

**Response of Maturity Group IV late Xtend soybean cultivars to stem canker, 2019.**

<b>Company/Cultivar<sup>1</sup></b>	<b>Stem canker rating<sup>2,3</sup></b>	<b>Cultivar designation<sup>4</sup></b>
AgriGold G4990RX (check)	0.0	R
Petrus Seed 4916 GT (2018 check)	2.7	MR
AgriGold G4815RX	0.1	R
AGS GS47X19	1.4	R
*AGS GS48X19	0.1	R
AGS GS49X19	0.1	R
*Armor 49-D66	0.0	R
Armor X47D18	0.0	R
Armor X47D85	0.9	R
Armor X48D25	0.5	R
Armor X49D67	0.0	R
Asgrow AG47X9	0.1	R
Asgrow AG48X9	0.0	R
Asgrow AG49X9	0.0	R
Credenz CZ 4869X	0.3	R
Credenz CZ 4979X	0.2	R
Delta Grow 47X95	0.0	R
Delta Grow 48X05	1.2	R
Delta Grow 48X45	0.5	R
Delta Grow 48X95	0.2	R
Delta Grow 49X15	0.0	R
Don Mario 47X01	0.0	R
Don Mario 49J3X	0.2	R
Dyna-Gro S47XT20	0.7	R
Dyna-Gro S48XT56	0.2	R
Dyna-Gro S49XT39	0.5	R
Dyna-Gro S49XT70	0.0	R
Great Heart Seed GT-4764XS	0.0	R
Great Heart Seed GT-4802X	0.4	R
Great Heart Seed GT-4833XS	0.3	R
Great Heart Seed GT-4979X	0.0	R
LG Seeds C4845RX	0.0	R
LG Seeds LGS4899RX	0.2	R
LG Seeds LGS4931RX	2.2	R
*Local Seed LS4798X	0.0	R
Local Seed LS4889XS	0.5	R
Local Seed LSX4798X	0.0	R
Local Seed LSX4801XS	0.5	R
Local Seed LSX4901X	0.0	R
Mission Seed A4950X (MEX 4908)	0.5	R
MorSoy MS 4846	0.0	R
NK S47-Y9X	0.5	R
NK S49-F5X	0.0	R
Pioneer P48A60X	0.0	R
Progeny Ag P4799RXS	0.0	R
Progeny Ag P4816RX	0.9	R
Progeny Ag P4821RX	0.1	R
Progeny Ag P4851RX	0.3	R
Progeny Ag P4999RX	0.2	R
Terral REV 4927X	0.2	R
Terral REV 4940X	0.0	R
USG 7470XTS	0.0	R
USG 7489XTS	0.2	R
USG 7496XTS	0.2	R
LSD (0.05)	1.4	
CV (%)	327.2	
P-value for F-statistic	0.4803	

<sup>1</sup>An asterisk (\*) denotes a variety that was supplemented for the purposes of gaining additional information on varieties that may be planted in the MS soybean production system but were not a part of the 2019 MSU OVT program.

<sup>2</sup>Stem canker reaction-10 plants per plot were inoculated with infested toothpicks. Ratings were given by individual plant reaction using a modified 0-9 scale based on lesion severity and are presented as the average for the eight plants. Where a lesion did not appear, a rating of 0 (Resistant) was assessed. Ratings were assessed based on the presence of a lesion whereby a reaction that produced a visible lesion that did not expand up the length of the stem was assessed as a 1. Dead plants with lesions that extended up most of the plant's length received a score of 9.

<sup>3</sup>Means followed by the same letter(s) within a column are not significantly different according to Fisher's Protected LSD ( $P=0.05$ ).

<sup>4</sup>By using the Mean Disease Rating, a standardized designation system is as follows: 1 = Resistant, 3 = Moderately Resistant, 5 = Moderately Susceptible and 7 = Susceptible.