

THE 2020 SEASON AT HART

PREPARED AUGUST 28, 2020

The Mid-North had a promising start to the season receiving above average summer rainfall. This meant there was stored soil moisture available leading into the growing season (Figure 2).

Seeding at Hart commenced on the April 20, utilising an optimal sowing window for early sown wheats. Majority of Hart's trial program was sown early to mid May, with the final plots sown May 29.

The site received above average rainfall during April, with 60 mm. Although there was an optimistic start to the seeding program, well below average rainfall of 19 mm was received for May (Figure 1) affecting early crop establishment in some trials.

Rainfall received on site for both June and July was well under average, with a combined total of 38.4 mm.

For August to date, we have received 67.5 mm rainfall, relieving crops from both moisture and nitrogen stress (Figure 3).

Currently, Hart has received 281 mm annual rainfall (average 400 mm) and 183 mm of growing season rainfall (GSR average 300 mm). This is significantly higher compared to this time in 2019, with 154 mm annual rainfall and 144 mm of growing season rainfall. Current plant available water is 77 mm, up from 40 mm in August last year.

Yield prophet® is currently predicting above average yields of 3.7 t/ha for Scepter wheat sown on May 1. The traditional French & Schultz model is estimating similarly at 3.5 t/ha. For the remaining growing season, spring rainfall will continue to play an important role in determining crop yield potential for 2020.

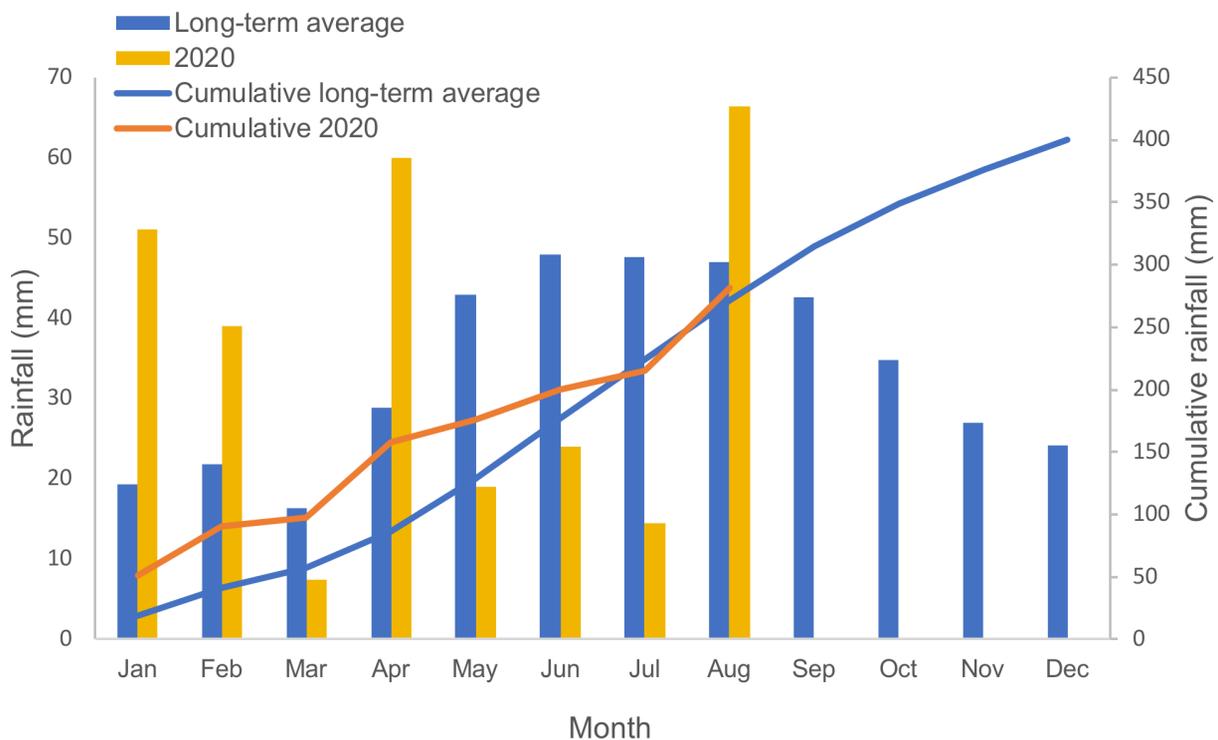


Figure 1. Hart rainfall graph for the 2020 season to date and long-term average. Lines are displayed to present cumulative rainfall for long-term average (blue) and 2020 (orange).

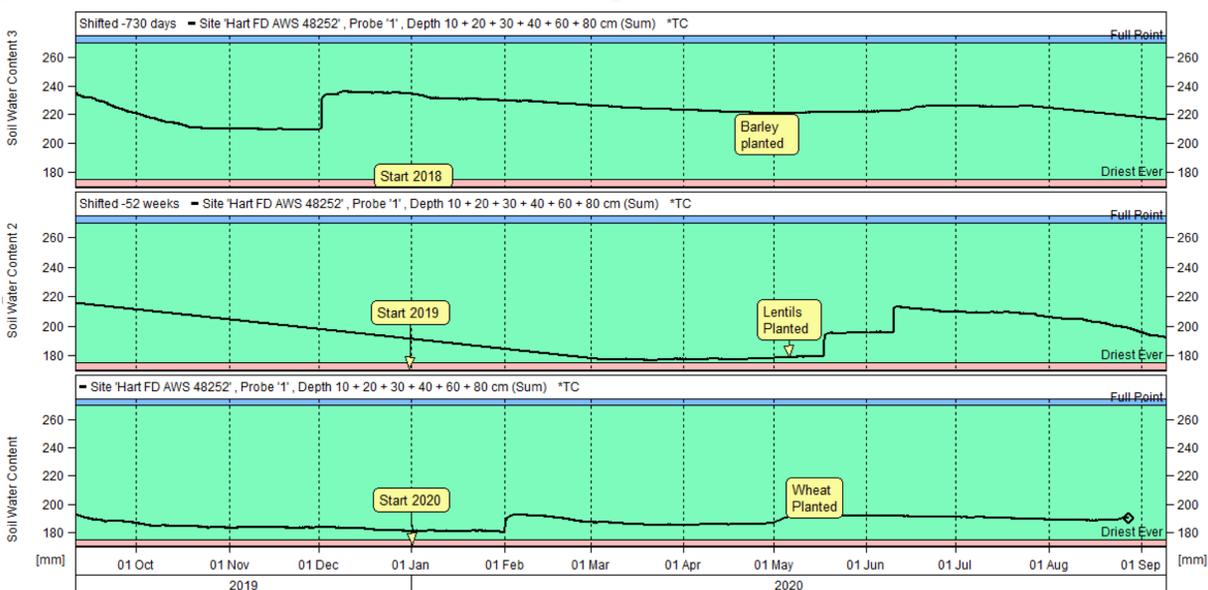


Figure 2. Soil moisture probe summed comparison (80 cm) for 2018 (top), 2019 (middle) and 2020 (bottom) at the Hart field site. Hart soil moisture data is free to view via Agbyte <http://www.hartfieldsite.org.au/pages/live-weather/soil-moisture-probe.php>



Figure 3. Image of the Hart field site, August 18, 2020.