Two major threads

• **PRACTICAL**
  • Where to garden
  • How to garden
  • Organic tricks of the trade
    – Compost
    – Bugs
    – Diseases
    – Critters

• **ORGANIZATIONAL**
  • Your clients
    Fellow congregants?
    Greater community
  • Your assistants
  • Some simple ways to get everyone involved
What do you need for gardening?
SUNLIGHT
WATER

From the hose or faucet

Consider drip irrigation
SOIL1

- Use your own
- Amend with compost

- Check with UConn extension:
  - [http://www.soiltest.uconn.edu/](http://www.soiltest.uconn.edu/)
  - Free ph testing 2x/year
- Mulch with wood chips between rows
SOIL2—other ways!

Compost from UCONN
http://www.extension.uconn.edu/
http://blog.extension.uconn.edu/2017/04/24/spring-compost-sales/

Sources of compost across the state:
Compost at your house of worship

- Start a compost pile!
  - grass clippings and leaves from last fall
  - coffee grounds from coffee hour and any other food leftovers that are fruit/vegetable based
  - (so NOT meat/fish/dairy scraps, although egg shells are OK).
- Generates rich soil that you can add to the garden in future years.
Vegetables to grow from seed:
Beans
Peas
Greens
Carrots
Squash . . . .
SEEDLINGS

Vegetables to grow from plants:
Tomatoes
Peppers
Broccoli
Cauliflower
Brussel Sprouts . . .

If possible, support your LOCAL Garden center
STOP!
Time for some organization!

• Who are your clients?
• Who are your collaborators?
• Which vegetables do they like?
• Which vegetables can they grow to like?

• Consider also garden products
  – Grow pumpkins, bake pumpkin pie to sell
  – Grow herbs, make pesto to sell
  – Grow tomatoes, make tomato sauce

• Use proceeds for the garden!
What do you need help with in the garden?

EVERYTHING
Specific ‘jobs’ for helpers

Once/season
• Build the beds
• Acquire the soil
• Test and amend soil
• Acquire the seeds
• Acquire the seedlings
• Plant the seeds
• Plant the seedlings

Multiple times/season
• Mulch the plants
• Water the garden
• Weed the garden
• Harvest the produce
• Bring the produce to your clients
How attract and keep your helpers?

• Talk about it as a ‘community garden’
• Plant with blessings
• Give updates during services as plants grow
• ASK for help!
• Bring your harvest as an offering, to be blessed during services
Collaborative community garden model
(courtesy Charmaine Craig)

• Gather interested collaborators
• Small garden committee
  • Visualize what goes into the garden
  • Find the location
  • Teach how to build, add soil, plant, weed, water
  • Teach about bugs and other challenges
  • Teach about harvesting times and how to ‘put the garden to sleep’ over the winter
  • Teach about how to use the produce! Healthy habits

• Develop community spirit through gardening
• Discuss community garden concerns like water, compost, cleanup
• Discuss community food concerns like food security, knowing where food comes from → workshops for others?
Back to the gardening thread . . .

Let’s think about ORGANIC
WHY garden organically?

• *Biblical perspective* (Genesis 1):
• On Day 3 of Creation, God gathered together the waters, and let the dry land appear. And God enabled the earth to put forth vegetation, plants yielding seed and fruit trees bearing fruit in which is their seed . . . And God saw that it was good.
Genesis, continued

• On Day 5 of Creation, came the creatures of the seas, and of the air.

• On Day 6 of Creation, came the creeping things of the earth . . . and us.

• All of Creation is connected in this story, in God’s plan
Therefore . . .

By gardening organically, you think of your plants as part of a whole system within Creation that starts in the soil and includes the water supply, people, wildlife and even insects.
A bit of biology and chemistry

• Good soil is full of living microorganisms
  • Bacteria are decomposers for plant matter, returning its nutrients to the soil
  • Bacteria bind compounds so they stay in the soil
  • Bacteria collaborate with legumes to fix nitrogen in the air and add it to the soil

• Chemical fertilizers contain mineral salts that plant roots can absorb quickly. Hence, they get big, quickly.
  • BUT
  • These fertilizers ‘starve’ the bacteria, so they disappear
  • Then, the soil structure declines, water is no longer retained
  • Then more and more chemical fertilizers are needed to stimulate plant growth b/c they are the only things ‘left’!
Plus

• Manufacture of most chemical fertilizers depends on nonrenewables like coal and natural gas $\rightarrow$ greenhouse gasses $\rightarrow$ global warming

• ALSO, the runoff from chemical fertilizers goes into our lakes and rivers, and ends up suffocating and killing the living things there—fish, crustaceans, water plants!
Drawbacks of pesticides

• NONorganic pesticides are indiscriminate: they kill everything in their path.
• Applied to soil → they kill the beneficial bacteria as well as blights and diseases.
• Applied to the plants themselves → they kill the beneficial insects (ladybugs, butterflies) as well as the problematic ones
• AND they harm birds and herbivores (squirrels, voles, moles) that eat the plants and nuts and seeds (remember DDT?)
• AND they harm the mammals/carnivores that eat the birds (foxes, hawks, and also our dogs and cats!).
• AND they could even harm us, the long-term effects of the buildup of these chemicals in our bodies is not good!
So, HOW garden organically?

• Use COMPOST as much as possible

• If needed, purchase *truly* organic fertilizers:
  • Made from natural plant and animal materials
  • Made from mined rock minerals.
  • Look for products labeled “natural organic,” “slow release,” and “low analysis.”

• Ask a reputable garden center owner to recommend fertilizer brands that meet organic standards.
Be proactive!

If you MULCH your plants

You won’t have to WEED so much!
Be proactive!

• Encourage the ‘good’/beneficial bugs, like ladybugs and nematodes.
• Flowers surrounding the garden attract ladybugs (marigolds are great),
  → you will have fewer problematic bugs
Be proactive!

If you FENCE your garden, the critters will find it HARDER to get in
IF you do get pests

• Spray them away with jets of water, or with gentler applications of soapy water or pepper/garlic water.

• Pick them off—sooner is better—and place the pests in sealed jars/containers to kill them.

• Use organic controls like BT (cabbage loopers eat leaves with BT, cannot digest, bulks in their digestive tracts, they die).

• Neem

• Diatomaceous earth
WHERE to find organic controls?

• www.organicgardening.com

• www.gardensalive.com
When to grow what . . .

<table>
<thead>
<tr>
<th>Start Seeds Indoors</th>
<th>Plant Seed/Transplant</th>
<th>Harvest</th>
</tr>
</thead>
<tbody>
<tr>
<td>JAN</td>
<td></td>
<td></td>
</tr>
<tr>
<td>FEB</td>
<td></td>
<td></td>
</tr>
<tr>
<td>MAR</td>
<td></td>
<td></td>
</tr>
<tr>
<td>APR</td>
<td>Beets</td>
<td></td>
</tr>
<tr>
<td>MAY</td>
<td>Broccoli</td>
<td></td>
</tr>
<tr>
<td>JUN</td>
<td>Brussel Sprouts</td>
<td></td>
</tr>
<tr>
<td>JUL</td>
<td>Cabbage</td>
<td></td>
</tr>
<tr>
<td>AUG</td>
<td>Carrots</td>
<td></td>
</tr>
<tr>
<td>SEP</td>
<td>Cauliflower</td>
<td></td>
</tr>
<tr>
<td>OCT</td>
<td>Corn</td>
<td></td>
</tr>
<tr>
<td>NOV</td>
<td>Cucumber</td>
<td></td>
</tr>
<tr>
<td>DEC</td>
<td>Kale</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Lettuce</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Onions</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Peas</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Peppers</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Spinach</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Squash</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Tomato</td>
<td></td>
</tr>
</tbody>
</table>
Don’t forget . . . Harvesting!
Last words

• WEIGH your harvest
• Estimate its VOLUME (for greens)
• Go and TELL