Groom® PGR

For Turf Growth Management



A microemulsion concentrate for managing growth, improving quality and stress tolerance, and edging of warm- and cool-season turfgrasses.

ACTIVE INGREDIENT:

Trinexapac-ethyl*	11.3%
OTHER INGREDIENTS:	88.7%
TOTAL:	00.0%
* CAS No. 95266-40-3	

KEEP OUT OF REACH OF CHILDREN CAUTION

See inside label booklet for FIRST AID and additional PRECAUTIONARY STATEMENTS.



EPA Reg. No. 83070-4

EPA Est. No. 5905-GA-I EPA Est. No. 67545-AZ-I

Advan, LLC

2520 Meridian Parkway, Suite 525 Durham, NC 27713

9504500-000-20090805

NET CONTENTS: I Gallon

	FIRST AID
If on skin or clothing:	Take off contaminated clothing. Rinse skin immediately with plenty of water for 15-20 minutes. Call a poison control center or doctor for treatment advice.
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.
If swallowed:	 Call a poison control center or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. Do not induce vomiting unless told to do so by a poison control center or doctor. Do not give anything by mouth to an unconscious person.
If inhaled:	Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth if possible. Call a poison control center or doctor for further 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. You may also contact I-800-424-9300 for emergency medical treatment information.

NOTE TO PHYSICIAN

If a large amount has been ingested, lavage stomach. An aqueous suspension of activated charcoal can be given to absorb remaining toxicant. Treat symptomatically.

PRECAUTIONARY STATEMENTS HAZARDS TO HUMANS AND DOMESTIC ANIMALS CAUTION

Harmful if absorbed through skin, swallowed or inhaled. Causes moderate eye irritation. Avoid breathing vapor or spray mist. Avoid contact with skin, eyes or clothing.

ENVIRONMENTAL HAZARDS

Do not apply directly to water, 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 washwater. Do not apply when weather conditions favor drift from treated areas.

PERSONAL PROTECTIVE EQUIPMENT (PPE)

Some materials that are chemical-resistant to this product are listed below. If you want more options, follow the instructions for Category C on an EPA chemical-resistance category selection chart.

Applicators and other handlers must wear:

- · Long-sleeved shirt and long pants
- Chemical-resistant gloves (such as nitrile, butyl, neoprene, or barrier laminate)
- Shoes plus socks

Discard clothing and other absorbent materials that have been drenched or heavily contaminated with this product's concentrate. Do not reuse them. Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables, use detergent and hot water. Keep and wash PPE separately from other laundry.

Engineering Control Statements

When handlers use closed systems or enclosed cabs in a manner that meets the requirements listed in the Worker Protection Standard (WPS) for agricultural pesticides [40 CFR 170.240 (d)(4-6)], the handler PPE requirements may be reduced or modified as specified in the WPS.

USER SAFETY RECOMMENDATIONS

Users should:

- · Wash hands before eating, drinking, chewing gum, using tobacco, or using the toilet.
- · Remove clothing immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing.

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.

Observe all precautions and limitations on this label and on the labels of each product used in tank mixture with this product.

FAILURE TO FOLLOW THE DIRECTIONS FOR USE AND PRECAUTIONS ON THIS LABEL MAY RESULT IN UNEVEN GROWTH REDUCTION OR SEVERELY STUNTED TURF.

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.

The restricted-entry interval (REI) for this product is 0 days.

Do not enter treated areas without footwear until sprays have dried.

NON-AGRICULTURAL USE REQUIREMENTS

The requirements in this box apply to uses of this product that are NOT within the scope of the Worker Protection Standard for agricultural pesticides (40 CFR part 170). The WPS applies when this product is used to product agricultural plants on farms, forests, nurseries, or greenhouses.

Do not enter treated areas without footwear until sprays have dried.

GENERAL INFORMATION

Groom® PGR is a microemulsion concentrate (MEC) for management of the growth of warm- and cold-season turfgrasses, reducing the frequency of mowing and the amount of grass clippings generated. Applications of Groom® PGR also frequently result in increased turf density, increased color, and increased turf quality. Apply Groom® PGR to turfgrass areas such as residential and commercial lawns, golf courses, sod farms, sports fields, cemeteries and other similar areas that are well-maintained. Groom® PGR is useful in the management of difficult-to-mow areas and can be used to minimize the need for edging turfgrass along sidewalks, curbs, parking lots, driveways, flower beds, fences and around posts, storage sheds, and trees.

Groom® PGR is absorbed by foliar uptake and is rainfast after one hour. Watering-in is not necessary for activation. Environmental conditions, management, and cultural practices that affect turf growth and vigor will influence the response of the turf to Groom® PGR applications. Fertility level, moisture availability, plant vigor, height and frequency of mowing, etc. have all been shown to influence the activity of Groom® PGR. Full growth regulation by Groom® PGR begins at about 3 – 5 days after application.

Notice To User: Plant tolerances to Groom® PGR have been found to be acceptable for the grasses listed on this label; however, due to the large number of species and cultivars of grasses it is impossible to test every one for tolerance to Groom® PGR. Neither the manufacturer nor the seller has determined whether or not Groom® PGR can be used safely on grasses not specified on this label and professional users should first determine if Groom® PGR can be safely applied prior to commercial use by testing on a small scale by applying the lower recommended rate for the turf setting (lawn, fairway, etc.) and evaluating for phytotoxicity and growth inhibition prior to widespread use.

USE PRECAUTIONS

- Do NOT apply Groom® PGR through any type of irrigation system.
- · Do NOT graze treated areas or feed treated clippings to livestock.
- Areas treated with Groom® PGR should continue to receive regular maintenance practices, including irrigation; fertilization; and weed, disease, and insect control when necessary and as recommended for quality turf.
- · Because some herbicides can injure turf, tank mixes with Groom® PGR should be tested on a small scale before widespread use.
- Groom® PGR may cause temporary yellowing that usually disappears approximately one week after application. To minimize yellowing and to enhance the green color of turf, apply readily available nitrogen at a rate of 0.2 0.5 lb. of actual nitrogen per 1,000 sq. ft. If desired, recommended rates of iron per 1,000 sq. ft. can also be used.

APPLICATION INSTRUCTIONS

Excessive turf growth during spring flushes or as a result of fertilization may require higher rates of Groom® PGR (up to 50% greater) to provide an adequate length of control.

For extended growth suppression (up to 8 weeks) when temporary discoloration can be tolerated, a maximum of twice the recommended Groom® PGR rate from the Application Rate Table may be applied.

Groom® PGR use rates may need to be reduced up to 50% for turfgrass grown under conditions of low fertility, compaction, or other factors, which stress the turf

Multiple applications of Groom® PGR can be made each growing season, but do not exceed a total of 7.0 fl. oz./I,000 sq. ft. (305 fl. oz./A; 19.0 pts./A) per year.

Mowing

Groom® PGR generally provides greater suppression when turfgrasses are maintained at lower mowing heights and the application rates in this label have been selected for typical mowing heights; be sure to adjust the application rate based on the actual mowing conditions under which Groom® PGR will be applied. To minimize possible turf injury, apply Groom® PGR at least 4 hours before mowing or at least 1 hour after mowing.

Application Timing

Apply Groom® PGR to actively-growing turf. A lower rate of Groom® PGR should be used if turf is going into dormancy because of high or low temperatures or lack of moisture.

As soon as the turf resumes growth or if more suppression is desired, repeat applications of Groom® PGR may be made but do NOT apply more than 7.0 fl. oz./1,000 sq. ft. per year.

Equipment

Groom® PGR may be applied using backpack sprayers, hand sprayers, boom sprayers, and with spraygun application devices. Be sure to clean the spray equipment thoroughly before use and make sure the sprayer is calibrated and capable of accurate and uniform application. Rinse sprayer with clean water after use and dispose of rinsate in an approved manner.

MIXING AND APPLICATION INSTRUCTIONS

Groom® PGR mixes completely with water (does not contain any petroleum solvents) and may be tank mixed with many commonly-used pesticides and liquid fertilizers. Prepare no more mixture than is necessary for the immediate operation in sufficient carrier (for example 0.5 – 4.0 gals. of water per 1.000 sq. ft.) to provide uniform and thorough coverage.

Once Groom® PGR is uniformly mixed, no further agitation is required when the product is used alone, but agitation may be required for tank mixes. If using Groom® PGR in a tank mixture, be sure to observe all directions for use, sites, use rate dilution ratios, precautions, and limitations, which appear on the tank-mix product's label(s). Do not exceed any label use rate and follow the most restrictive label precautions and limitations and do not mix Groom® PGR with any product which prohibits such mixing.

Backpack and Hand Sprayers (0.5 - 4.0 gal. capacity)

Add all of the required water to the mix tank followed by the appropriate amount of Groom® PGR. Close the sprayer and vigorously shake. Begin application.

Boom and Hand Gun Sprayers

Groom® PGR Alone: Add all the required amount of water to the spray tank. Then, while agitating, add Groom® PGR.

<u>Groom® PGR in Tank Mixtures</u>: When mixing Groom® PGR with other carrier and/or tank mix pesticide products, add the products to the spray tank using the following procedure:

- 1. Always check the compatibility of the tank mix using a jar test with proportionate amounts of Groom® PGR, other products to be used, and the water before mixing in the spray tank. Use a clear glass quart jar with lid and mix the tank mix ingredients in their relative proportions. Invert the jar containing the mixture several times and observe the mixture for approximately 1/2 hour. If the mixture balls-up or forms flakes, sludges, gels, oily films or layers; or precipitates, it is not compatible and do not use the combination in a tank mix.
- 2 Fill tank at least 1/2 full of water
- 3. Maintain sufficient agitation during filling to keep the tank mix uniformly suspended.
- 4. Add all products packaged in water-soluble bags first. Allow the packages to dissolve and the contents to completely disperse into the mix water. Then add water-dispersible granules (WG formulations) while maintaining agitation in the mix tank. Next, add wettable powders (WP formulations). Allow the products to disperse completely before other products are added.
- 5. Add emulsifiable concentrates (EC).
- 6. Add flowable liquids (FL) or suspension concentrates (SC).
- 7. Add Groom® PGR.
- 8. Add spray adjuvants and spray markers. Use surfactants approved for application to turf. Check surfactant label before use.
- 9. Add the remainder of the water.
- 10. Do not leave tank mix combinations in the spray tank for prolonged periods without agitation. Mix and apply all of the spray solution on the same day.

Application Near and Around Monuments and Hardscape Materials

At normal dilution rates, Groom® PGR will not stain brass, bronze, concrete, marble, granite, or other types of stone. Prior to using Groom® PGR around other materials, test on a small scale basis first.

Turf Pre-Stress Conditioning

Multiple Groom® PGR applications, in conjunction with cultural practices such as fertilization, irrigation, drainage and mowing height will delay the onset of stress, improve stress survival, and enhance turfs recovery from stress. Apply Groom® PGR to healthy, actively growing turf before the onset of stress and continue to apply Groom® PGR throughout the growing season as long as the turf remains healthy. NOTE: Do NOT apply more than 7.0 ft. oz./1,000 sq. ft. per year.

When turf top growth slows, energy is redirected to below-ground plant parts, and root and rhizome production increases resulting in root-mass that is often greater in Groom® PGR-treated turf than in similar, untreated turf.

Research indicates that Groom® PGR may also enhance the performance of fungicides. Monthly applications of Groom® PGR at the label rate or biweekly application at 1/2 the label rate may strengthen the turfgrass to help it resist disease. Additionally, if mowing is less frequent, and leaf material removal is reduced, contact and systemic products will remain at effective concentrations on or in the turf longer.

Multiple Groom® PGR applications will result in smaller, more compact turfgrass and reduced leaf area, resulting in reduced transpiration, water use and improved drought tolerance. Increased turf density will also reduce moisture loss from soil evaporation, and additional soil moisture will be available due to increased root depth and mass. Groom® PGR may also enhance cold and heat tolerance by increasing carbohydrate levels.

POA ANNUA CONVERSION/RENOVATION

As part of an overseeding/renovation program allowing better germination and seedling growth of more desirable turf, Groom® PGR may be applied to existing turf infested with stands of Poa annua. By combining Groom® PGR with appropriate cultural practices that help to ensure the vigor and growth of new seedlings, fewer clippings and reduced maintenance traffic on new seedlings will result. Additionally, seed germination is not affected because Groom® PGR is absorbed foliarly. NOTE: Aggressive application rates of Groom® PGR may result in temporary initial discoloration.

Apply Groom® PGR I – 5 days before seeding and before verticutting, scalping, spiking or other similar operations. The following spring, apply the recommended upper end rate of Groom® PGR for the turf type and setting listed in the Application Rate Table. Actual conversion success will also depend on growing conditions, fertilization, rainfall, and other agronomic and environmental conditions.

BERMUDAGRASS OVERSEEDING

Establishment of cool-season turfgrasses can be enhanced by applying Groom® PGR to bermudagrass. By combining Groom® PGR with appropriate cultural practices that help to ensure the vigor and growth of new seedlings, fewer clippings and reduced maintenance traffic on new seedlings will result. Additionally, seed germination is not affected because Groom® PGR is absorbed foliarly. NOTE: Ageressive application rates of Groom® PGR may result in temporary initial discoloration.

Apply Groom® PGR to the bermudagrass I – 5 days before seeding or before verticutting, scalping, spiking, or other similar operations. For maintenance applications, see the Application Rate Table. Use normal seeding rates for your area and turf setting (lawn, fairway, etc.). Actual overseeding results will also depend on growing conditions, fertilization, rainfall, and other agronomic and environmental conditions

APPLICATION WITH TURF MARKING PAINT

When applied before or with marking agents, Groom® PGR can extend the duration of marking visibility. When combining with latex-based marking agents, mix Groom® PGR with water first and refer to the marking agent's products label for further instructions.

To treat approximately 1,000 sq. ft. of line surface area, apply Groom® PGR at 1 oz./gal. of marking paint mix. Refer to the Groom® PGR plus Tank Mixtures section of this label for additional instructions.

Total Torre	Residential and Commercial Turf ²		Golf Course Fa (cut at 1/2" o	
Turf Type	fl. oz./ 1000 sq. ft.	fl. oz./A	fl. oz./ 1000 sq. ft.	
Cool Season				
Bentgrass	0.75	33	0.25	
Fescue, Red	0.75	33		
Fescue, Tall (Ky–31)	1.0	44		
Fescue, Tall (Turf Types)	0.75	33		
Kentucky Bluegrass	0.60	26	0.25	
Mixture (Bentgrass/Poa annua)			0.25 4	
Mixture (K. Bluegrass/Fescue/Ryegrass)	0.75	33		
Mixture (K. Bluegrass/Ryegrass/Poa annua)			0.50 ^s	
Ryegrass, Annual	1.0	44		
Ryegrass, Perennial	1.0	44	0.50	
Warm Season				
Bahiagrass	1.0	44		
Bermudagrass ⁵				
Bermudagrass, Common	0.75	33	0.25	
Bermudagrass, Other Hybrids	0.25	11	0.20	

0.20

0.25

0.38

1.0

0.25 - 0.40

0.50

0.30 - 0.50

0.10 - 0.15

0.10

0.25

1 Seedheads: At rates equal to or higher than the rates in Table 1, Groom® PGR provides seedhead suppression of hybrid bermudagrass grass, and tall fescue. Groom® PGR must be applied prior to seedhead formation. Do not apply more than 7.0 fl. oz./1000 sq. ft. per yea

9

П

16

44

11 – 18

22 13 – 22

4.50 - 6.50

4.5

П

0.20

0.20

0.25

0.3

0.125

Buffalograss

Carpetgrass

Kikuyugrass

Zoysiagrass

Centipedegrass

St. Augustinegrass

Bermudagrass, Tifdwarf

Bermudagrass, Tifgreen (328)

St. Augustinegrass, Texas Common

Bermudagrass, Tifway (419)

ood growing conditions.

irways r less)	Golf Course Greens		Edging/Banding ³	
fl. oz./A	fl. oz./ I 000 sq. ft.	fl. oz./A	fl. oz./ I 000 sq. ft.	fl. oz./A
11	0.125	6	1.0	44
			1.0	44
			1.0	44
			1.0	44
П			0.75	33
П	0.125	7		
22				
22			1.0	44
22			1.0	44
			I – 2	44 – 88
П			I – 2	44 – 88
9			0.50 - 0.75	22 – 33
9	0.062	3	0.50 - 0.75	22 – 33
9	0.125	6	0.75	33
П			0.75	33
			1.0	44
			0.50	22
<u> </u>		<u> </u>	1.0	44
13			1.0	44
			0.40 - 0.80	18 – 36
			0.20	9
6			0.75	33

grass, and partial seedlead suppression of annual bluegrass, banagrass, bunalograss, carpetgrass, common bermudagrass, Kentucky blueer year.

- ² Including, but not limited to: home lawns, parks, recreation areas, golf course roughs, cemeteries, business sites, sports fields, and sod farms.
- ³ Groom® PGR can be applied along the perimeter of lawns, sidewalks, curbs, parking lots, driveways, posts, storage buildings, pet pens, fences, or other areas. Groom® PGR can be used around trees, shrubs, flower beds, and other border plants or similar areas with no injury.Apply Groom® PGR in an 8 12 inch band with a single nozzle sprayer. Use the higher concentration to reduce the growth of turfgrass into adjacent areas.
- ⁴ If yellowing of *Poa Annua* is a concern, use half this rate and apply more frequently. For *Poa annua* conversion/renovation, where temporary discoloration can be tolerated, twice this rate may be applied.
- ⁵ Bermudagrass overseeding preparation: 0.5 oz./1000 sq. ft. for golf fairways and tees; 0.25 oz./1000 sq. ft. for golf greens.

STORAGE AND DISPOSAL

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

PESTICIDE STORAGE: Store in a cool, dry place and avoid excess heat. Do not store below 0° F. If crystals form, store above 70° F, shaking periodically until crystals are dissolved.

PESTICIDE DISPOSAL: Pesticide wastes are toxic. Improper disposal of excess pesticide, spray mixture, or rinsate is a violation of Federal Law. If these wastes cannot be disposed of by use according to label instructions, contact your State Pesticide or Environmental Control Agency, or the Hazardous Waste representative at the nearest EPA Regional Office for guidance.

CONTAINER DISPOSAL: Nonrefillable container. Do not reuse or refill 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 ½ 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. Then offer for recycling, if available, or puncture and dispose of in a sanitary land-fill, or by incineration, or if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Read the "Warranty and Limitation of Damages" section below before buying or using this product. If the terms are not acceptable, return the product at once, unopened and the purchase price will be refunded.

WARRANTY AND LIMITATION OF DAMAGES

CONDITIONS OF SALE: Advan, LLC warrants that this product conforms to the chemical description on the label and is reasonably fit for the purposes stated on the label when used in accordance with the directions under normal conditions of use. This warranty does not extend to the use of this product contrary to label instructions, or under abnormal use conditions, or under conditions not reasonably foreseeable to Advan, LLC. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, ADVAN, LLC DISCLAIMS ALL OTHER WARRANTIES EXPRESS OR IMPLIED, INCLUDING ANY WARRANTY OF FITNESS OR MERCHANTABILITY. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, ADVAN, LLC SHALL NOT BE LIABLE FOR CONSEQUENTIAL, SPECIAL, OR INDIRECT DAMAGES RESULTING FROM THE USE OR HANDLING OF THIS PRODUCT, AND ADVAN, LLC'S SOLE LIABILITY AND BUYER'S AND USER'S EXCLUSIVE REMEDY SHALL BE LIMITED TO THE REFUND OF THE PURCHASE PRICE. BUYER AND USER ACKNOWLEDGE AND ASSUME ALL RISKS AND LIABILITY RESULTING FROM HANDLING, STORAGE AND USE OF THIS PRODUCT. ADVAN, LLC DOES NOT AUTHORIZE ANY AGENT OR REPRESENTATIVE TO MAKE ANY OTHER WARRANTY, GUARANTEE OR REPRESENTATION CONCERNING THIS PRODUCT.

 $\mathsf{Groom}^{\circledR}$ is a registered trademark of Advan, LLC.

