



Fascination[®]

PLANT GROWTH REGULATOR (PGR) SOLUTION



For use on lilies.

ACTIVE INGREDIENTS:

N-(phenylmethyl)-1H-purine 6-amine	1.8% w/w
Gibberellins A ₄ A ₇	1.8% w/w
Other Ingredients	96.4% w/w
Total	100.0% w/w

EPA Est. No. 33762-IA-001

EPA Reg. No. 73049-41

List No. 02571

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**KEEP OUT OF REACH OF CHILDREN
CAUTION**

For **MEDICAL** and **TRANSPORT** Emergencies **ONLY**
Call 24 Hours A Day 1-800-892-0099.

For All Other Information Call 800-89-VALENT (898-2536).

1.0

FIRST AID

If in eyes

- Hold eye open and rinse slowly and gently with water for 15-20 minutes.
- Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye.
- Call a poison control center or doctor for treatment advice.

HOT LINE NUMBER

Have the product container or label with you when calling a poison control center or doctor, or going for treatment. For medical emergencies, you may also call toll-free 1-800-892-0099 for treatment information.

2.0 PRECAUTIONARY STATEMENTS

2.1 HAZARD TO HUMANS & DOMESTIC ANIMALS CAUTION

Causes moderate eye irritation. Avoid contact with eyes or clothing. Wash thoroughly with soap and water after handling and before eating, drinking, chewing gum, or using tobacco.

2.2 Personal Protective Equipment (PPE)

Applicators and other handlers must wear:

- Long-sleeved shirt and long pants
- Waterproof gloves
- Shoes plus socks

2.3 User Safety Requirements

Follow manufacturer's instructions for cleaning and maintaining PPE. If no such instructions for washables, use detergent and hot water. Keep and wash PPE separately from other laundry.

2.4 User Safety Recommendations

User should:

- Wash hands before eating, drinking, chewing gum, using tobacco, or using the toilet.
- Remove PPE immediately after handling this product. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.
- Remove clothing/PPE immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing.

2.5 Environmental Hazards

For terrestrial uses: Do not apply directly to water, or to areas where surface water is present or to intertidal areas below the mean high water mark. Do not contaminate water when disposing of equipment washwaters or rinsate.

3.0 DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling. Do not apply this product in a way that will contact workers or other persons, either directly or through drift. Only protected handlers may be in the area during application. For any requirements specific to your State or Tribe, consult the agency responsible for pesticide regulation.

4.0 AGRICULTURAL USE REQUIREMENTS

Use this product only in accordance with its labeling and with the Worker Protection Standard, 40 CFR Part 170. This Standard contains requirements for the protection of agricultural workers on farms, forests, nurseries, and greenhouses, and handlers of agricultural pesticides.

It contains requirements for training, decontamination, notification, and emergency assistance. It also contains specific instructions and exceptions pertaining to the statements on this label about personal protective equipment (PPE) and restricted-entry interval. The requirements in this box only apply to uses of this product that are covered by the Worker Protection Standard.

Do not enter or allow worker entry into treated areas during the restricted entry interval (REI) of 4 hours, unless wearing appropriate PPE.

PPE required for early entry to treated areas that is permitted under the Worker Protection Standard and that involves contact with anything that has been treated, such as plants, soil, or water, is:

- Coveralls
- Waterproof gloves
- Shoes plus socks

5.0 PRODUCT INFORMATION

Fascination® PGR is an extremely active plant growth regulator. Care must be used in measuring, diluting, and applying *Fascination* PGR.

A foliar application of *Fascination* PGR supplies plants with an additional source of the naturally occurring plant hormones, gibberellin and cytokinin. Gibberellin and cytokinin are involved in nearly all processes of plant development. Together, gibberellin and cytokinin promote a number of desirable effects, including preventing leaf yellowing and delaying flower senescence in lilies.

Additionally, gibberellin applications have been shown to increase flower size, to reduce the minimum temperature required to initiate plant growth, to initiate flowering, and to overcome bud and seed dormancy. Cytokinins are involved in cell enlargement, tissue differentiation, chloroplast development, the stimulation of cotyledon growth, the delay of aging in leaves, and many other aspects of plant development.

6.0 GENERAL INSTRUCTIONS

An effective dose of *Fascination* PGR is strongly dependent on application volume. Plant response can vary if a given rate is applied at different spray volumes. Uniformity of spray solution is equally important. **For foliar applications uniformly apply 2 quarts of finished spray solution to 100 sq. ft. of bench area.**

Differences in plant response to *Fascination* PGR due to differences in plant surfaces, leaf orientation, and plant structure are possible. Extreme temperatures can influence plant response to *Fascination* PGR. Apply *Fascination* PGR during morning or late afternoon hours when drying conditions are slower, and when plants are not under environmental stress.

Tank mixing of this product with any other product, which is not specifically and expressly authorized by the label, shall be the exclusive risk of the user, applicator and/or application advisor.

7.0 DETERMINING OPTIMAL APPLICATION RATES

Fascination PGR contains equivalent portions of 6-Benzyladenine (6BA) and Gibberellin (GA4+7). The rates given on this label are rate ranges and an optimum *Fascination* PGR rate depends on desired expectations, and physical and environmental factors. Specific growing practices such as watering, potting media, fertilization, temperature, and light conditions will affect plant responses to a given *Fascination* PGR rate.

Results from *Fascination* PGR applications are dependent upon timing, rate, frequency of application, and plant vigor at application, and plant tissues that are sprayed.

To determine optimum use rates, conduct trials on a small number of plants under actual use conditions using the lowest indicated rate.

7.1 Limitations

- Do not apply to plants under pest, nutritional, or water stress. *Fascination* PGR will not correct or substitute for treatment of pest, nutrient, or water stresses, all of which may result in lower leaf yellowing as a symptom.
- The active ingredient in *Fascination* PGR is not readily translocated throughout the plant following applications. Thus, plant parts not covered with *Fascination* PGR will not be affected.
- Do not apply this product through any type of irrigation system.
- Avoid drift onto non-target species or plant tissues.
- Do not mix *Fascination* PGR with pesticides or fertilizers.
- Over-application results in accelerated growth and excessive elongation.
- Do not apply *Fascination* PGR to any food crop.
- Do not reuse soil or media from plants treated with *Fascination* PGR.

8.0 MIXING INSTRUCTIONS AND RATE CONVERSION TABLE

Fascination PGR mixes readily with water.

Foliar Applications: Always make sure application equipment is thoroughly clean before mixing. When preparing *Fascination* PGR for use as a foliar spray, fill tank to one half full. Add the determined optimal amount of *Fascination* PGR according to the rate conversion table below. Complete filling the tank.

8.1 Rate Conversion Table

PPM (parts per million) (6BA/GA4+7)	ml/ L	ml/ Gallon	Fl. Oz./ Gallon
1/1	0.06	0.2	0.007
5/5	0.3	1.1	0.04
10/10	0.6	2.1	0.07
25/25	1.4	5.3	0.18
50/50	2.8	10.5	0.36
75/75	4.2	15.8	0.53
100/100	5.5	21.0	0.71

9.0 APPLICATION INSTRUCTIONS FOR PREVENTION OF LEAF YELLOWING IN EASTER AND LA HYBRID LILIES

Fascination PGR may be applied to Easter (*Lilium longiflorum*) and LA Hybrid (*longiflorum*-Asiatic crosses) lilies to decrease yellowing and necrosis of lower leaves and delay flower senescence. Gradual leaf yellowing usually begins near or before visible bud stage. Post-harvest leaf yellowing is known to be dramatic with rapid leaf yellowing occurring on finished plants prior to their sale. When used preventatively, *Fascination* PGR inhibits both types of leaf yellowing on Easter and LA Hybrid lilies. Additionally, an application of *Fascination* PGR to flower buds has been shown to delay flower senescence.

Apply *Fascination* PGR with standard spray equipment. Avoid high spray pressure when applying to the lower leaves as high pressure can cause “misting” of spray particles. These small spray particles are often deposited on immature foliage and contribute to unwanted stem elongation. For optimum effectiveness, thorough spray coverage must be achieved; only plant parts covered with spray solution will be protected from leaf yellowing. Leaves or parts of leaves not covered with *Fascination* PGR will not be protected from chlorosis.

When making directed applications to lilies, apply enough solution to ensure coverage of the lower leaves, but do not apply more than 15 ml of finished solution per plant, as *Fascination* PGR applied to soil can contribute to unwanted stem elongation due to root uptake.

9.1 Early-season Application Directions

Foliar *Fascination* PGR applications directed only toward the lower foliage have proven to reduce lower leaf yellowing on greenhouse-grown Easter and LA Hybrid lilies.

- Apply 7 to 10 days prior to visible bud stage.
- Protection from leaf yellowing lasts up to 3 weeks after application. Thus, a second application is required for subsequent protection from leaf yellowing.
- Avoid direct contact of spray solution to immature leaves. Spray solution contacting immature leaves has the potential to result in unwanted stem elongation.

Rate (PPM) (parts per million)	Timing	Method
10/10 (6BA/GA4+7)	Early-season (7 to 10 days prior to visible bud stage)	Directed foliar spray Apply only to lower leaves to minimize stem elongation

9.2 Mid-season Application Directions

A second foliar *Fascination* PGR application directed only toward the lower foliage has proven to reduce leaf yellowing on greenhouse-grown Easter and LA Hybrid lilies that often occurs just prior to shipping/flowering.

- Apply 7 to 10 days after visible bud.
- Avoid direct contact of spray solution to immature leaves. Spray solution contacting immature leaves has been known to result in unwanted stem elongation.

Rate (PPM) (parts per million)	Timing	Method
5/5 to 10/10 (6BA/GA4+7)	Mid-season (7 to 10 days after visible bud stage)	Directed foliar spray Apply only to lower leaves to minimize stem elongation

9.3 Late-season Application Directions

A late-season *Fascination* PGR application contacting foliage and flower buds has proven to reduce leaf yellowing and prolong flowering of Easter and LA Hybrid lilies during shipping and in the post-harvest environment. *Fascination* PGR will prevent the chlorosis that often afflicts lilies following storage in a cooler. Protection from leaf yellowing lasts for up to 14 days after placement of plants into a cooler. *Fascination* PGR has shown to increase flower longevity of Easter and LA Hybrid lilies.

- Apply when largest flower bud is at least 8 cm in length. Application to plants with smaller flower buds has been known to result in stem elongation and taller plants.
- Do not apply more than 14 days prior to placement into a cooler or shipping, as suitable protection may not be achieved.

Rate (PPM) (parts per million)	Timing	Method
100/100 (6BA/GA4+7)	Late-season (when first bud reaches at least 8 cm in length and no more than 14 days prior to placement in a cooler or shipping)	Foliar spray Apply to foliage and flower buds

10.0 APPLICATION INSTRUCTIONS FOR PREVENTION OF LEAF YELLOWING IN ORIENTAL LILY

Apply *Fascination* PGR to Oriental lily to decrease yellowing and necrosis of lower leaves and delay flower senescence. Gradual leaf yellowing often begins at or near the visible bud stage. Post-harvest leaf yellowing is known to be dramatic with rapid leaf yellowing occurring on finished plants prior to their sale. When used preventatively, *Fascination* PGR inhibits both types of leaf yellowing on Oriental lily. Additionally, an application of *Fascination* PGR to flower buds has shown to delay flower senescence.

10.1 Mid-season Application Directions

Foliar *Fascination* PGR applications contacting foliage have shown to reduce lower leaf yellowing on greenhouse-grown Oriental lily.

- Apply within 7 to 10 days before or after visible bud stage.
- Protection from leaf yellowing lasts up to 3 weeks after application. Thus, a second application is required for subsequent protection from leaf yellowing.

Rate (PPM) (parts per million)	Timing	Method
100/100 (6BA/GA4+7)	Mid-season (7 to 10 days before or after visible bud stage)	Foliar spray

10.2 Late-season Application Directions

A second foliar *Fascination* PGR application contacting foliage and flower buds has proven to reduce leaf yellowing and prolong flowering of Oriental lily. A late-season *Fascination* PGR application will prevent leaf chlorosis that often occurs just prior to shipping/flowering, in a storage cooler, and during shipping in the post-harvest environment.

- Do not apply more than 14 days prior to placement into a cooler or shipping, as suitable protection may not be achieved.
- Protection from leaf yellowing lasts for 14 days after plants are placed into a cooler.

Rate (PPM) (parts per million)	Timing	Method
100/100 (6BA/GA4+7)	Late-season (no more than 14 days prior to placement in a cooler or shipping)	Foliar spray Apply to foliage and flower buds

11.0 APPLICATION INSTRUCTIONS FOR PROMOTION OF PLANT GROWTH IN POINSETTIA

Apply *Fascination* PGR to poinsettia (*Euphorbia pulcherrima*) to increase stem length, leaf size and bract size. When used early in production during vegetative growth under long days, *Fascination* PGR can enhance stem elongation and help plants achieve a final desired height. First time users of *Fascination* PGR on poinsettia will achieve the best results by testing a small number of plants for each variety due to potential differences in response among varieties.

It is important to avoid an over application that will result in a stretched appearance and lower plant quality. Applications are best early in the crop with sequential applications made if needed. A single application of *Fascination* PGR will not increase plant height by more than one inch.

Apply *Fascination* PGR with standard spray equipment. For optimum effectiveness, thorough spray coverage must be achieved, as foliar applications of *Fascination* PGR are not readily translocated throughout the plant. Thus, plant parts not covered with *Fascination* PGR will not be affected. Non-uniform application often results in a lateral shoot elongating to a greater extent than another.

When making applications of *Fascination* PGR to poinsettia, the use of a wetting agent, such as Capsil, is required to insure complete leaf wetting. *Fascination* PGR that runs off the leaf without wetting is not effective.

11.1 Early-season Application Directions

- Apply during vegetative growth prior to short days and flower initiation if internode extension is desired.
- Application of *Fascination* PGR from start of short days until plants are two to three weeks past first color can contribute to delayed bract coloration or

“greening” of bracts just starting to color. Therefore, application after start of short days through two weeks after first color is not recommended unless the applicator is willing to accept delay in complete bract coloration and shipping.

Rate (PPM) (parts per million)	Timing	Method
3/3 (6BA/GA4+7)	Early-season During vegetative growth prior to flower initiation	Foliar spray Be certain all foliage is evenly wet by spray application

11.2 Late-season Application Directions

A late-season *Fascination* PGR application contacting foliage and bracts has been shown to promote bract expansion. Depending on the developmental stage applied, it also increases final plant height.

- Late-season applications will increase bract size, especially on bracts “stunted” due to growth retardant applications. It will also help elongate petioles and expand bracts where the flower-inflorescence/bracts are “buried” in the leaves, often resulting in plants becoming salable at an earlier date.
- When applying *Fascination* PGR to promote stem and/or bract expansion, start with 3 ppm unless previous experience warrants higher use rates.
- Late applications require the addition of a wetting agent as bracts often develop a very waxy, water repellent cuticle that readily sheds the spray solution.
- The more mature the inflorescence, the higher the *Fascination* PGR rate required to obtain the desired response.
- As *Fascination* PGR promotes bract expansion, bract color appears lighter (diluted) immediately following application as bracts expand. Given time, bracts normally develop a more intense color, although they are often never as dark as bracts on non-sprayed plants.
- Application to bracts of white-colored varieties about 7 days before anthesis has been shown to “whiten” or “smoothen” the appearance of the bracts.

Rate (PPM) (parts per million)	Timing	Method
3/3 to 10/10 (6BA/GA4+7)	Late-season 7 to 14 days before anthesis	Foliar spray Be certain adequate wetting agent is in the spray solution so bracts evenly wet

12.0 APPLICATION INSTRUCTIONS FOR PROMOTION OF PLANT GROWTH IN BEDDING PLANTS, ANNUAL AND PERENNIAL POTTED CROPS, FIELD-GROWN ORNAMENTALS AND BULB CROPS

Apply *Fascination* PGR to bedding plants, annual and perennial potted crops, and bulb crops to promote plant growth and stem elongation. Applying *Fascination* PGR can dramatically promote stem elongation of most dicot and monocot plants. Additionally, utilize a foliar *Fascination* PGR application to overcome over-application(s) of a gibberellin-inhibiting plant growth regulator. In most cases, *Fascination* PGR does not increase the number of leaves formed; stem elongation is due to increased internode length. Therefore, it is important to avoid an over application that will result in a stretched appearance and lower plant quality. *Fascination* PGR does not substitute for good crop culture.

- When applying *Fascination* PGR to promote plant growth, start with 1 ppm unless previous experience warrants higher use rates. The most common rates for using *Fascination* PGR to promote plant growth and stem elongation are 3/3 to 5/5 ppm.
- If desired results are not evident, reapplication or an increase in rate is often warranted. However, wait a minimum of 5 days to reapply *Fascination* PGR to previously treated plants.

Rate (PPM) (parts per million)	Timing	Method
1/1 to 25/25 (6BA/GA4+7)	<i>Apply directly to plant foliage</i>	Foliar application

13.0 STORAGE AND DISPOSAL

Do not contaminate water, food or feed by storage or disposal.

Pesticide Storage: Store below 75°F (24°C). Keep containers tightly closed when not in use.

Pesticide Disposal: Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

Container Disposal: Nonrefillable container. Do not reuse this container. Triple rinse container (or equivalent) promptly after emptying. Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank and drain for 10 seconds after the flow begins to drip. Fill the container 1/4 full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times.

Once cleaned, some agricultural plastic pesticide containers can be taken to a container collection site or picked up for recycling. To find the nearest site, contact your chemical dealer or manufacturer, or contact Ag Container Recycling Council at 202-861-3144 or www.acrecycle.org. If recycling is not available, dispose of empty container in a sanitary landfill or by incineration, or, if allowed by State and local authorities, by burning. If burned, stay out of smoke.

14.0 WARRANTY AND DISCLAIMER STATEMENT

To the fullest extent permitted by law, seller makes no warranty, express or implied, of merchantability, fitness or otherwise concerning use of this product other than as indicated on the label. User assumes all risks of use, storage or handling not in strict accordance with accompanying directions.

Registered and Manufactured by:
Valent BioSciences Corporation
870 Technology Way
Libertyville, IL 60048

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P.O. Box 8025
Walnut Creek, CA 9456-8025



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