PROPAGATION

Viola Open Cultivar(s)



Etain



TRAY & ROOTING

Unrooted Cuttings

(URC)

Rooting Hormone

Yes

Trav Size(s)

Form

72, 105

Plants Per Cell

1

Wks. From Stick To

5-6

Transplant

Pinch?

Yes

Days from stick to pinch

14-21

FERTILITY

Fertilize Through Mist? No

100-150 ppm N (20-6-22

Fertilizer Rate

or 22-5-16 [15-0-15

under low-light

conditions])

Moderate: (2.0-3.5 mS EC Range

via SME)

pH Range 5.4 - 5.8

TEMPERATURE

Average Soil Temperature 65-72°F (18-22°C)

Average Air Temperature 58-65°F (14-18°C)

IRRIGATION

Level 3: Keep media

moderately moist with Irrigation Frequency

mild dry cycles

LIGHT

Supplemental No

Benefits From Shade? No

POTENTIAL DISEASES

Botrytis, Alternaria, Pythium

POTENTIAL PESTS

aphids, whitefly, fungus gnats

PGR SUGGESTIONS

Optional 300-500 ppm Florel (3.9% Ethephon)

TIPS

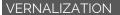
- Plants are sensitive for high pH and high salt levels. Monitor pH and EC regularly to avoid any issues.
- Overmisting can lead to pronounced nutrient deficiencies; monitor mist carefully to avoid consistently saturated media. Tenting has proven to be an effective strategy for some growers.



FINISHING

Viola Open Cultivar(s)

Viola cornuta



Vernalization Required? **Cooling**

Vernalization Duration

Minimum

6-8 weeks

Vernalization Temperature 35-40°F (1.6-4.4°C)

CONTAINER SIZE	PLANTS PER POT	TRANSPLANT TO FINISH (WEEKS)
4 in./qt (10-12 cm)	1	8-10
6 in./Gal. (15-16 cm)	2-3	9-12

FERTILITY

200-250 ppm N (20-6-22 or 22-5-16

Fertilizer Rate [15-0-15 under low-light

conditions])

EC Range Moderate: (2.0-3.5 mS via SME)

pH Range 5.8-6.3

TEMPERATURE

45-55°F (7-13°C) Day Temperature Night Temperature 35-45°F (2-7°C)

IRRIGATION

Level 3: Keep media moderately Irrigation Frequency



LIGHT

Photoperiodic **Daylength Neutral** requirements

Supplemental? None

Benefits From Shade? No

PINCHING

Finishing Pinch? No

Transplant to pinch (days) N/A

POTENTIAL DISEASES

Botrytis, Alternaria, Pythium

POTENTIAL PESTS

aphids, whitefly, fungus gnats

PGR SUGGESTIONS

- Bonzi (0.4% Paclobutrazol) 5-40ppm spray
- 5-8 ppm Sumagic (0.055% Uniconazole)





'Etain'

TIPS

- Finish crop as cool as possible with low day and night temperatures and high light.
- Cooling for 4-5 weeks is required for superior flowering at 40°F (4.4°C)

FEATURES AND BENEFITS

Viola Open Cultivar(s)

Viola cornuta

KEY INFORMATION

First Year Flowering? Yes

Bloom Time

Spring

Exposure Full Sun to Shade

Hardiness Zone 4-6

Height **4-8 inches (10-20 cm)**

Width **8-14 inches (20-36 cm)**

DESCRIPTION

Great early perennial with semi-evergreen foliage and pansy-like flowers that offer more than an annual Viola. Will reseed regularly and establish sporadic colonies wherever growing conditions are favorable.

CONSUMER APPEAL

- A great cool-season perennial that will bloom in the spring, stop blooming during the summer heat, and bloom again in the autumn. A delightful way to book-end the growing season.
- Violas can be good pollinator plants, they are also resistant to deer and the allelopathic biochemicals produced by black walnut trees.

GARDEN ATTRIBUTES

- Viola cornuta features cute single flowers that can be used as solo cut flowers. The flowers are also edible.
- A nice choice for perennial borders, containers, hanging baskets, window boxes, spring centerpiece displays, or sprinkled throughout the garden to declare "spring is here!".
- Prefers consistently moist soils that are relatively welldrained and rich in organic matter. Can be grown in clay soils if in full sun and not overwatered.

NATIVITY

Western Europe



COMPANION PLANTS

Alstroemeria, Monarda, Eupatorium (Ageratina), Polemonium, Phlox, Dianthus, Veronica

COMMON NAMF(S)

violet, horned violet, horned pansy

Tech.NA@DummenOrange.com 614-850-9551

DummenOrange.com