GrowerFacts

PanAmerican Seed®

Leucanthemum Madonna F_1

(Leucanthemum x superbum)

Perennials Culture (revised 10/14/25)

Plug crop time: 5 to 6 weeks
Transplant to finish: 10 to 14 weeks

- Madonna offers better uniformity in height and habit over the competition.
- Compact, first-year-flowering F1 shasta has a critical daylength of 14.5 hours, making it an attractive alternative to vegetative varieties that doesn't require vernalisation and has no risk of bacterial infection.
- Features excellent vigour and leaf quality for optimal finishing in quarts to large containers using multiple plugs.
- It also offers a reduced percentage of "too small" plants compared to standard seed varieties.
- With a larger percentage of saleable plants, Madonna requires less labour for harvesting and grading.
- Up to 15% of petals may have a lacy edge for a unique look.

General Information

Exposure	Bloom Season	Height	Spread	Spacing
Sun	Summer, Late Summer, Autumn	8-10 in. (20-25 cm)	8-12 in. (20-30 cm)	12 in. (30 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
RAW	288 72	1 4	6-7 7-8	4-10	5.5-6.2 pH 0.2-0.5 mmhos/cm	Optional

Plug Production

	Stage 1	Stage 2	Stage 3	Stage 4
Moisture	Level 4	Level 3-4	Level 2-3	Level 2-3
Temperature	68-77°F (20-25°C)	65-68°F (18-20°C)	65-68°F (18-20°C)	60-65°F (16-18°C)
Light	Optional	3,000-5,000 f.c. (32,300-53,800 Lux)	5,000-7,000 f.c. (53,800-75,300 Lux)	5,000-7,000 f.c. (53,800-75,300 Lux)
Fertiliser		Less than 100 ppm N (Less than 0.7 EC)	100 to 175 ppm N (0.7 to 1.2 EC)	100 to 175 ppm N (0.7 to 1.2 EC)

Vernalisation

No

Juvenility

Needs a minimum of 10 true leaves before forcing via night interruption (preferred forcing method) or day extension (min. 16 hr.).

Fertiliser Notation

Use well-balanced Calcium Nitrate-based fertiliser. Do not give continuous feed to prevent high salt levels. Best to leach with fresh water periodically.

Propagation Key Tips

Avoid high soluble salts. Provide an active climate, including air movement and relatively high light levels. Do not grow too long, as old plugs show irregular growing after transplant.

Growing on to Finish

Growing on Temperature	Target Media pH/EC (1:2)	Fertiliser	Daylength
(day) 65-72°F (18-22°C) **(night)** 57-60°F (14-16°C)	5.5-6.2 pH 0.9-1.1 mmhos/cm	100 to 175 ppm N (0.7 to 1.2 EC)	Obligate Long Day

Daylength Notation

Plant needs a minimum of 14.5 hrs. daylength to initiate flowering. Responds very well to night interruption (4 hrs. between 10 p.m. and 2 a.m.) for Spring Forcing. Juvenility ends at 10 leaves.

Crop Scheduling

Crop Type	Container Size	Plugs/Pot	Crop Time	Season	PGR
Annual	4"/4.5"/Quart/10 cm	1 (ppp)	12-14 (weeks)	Late Spring, ADT 65°F (18°C)	-
Annual	4"/4.5"/Quart/10 cm	1 (ppp)	12-13 (weeks)	Autumn, ADT 68°F (20°C)	daminozide 2,500-3,000 ppm Spray
Annual	4"/4.5"/Quart/10 cm	1 (ppp)	12-13 (weeks)	Autumn, ADT 68°F (20°C)	paclobutrazol 20-30 ppm Spray
Annual	4"/4.5"/Quart/10 cm	1 (ppp)	11-12 (weeks)	Summer, ADT 68°F (20°C)	paclobutrazol 20-25 ppm Spray
Annual	4"/4.5"/Quart/10 cm	1 (ppp)	11-12 (weeks)	Summer, ADT 68°F (20°C)	uniconazole 5 ppm Spray
Annual	4"/4.5"/Quart/10 cm	1 (ppp)	10-11 (weeks)	Summer, ADT 78°F (26°C)	daminozide 5,000-6,000 ppm Spray
Annual	4"/4.5"/Quart/10 cm	1 (ppp)	11-12 (weeks)	Summer, ADT 68°F (20°C)	daminozide 2,500-3,000 ppm Spray
Annual	4"/4.5"/Quart/10 cm	1 (ppp)	10-11 (weeks)	Summer, ADT 74°F (23°C)	uniconazole 5-10 ppm Spray
Annual	4"/4.5"/Quart/10 cm	1 (ppp)	10-11 (weeks)	Summer, ADT 78°F (26°C)	paclobutrazol 20-30 ppm Spray
Annual	4"/4.5"/Quart/10 cm	1 (ppp)	10-11 (weeks)	Summer, ADT 78°F (26°C)	uniconazole 10 ppm Spray
Annual	4"/4.5"/Quart/10 cm	1 (ppp)	11-12 (weeks)	Summer, ADT 68°F (20°C)	-
Annual	5"/6"/1 Gallon/15 cm	1-3 (ppp)	12-15 (weeks)	Late Spring, ADT 65°F (18°C)	-
Annual	5"/6"/1 Gallon/15 cm	1 (ppp)	11-12 (weeks)	Summer, ADT 68°F (20°C)	-

Fertiliser Notation

Use a well-balanced Calcium Nitrate-based fertiliser. Fertiliser rate at 140 to 160 ppm. Do not use continuous feed to avoid high soluble salt levels. Best to leach with fresh water periodically.

Chemical Sensitivity

Do not use abamectin or allow it to be in contact (even gas from a neighboring compartment). This will kill the crop.

Common Problems

Irregular growth can result from old plugs or high salt levels. Variable finishing can occur due to natural daylength being below critical, or not providing night interruption.

Bulking Strategy

Use advised temperatures, grow below 12-hour daylength and watch out for light pollution from neighboring departments.

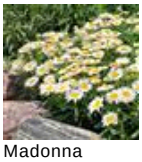
Finishing Key Tips

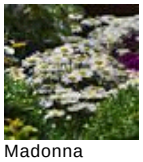
For 2 Gallon, use 3-4 plugs per pot.

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.

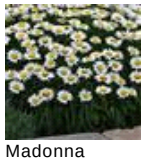
Variety Pictures


Madonna


Madonna


Madonna


Madonna


Madonna

PanAmerican Seed Co.
622 Town Road,West Chicago, Illinois, USA, 60185
+1 800-231-7065 PanAmSeed.com

™ denotes a trademark of and ® denotes a registered trademark of Ball Horticultural Company in the US. It may also be registered in other countries.
©2026 Ball Horticultural Company