

B3 Disease Management, MRZ Wimmera (Pimpinio), Victoria

Aim

To investigate the effect of chocolate spot and rust management strategies across a range of faba bean varieties in standing and slashed stubble treatments.

Experimental Treatments

Varieties: PBA Samira, AF05095-1, AF06125, AF07125, AF09167, Farah, Nura, PBA Rana.

Fungicide Regimes:

Treatment	Chemical and Application Rate¹	Timing
Nil	Nil	Nil
Double Choc (Cx2)	carbendazim 500 @ 500ml/ha	Early and late flower
Triple Choc (Cx3)	carbendazim 500 @ 500ml/ha	Early, mid and late flower
Complete (Com)	mancozeb 800 @ 2kg/ha chlorothalonil 720 @ 2L/ha carbendazim 500ml/ha	mancozeb + chlorothalonil applied fortnightly from 6-8 weeks after emergence All 3 chemical applied fortnightly during flowering.
Rust (Rx2)	Tebuconazole 430 @ 350ml/ha	6-8 weeks after emergence and early flower
Rust (Rx3)	Tebuconazole 430 @ 350ml/ha	Early, mid and late flower

1. Refers to application rate of the product

Other Details

Sowing date: 9 May.
Row Spacing: 30 cm.
Fertiliser: MAP @ 80 kg/ha at sowing.
Plant Density: 20 plants/m².
Stubble: Standing (approximately 15cm tall)

Results and Interpretation

- Key Message: Disease was not significant in 2014. AF05095-1 continued to show increased susceptibility to brackling compared other varieties.
- Establishment, Plant Growth and Disease – Establishment was generally adequate, although some mouse damage occurred throughout the trial. Early plant growth was good, but due to the dry conditions, disease development was slow. Early chocolate spot and cercospera were noted, but did not progress to epidemic levels as conditions dried out in spring and several frosts were experienced. A heat wave in late spring resulted in brackling (necking). AF05095-1, showed significantly worse symptoms than all other varieties in the trial, similar to observations in previous seasons (Figure 1).
- Grain Yield– Due to low disease levels there was not grain yield response observed across the disease management treatments in these trials. The main effect of variety was significant with AF07125, highest yielding and PBA Rana lowest.

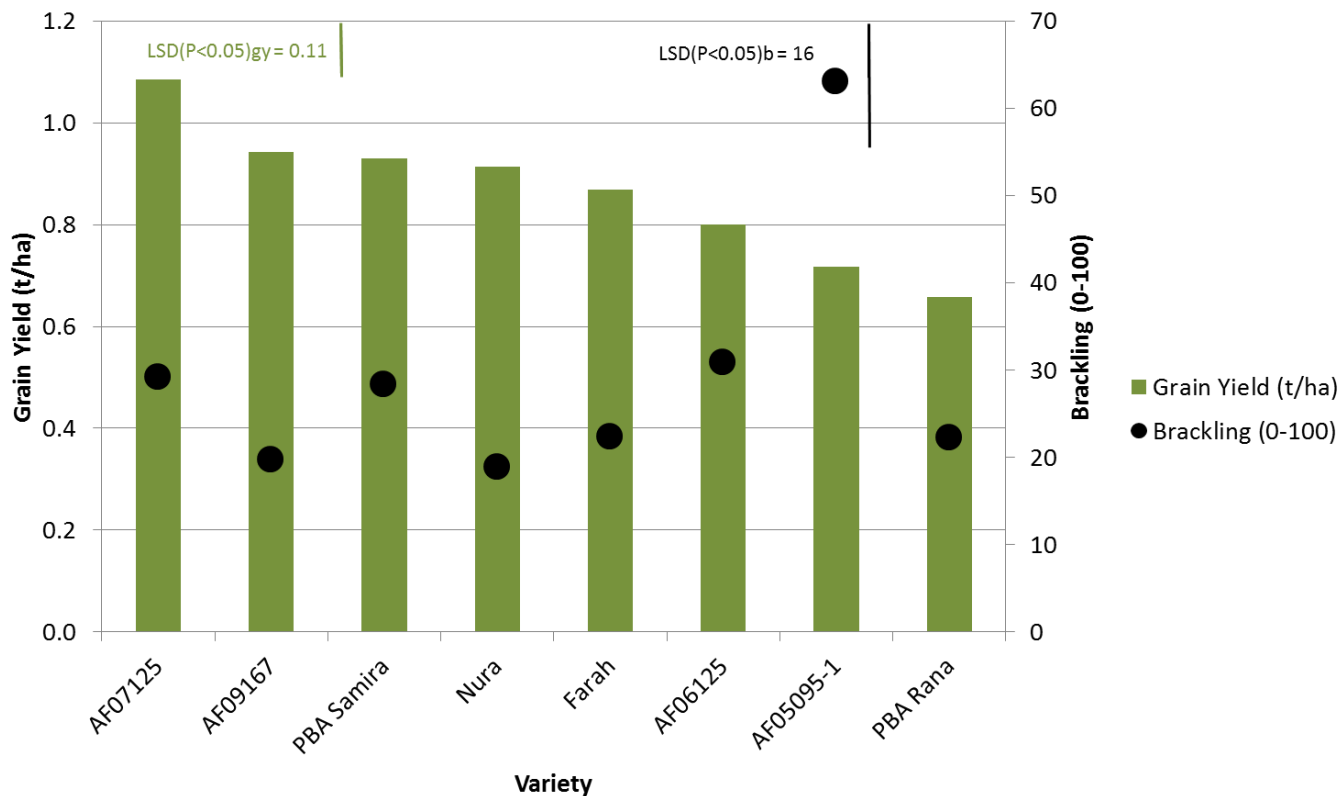


Figure 1. Brackling Score (0, no symptoms; 100, crop fully brackled) and grain yield (t/ha) of faba bean varieties grown at Pimpinio in 2014 in a disease management trial.