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FOOD ACCESS PROGRAM

Food Is Medicine

- ❖ Healthy Navajo Stores Initiative (HNSI)
- ❖ Navajo FVRx Fruit & Vegetable Prescription Program
- ❖ Growers' Initiative
 - Farm to School/ECE
 - "Grow the Growers"



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What are Frost Dates...?

...the **average** date of the last light freeze in spring or the first light freeze in fall.

It is a way to classify freeze temperatures, based on their effect on plants.

FIRST AND LAST FROSTS

ZONE	3	4	5	6	7	8	9	10
AVERAGE FIRST FROST	Sep. 14 to Mar. 31	Sep. 4 to Mar. 20	Sep. 24 to Oct. 31	Sep. 14 to Oct. 31	Sep. 24 to Oct. 31	Oct. 14 to Nov. 31	Nov. 24 to Dec. 31	Nov. 14 to Dec. 31
AVERAGE LAST FROST	May 7 to May 21	May 14 to May 31	May 24 to Jun. 31	May 14 to Jun. 31	May 24 to Jun. 31	Jun. 14 to Jun. 31	Jun. 24 to Jul. 31	Jul. 14 to or earlier

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Frost occurs
 ...when water vapor in the air forms dew and is also cooled to the point of freezing.*

Ideal conditions for creating frost include:

- ✓ clear night skies
- ✓ calm winds
- ✓ temperatures of 40 degrees Fahrenheit and below

Remember, "weather predictions" are just that... predictions.

** Usually at night, while you're asleep and dreaming of your big harvest...*



2022
Photo 163150027 / Frost © Ludmila Fedoseeva | Dreamstime.com

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Light freeze
 29°F to 32°F
 Tender plants killed, but little damage to other vegetation.

Moderate freeze
 25°F to 28°F
 Most vegetation affected, with heavy damage to fruit blossoms as well as to tender and semi-hardy plants.

Severe freeze
 24°F and colder
 Damage to most plants.

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Photo 15905469 / Frost © Amalia Martin | Dreamstime.com

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Crownpoint, NM*
 Average LAST Spring Frost = June 3
Average FIRST Fall Frost = September 20

* Based on THOREAU records...

2022

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Shiprock, NM*
 Average LAST Spring Frost = JMay 20
Average FIRST Fall Frost = September 29

* Based on FRUITLAND records...

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Photo 78788473 / Frozen Shiprock Plant © Grigory Fall | Dreamstime.com

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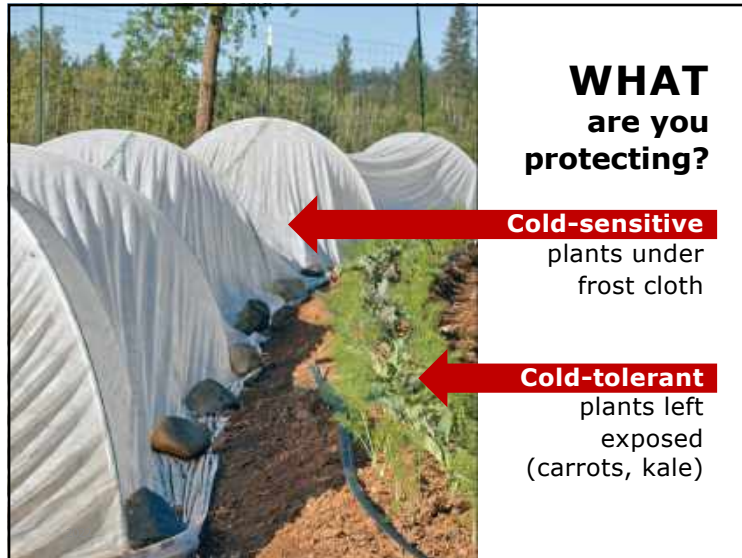
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Considerations:

- What are you growing...?
- How sensitive is it to cold...?
- What is the advantage of protecting it...?

vs.
 harvesting it now...?

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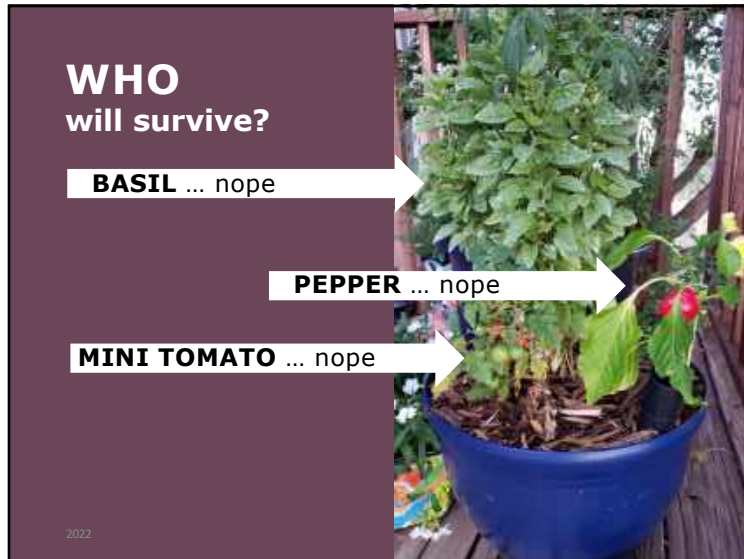
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STRATEGIES:

Short Term vs. Long Term

Shortest Term =
Plant cold-hardy varieties,
save seeds from these

Miss Penn's Mountain Seeds

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The Original **WALL o' WATER**®

SEASON EXTENDERS

Protects a plant from:

- ✓ cold as low as 12° F
- ✓ winds up to 40 mph
- ✓ animal activity
- ✓ reduces water use by sheltering the base of the plant from sun and wind, reducing transpiration.

-- weighs ~20 pounds when filled --

www.wall-o-water.com

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Agribon

Keep your plants protected this winter.

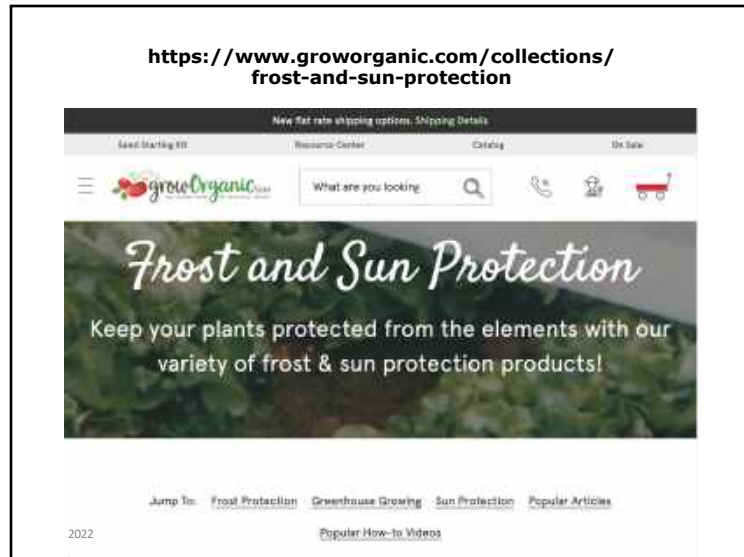
Widely available, several options

a.k.a. floating row cover, frost blanket

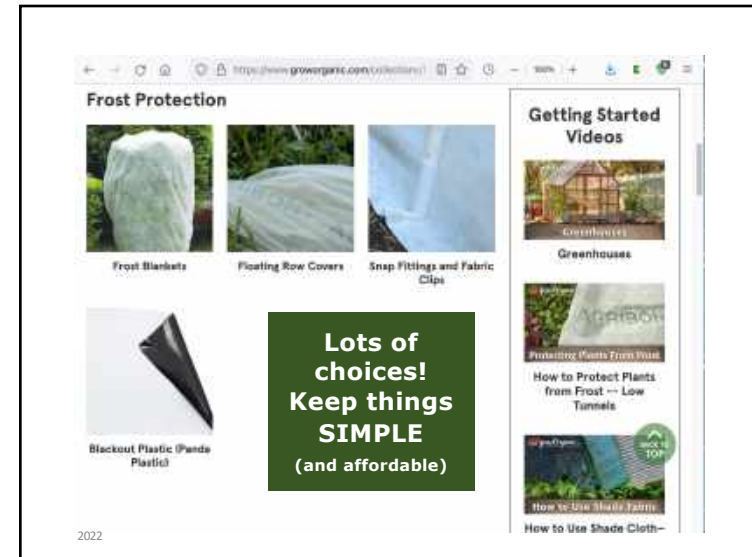
AGRIBON AG-15 • Insect control • 90% light transmittance	AGRIBON AG-30 • Medium frost protection • 70% light transmittance • Provides up to 8°F of frost protection	AGRIBON AG-70 • Heaviest frost protection • 30% light transmittance • Provides 8°F+ of frost protection
AGRIBON AG-19 • Insect control & light frost • 85% light transmittance • Provides up to 4°F of frost protection	AGRIBON AG-50 • Heavy frost protection • 50% light transmittance • Provides 8°F+ of frost protection	

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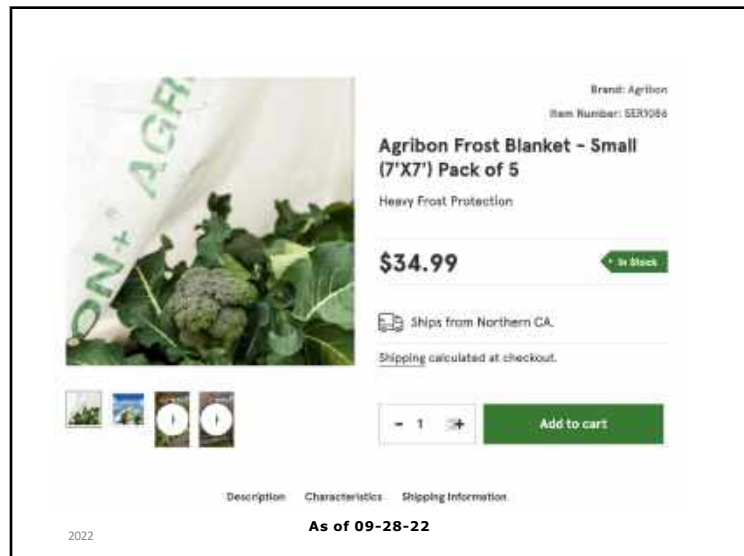
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Brand: Agribon
Item Number: 5CR1064

Agribon AG-30 Floating Row Cover (83" X 50')

Medium Frost Protection

\$27.99 In Stock

Ships from Northern CA.

Shipping calculated at checkout.

- 1 + Add to cart

Description Features Characteristics Shipping Information

2022 **As of 09-28-22**

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Agribon Floating Row Cover

Widely used for frost protection on citrus, strawberries, vegetables and nursery stock. It also conserves water by reducing evaporation.

- AG-30 is a medium weight cover, 10.9 oz per sq yd.
- 70% light transmittance.
- Provides up to 4°F of frost protection.
- Warms the soil and is a good pest barrier.
- Conserves water by reducing evaporation.

Find more information on selecting the right Agribon for your garden or farm in our resource center.

Agribon™ rowcovers are high quality spun-bonded polypropylene and have all the qualities of other brands, plus seams double-bonded for ultra-strength, while being more affordable.

These floating rowcovers increase yields, prolong seasons, reduce soil erosion, protect against frost, speed up germination, minimize wind damage, conserve soil moisture, deter insects and birds and protect against extreme temperatures.

In addition, Agribon offers a 1-year *limited warranty* against premature UV breakdown. It is similar to other rowcovers but generally longer lasting. UV stabilizers increase expected field life to 2 to 3 seasons.

2022 **As of 09-28-22**

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Long Term:
LOCATION, LOCATION, LOCATION

- **South-facing slope** (or almost any slope)
- **South-facing exposure**

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Long Term:
LOCATION, LOCATION, LOCATION
 part 2

- **Plant next to a wall**
- **Build a rock wall**
- **Build a raised bed out of rocks**
- **Or just include rocks in your design... stepping stones**

2022

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Incorporate Shade & Frost Protection into your projects

- find a plan
- adapt to your abilities, needs & especially to your budget

Figure 13. In warmer areas, cut out and leave open the top 6–12 inches of each end, for ventilation.

Credit: Sam Angino, © Oregon State University

<https://extension.oregonstate.edu/pub/ec-1627>

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Another approach

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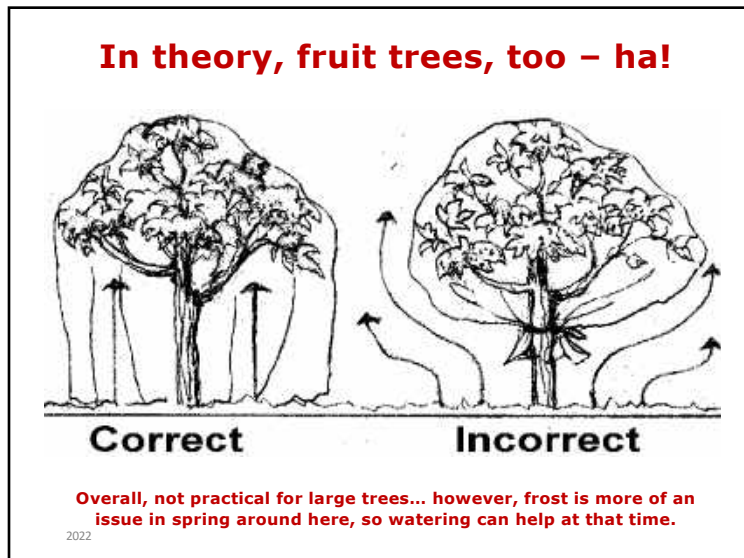
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**Hoophouse/
Greenhouse
Considerations**

In General:

- Wind
- Snow load
- Wind
- Hail
- Wind
- Monsoons
- Wind

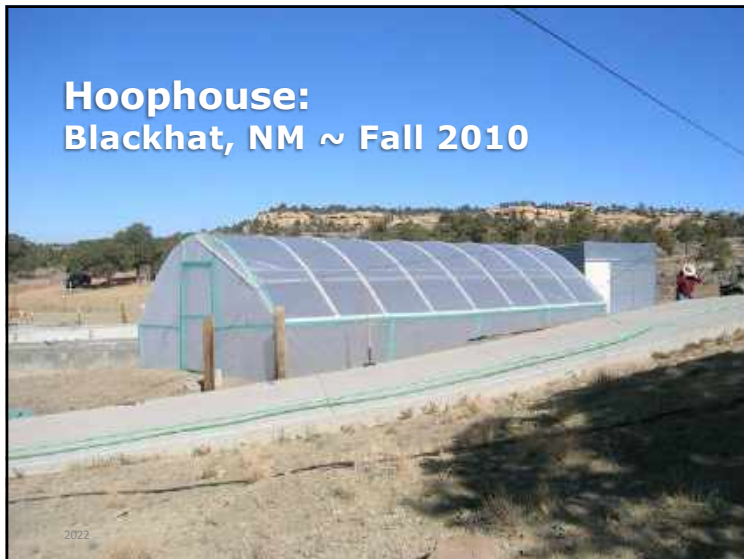
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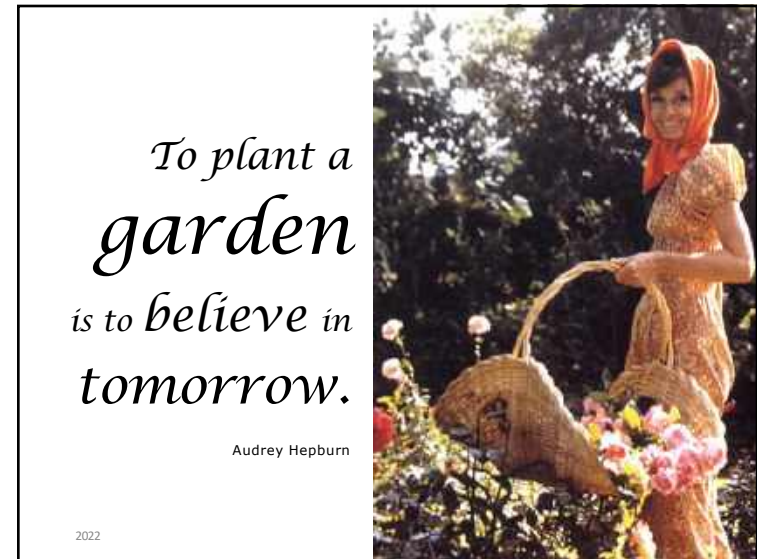
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