

Insect suction trap – aphid data from 2016 to 2018

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Key findings to date

**NOTE* This data has been collected from one site only. Other locations may show slightly different trends due to environmental conditions and the surrounding landscape / crops.*

- Green peach aphid numbers have been increasing over the three sampling seasons. Numbers peaked at 200 green peach aphids per week in October 2018. This is more than double the population collected in October 2017.
- Russian wheat aphid was first detected in SA in 2016. Numbers were low in the first season reaching a maximum of 9 collected in one week by November 2016. In late 2017 these number increased (15 – 90 per week) to similar levels of green peach aphid. However, in 2018 there has been a decrease in Russian wheat aphid numbers.
- This long-term monitoring also shows the timing of aphid flights shifts several weeks between years.

Why do the research?

There are a range of new technologies being developed for the detection of pests affecting the grains industry.

The insect vortex suction trap (photo right) is one such example.

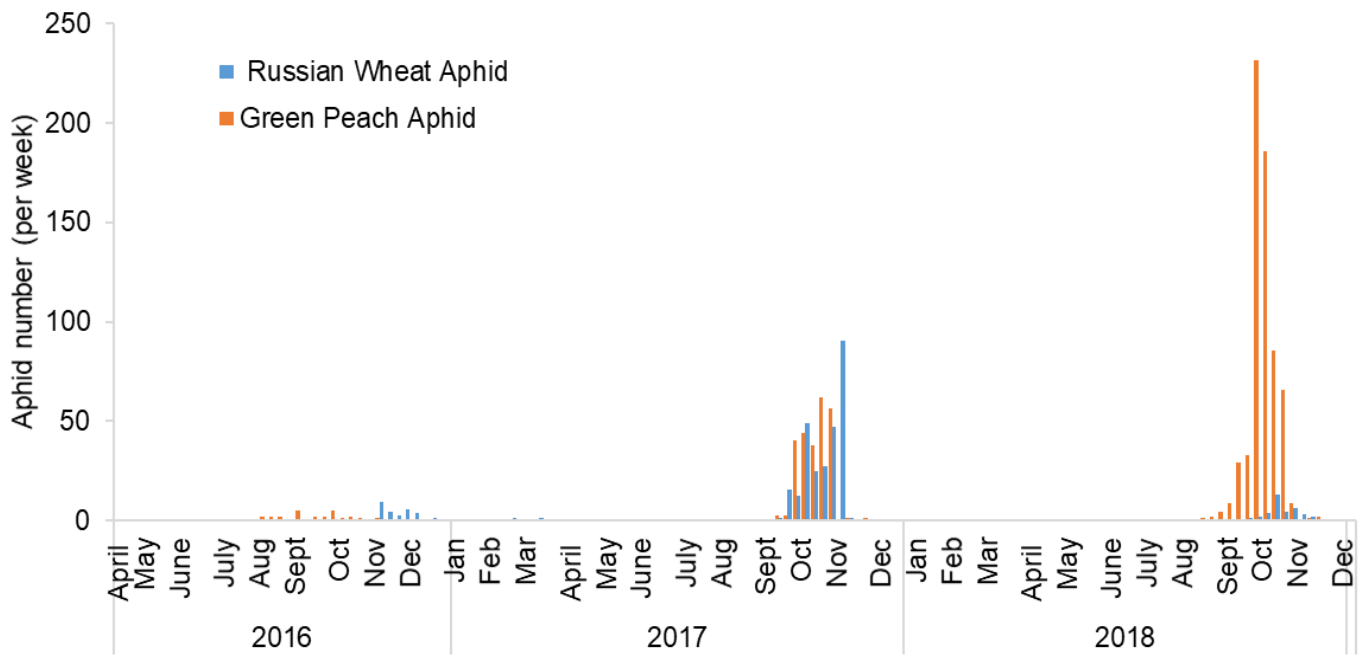
This trap has 1.5 to 1.7 m vertical sampling heights and as insects fly over the silver cylinder they are sucked into the trap and collected in a cup.

Each cup on the carousel samples a 24-hour period (1 day).

Below is a summary of green peach and Russian wheat aphid numbers since the trap was deployed in April 2016.

Suction trap location: Kapunda, SA





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