

Arabis Lotti

(*Arabis caucasica*)

Germination

Media

Use a well-drained, disease-free, soilless media with a pH of 5.8 to 6.5 and a medium initial nutrient charge (EC 0.75 mmhos/cm).

Sowing

Sow 3 to 4 seeds per cell in 288 or larger plug trays. Do not cover the seeds. Spray preventively with fungicide against damping off.

Stage 1 – Germination takes 4 to 7 days.

Soil temperature: 65 to 68°F (18 to 20°C) Light: Light is optional. Moisture: Keep soil wet (level 4) during Stage 1. Humidity: Maintain 95 to 97%+ relative humidity (RH) until radicles emerge.

Plug Production

Stage 2

Soil temperature: 65 to 68°F (18 to 20°C) Light: Can be up to 2,500 f.c. (26,900 Lux). Moisture: Reduce soil moisture slightly (level 3 to 4) to allow the roots to penetrate into the media. Don't let the media dry out. Fertilizer: Apply fertilizer at rate 1 (less than 100 ppm N; less than 0.7 mmhos/cm EC) from nitrate-form fertilizers.

Stage 3

Soil temperature: 60 to 65°F (16 to 18°C) Light: Can be up to 2,500 f.c. (26,900 Lux). Moisture: Allow the soil moisture to dry to level 3 (surface becomes brown to dark brown) before watering. Fertilizer: Maintain fertilizer at rate 1 (less than 100 ppm N; less than 0.7 mmhos/cm EC) from nitrate-form fertilizers and keep media with a medium pH of 5.8 to 6.5 Growth Regulators: Not needed.

Stage 4

Soil temperature: 60 to 65°F (16 to 18°C) Light: Can be up to 5,000 f.c. (54,000 Lux). Moisture: Same as Stage 3. Fertilizer: Increase fertilizer to rate 1-2 (up to 175 ppm N; up to 0.75 mmhos/cm EC) from nitrate form fertilizers.

Growing On to Finish

Container Size

3.5 to 5-in. (9 to 13-cm) square/quart pots: 1 plug per pot
Gallon (7 in./18 cm): 1 to 3 plugs per pot

Media

Use a well-drained, disease-free, soilless media with a pH of 5.8 to 6.5 and a medium initial nutrient charge (EC 0.75 mmhos/cm).

Vernalization:

Required for flower induction; approximately 8-10 weeks with temperature at 35-44°F (2-7°C). Keep frost-free and use fleece cover for outside overwintering.

Temperature

Nights: 46 to 50°F (8 to 10°C)

Days: 50 to 65°F (10 to 18°C)

Note: Lower temperatures don't harm plants, but delay growing-on time. A day temperature of 16-18°C results in approx. 6-7 weeks crop time.

Light

No additional light is required. High light will enhance flowering; at higher temperatures, additional lighting is advised for optimizing plant quality.

Photoperiod

Lotti is a day-neutral plant after cold treatment.

Irrigation

Maintain media between medium moist and medium wet (level 3-4). Avoid both excessive watering and drought. Let media dry until substrate color is light brown (level 2) before re-saturating.

Fertilizer

Apply fertilizer at rate 2 to 3 (150 to 225 ppm N; 1.0 to 1.5 mmhos/cm EC). Maintain the pH at 5.8 to 6.5.

Growth Regulators

Arabis is responsive to B-nine/Alar (daminozide) 2500 ppm (3.0 g/l 85% formulation or 4.0 g/l of 64% formulation). Start treatments in early bud stage and repeat as needed.

Pinching

Not needed.

Spacing

Space plants when foliage is touching.

Post Production Care

Crop Scheduling

Sow to transplant (288 cell plug): 5 to 6 weeks

Transplant to flower: 25 to 28 weeks

Total crop time: 30 to 34 weeks

Note: Larger pots and/or more plugs per pot may add one more week crop time.

Normal production: Sowing late July to early September will give natural flowering from mid-February to late March the following year.

Note: Do not sow later than week 33-34 for NW Europe to prevent enlarging flowering gap between Deep Rose and White.

Common Problems

Insect: Aphids

Disease: Botrytis, Downy Mildew, Pythium

Physiological: Leaves may turn reddish-purple during winter.

