



Corn

response to Anglo American's POLY4[®]

Trial focus

Evaluate the yield response of corn to MOP + AMS and POLY4 program.

Overview

- Sulfur uptake can be a significant contributor to crop growth and eventual yield including more and larger kernels.
- Corn has a high sulfur need commonly supplied by AMS in spring, and not before, because it contains nitrogen (N) and sulfur (S) that are leachable and therefore move with water.
- POLY4, as a source of sulfate sulfur as well as potassium (K), magnesium (Mg) and calcium (Ca), offers a sustained nutrient delivery ensuring a continuous supply of nutrients throughout the growing season, increased nutrient uptake and higher yields.

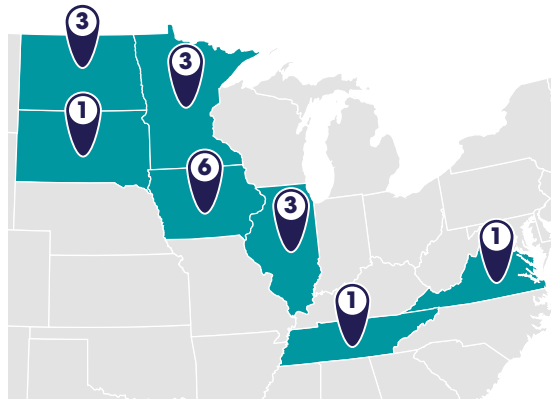
Treatments applied

- All treatments received standard N and P application rates.
- POLY4, MOP and AMS were spring applied.
- On average 146 lb acre⁻¹ of POLY4 was applied; the remainder of K₂O has been applied from MOP.

Average nutrients applied (lb acre⁻¹)

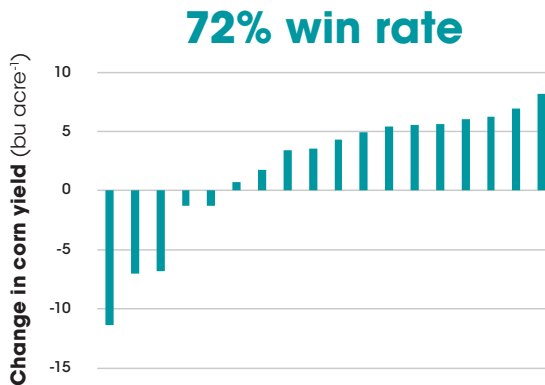
	K ₂ O	S	Mg	Ca
MOP + AMS	77	28	0	0
POLY4 program	77	28	5.3	18

Trial locations



Results

POLY4 program versus MOP + AMS.



Conclusion

- POLY4 program increased corn yield over MOP + AMS.
- POLY4 yield outperformed MOP + AMS by at least 3.4 bushels per acre in 11 trials and by at least 5 bushels per acre in seven trials.
- The results demonstrate that POLY4 offers the benefits of a balanced, season-long crop nutrition helping to increase yield potential.

Crop:

Corn

Years:

2015–2020

Locations:

18 trials in Illinois, Iowa, Minnesota, North Dakota, South Dakota, Tennessee, Virginia.

Data source:

Trials conducted by third-party, independent researchers.

3.9
bu/ac

POLY4 program yield advantage over MOP + AMS

Notes: Median yield with standard practice was 167 bu/ac. All calculated yield results are median.