Objective: Determine which cauliflower variety: Snow Crown, Amazing, or Denali produces the highest yield and quality fall cauliflower in Iowa. Skywalker can be trialed as an optional variety.

Hypothesis: Some farmers expect Snow Crown to produce the most curds, and best quality curds.

Farmer-Cooperator will:
• Follow Research Protocols for study
• Take photos throughout the project
• Keep in contact with PFI with updates and questions
• Turn in all data by November 2019

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.

Project Design:
• Each farm will set up a randomized, replicated trial with 1-2 successions. Each succession will have 4 replications.
• 3 or 4 varieties x 4 replications (per succession)
  o Snow Crown, Amazing, Denali, (Skywalker, optional)
  o At least 10 plants/plot

Example layout:

<table>
<thead>
<tr>
<th>Rep1</th>
<th>Rep2</th>
<th>Rep3</th>
<th>Rep4</th>
</tr>
</thead>
<tbody>
<tr>
<td>Snow Crown</td>
<td>Amazing</td>
<td>Denali</td>
<td>Snow Crown</td>
</tr>
<tr>
<td>Amazing</td>
<td>Denali</td>
<td>Snow Crown</td>
<td>Amazing</td>
</tr>
<tr>
<td>Denali</td>
<td>Snow Crown</td>
<td>Amazing</td>
<td>Denali</td>
</tr>
</tbody>
</table>

Data to Collect (see excel workbook):
• At harvest, Score plot for color, riciness/fuzziness, curd compactness, and curd bracts.
• Harvest cauliflower as mature, keep records by plot and harvest date. Record weight, diameter of three curds, and count harvested by plot.
• Take photos of harvested curds (each variety), and the plants in the field.
• See excel workbook for pick sheets, scoring, and data entry.
• More info on cauliflower grading: Cole Crop Disorders: https://agdev.anr.udel.edu/weeklycropupdate/?p=2502
Project Timeline:

<table>
<thead>
<tr>
<th>March</th>
<th>April - Oct.</th>
<th>November</th>
</tr>
</thead>
</table>
| • Edit/Approve Protocol  
  • Complete MOU & pre-survey  
  • Liz will order seed | • Layout plots  
  • Update other cooperators and PFI with progress of trial  
  • Conduct trial and collect data! Take photos! | • Turn in data and photos  
  • Take post-survey |

Contact: Liz Kolbe, Horticulture and Habitat Programs Manager, (515) 232-5661; liz@practicalfarmers.org