Upcoming Webinars

• February 26 - Building a Terrarium
  – Esther McGinnis, Associate Professor and NDSU Extension Horticulturist

• March 4 - Pressure Cooking and Canning: New (and Old) Ways to Cook and Preserve Vegetables
  – Julie Garden-Robinson, NDSU Extension Food and Nutrition Specialist
Zoom Controls

- Meeting Topic: Field2Fork - Tom Kalb Growing Vegetables
- Host: Extension FCW
- Invitation URL: https://zoom.us/j/609371435
- Participant ID: 22

- Join Audio
- Share Screen
- Invite Others

- Mute/unmute
- Open chat box

Question/Answer Controls

Chat box
Please Complete the Survey

• Please complete the short online survey that will be emailed to you after today’s webinar. It will take just a couple minutes!

• Be sure to sign up for an opportunity to win a prize in the drawing. After submitting the survey, a form to fill out with your name/address will appear.

• Acknowledgement: This project was supported by the U.S. Department of Agriculture’s (USDA) Agricultural Marketing Service through grant 14-SCBGP-ND-0038.
Best Varieties

• Early
• Productive
• Resist diseases
• Flavorful
‘Roma’
‘Yellow Pear’
Heirlooms
Vine Types

• **Determinate**
  – Vine growth stops when flowers appear
  – Compact; no pruning; trellising optional
  – Early and concentrated yield

• **Indeterminate**
  – Vine growth never stops
  – Requires pruning and trellising
  – Extended harvest season
Popular Varieties

- **Early Girl** – Early (I)
- **Celebrity** – Reliable (D)
- **Mountain Fresh Plus** – Productive (D)
- **Big Beef** – Beefsteak (I)
- **Roma** – Canning (D)
Fertilizing

• 1 pound 10-10-10 for every 100 sq. ft.
• Phosphate critical in seedling growth
• Sidedress AFTER fruit set
• Keep your eyes on your plants
  – Pale vines? May need more fertilizer
  – Lush green vines without flowers? Too much fertilizer
Mulching

• Accelerates growth rate
• Protects plants from soil diseases
• Conserves moisture
• May repels insects
Mulching

- **Red plastic** – highest yields
- **Clear plastic** – more heat, more weeds
- **Black plastic** – some heat, stops weeds
- **Silver** – minimal heat, controls aphids
- **Straw** – moderates temps
- **Landscape fabric** – reusable
Trellis plants
Trellising: Pros and Cons

+ Promotes good air circulation
+ Fewer diseases
+ Better fruit quality

– Adds cost
– Requires more irrigation
– More blossom end rot
String Weave System
Cages

• Make them sturdy

• 6.5 feet of concrete reinforcing mesh
  – Two feet across and five feet high
  – Clip off bottom ring
  – Support with a stake
  – Wrap with plastic sheet in early season
## Trellising

(adapted from Diver et al., 1999 and other sources)

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<thead>
<tr>
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<th>Sprawl</th>
<th>Stake</th>
<th>Cage</th>
<th>String-Weave</th>
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<td>1 ✔</td>
<td>3</td>
<td>2</td>
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<tr>
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<td>Affordable</td>
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<td>2</td>
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Pruning

First flower cluster

Leave this sucker

Remove this sucker and all below
Pest Control
Natural Insecticides

• Bacillus thuringiensis (Bt)
• Spinosad
• Neem
• Pyrethrin
• Insecticidal soap
Carbaryl
Pyrethroids
Early Blight
Don’t do this!
Proper Watering

- Avoid overhead irrigation
- Irrigate in morning
- Water deeply, not frequently
- Mulch
Fungal Diseases

- Use resistant varieties
- Rotate crops
- Maximize sunlight and air movement
- Avoid soil splash
- Protective fungicides include chlorothalonil and copper
- Remove or bury debris
Blossom End Rot
Blossom End Rot

• Calcium deficiency
• Be careful when cultivating
• Maintain uniform soil moisture
• Avoid excessive nitrogen
• Calcium sprays
  – 4 TBSP calcium nitrate per gallon of water. Spray fruits when dime-sized.
Herbicide Injury
Good Luck!
Questions?
www.ag.ndsu.edu/fieldtofork