

Tips for Terrific Tomatoes

Presented by the UCCE
Stanislaus County
Master Gardeners



Special thanks to the Master Gardeners of San Joaquin County for use of this presentation.



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Meet Your Speakers and their favorite tomato!

- Heidi Aufdermaur
- Terry Harper



(snappygoat.com)



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Agenda

- Know Your Tomatoes
 - A brief history
 - Growth habits
 - Hybrid vs. Heirloom
 - Growing season
- Planting for Success
 - Watering
 - Staking
 - Fertilizing



Today

- Our presentation will focus on growing tomatoes from transplants.
- Look for our August 2021 Class “Tomatoes, from Seed to Shining Seed” to learn how to save and start your own!



(Dwight Sipler)



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#1 Vegetable Grown

- Most people who grow vegetables grow tomatoes.
- There are more than 15,000 tomato varieties!
- There are more than 3,000 heirloom varieties actively cultivated worldwide



(Rezel Apacionado)



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Wait, is it a fruit or a vegetable?

Botanically a fruit (berry)

- Berry = fleshy fruit produced from a single flower with one ovary
- Considered a vegetable by the Supreme Court



Tomato Plants are Productive!

- One plant can yield 10-15 + pounds of tomatoes!



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Member of the Solanaceae Family

“Night Shade” Family

- Tomatoes
- Peppers
- Eggplant

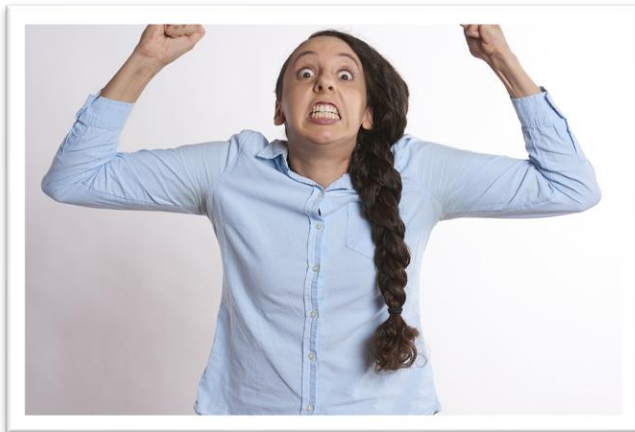
- Tobacco
- Petunias
- Potatoes



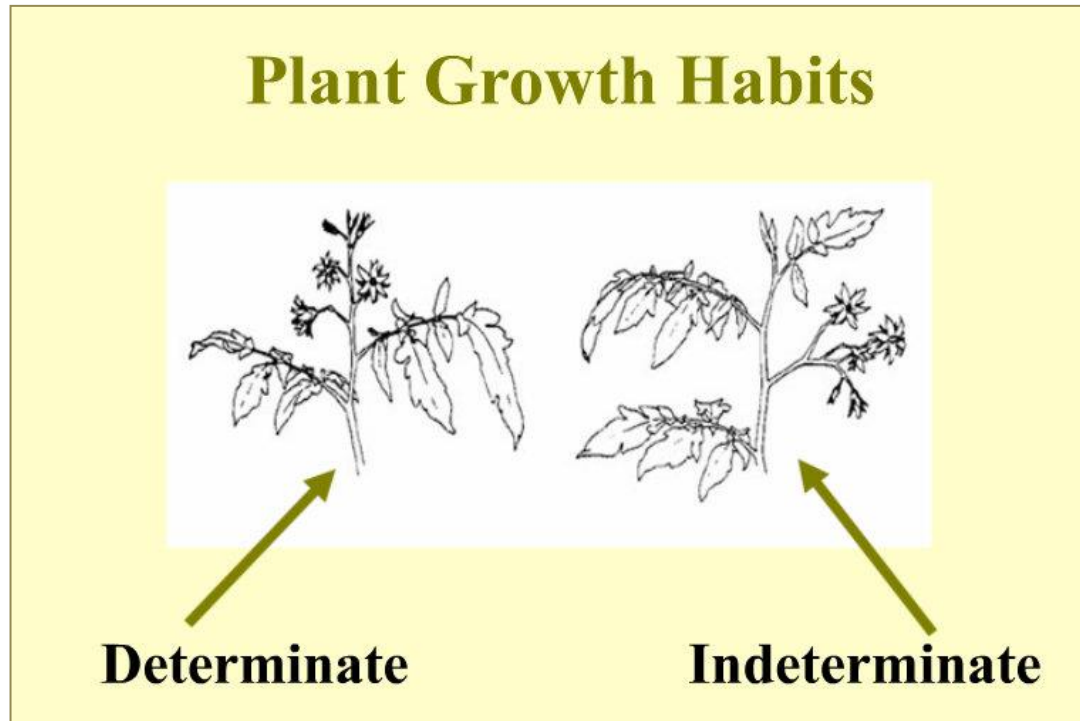
(photos from pixabay.com)

Tomatoes in the USA

- Tomatoes are native to South America
- 1800's brought to the U.S.
- “Nightshade? Not edible!”



Tomato Growth Habit



Determinate (bush)

- Often referred to as “bush” tomatoes
- Grow to a set height
- Set all fruit within 4-6 weeks
- Great for canning or freezing
- Can be grown in 5-gallon containers
- Do better when staked

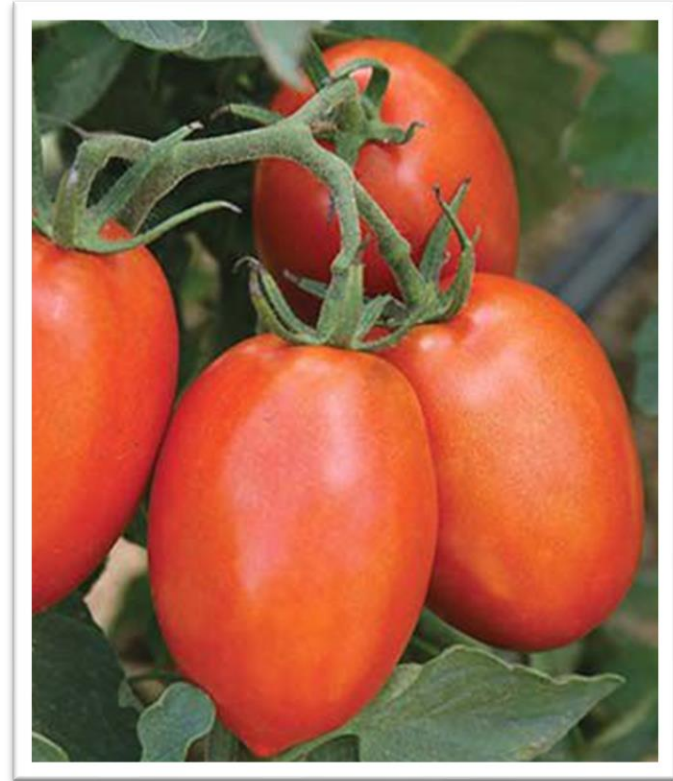


‘Patio’
(bonnieplants.com)



Determinate Examples

- 'Bush Early Girl'
- 'Roma'
- 'Celebrity'
- 'Patio'
- 'Ace'
- 'Little Sicily'



'Roma'
(burpee.com)



Indeterminate (vine)

- Grow, flower, and set fruit during warm weather
- Most tomatoes sold are indeterminate varieties
- Need sturdy support
- Too large for most containers
- Need support!



(pixabay.com)



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Indeterminate Examples

- ‘Early Girl’
- ‘Better Boy’
- ‘Big Beef’
- ‘Sungold’
- ‘Super Sweet 100’



‘Early Girl’
(johnnyseeds.com)



Determinate vs Indeterminate

Which type should you choose?

- **Growing in the ground?**
Any variety.
- **Small spaces:** Determinate
- **Container*:** Determinate
 - **Use a 5-gallon container or larger*



'Little Sicily'
(bonnieplants.com)

Let's take a poll!

Question #1

- Tomatoes are native to:
 - Central America
 - Alaska
 - South America
 - Asia
 - Australia



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Let's take a poll!

Question #1

- Tomatoes are native to:
 - Central America
 - Alaska
 - **South America**
 - Asia
 - Australia



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Let's take a poll!

Question #2

- If you are growing tomatoes in a pot, the best type to grow is:
 - Determinate
 - Indeterminate



Let's take a poll!

Question #2

- If you are growing tomatoes in a pot, the best type to grow is:
 - **Determinate**
 - Indeterminate



Let's take a poll!

Question #3

- When growing indeterminate tomatoes in a pot, the best pot size is one that holds:
 - 5 gallons or more potting mix
 - It doesn't matter
 - 5 gallons or less potting mix



Let's take a poll!

Question #3

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Questions?

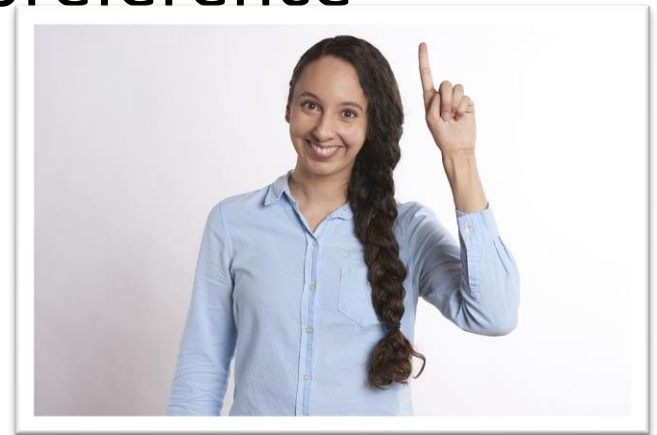


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Hybrids vs Heirlooms

- Some gardeners prefer one type over the other
- You may want to grow both!
- Usually a matter of personal preference
- Let's discuss the differences!



Hybrid

- Bred for characteristics such as fruit size, crop yield, and disease resistance.
- Many have a code such as VFNT which stands for:
 - Verticillium wilt, fusarium wilt, nematodes, tobacco mosaic disease resistant



'SteakHouse'



Disease Resistant

- A: Alternaria stem canker
- F: Fusarium wilt
- FF: Fusarium, strains 1 and 2
- FFF: Fusarium, strains 1, 2, and 3
- N: Nematodes
- T: Tobacco mosaic virus
- St: Stemphylium gray leaf spot
- V: Verticillium wilt



Common Hybrid Tomatoes

- 'Early Girl'
- 'Ace'
- 'Better Boy'
- 'Sungold' or 'Sweet 100' cherry
- 'Roma'



'Sungold'
(snappygoat.com)



'Roma'
(pixabay.com)

Heirloom

- Seeds saved from season to season
- Less disease resistant; may not set as well as hybrid tomatoes
- Fans insist their flavor & uniqueness make up for any disadvantages
- Separate varieties you want to save

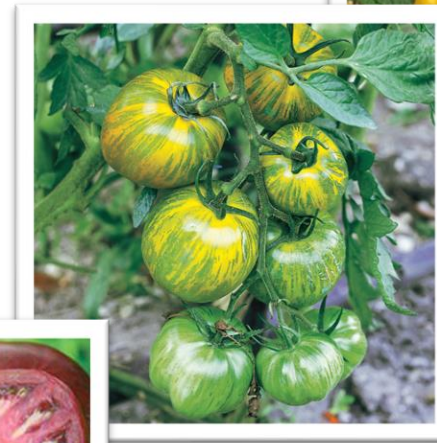


'Mortgage Lifter'
(R. Rhoades)



Common Heirloom Tomatoes

- ‘Brandywine’
- ‘Mortgage Lifter’
- ‘Beefsteak’
- ‘Mr. Stripey’
- ‘Rainbow’
- ‘Yellow Pear’



‘Yellow Pear,’ ‘Green Zebra’ and
‘Black Krim’ (burpee.com)



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Another Poll!

Question #4

- If you want to save seeds to plant next year, save:
 - Seeds from hybrid tomatoes
 - Seeds from heirloom tomatoes



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Another Poll!

Question #4

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Questions?



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Growth Requirements

- **Soil**

- Mix in several inches of compost before planting
- Use compost as mulch (not near the base of the plant) to help soil retain moisture)



(pixabay.com)

- **Temperature** - Heat loving plant

- Won't set fruit if temperature is below 55°F or over 100°F



Site Selection

- Full sun, at least 6 hours
- Enough space for plants to grow
- Nearby water supply



(Taunton Press, Inc.)



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Planting Time

- Plant transplants now that soil is warmer.
- During cool temperatures plant growth is slowed down.
- In Stanislaus County, there is still a 10% chance of frost after March 23.



(gardeningtoday.com)

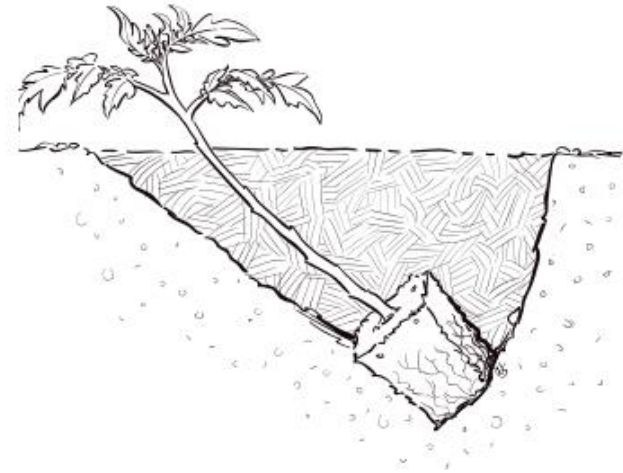


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Planting Tips for a gangly plant

- Plant deep for more roots, better growth
- Pick off foliage on lower third before planting
- Plant up to a few inches from lowest leaves
- Tomatoes grow roots along the stem



(UC Master Gardener Handbook)



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Tomato Support

- Stake or cage tomatoes when you plant
- Methods
 - Caging
 - Staking
 - Trellising



Tomatoes Need Space!

- Space rows of staked or cage tomatoes 30-42” apart
- Allow 2-3 feet between rows
- If tomatoes can't be staked, plant at least 6' apart and leave 4' for rows



Cage Size

- Cages should be 3-6' tall and 18-30" wide
- Use short cages for determinates, tall cages for indeterminate



(joegardener.com)



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Staking & Trellising

- Use sturdy wooden stakes, 6' long and 2" wide
- Drive 1' into soil, 4-6" away from plant after transplanting
- Staked tomatoes require pruning to a few main stems
- Once per week, prune off "suckers" to control size

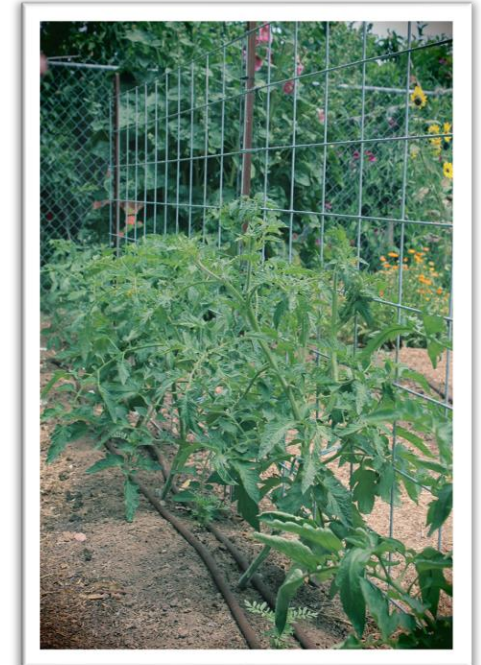


(properlyrooted.com)

Staking & Trellising Continued

- Tie heavy twine to the stakes every 10"
- As the plants grow, pull the stems towards the stakes and tie loosely
- Trellising incorporates a fence

Photos: H.
Aufdermaur



Questions?

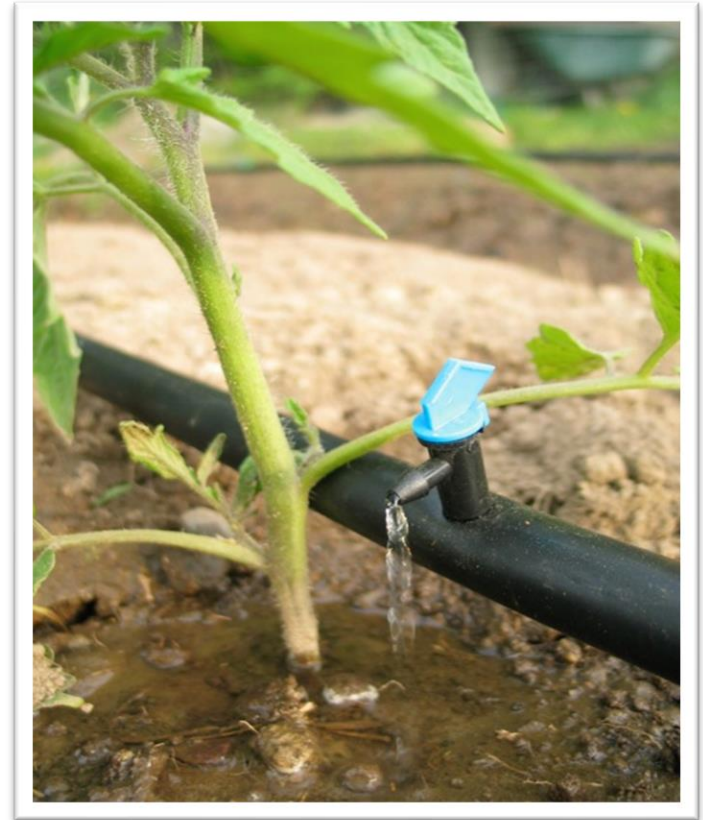


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Watering

- Water regularly to maintain even soil moisture
- Keep root ball moist until established
- Once established, water deeply
- Don't be afraid to let soil dry out a little between watering



Fertilizing

- Use tomato or vegetable fertilizer
- Follow instructions when planting
- Fertilize again when blossoms appear
- Fertilize lightly if desired every 2-4 weeks until the end of harvest



Growing in Containers

Best for determinate tomatoes only

- 5 Gallon container or larger
- Use a potting soil
- Remember to fertilize
- Water more frequently
- Stake properly



Crop Rotation

- Avoid planting tomatoes (or other nightshades) in the same location more than 2 years consecutively
- Rotating crops enhances soil fertility and helps minimize insect and disease pests



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Let's Take Another Poll!

Question #5

- When should you stake your tomatoes?
 - Right when you plant them.
 - When you remember.
 - Never, let them sprawl. It's okay if the bugs get a few.



Let's Take Another Poll!

Question #5

- When should you stake your tomatoes?
 - Right when you plant them.
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Let's Take Another Poll!

Question #6

Choose all that are true:

- Determinate tomatoes put on all their fruit within a 4–6-week time period
- Indeterminate tomatoes produce fruit all season long
- Heirlooms are tomatoes handed down from generation to generation



Let's Take Another Poll!

Question #6

All are true!

- Determinate tomatoes put on all their fruit within a 4-6 week time period
- Indeterminate tomatoes produce fruit all season long
- Heirlooms are tomatoes handed down from generation to generation



Pests, Diseases, & Problems, Oh My!

- What to do?
- Take our Vegetable Garden Pest Management Class in May!
- Registration coming soon.



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Help Us Grow!

Our follow-up survey provides us the tools we need to grow and improve the quality of our program.



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Diane Barlett, Reference Librarian

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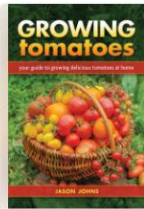
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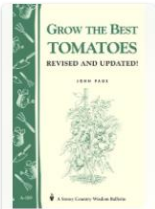
EBOOK Growing Tomatoes Jason Johns



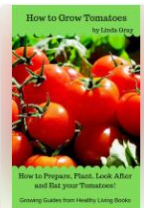
EBOOK Epic Tomatoes Craig LeHoullier



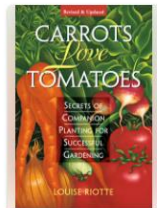
EBOOK It's A Long Road To A Tomato Keith Stewart



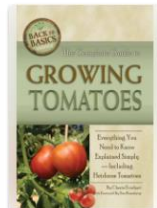
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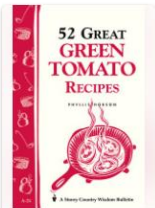
EBOOK How to Grow Tomatoes Linda Gray



EBOOK Carrots Love Tomatoes Louise Riotte



EBOOK The Complete Guide to Grow... Cherie Everhart



EBOOK 52 Great Green Tomato Recipes Phyllis Hobson

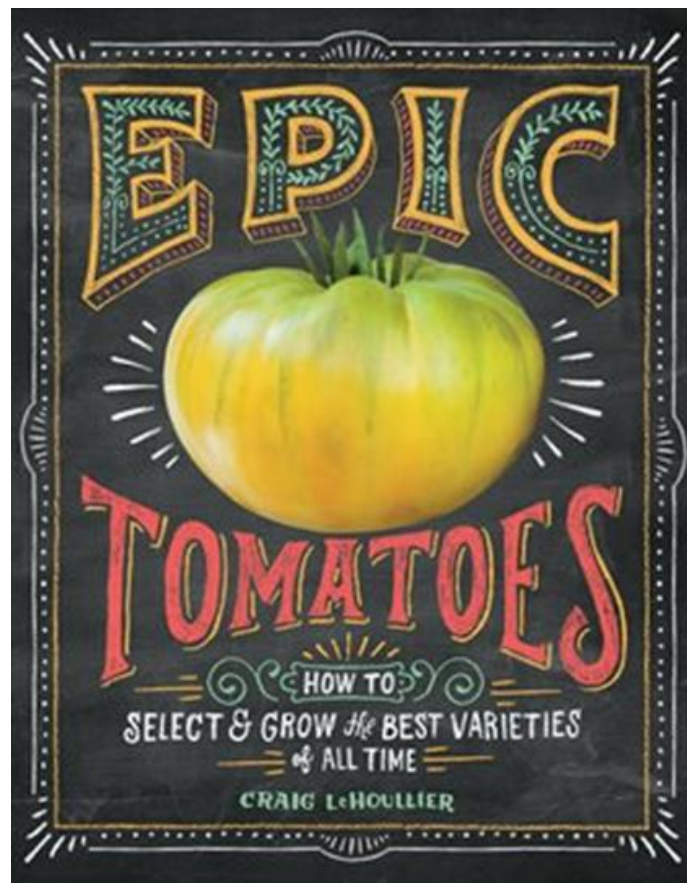
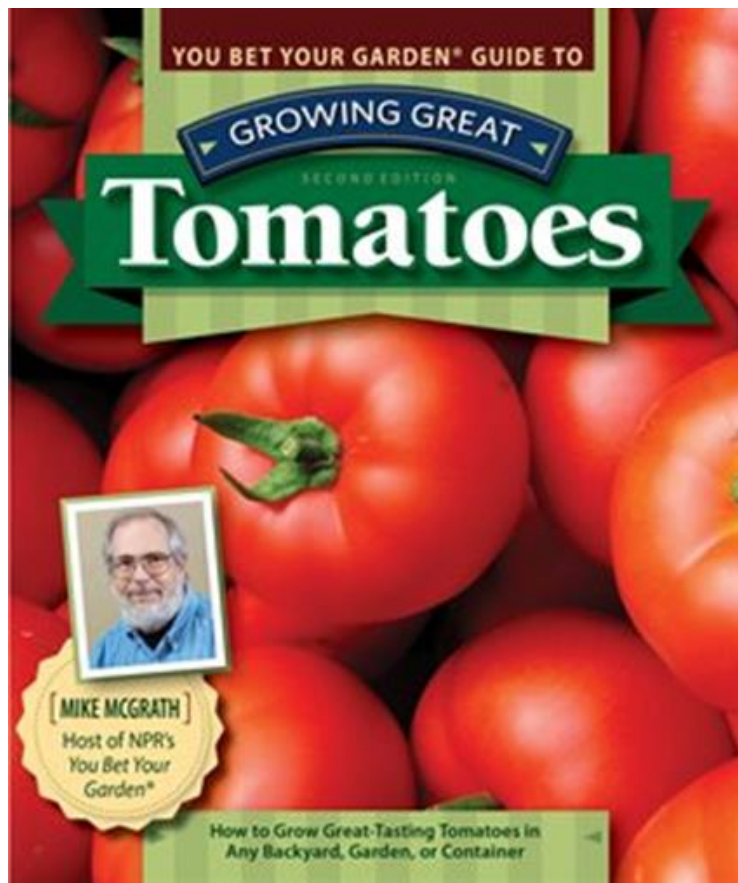
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Grow to Eat

Spring 2020



FORMAT	Magazine
EDITION	Spring 2020
SERIES	Grow to Eat >
PUBLISHER	Lonehill Trading (PTY) LTD >
RELEASE	2 Aug 2020
COPIES	Unlimited
AUDIENCE	General Content
SUPPORTS	Libby Magazine

Grow to Eat is the definitive seasonal guide to edible gardening in South Africa, brought to you by your favourite gardening magazine, *The Gardener*. A practical, non-nonsense guide, *Grow to Eat* is filled with growing, harvesting and cooking tips for seasonal fruit, vegetable and herbs.



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http://stanlibrary.org/emagazine_information.shtm



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Sarah Dentan
County Library Director
[Biography](#)



Stanislaus County Libraries to open for browsing and checkout

Effective March 22, 2021, most Stanislaus County Libraries will be open for browsing and checkout of materials. Capacities will be limited, in keeping with the State of California's current guidance for opening. Masks and social distancing will be required. In order to maintain capacity limits, libraries are not equipped for group or extended visits at this time.

Most locations will be open Monday through Friday; Modesto and Salida Libraries will be open Monday through Thursday and Saturday; see the [complete list of hours here](#).

Libraries in Denair and Keyes will continue to offer no-contact pick-up of materials only. The Turlock Library remains closed for expansion and renovation.

Book returns, which have remained closed in Modesto and Salida, will also reopen on March 22.

When placing holds in the catalog, please select the pickup location from the drop down menu.

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