

The germination of ideas

FEATURES

- Fast germination, strong seedling vigor and rapid establishment
- Superior turf quality
- Excellent Dollar Spot and Brown Patch resistance
- Improved heat tolerance and excellent winter performance
- Uniform dark green color
- Vigorous, uniform, moderately dense growth
- Uses: Ideal for use on golf course greens, tees and fairways

BENEFITS

- Reduced fungicide use
- Competitive against Poa annua
- Year-round quality and performance
- Excellent results at a variety of mowing heights
- Rapid divot recovery

SEEDING RATES

- Seeds/lb: 6,000,000
- Seeds/kg: 13,200,000
- New Turf

 1.5 lbs/1,000 ft²
 45 65 lbs/acre
 7.5 gr/m²
 75 kgs/hectare
- Overseeding/Interseeding
 2 3 lbs/1,000 ft²
 90 -135 lbs/acre
 10 15 gr/m²
 100 150 kgs/hectare

ESTABLISHMENT

- Germination: 3 5 days (6 - 10 days in cooler weather)
- First mowing: approximately 21 days depending on usage
- First limited use for new sites: approximately 6 - 8 weeks depending on conditions



Dominant X-Treme 7 creeping bentgrass blend is a welcome enhancement to Seed Research of Oregon's stable of blends. This blend of three superior performance bentgrass cultivars including 007, SR 1150 and MacKenzie, was designed for superior



performance in all areas where creeping bentgrass can be used for greens or fairways. Dominant X-Treme 7 takes improvements to the next level, providing a denser, even faster establishing, more Dollar Spot resistant turf, with advanced cold weather performance and winter color.

Breeding

Dominant X-Treme 7 comprises a

broad genetic base, carefully matched, resulting in excellent resistance to Dollar Spot, Brown Patch and Pythium. It combines the superior attributes of two separate breeding programs with similar aims but unique gene pools. 007 creeping bentgrass has a broad genetic base developed using plants, identified from the varieties L-93, Southshore and plants collected from older greens on high stress golf courses in the northeast section of the United States. The parents used in the development of 007 were selected for improved Dollar Spot resistance, bright, dark green leaf color, excellent winter color with no purpling and a vigorous, uniform, moderately dense growth habit. SR 1150 was developed by Rutgers University for Dollar Spot resistance and stress tolerance. This superior variety has demonstrated high performance under reduced fungicides on both greens and fairways. MacKenzie was developed for high performance on greens, tees and fairways and ranks high consistently around the world. MacKenzie's performance under a wide range of conditions works well for many golf superintendents.

Uses

Recommended uses for Dominant X-Treme 7 include seeding or sodding golf course putting greens, tees and fairways, either new or renovated, as well as overseeding conversions on greens planted to older, poorer performing varieties that need to be updated. This creeping bentgrass blend adapts well for low mowing on greens as well as for reduced fungicide management on fairways and tees.

Maintenance

Basic maintenance requirements include frequent light top-dressing for greens, reduced nitrogen fertility and occasional grooming. Due to Dominant X-Treme 7 lower fertility requirements and excellent disease resistance, maintenance inputs are greatly lowered. Dominant X-Treme 7 also has reduced thatch production, thus reducing Bentgrass Bloat (Summer Scalp) for easier maintenance. Dominant X-Treme 7 will maintain fast putting speeds at variable greens heights but is perfect for tees and fairways.



IDEAS IN PLAY

Bentgrass Interseeding and Conversion It Does Work!

The introduction of new creeping bentgrass cultivars with superior genetics into stands of annual bluegrass, perennial ryegrass or creeping bentgrass can reduce costs and increase golfer satisfaction. Lower inputs and less fear of turfgrass loss from cold or heat make conversion a long term solution. Superior disease resistance, higher density, improved cool temperature growth with drought and heat tolerance make these cultivars long term solutions.

Key Concepts

- Bentgrass seedlings are very small and initially weak. Varieties such as 007, SR 1150, Flagstick and Tyee have been selected for greater seedling vigor and faster tillering to increase your chances of success.
- In competition for resources including light, water and nutrients an established plant has an advantage over seedlings.
- Creeping bentgrass germination is favored by warmer soil temperatures (above 71 degrees F or 22 degrees C) (See Figures 1 and 2 from University of Minnesota, Horgan, Bauer and Cavanaugh 2015). Timing the overseeding to correspond with favorable growing conditions in summer or early fall increases your chance of success.
- *Poa annua* germination primarily occurs in the fall when temperatures are below 68 degrees F (20 degrees C) see Figure 3 (Kaminski and Dernoeden, 2007) and in Pennsylvania this corresponds to most germination in a 2 week period between late September and mid-October.
- Existing plants must be weakened to give seed or holes created to give young seedlings a chance.

Figure 1 - Bentgrass Seedlings



Poa annua not germinating High Temp = 21.7 Degrees C (71 degrees F)

Figure 2 - Bentgrass Seedlings

Cumulative Germination Day 8 Medium Temp



Poa annua germinating rapidly Medium Temp = 16.1 Degrees C (61 degrees F)

Figure 3 - Poa Annua Seedlings



2001-2002 Temps Below 20 Degrees C (68 degrees F)