

Horticulture Research Protocols

High Tunnel Variety Trial: Heirloom Tomatoes, 2018

1. Determine which heirloom tomato variety performs better in high tunnels: Black Krim, Italian Heirloom and Paul Robeson.

Farmer-cooperator will:

- Follow Research Protocols for study
- Take photos of fruits (by variety) and plants throughout the project
- Keep in contact with PFI with updates and questions
- Turn in all data by October 2018

Practical Farmers of Iowa will:

- Help set up research protocol.
- Monitor progress of project and provide support when needed.
- Publish results in a PFI research report, on PFI website, and potentially other outlets.
- Provide \$550 cooperator payment at conclusion of project year.

RESEARCH PROTOCOL

Crops: Black Krim (Johnny's Seeds), Italian Heirloom (Uprising Seeds), Paul Robeson (Baker Creek Seeds).

Transplanting and In-field practices:

Each farmer can decide their own in growing practices, but should record what was done and when. Practices should be consistent for both varieties and all plots. **Some planting information is requested in the excel document.**

Field Layout:

- Treatment plot lengths can be 10-20 plants depending on farm needs.
- Four replications of each set is preferred, three is ok.

Example Plot Layout

Rep 1	Rep 2	Rep 3	Rep 4
Variety 1	Variety 2	Variety 3	Variety 1
Variety 2	Variety 3	Variety 1	Variety 2
Variety 3	Variety 1	Variety 2	Variety 3

Harvest and Data Collection:

- Harvest tomatoes from plots as they are mature. Record marketable weight and count of the plot for each harvest; count cull fruits.
- See Excel spreadsheet for data collection.

HIGH TUNNEL TOMATO VARIETY TRIAL SETUP DATA					
Seeding date:					
Transplant date:					
Number of plants per plot:					
In-row spacing (inches):					
Between row spacing (inches):					
Plot area (ft2)					
Soil amendments/inputs used (product and rate, approx):					
Trellis style:					

HIGH TUNNEL TOMATO VARIETY TRIAL HARVEST DATA			·A			
			Plot Fruit	Plot Fruit		
Harvest Date	Rep	Variety	Weight (lb)	Count	Cull Fruit Count	notes