

HCPSL Legume Planter

Calibration

What you will need,

- 4 buckets
- tape measure
- weighing scales (grams)
- calculator
- Your row spacing

Step 1 - Collecting seed output

1. Choose the correct plates according to seed size
2. Pour a small quantity of seeds into all of the hoppers
3. Detach the seed distribution hose and place a bucket under each of the hopper outlets using the small hook provided
4. Measure out a straight 50 metre run on the ground (headland etc)
5. Choose a gear using the selector levers
6. Run the planter over 50m collecting beans in bucket
7. Weigh each bucket to check that seeds are being distributed evenly (remember to remove the weight of the bucket itself!)
8. Weigh the combined weight and calculate the kg/ha output using the calculation below.

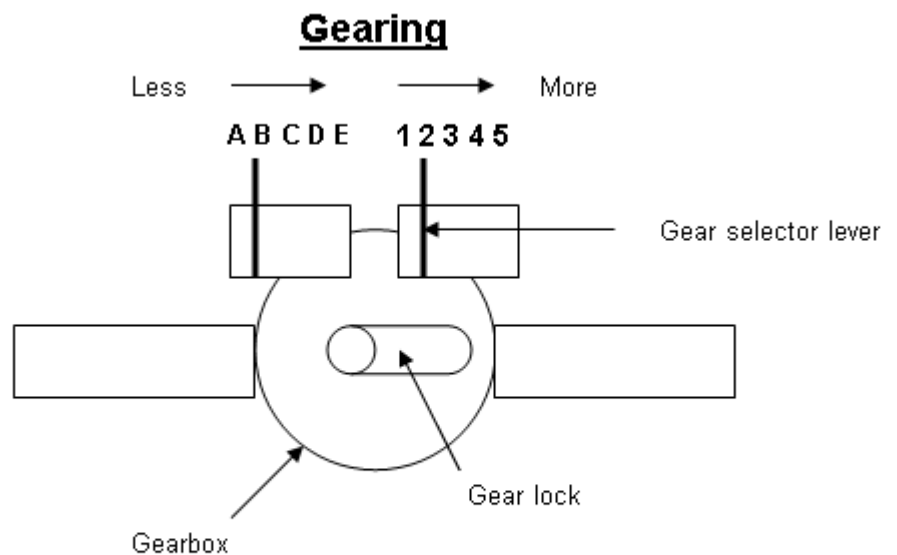
Step 2 - Calculating seed output (kg/ha)

1. Choose a multiplication factor from the table provided (see page 3) according to your row width (Example - 1.57m = 63.7)
2. Multiply the combined weight collected (kg) by the multiplication factor (Example - 0.440kg x 63.7 = 28kg)
3. The figure show is the kg/ha output with the current plates and gearing.

Your Calibration	1	2	3	
Row width	(metres)
Gearing	(see dia. below)
Multiplication factor (A)	(see table below)
Combined seed output (B)	(kg)
Seed output (A x B)	(kg/ha)

Row width (metres)	Multiplication factor
1.52	65.8
1.55	64.5
1.57	63.7
1.6	62.5
1.62	61.7
1.65	60.6
1.67	59.9
1.7	58.8
1.72	58.1
1.75	57.1
1.77	56.5
1.8	55.6
1.82	54.9
1.85	54.1
1.87	53.5
1.9	52.6

Multiplication factor =
 $10,000 / ((\text{row width} \times 2) \times 50\text{m})$



QUICK GUIDE*

Medium Plate (49 teeth)		Soybean	Cowpea
Gearing	No. Seeds / ha	kg/ha	kg/ha
A 1	150000 - 175000	23 - 27	13 - 18
A 3	190000 - 220000	29 - 34	17 - 22
B 3	215000 - 250000	33 - 38	19 - 24
C 1	170000 - 200000	26 - 31	16 - 21
C 3	210000 - 240000	32 - 37	19 - 25
D 1	195000 - 225000	30 - 35	18 - 23
D 3	260000 - 300000	40 - 46	25 - 30
E 1	270000 - 310000	42 - 48	26 - 31
E 4	405000 - 470000	62 - 72	40 - 47
Large Plate (35 teeth)		Lab Lab	<i>* Rates will vary according to seed size and row width.</i>
Gearing	No. Seeds / ha	kg/ha	
A 1	105000 - 125000	26 - 31	
A 3	135000 - 155000	33 - 38	
B 3	155000 - 180000	39 - 45	
C 1	120000 - 145000	30 - 36	
C 3	150000 - 170000	38 - 43	
D 1	140000 - 160000	35 - 40	
D 3	185000 - 215000	46 - 54	
E 1	195000 - 220000	49 - 55	
E 4	290000 - 335000	73 - 84	

General Details

Recommended Seeding Plate

Recommended plate sizes are a guide only. Check seed size and suitability to the recommended plates. Change plate size if required.

Medium Plate (49 teeth): Soybeans, Cowpea

Large Plate (35 teeth): Lablab

Recommended Seed rates

Seeding rates vary according to variety, seed size and germination rates. The figures below should only be used as a guide.

Soybeans 40–60kg/ha

Lab Lab 25–35kg/ha

Cowpeas 20–30kg/ha

Recommended planting depth

Planting depth will vary slightly according to soil moisture, soil type and other factors. The following recommendations are a general rule of thumb.

Soybeans 25mm (1")

Lab Lab 50mm (1"–2")

Cowpeas 50mm (1"–2")

Hire Fee: \$15/ha

A hire fee is charged for the use of the HCPSL legume planter to assist with maintenance costs. Hire fees are for the use of the legume planter only and do not include tractor, trailer, transport to and from farm or seeds.

DISCLAIMER – You should not rely on this publication without making independent inquiries. Except as required by law and only to the extent so required, none of the contributors make any representation or warranty, express or implied, as to, or shall in any way be liable (including liability in negligence) directly or indirectly for any loss, damages, costs, expenses or reliance arising out of or in connection with, the accuracy, currency, completeness or balance of (or otherwise), or any errors in or omissions from, any information, statement or forecast in this publication.