



Small Sprayer Calibration Instructions

Prior to calibrating your sprayer, ensure that your equipment is in good working order. Inspect screens and filters to ensure that they are not plugged. Check that nozzles are clean and in good working condition with a steady flow of water and even spray pattern.

MATERIALS REQUIRED

- **Pylons** or something similar to act as markers
- **Rolling measuring wheel**, or a similar device to measure distance
- **Graduated container** to measure liquids
- **Timer**
- **5 gallon pail**, or something of similar size, to capture water from nozzles

STEPS REQUIRED

- 1. Fill spray tank to a minimum of half full with clean water;** do not use mixed product for calibrating
- 2. Measure swath width**
 - A. Provided your sprayer has an external pump, turn engine on and rev it up to where it will give you the proper psi to run your nozzles. If you have a 12v electric pump, disregard Step A
 Note: You will find psi rating on the nozzle manufacturers website or the literature that is provided with your nozzles
 - B. Turn nozzles on, and set pylons on the outer edge of the spray pattern
 - C. Measure the distance between the pylons with your measuring wheel
- 3. Measure ground speed**
 - A. You need to determine your ground speed by timing how long it takes to travel a measured distance. For simplicity sake we recommend measuring 1/100 of an acre. For example if

your swath width was 2.0m then your test run length should be 20.2m which equals 40.5m² or 1/100ac. Place pylons at either end and time how long it takes you to drive the test run distance.

4. Calculate water used to spray that distance

A. If it took 15.5 seconds to drive 1/100 of an acre, you will need to capture the water sprayed out of each nozzle for 15.5 seconds. Pour the water collected from each nozzle into a graduated measuring device. Continuing with this example, if you had 3 nozzles, you would need to collect water from all 3 nozzles individually for 15.5 seconds and measure the total combined amount of water.

B. The total amount of water captured from all of the nozzles will give you your total output water volume. For example 2.0L of water in 1/100 of an acre.

Once you have determined your output over a measured distance, we can now calculate how much product to put in the tank.

What we know: The unit sprays 2.0L over 1/100 of an acre

- 1. Calculate spray volume per acre:**
 $2.0L \times 100 = 200L/ac$ of water volume
- 2. Calculate the number of fills required to spray 1 acre**
 For example if you had a 20L tank and you know that your spray volume is 100L/ac;
 $200L/ac \div 100L = 2$ fills
- 3. Calculate how much product to put in each tank load**
 Check the herbicide label to find out how much product to apply per acre. In this example, the herbicide rate is 1L/ac.
 Divide herbicide rate by the number of tank loads;
 $1L/ac \div 2$ fills = 0.5L/tank



Range & Pasture™

Product	Packaging	Broadcast Rate/Ac <i>20 gal/ac or 81L/ac water volume</i>	Backpack/Spot Application Rate <i>Mixing in 10L water</i>
Restore II HERBICIDE	2 × 9.71L jugs/case	1 L/ac	24 ml
Reclaim HERBICIDE	1.84 kg Reclaim A 2 × 8L Reclaim B <i>Surfactant required - sold separately</i>	96 g/ac Reclaim A 0.8 L/ac Reclaim B <i>200 ml of non-ionic surfactant (provided you are using 81L/ac water volume)</i>	2.3 g (~1 tsp) Reclaim A 20 ml Reclaim B 20 ml Surfactant <i>Thoroughly and uniformly wet the foliage but not to the point of run-off.</i>
Grazon XC HERBICIDE	2 × 10L jugs/case	Broadleaf Weeds: 1.9 L/ac	Weed Rate: 67 ml <i>Apply to foliage until wet, up to the point of run-off</i>
Tordon 22K HERBICIDE	2 × 10L jugs/case	1.8 L/ac	50 ml <i>Apply to foliage until wet, up to the point of run-off</i> <i>For control of leafy spurge, field bindweed and toadflax only, a spot treatment rate of 90ml per 100m² may be used provided no more than 50% of a hectare is treated.</i>

Always read and follow label directions.

Watch the video at www.youtube.com/watch?v=0sBvkgR4MOo or go to www.youtube.com and search **Dow Small Sprayer Calibration**.



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