

## CERTAINTY® TURF HERBICIDE USE IN ST. AUGUSTINEGRASS Q&A

- CERTAINTY TURF HERBICIDE IS LABELED TO CONTROL OR SUPPRESS 35 WEED SPECIES INCLUDING, YELLOW AND PURPLE NUTSEDGE, KYLLINGA SPECIES, ANNUAL BLUEGRASS, QUACKGRASS, AND JOHNSONGRASS SEE LABEL FOR COMPLETE LIST OF WEEDS CONTROLLED AND RECOMMENDED LANDSCAPE, NURSERY, AND ORNAMENTAL USE SITES.
- APPLY 1.25 OUNCE PER ACRE OF CERTAINTY® TURF HERBICIDE WITH 0.25% V/V OF A NONIONIC SURFACTANT IN 20 TO 30 GALLONS OF WATER PER ACRE FOR SELECTIVE WEED CONTROL FOLLOWED, IF NEEDED, BY A SEQUENTIAL APPLICATION OF 1.25 OUNCE PER ACRE AT AN INTERVAL OF 28 DAYS OR GREATER.

APPLICATIONS SHOULD BE MADE WHEN THE WEEDS ARE ACTIVELY GROWING AND NOT DISTURBED FOR TWO DAYS PRIOR TO AND AFTER APPLICATION.

1. Q- CAN I TANK MIX CERTAINTY WITH OTHER TURF HERBICIDES?

A- YES. REFER TO ALL INDIVIDUAL PRODUCT LABELS, SUPPLEMENTAL LABELING AND FACT SHEETS FOR ALL PRODUCTS IN THE TANK MIXTURE, AND OBSERVE ALL PRECAUTIONS AND LIMITATIONS ON THE LABEL. ALWAYS PREDETERMINE THE COMPATIBILITY OF ALL TANK-MIX PRODUCTS TOGETHER IN THE CARRIER BY MIXING SMALL PROPORTIONAL QUANTITIES IN ADVANCE. WHEN MIXING, ADD INDIVIDUAL COMPONENTS TO THE SPRAY TANK IN THE FOLLOWING SEQUENCE: WATER, WATER DISPERSIBLE GRANULES (THIS PRODUCT), WATER-SOLUBLE BAGS, DRY FLOWABLES, Mulsifiable Concentrates, Drift Control Additive, Water-soluble Liquids, Nonionic Surfactants.

2. Q- CAN I MIX CERTAINTY WITH OTHER TURF FUNGICIDES OR INSECTICIDES?

A- IT IS NOT RECOMMENDED TO MIX CERTAINTY WITH INSECTICIDES OR FUNGICIDES.

3. Q- WHAT AIR TEMPERATURES ARE SAFE WHEN APPLYING CERTAINTY? CAN I APPLY WHEN IT IS HOT? CAN I APPLY WHEN IT IS COLD?

A- CERTAINTY HERBICIDE EFFECTIVENESS IS INFLUENCED BY ENVIRONMENTAL CONDITIONS. THE IDEAL DAYTIME TEMPERATURE FOR APPLYING CERTAINTY IS BETWEEN 65 AND 85 F. CERTAINTY IS GENERALLY LESS ACTIVE AT LOW TEMPERATURES THAN HIGH TEMPERATURES. WEEDS WILL DIE VERY SLOWLY OR NOT AT ALL IF EXTREMELY COOL PROLONGED WEATHER OCCURS DURING AND AFTER TREATMENT. CERTAINTY IS MORE ACTIVE AT HIGH TEMPERATURES, SO AVOID SPRAYING WHEN THE DESIRABLE TURF IS STRESSED FOR ANY REASON. INJURY IS MORE LIKELY TO OCCUR IF HERBICIDES ARE SPRAYED ON EXTREMELY HOT DAYS.

4. Q- WHAT IS CONTROL VS. SUPPRESSION?

A- CONTROL DESCRIBES A WEED POPULATION REDUCED BY 80% OR MORE. SUPPRESSION IS WHEN THE WEED POPULATION IS REDUCED BY 60% TO 80%.

5. Q- WHAT TYPES OF ST. AUGUSTINE GRASS OR PASPALUM CAN CERTAINTY BE APPLIED TO SAFELY? ANY TYPES SUSCEPTIBLE TO DAMAGE?

A- ST. AUGUSTINE GRASS MAY BE MORE SENSITIVE TO THIS PRODUCT THAN OTHER GRASSES DEPENDING ON ENVIRONMENTAL CONDITIONS, CULTIVAR DIFFERENCES AND OTHER INFLUENTIAL FACTORS. FOR ST. AUGUSTINE GRASS AND SEASHORE PASPALUM, TEST THIS PRODUCT ON A SMALL AREA PRIOR TO WIDE-SCALE USE TO DETERMINE IF THIS PRODUCT IS SUITABLE FOR YOUR MANAGEMENT AND CULTURAL PRACTICES.

6. Q- WHAT WATER VOLUMES PER TREATED AREA ARE RECOMMENDED?
- A- APPLY THIS PRODUCT UNIFORMLY WITH PROPERLY CALIBRATED GROUND EQUIPMENT IN 10 TO 50 GALLONS OF WATER PER ACRE. SELECT SPRAY VOLUMES THAT ENSURE THOROUGH AND UNIFORM WEED COVERAGE. USE EQUIPMENT THAT IS CAPABLE OF CONTINUOUS AGITATION. CHOOSE NOZZLES THAT PROVIDE OPTIMUM SPRAY DISTRIBUTION AND UNIFORM COVERAGE AT A SPRAY PRESSURE APPROPRIATE FOR APPLYING POST EMERGENCE HERBICIDES. AVOID STREAKING, SKIPS, OVERLAPS AND SPRAY DRIFT DURING APPLICATION.
- BACKPACK SPRAYERS, PUMP-UP PRESSURE SPRAYERS, AND OTHER, SIMILAR TYPES OF HAND-HELD SPRAYERS MAY BE USED TO APPLY THIS PRODUCT. APPLY TO FOLIAGE OF VEGETATION TO BE CONTROLLED AT A RATE OF 2 GALLONS OF SPRAY SOLUTION PER 1000 SQUARE FEET. SPRAY COVERAGE SHOULD BE UNIFORM AND COMPLETE. DO NOT SPRAY TO THE POINT OF RUNOFF.
7. Q- WHAT TYPES OF SURFACTANTS ARE RECOMMENDED? ARE ORGANOSILICONES OK AND AT WHAT RATES? ANY SURFACTANT TYPES NOT RECOMMENDED?
- A- USE A NONIONIC SURFACTANT AT 0.25 TO 0.5 PERCENT BY VOLUME (1 TO 2 QUARTS PER 100 GALLONS OF SPRAY SOLUTION). USE ONLY NONIONIC SURFACTANTS THAT CONTAIN AT LEAST 90 PERCENT ACTIVE INGREDIENT. DO NOT USE NONIONIC SURFACTANTS OR OTHER ADDITIVES THAT ALTER THE PH OF THE SPRAY SOLUTION BELOW PH 5. USE OF SURFACTANTS THAT CONTAIN D'LIMONENE, METHYLATED SEED OIL, OR COC (CROP OIL CONCENTRATE) MAY CAUSE TEMPORARY TURF DISCOLORATION. ORGANOSILICONE SURFACTANTS ARE ALSO CLASSIFIED AS NON-IONIC AND CAN BE USED AT THE SURFACTANT PRODUCT LABELED RATE.
8. Q- HOW WILL ACTIVITY BE AFFECTED IF I APPLY A RATE LOWER THAN 1.25 OUNCES PER ACRE OR 0.8 GRAMS PER 1000 SQ. FT.? CAN I APPLY A 1 OUNCE RATE?
- A- CERTAINTY IS LABELED FOR USE IN ST. AUGUSTINE GRASS AT 1.25 OUNCES OF PRODUCT PER ACRE OR 0.8 GRAMS PER 1000 SQ. FT. PLEASE CONSULT YOUR LOCAL EXTENSION OFFICE FOR USING PESTICIDES AT RATES LOWER THAN SHOWN ON MANUFACTURER'S LABEL.
9. Q- HOW MANY TIMES CAN I APPLY CERTAINTY PER YEAR AND HOW LONG BETWEEN EACH TREATMENT?
- A- THE COMBINED TOTAL OF ALL TREATMENTS MUST NOT EXCEED 2.66 OUNCES OF THIS PRODUCT PER ACRE PER YEAR. A SEQUENTIAL APPLICATION OF 1.25 OUNCES PER ACRE MAY BE MADE 4 OR MORE WEEKS AFTER THE INITIAL TREATMENT, IF NEEDED.
10. Q- WILL CERTAINTY HURT ORNAMENTAL PLANTS IN BEDS, INCLUDING ANY TYPES OF TREE PLANTINGS?
- A- THIS PRODUCT MAY BE APPLIED AT RECOMMENDED RATES AS A POST-DIRECTED SPRAY AROUND ANY ESTABLISHED WARM-SEASON ORNAMENTAL GRASS OR ESTABLISHED WOODY ORNAMENTAL SPECIES IN LANDSCAPED AREAS. AVOID CONTACT OF THIS PRODUCT WITH LEAVES OF DESIRABLE PLANTS AS FOLIAR INJURY, DISCOLORATION OR LOSS OF THE PLANT MAY RESULT.
11. Q- DOES CERTAINTY HAVE A SOIL RESIDUAL AND WILL IT MOVE?
- A- SUSCEPTIBLE PLANTS MAY BE INJURED IF SEEDING OR TRANSPLANTED INTO TREATED AREAS UNLESS OTHERWISE DIRECTED IN THIS LABEL. AVOID AREAS WHERE THIS PRODUCT MAY BE WASHED OR MOVED INTO CONTACT WITH ROOTS OF DESIRABLE VEGETATION.

