

### Trial 3. Canola Plant Density for Hyper-Yielding Canola (FAR WAK C22-03)

**Objectives:** To determine optimum plant density for hyper-yielding spring canola.

**Key points:**

- Plant density achieved was generally higher than the target plant density.
- There was no effect of plant density on canola grain yield or oil concentration.
- 23 -32 plants/m<sup>2</sup> was enough to achieve a similar yield to high seeding rates and at much lower cost.

**Treatments:** 45Y28 RR canola sown at four seeding rates to target 15, 30, 50 and 75 plants/m<sup>2</sup>.

**Table 1.** Grain yield (t/ha), % site mean, protein (%), test weight (kg/hl) and screenings (%).

Target Seed Rate (m <sup>2</sup> )	Plants (m <sup>2</sup> )	Yield and quality		
		Yield (t/ha)	Oil %	Protein %
15	23	3.25 a	49.6 a	17.4 a
30	32	3.43 a	49.5 a	17.9 a
50	63	3.47 a	49.2 ab	17.8 a
75	96	3.47 a	48.9 b	18.0 a
Mean		3.40	48.8	17.8
LSD 0.05		0.56	0.42	0.67
P Val		n.s.	n.s.	n.s.
CV		10.6		

**Table 2.** Trial management details.

<b>Sowing date:</b>		<b>20 April 2022</b>
<b>Variety:</b>		45Y28 RR
<b>Target plant density:</b>		As per treatments
<b>Sowing Fertiliser:</b>		80 kg/ha MAP + 50 kg Urea/ha (31 kg N/ha, 17 kg P/ha, 12 kg S/ha)
<b>Nitrogen:</b>	6 Leaf	83 kg N/ha + 13 kg S/ha (Urea + SOA)
	Bud Visible	67 kg N/ha (Flexi-N)
<b>Fungicide:</b>	20% Bloom	Aviator Xpro 0.80L/ha