REDUCING SPRAY DRIFT AND INCREASING SPRAY DAYS WITH REDBALL-HOODED™ SPRAYERS – A DRIFT COMPARISON OF A REDBALL-HOODED BOOM VERSUS AN OPEN BOOM, AND AN OVERVIEW OF AVAILABLE LEGAL SPRAY DAYS IN 2018

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Abstract

Applicators need a safe and effective way to spray chemical applications to help maintain a healthy environment and to ensure a successful crop. Redball® Gen II Broadcast Hoods and Redball-Hooded™ Sprayers reduce drift. The unique hood design helps enclose the spray pattern reducing pesticide exposure to the wind and improving overall coverage. To illustrate the difference in drift between a Redball-Hooded boom and an open boom, Willmar Fabrication tested a spray boom that features Redball Hoods on half and an open boom on the other. The boom had a 10-gallon tank filled with water. Fans were used to stage 10 miles per hour (mph) and 15 mph wind speeds. Water sensitive paper was placed 10 feet downwind from each side of the sprayer at 12" and 24" above the crop canopy. Each side of the sprayer ran for 10 seconds using AIXR 11003 Very Coarse Tips. The water sensitive paper downwind changed colors when contacted with water (which represents drift in this test). The test was repeated with XR 11003 Fine Tips in both the Redball-Hooded boom and open boom. The water sensitive paper downwind from the Redball-Hooded boom indicated significantly less drift when compared to the same on an open boom whether wind speeds were 10 mph or 15 mph, or AXIR and XR Tips were used. Along with reducing drift, it's equally important to apply chemical applications during the most optimal time. Willmar Fabrication tracked rain, wind and temperature during May, June and July across the United States and analyzed the data to determine available optimal spray days in 2018.