Nitrogen Combinations and Timing in Corn 2019

Mulford Agronomic: Hampstead, MD

Experiment Info:	
Planted:	5-9-2019
Harvest:	10-25-2019
Yield Goal:	200 bu/a
Target Fert.:	
Variety:	
Population:	
Row Width:	
Prev. Crop:	soybean
Plot Size:	
Replications:	

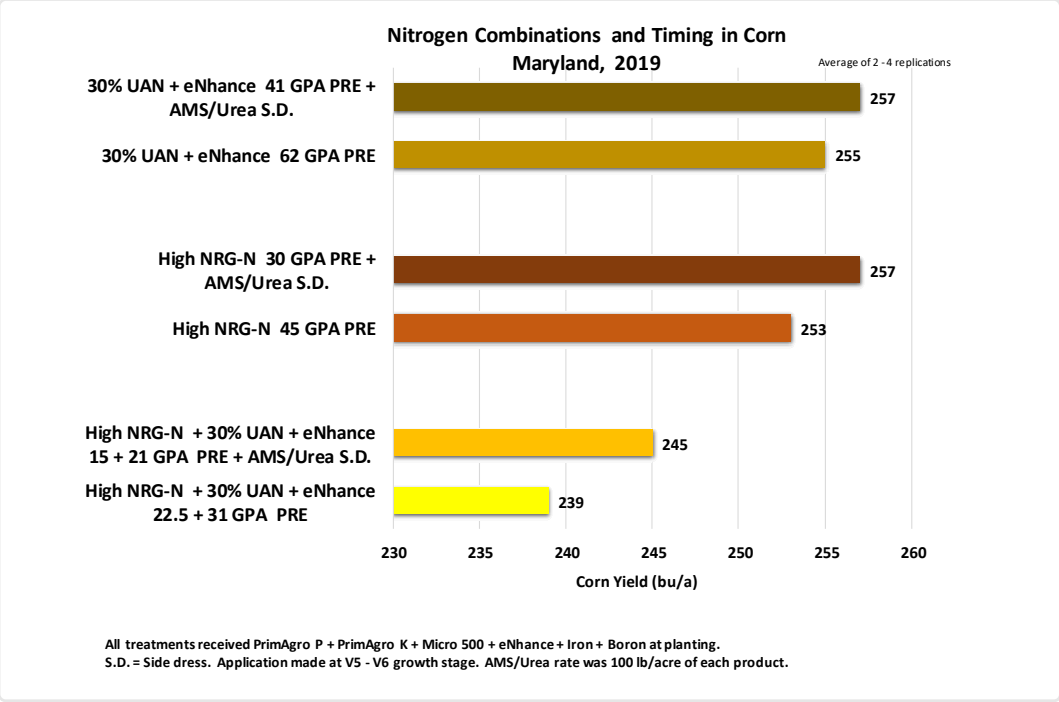
Soil Test Values (ppm):	
pH:	6.9
CEC:	7.2
%OM:	3.5
Bray P1:	84
Bicarb P:	
K:	168
S:	11
%K:	6
%Mg:	13.9
%Ca:	78.5
%H:	1.4
Zn:	3.4
Mn:	158
B:	0.4

Objective:

Compare the performance of 50:50 combination of High NRG-N + 30% UAN + eNhance to full rates of each product alone or in side dress combination with Urea + AMS in corn.

High NRG-N has a controlled release feature that extends the availability of usable nitrogen through approximately 90 days. This trial was designed to determine whether a combination of High NRG-N + 30% UAN + eNhance would provide better performance in corn compared to either product alone or in side dress combination with Urea + AMS. A total of 200 lb nitrogen was applied in each treatment.

All treatments received PrimAgro P 2.5 GPA + PrimAgro K 3 GPA + Micro 500 0.5 GPA + Boron 0.125 GPA + eNhance 0.25 GPA + Iron 0.25 GPA applied in-furrow.



All treatments received PrimAgro P + PrimAgro K + Micro 500 + eNhance + Iron + Boron at planting.
S.D. = Side dress. Application made at V5 - V6 growth stage. AMS/Urea rate was 100 lb/acre of each product.

Conclusions:

- Corn yield in treatments containing 50:50 combinations of High NRG-N + 30% UAN + eNhance ranged from 239 - 243 bu/a compared to High NRG-N or 30% UAN + eNhance alone which ranged from 253 - 257 bu/a.
- This trial shows no advantage of using a combination of High NRG-N + 30% UAN + eNhance compared to using either product at their respective full rates.