

## Nebraska On-Farm Research Network Soygreen<sup>®</sup> Chelated Iron for Soybean Production on Fields Susceptible to Iron Chlorosis

**Objective:** The following is the treatment design to test the impact of Soygreen<sup>®</sup> chelated iron on soybean production. Fields with low pH soils and a history of iron deficiency chlorosis (IDC) will be selected for this research project.

**Experiment Design:** Soygreen<sup>®</sup> will be applied at a rate of 1 gallon per acre or 9 pounds per acre of dry formulation with the seed at planting. The following plot layout should be used. A total of 4 replications are needed for this trial. The same soybean variety and other management practices should be used across the entire study area. Please note the variety and its IDC rating.

Check – No Soygreen <sup>®</sup>	Yield:
Soygreen®	Yield:
Soygreen®	Yield:
Check – No Soygreen <sup>®</sup>	Yield:
Soygreen®	Yield:
Check – No Soygreen <sup>®</sup>	Yield:
Check – No Soygreen®	Yield:
Soygreen®	Yield:
	Check – No Soygreen® Soygreen® Check – No Soygreen® Soygreen® Check – No Soygreen® Check – No Soygreen® Check – No Soygreen® Soygreen®

**NOTE:** Rows planted in each treatment need to be equal to or greater than soybean head width.

## Data to Collect:

- 1. 0-8" soil sample from each treatment strip (8 soil tests) with GPS tag of soil sample locations. Optional, if possible: collect Veris EC and pH data for fields being studied.
- 2. Early season stand counts (3 counts in each strip), ideally with GPS tag of locations.
- 3. In-season aerial imagery throughout growing season (provided by Nebraska On-Farm Research Network).
- 4. Yield from a weigh wagon or well-calibrated yield monitor.

## Grower Requirements:

- 1. Flag or mark GPS location of each treatment.
- 2. Provide all necessary inputs for crop production.
- 3. Complete background agronomic form about site and practices (available on on-farm research resources page: <u>https://cropwatch.unl.edu/farmresearch/getting-started</u>).
- 4. Collect yield data and grain moisture with weight wagon or yield monitor. If using yield monitor, please designate a separate "load" for each treatment and set up separate "products" names for each treatment harvested. Yield monitor must be **well calibrated**. Contact UNL Extension if assistance with this process is needed.
- 5. Submit harvest data to UNL Extension within 30 days of harvest or by Dec. 15.
- 6. Allow UNL Extension to use submitted and collected data for research, educational, and informational purposes.

Nebraska On-Farm Research Network will:

- 1. Provide technical assistance in setting up replicated and randomized experimental design.
- 2. Provide assistance with treatment implementation, flagging, stand counts, soil sampling, and recording yield.
- 3. Analyze raw data using statistical analysis and provide this information to the grower.

**Disclaimer:** The Nebraska On-Farm Research Network does not endorse the use of products tested in on-farm replicated strip trials. While treatments are replicated within trials and may be replicated across multiple sites under various conditions, your individual results may vary.

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