**Objective:** Determine the agronomic and economic effect of a biological soil stimulant on alfalfa hay yield.

**Farmer-cooperator will:**
- Take photos throughout the project.
- Keep in contact with PFI with updates and questions.
- Spring 2016, establish a minimum of 4 replications as shown in the diagram below with randomized and replicated strips of:
  - Alfalfa with biological soil stimulant (Soil stimulant)
  - Alfalfa without biological soil stimulant (Control)
- Strips will be as wide as at least one windrower pass and run the length of the field.
- Summer 2016, conduct sap tests and apply biological soil stimulant to assigned strips according to sap test results.
- Cut alfalfa hay from strips separately and document yields.
- Turn in data to Practical Farmers of Iowa at the end of the project.

**Practical Farmers of Iowa will:**
- Help set up monitoring 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 compensation at conclusion of the project in 2016.

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*The terms of this Research Protocols document are subject to the terms of the individual Research Cooperators Memorandum of Understanding agreement with PFI. To the extent these terms may differ or conflict, the Memorandum of Understanding shall control.*