Almond Board of California - Disease Forecasts in cooperation with the University of California

Table 1. Daily risk assessment disease forecasts for Thursday, June 23 through Wednesday, June 29, 2022*

No.	County	Region	Alternaria leaf spot (date, value, level), 7-day index summary (risk)^	Anthracnose (date, value, level), 5-day index summary (risk)^	Bacterial spot (date, value, level), 7-day index summary (risk)^
1	Butte	West	0	6-23 (1.34), High risk; 5-day index 1.34 decreasing to 0	6-23 (0.99), High risk; 7-day index holding at 0.99
2	Colusa	East	0	0	0
3	Fresno	Central	0	0	0
4	Fresno	East	6-23 (0), Low risk; 7-day index decreasing to 0	6-23 (3.37), High risk; 5-day index 3.37 decreasing to 0	6-23 (0), High risk; 7-day index 1.92 decreasing to 0
5	Fresno	West	0	0	0
6	Kern	Central	0	6-23 (0), Low risk; 5-day index 0.26 decreasing to 0	6-23 (0), High risk; 7-day index 0.79 decreasing to 0
7	Kern	East	0	6-23 (0), High risk; 5-day index 3.34 decreasing to 0	6-23 (0), High risk; 7-day index 6.25 decreasing to 0
8	Kern	West	0	0	0
9	Madera	Central	0	6-23 (0), High risk; 5-day index 1.2 decreasing to 0	6-23 (0), High risk; 7-day index 1.68 decreasing to 0
10	Merced	Central	0	0	0
11	Stanislaus	Central	0	0	0
12	Stanislaus	East	0	0	0
13	Stanislaus	West	0	6-23 (0.26), Low risk; 5-day index 0.26 decreasing to 0	6-23 (0.64), High risk; 7-day index 0.64 decreasing to 0

* - 5- and 7-day forecasts are based on temperature (inside- and outside-canopy measurements), precipitation, and leaf wetness which are powered by the Semios® precision farming platform.

^ - Numerical risk is scaled as follows: 0 = no risk, 1 = action threshold (Note: values may exceed 1 due to hourly accumulations).

Note: In this updated table, the order of some regions was changed from previous reports to match the RADAR on-line report and to minimize errors in the summary table.

Industry Advisory - Summary for Selected Almond Growing Regions

Because precipitation occurred on 6-22 in Butte-W (0.05 mm), Fresno-E (0.19 mm), Kern-C (0.04 mm), Kern-E (3.5 mm), and Madera-C (0.66 mm), and on 6-23 in Stanislaus-W (0.35 mm), the models for anthracnose and bacterial spot went to mostly high risk for these locations. Without repeated rainfall or extended high precipitation, the risk of these diseases becoming a problem is low. Other locations are at 0 risk for anthracnose and bacterial spot. For Alternaria leaf spot, the risk is predicted as 0 to low (i.e., Fresno-E) for the coming week. No precipitation is forecasted after 6-23 for all locations.

Overall, the forecasts are subjected to the amount and duration of precipitation (leading to leaf wetness) and realized temperatures. Forecasted temperatures are warmer in the coming week (24.4 to 32.5 C) in all regions (Table 2). This will result in an increase in disease pressure for anthracnose and bacterial spot if additional rainfall occurs. Overall, disease pressure has slightly increased this past week with the scattered precipitation for many almond growing regions of the state (Table 1). In summary, continue to scout the orchards and be on your guard especially if additional rainfall occurs.

The website https://www.ag-radar.com (password: Almondboard2022) displays actual and forecasted disease risk assessments for each region. Because these are regional forecasts, precipitation may vary with region and differ for the forecasted rainfall. Please check https://www.ag-radar.com for up to date daily forecasts. Historical records and experience for specific locations should be considered. This advisory will be updated weekly.

"2022 Fungicide Efficacy Tables" were posted at http://ipm.ucanr.edu/PDF/PMG/fungicideefficacytiming.pdf on 3-21-22 and at https://cfn-fungicides.ucr.edu/efficacy-tables on 5-1-22.

Note: Maps for all regions listed in Tables 1 and 2 are provided in Figs. 1 to 3.
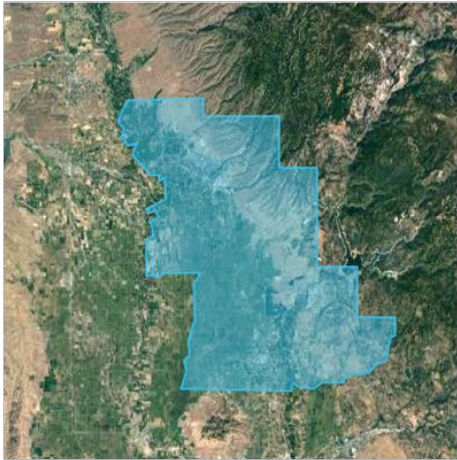
Table 2. Forecasted weather for Thursday, June 23 through Wednesday, June 29, 2022*

No.	County	Region	Date	Avg Temp (in canopy) °C	Avg Humidity (%)	Precip. (mm)	Leaf Wetness (hours/day)
1	Butte	West	6-23 to 6-29	26.2 to 30.8	19.7 to 48.0	0	0
2	Colusa	East	6-23 to 6-29	25.4 to 29.5	25.1 to 39.0	0	0
3	Fresno	Central	6-23 to 6-29	26.6 to 31.3	20.0 to 49.5	0	0
4	Fresno	East	6-23 to 6-29	26.9 to 31.6	21.5 to 45.1	0	0
5	Fresno	West	6-23 to 6-29	26.6 to 31.2	16.3 to 31.7	0	0
6	Kern	Central	6-23 to 6-29	27.4 to 30.9	20.6 to 47.0	0	0
7	Kern	East	6-23 to 6-29	27.6 to 32.5	19.6 to 49.4	0	0
8	Kern	West	6-23 to 6-29	27.4 to 31.5	20.2 to 42.6	0	0
9	Madera	Central	6-23 to 6-29	26.0 to 30.7	22.4 to 40.3	0	0
10	Merced	Central	6-23 to 6-29	25.4 to 30.2	22.3 to 44.5	0	0
11	Stanislaus	Central	6-23 to 6-29	24.4 to 28.5	23.6 to 42.5	0	0
12	Stanislaus	East	6-23 to 6-29	24.7 to 29.3	24.1 to 47.2	0	0
13	Stanislaus	West	6-23 to 6-29	24.8 to 28.9	19.0 to 43.1	6-23 (0.35)	0

Note: In this table, the order of regions is the same as Table 1 and was generated using the RADAR on-line forecasted report powered by the Semios® precision farming platform. The ranges of average temperatures, relative humidity values, precipitation, and leaf wetness are not sequential with dates, but the high and low values are within the forecasted week.

Fig. 1. Maps of counties and regions (alphabetically listed).

Butte West

Colusa East

Fresno Central

Fresno East

Fresno West

Fig. 2. Maps of counties and regions (alphabetically listed).

Kern Central

Kern East

Kern West

Madera Central

Fig. 3. Maps of counties and regions (alphabetically listed).

Merced Central

Stanislaus Central

Stanislaus East

Stanislaus West