

## Pansy Spring Matrix™ F<sub>1</sub> Series

(Viola x wittrockiana)

Annuals Culture (revised 02/14/23)

### Your simplest solution for Spring

If you're using another pansy series and you're not happy with the uniformity or plant habit, try Spring Matrix. It's designed for cool-season, short-day growing conditions – or when you need a large bloom that maintains good presentation under cold, dark, wet Winter production.

**Plug crop time:** 5 weeks

**Transplant to finish:** Spring 6 to 7 weeks, Autumn 4 to 5 weeks

- *Your best option for shorter days and cool growing* – plants look better, last longer and have the tightest flowering window for less dump.
- Most uniform Spring-flowering series produces large blooms that maintain good presentation under cold, dark, wet Winter production.
- Superior branching without stretching puts more flowers on every plant.

## General Information

| Exposure         | Bloom Season                         | Height           | Spread                 | Spacing               |
|------------------|--------------------------------------|------------------|------------------------|-----------------------|
| Partial Sun, Sun | Early Spring, Spring, Autumn, Winter | 8 in.<br>(20 cm) | 8-10 in.<br>(20-25 cm) | 6-8 in.<br>(15-20 cm) |

## Germination

| Seed Form | Recommended Plug Size | Seeds/Cell | Plug Crop Weeks | Days from 50% to maximum germination | Initial Media pH/EC (1:2)   | Cover Seed |
|-----------|-----------------------|------------|-----------------|--------------------------------------|-----------------------------|------------|
| PRM, RAW  | 288                   | 1          | 5               | 3-4                                  | 5.5-5.8 pH<br>0.75 mmhos/cm | Yes        |

## Plug Production

|                    | Stage 1              | Stage 2                                   | Stage 3  | Stage 4  |
|--------------------|----------------------|---|--|--|
| <b>Moisture</b>    | Level 4              | Level 3-4                                 | Level 3-4  | Level 2-4  |
| <b>Temperature</b> | 65-70°F<br>(18-21°C) | 60-65°F<br>(16-18°C)                      | 60-65°F<br>(16-18°C)   | 55-60°F<br>(13-16°C)   |
| <b>Light</b>       | Optional             | 2,500 f.c.<br>(26,900 Lux)                | 2,500 f.c.<br>(26,900 Lux)                                   | 5,000 f.c.<br>(53,800 Lux)                                   |
| <b>Fertilizer</b>  |                      | Less than 100 ppm N<br>(Less than 0.7 EC) | 100 to 175 ppm N<br>(0.7 to 1.2 EC)                          | 100 to 175 ppm N<br>(0.7 to 1.2 EC)                          |
| <b>PGR</b>         |                      |   | ancymidol/5-10 ppm/Spray<br>daminozide/1,500-2,500 ppm/Spray | ancymidol/5-10 ppm/Spray<br>daminozide/1,500-2,500 ppm/Spray |

### Fertilizer Notation

It is best to use a nitrate-based fertilizer with low phosphorus to reduce stretch. Maintain a media pH of 5.5 to 5.8 and EC at 0.7 to 1.0 mS/cm (1:2 extraction). A higher pH (greater than 6.2) can induce Boron deficiency and also encourages fungal black root rot caused by *Thielaviopsis* sp.

### Propagation Key Tips

Adjust PGR rates and frequency of application depending on local conditions in Stages 3 and 4.

## Growing on to Finish

| Growing on Temperature   | Target Media pH/EC (1:2)       | Fertilizer                          | Daylength            |
|--|--------------------------------|-------------------------------------|----------------------|
| <b>(day)</b> 60-70°F (16-21°C)<br><b>(night)</b> 50-55°F (10-13°C) | 5.5-5.8 pH<br>1.5-2.0 mmhos/cm | 175 to 225 ppm N<br>(1.2 to 1.5 EC) | Facultative Long Day |

## Crop Scheduling

| Container Size               | Plugs/Pot | Crop Time   | Season       | PGR  |
|------------------------------|-----------|-------------|--------------|--|
| Cell Pack                    | 1 (ppp)   | 6-7 (weeks) | Early Spring | daminozide/chlormequat chloride tank mix 1,500/500 ppm Spray |
| 4"/4.5"/Quart/10 cm          | 1 (ppp)   | 6-7 (weeks) | Early Spring | daminozide/chlormequat chloride tank mix 1,500/500 ppm Spray |
| 10" Pot or HB/3 Gallon/25 cm | 7-9 (ppp) | 6-7 (weeks) | Early Spring | daminozide/chlormequat chloride tank mix 1,500/500 ppm Spray |

### Common Problems

Insects: Fungus Gnats and Shore Flies in plug stage and Aphids in early stages after transplant. Disease: Damping off, Black Root Rot, Foliar Leaf Spots, Botrytis

### Finishing Key Tips

Adjust PGR rates and frequency of application depending on local conditions. If growing frost-free (northern overwinter culture from Autumn transplant), plan for crop times of 17 to 18 weeks from transplant to finish.

NOTE: Growers should use the information presented here as guidelines only. PanAmerican Seed recommends that growers conduct a trial of products under their own conditions. Crop times will vary depending on the climate, location, time of year, and greenhouse environmental conditions. It is the responsibility of the grower to confirm the treatment is available in their region as well as read and follow all the current label directions relating to the products. Nothing herein shall be deemed a warranty or guaranty by PanAmerican Seed of any products listed herein. PanAmerican Seed's terms and conditions of sale shall apply to all products listed herein.

## Variety Pictures



PanAmericanSeed™

PanAmerican Seed Co.  
622 Town Road, West Chicago, Illinois, USA, 60185-2698  
630 231-1400 Fax: 630 231-3609 PanAmSeed.com

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