

Wheat Plant Growth Regulator

Trial ID: 2020-WPGR08 — R.M. of Louise

Objective: The purpose of this project is to quantify the impact of the plant growth regulator Manipulator[™] 620 (chlormequat chloride) on plant height, lodging, yield and quality of spring wheat

TRIAL INFORMATION				
Treatment	Manipulator™ 620 vs. Untreated			
Location	Crystal City			
Previous Crop	Canola			
Soil Texture	Clay Loam			
Tillage	Minimal Tillage			
Planting Date	May 20, 2020			
Variety	AAC Redberry			
Row Spacing	7.5″			
Seeding Rate	131 lbs/ac			
Residual N				
Fertilizer (N-P-K-S)	120N 40P 15K			
Application Date	June 16, 2020			
Application Timing	5L			
Application Rate	0.7 L/ac			
Harvest Date	August 26, 2020			
PRECIPITATION ⁺				

	May	June	July	Aug	Total
Rainfall	46	36	174	31	287
Normal	62	86	66	79	293
+Growing season precipitation (mm)					

WHEAT RESPONSE						
	Plant Height (cm)	Lodging				
		Incidence (%)	Severity (1-10)	Protein %		
Manipulator [™] 620	82	50	6	16.3		
Untreated	85	50	6	15.6		

OVERALL YIELD				
	Mean (bu/ac)			
Manipulator™ 620	57.4			
Untreated	56.6			
Yield Difference	0.8			
P-Value	0.062			
CV	3.4%			
Significance	No			





Summary: There was no significant yield difference between the Manipulator™ 620 plant growth regulator application and the untreated check. There was a significant reduction in plant height due to the plant growth regulator application. There was lodging observed within the trial, due to heavy rainfall in July storms.



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MANITOBA CROP

Phone: 204-745-6661 Website: mbcropalliance.ca Email: hello@mbcropalliance.ca