaced around the tree and **no more than 2-4 inches deep**. Note: For trees that are smaller than 4 inches in diameter, make a **minimum of 4 shallow holes** around the tree.

Step 4. Treatment is done on an **individual tree** basis using the Dosage table below. Put the total number of ounces of treatment mixture listed for the specific trunk diameter into a separate pouring container. You can add more water to the pouring container if needed to have enough liquid to distribute evenly.

Optimal Dosage for Soil Drench using Imidacloprid 2F / 2L										
Inches DBH	# Fluid Ounces		Inches DBH	# Fluid Ounces		Inches DBH	# Fluid Ounces		Inches DBH	# Fluid Ounces
4	1.5		12	8		20	16		28	26
5	2		13	9		21	18		29	28
6	2.5		14	10		22	19		30	29
7	3.5		15	11		23	20		31	30
8	4		16	12		24	21		32	32
9	5		17	13		25	22		33	33
10	6		18	14		26	24		34	34
11	7		19	15		27	25		35	36

Maximum dosage allowed is 181 fl. oz. per acre per year.

Step 5. Pour the entire amount from the pouring container into the holes and all around the base of the tree slowly to avoid runoff.

Step 6. Replace the ground cover and mark the tree to indicate it’s been treated. Give the treatment time to dry before children or pets are allowed in the area.

CALL THE HEMLOCK HELP LINE 706-429-8010 WITH ANY QUESTIONS.

** Based on instructions developed by Elizabeth P. Benton, Warnell School of Forestry and Natural Resources, University of Georgia, Tifton, GA, and Richard S. Cowles, The Connecticut Agricultural Experiment Station, Windsor, CT.*

