

Corn Response to Pelletized Lime Trial 2005

Table 2.

Corn Response to Pelletized Lime

Treatment			2005 Yield	Significant Difference	Yield Gain Over Control	Gross Dollar Value* per Acre	3-Year Ave. Yield Bushels/Acre
Corn Fertilizer Program w/ Pellet Lime	250 lbs <i>Pellet Lime</i> 100 lbs Potash 125 lbs MAP 150 lbs Nitrogen (Actual N)	1	156.88 bu	YES	14.93 bu	\$313.75	190.76 bu
Standardized Fertilizer Program	100 lbs Potash 125 lbs MAP 150 lbs Nitrogen (Actual N)	2	147.6 bu	–	5.65 bu	\$295.20	180.9 bu
Pellet Lime/Nitro-	250 lbs <i>Pellet Lime</i> 150 lbs Nitrogen (Actual N)	3	155.4 bu	YES	13.45 bu	\$310.80	183 bu
Nitrogen Only (Control)	150 lbs Nitrogen (Actual N)	4	141.95 bu	–	–	\$283.90	170.30 bu
LSD (P=.05) C.V.			2.347 bu .98%	Additional Test Notes: Ave. soil pH = 6.3; P levels “High; K levels “High” *Corn \$2.00/Bu; Potash \$11.20/cwt; MAP \$18/cwt; Pellet Lime \$5/cwt; Urea \$17.50/			

Comments

The results in the third year of this study show that **Treatment 1 with Pellet Lime** out yielded **Treatment 2 without Pellet Lime** by nearly **9.28 bushels/acre**. The three year average difference is over 10 bushels per acre. This difference is statistically significant and shows what the addition of Pellet Lime can contribute towards maximizing yields. For two consecutive years and perhaps due in part to high P/K soil test levels, Treatment 3 with only Pellet Lime and Nitrogen significantly out yielded the N/P/K control for the second year in a row. The theory that nitrogen use efficiency increases with the addition of calcium packed Pellet Lime is gaining credibility. This trial is a good example of corn response to pellet lime by combining soil pH management and calcium nutrition.