

Pea Fungicide Trial

Trial ID: 2022-PF08 – R.M. of Swan Valley

Objective: Quantify the agronomic and economic impacts of a single vs. double foliar fungicide application in field peas.

Summary: Foliar and stem ascochyta were present throughout the trial. There was a significant yield increase of 2.8 bu/ac for peas with a double fungicide application compared to peas with a single fungicide application. This increase was more than enough to pay for the cost/ac from a single application of fungicide at all market prices listed, except the lowest range of the long-term average.

Trial Information

Treatment	Dyax vs Dyax+Delaro
Application Timing	Early Flower / End Flower
Application Date	July 6 / July 18
Application Rate	60 ac/jug and 356ml/ac
Application Method	Broadcast
Soil Texture	Clay Loam
Previous Crop	LL Canola
Tillage	Conventional
Seeding Date	May 12
Variety	Inca
Seeding Rate	4.2 bu/ac
Row Spacing	12"
Plant Stand @ R4	294,000 plants/ac
Harvest Date	August 27

Precipitation (mm)

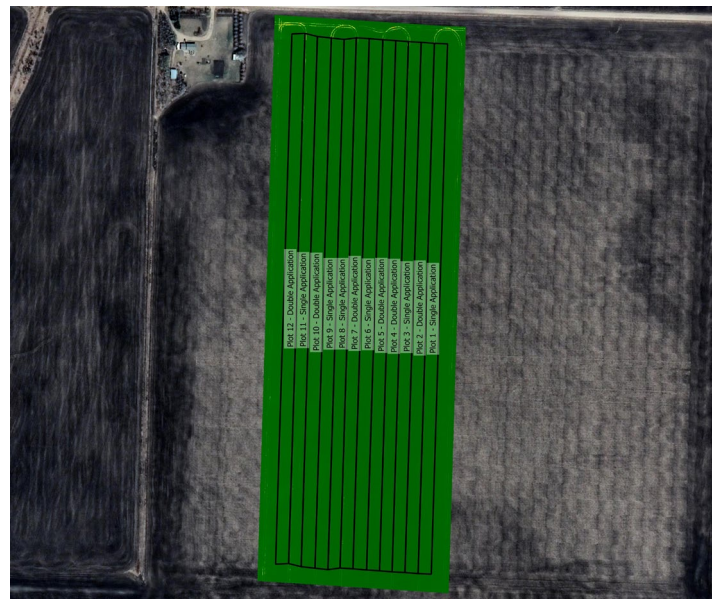
	May	Jun	Jul	Aug	Total
Rainfall	114.1	59.7	42.7	41.9	258.4
Normal	45.4	84.2	85.6	68.3	283.5
% Normal	251%	71%	50%	61%	91%

Summary of Disease Rating (R4) †

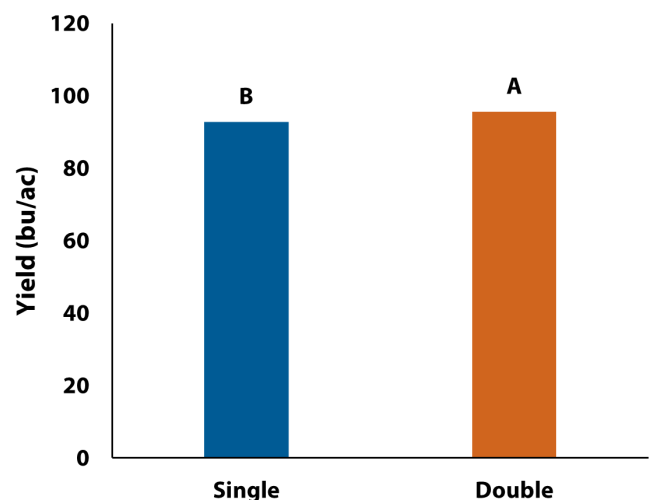
	Foliar Ascochyta		Stem Ascochyta	
	Single	Double	Single	Double
Incidence	100%	95%	70%	62%
Severity	3.5	2.3	1.7	1.6

† Foliar and stem ascochyta are rated on a scale of 1 (no symptoms) to 7 (stunted/dead plants).

NDVI Field Image July 26



Yield by Treatment





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Overall Yield & Economics

	Mean (bu/ac)	Cost †	Change in Profit/ac ^{††}	
			Long-Term Average (\$5.33-\$11.47/bu)	Current Conditions (\$11-\$13/bu)
Double Application	95.6	\$37/ac	-\$4/ac to \$14/ac	\$12/ac to \$18/ac
Single Application	92.8	\$18.50/ac		
Yield Difference	2.8			
P-Value	0.0022			
CV	2.4%			
Significance	Yes	Economic	Yes^{†††}	Yes

† Based on MB Agriculture 2022 *Cost of Production Guidelines* and industry prices; treatment cost only, does not include application cost.

†† Change in profit/ac is calculated from profit gained or lost due to yield differences, treatment cost/ac, and market prices; Long-term average prices are based on Manitoba Agriculture's Historical Manitoba Crop Prices (2017-2021).

††† Economic at the higher range of long-term average prices.