

## Pea Fungicide Trial

**Trial ID:** 2021-PF01 – R.M. of Roland

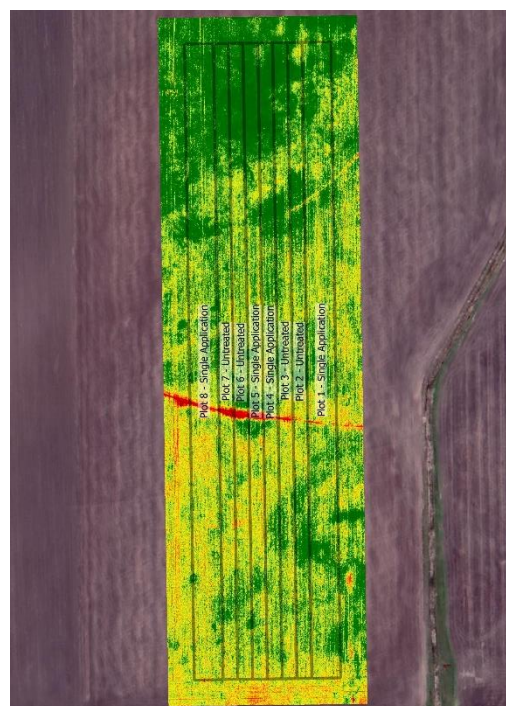
**Objective:** Quantify the agronomic and economic impacts of a single foliar fungicide application in field peas

**Summary:** The pre-spray check (R1) did not indicate an application of fungicide was necessary. No foliar or stem ascochyta and no white mould symptoms were observed after fungicide application, at R3. There was no significant yield difference between peas with and without a single application of Cotegra. As a result, profit/ac in the treated area of the trial decreased by the cost of fungicide application.

### Trial Information

<b>Treatment</b>	Cotegra
<b>Application Timing</b>	Early Flower
<b>Application Date</b>	June 26
<b>Application Rate</b>	280 ml/ac
<b>Application Method</b>	Broadcast
<b>Soil Texture</b>	Clay, Fine Sandy Loam
<b>Previous Crop</b>	Dry Beans
<b>Tillage</b>	Zero Till
<b>Seeding Date</b>	April 27
<b>Variety</b>	CDC Lewochko
<b>Seeding Rate</b>	180 lbs/ac
<b>Row Spacing</b>	10"
<b>Plant Stand @ R3</b>	221 000 plants/ac
<b>Harvest Date</b>	August 2

### NDVI Field Image July 13



### Precipitation (mm)

	May	Jun	Jul	Aug	Total
<b>Rainfall</b>	29	104	17.9	77.7	228.8
<b>Normal</b>	53.8	80.6	65.7	71	271.1
<b>% Normal</b>	54%	129%	27%	109%	84%

### Results from the Pre-Spray Check (R1)

Category	Average Rating <sup>†</sup>	Explanation
<b>Crop Canopy</b>	15	Normal (~8 plants/ft <sup>2</sup> )
<b>Leaf Wetness/Humidity @ 12 pm</b>	0	No leaf wetness
<b>5-Day Weather Forecast</b>	10	Unpredictable
<b>Ascochyta Symptoms on Peas</b>	0	No visible symptoms
<b>Total Score</b>	<b>25</b>	<b>No application recommended</b>

<sup>†</sup> Ratings taken at six locations in the field and average together to assess overall field risk



## Summary of Disease Rating (R3)<sup>†</sup>

	Foliar Ascochyta		White Mould	
	UN	SGL	UN	SGL
<b>Incidence</b>	0%	0%	0%	3%
<b>Severity</b>	0.0	0.0	0.0	0.0

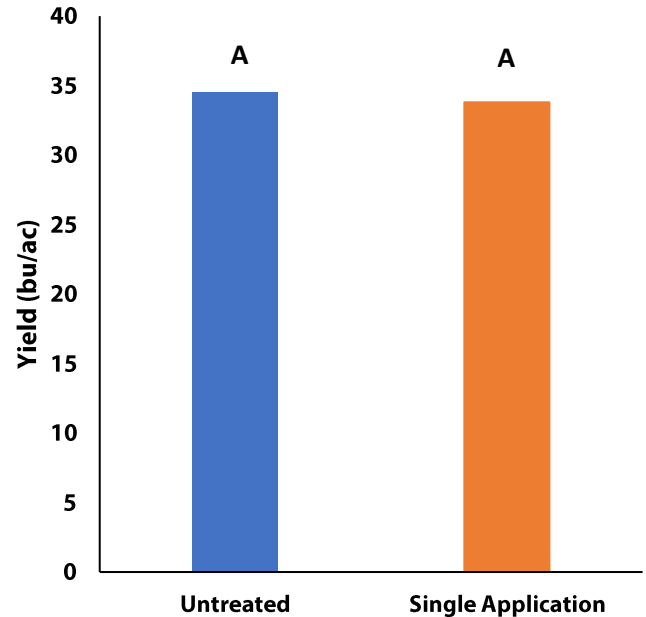
<sup>†</sup> SGL=Single application; Foliar ascochyta  
1 – 7 rating scale, stem ascochyta 1-7 rating scale

## Observations (R3)



No foliar disease symptoms were observed at R1 during the pre-spray check, or post-fungicide application at R3, during disease rating (pictured left).

## Yield by Treatment



## Overall Yield & Economics

	Mean (bu/ac)	Cost <sup>†</sup>	Change in Profit/ac <sup>††</sup>
<b>Single Application</b>	33.8	\$17/ac	-\$17/ac
<b>Untreated</b>	34.5		
<b>Yield Difference</b>	-0.7		
<b>P-Value</b>	0.5087		
<b>CV</b>	3.6%		
<b>Significance</b>	<b>No</b>	<b>Economic</b>	<b>No</b>

<sup>†</sup> Estimated cost; represents product only, does not include application cost

<sup>††</sup> Because yields were not significantly different, there is no increased income to offset the cost of the fungicide. Profit/ac declines by the cost of the fungicide application.