



## CANOLA

# MicroEssentials SZ<sup>®</sup> vs MAP + AS in Canola

## Objective

• Evaluate the yield response of canola with MicroEssentials® SZ® (12-40-0-10S-1Zn) applied infurrow compared to MAP (11-52-0) + Ammonium Sulfate (AS) (21-0-0-24).

### Overview

- Meeting canola's crop nutrition needs for phosphorus (P) and sulfur (S) is critical for optimizing canola yields.
- Blends of MAP + AS are commodity fertilizer sources used in canola-growing regions of North America that provide nitrogen (N), P and only one form of sulfur that is subject to leaching loss.
- MicroEssentials SZ is a performance fertilizer that combines N, P, two forms of S providing season long sulfur availability, and zinc (Zn) to promote uniform nutrient distribution for higher yields.



**LOCATIONS:** 19 site-years Canada (AB, MB, SK) and United States (ND)

# Trial Details

#### **Locations and Crop Management:**

**CROP:** Canola (*Brassica napus*)

**YEARS:** 2017-2022

**DATA SOURCE:** Replicated small-plot trials conducted by university and/or independent third-party researchers.

**CROPPING CONDITIONS:** All trials conformed to local cropping practices.

**N Rate:** Applied according to local recommendations and balanced between treatments.

**P Rate:** 33 lbs  $P_2O_5/ac$  applied as MicroEssentials SZ or MAP.

**S Rate:** 15 lbs S/ac applied as MAP + AS, or 8.25 lbs S/ac as MicroEssentials SZ.

**Application Method:** Fertilizer was applied with the seed at planting.

#### **Canola Yield by Fertilizer Source**



# SZ O C

Micro**Essentials** 

# **Z.O** bu/ac

Yield advantage with MicroEssentials SZ over MAP+AS in higher yielding canola environments (over 60 bu/ac)



Yield increase with MicroEssentials SZ over MAP+AS



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Individual results may vary, and performance may vary from location to location and from year to year. This result may not be an indicator of results you may obtain, as local growing, soil and weather conditions may vary. Growers should evaluate data from multiple locations and years whenever possible.

For more information, go to MicroEssentials.com.

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# Summary

- Meeting the crop nutrition needs of canola with MicroEssentials SZ resulted in an average yield increase of 2.1 bu/ac over MAP+AS.
- MicroEssentials SZ achieved greater yields with the same  $P_2O_5$  rate, despite lower S application rate (15 lbs S/ac with AS vs 8.25 lbs S/ac with MicroEssentials SZ.)
- The yield advantage of MicroEssentials SZ compared to MAP+AS increased as yields increased, as was observed with the top yielding 1/3 of trials (over 60 bu/ac).