



# Phosphorus Rates in Strip Till

## Huron Soil Conservation District, Elkton - 2013

<b>Trial Quality:</b> Good	<b>Soil Info:</b> Loam	<b>Rhizoc Control:</b> Good Control: Quadris 6-8 leaf
<b>Variety:</b> HM-28RR	<b>Fertilizer:</b> Strip Till: See treatments; 2x2: 30# of N; I.F.: Zn and Mn; S.D.: 30# of N	<b>Cerc Control:</b> Fair/Good Control: 1. Inspire XT + Kocide, 2. Headline + EBDC, 3. Eminent
<b>Planted:</b> May 6	<b>Prev Crop:</b> Soybeans	<b>Other Pests:</b> None
<b>Harv/Samp:</b> Oct 4 / Oct 1	<b>Weather:</b> Dry summer	
<b>Plot Size:</b> 4 reps		
<b>Row Spacing:</b> 30 inch		
<b>Seeding Rate:</b> 53,000		

Treatment	\$/A	RWSA	RWST	T/A	% Sugar	% CJP	Population 100 Ft. 31 Day
No P 15-0-15	\$1,623	8922	284	31.4	18.7	96.2	194
High Rate of P 15-40-16	\$1,619	8906	272	32.7	18.0	96.2	188
Low Rate of P 15-14-16	\$1,578	8682	276	31.5	18.1	96.4	190
Average	\$1,607	8837	277	31.9	18.3	96.3	191
LSD 5%	—	ns (948)	ns (12)	ns (3.2)	ns (0.7)	ns (0.6)	ns (25)
CV %	—	6	2	5.8	2.0	0.4	8

**Comments:** Trial was established by the Huron County Soil Conservation District to look at reducing phosphorus rates on medium/high testing P soils. Field was zone tilled in the fall of 2012 with an established cereal rye cover crop. A burn down herbicide was applied to the cereal rye 4 days before planting. On the day of planting, a strip tiller was used on the field which placed the 3 different P rate treatments 6 inches deep in the soil. The three P rates were 0, 14, and 40 pounds per acre of P<sub>2</sub>O<sub>5</sub>. Later that same day, the field was planted into the strips. The planter applied the same 2x2 starter to all three treatments which contained no phosphorus (only 30# N). Average Bray P1 soil levels are as follows: No applied P strips 41.6 ppm, Low Rate strips 47.3 ppm and High Rate strips 45.6 ppm. Nitrate soil test averaged a 50 lb/acre N credit. Total nitrogen available was 125 lbs/acre from fertilizer and N credit. No visual differences in growth seen during the season. No significant differences shown on yield or quality.

**\$/A:** Gross payment unless noted as net. Calculated assuming a \$50 payment and an average RWST of 275.

**Bold:** Results are not statistically different from top ranking variety in each column.