



INNOVATIVE and AUSTRALIAN

MANNI-TURF ROOT BUILDER

Mannitol based turf supplement



Barmac Manni-Turf Root Builder is a high quality, multifaceted product specifically formulated to enhance root vigor and mass.

MANNITOL COMPLEXED PRODUCTS

Manni-Turf Root Builder is based on the world patented Mannitol technology. Essential plant micronutrients are complexed in an organic sugar alcohol to create a highly efficient foliar trace element fertiliser. The small molecular size and delivery package containing humectants, spreading and penetrate agents further ensures that the complexed nutrients are phloem and xylem mobile.

ZINC

Zinc is as essential as phosphorus for root development. Zinc plays a vital role with phosphorus assimilation, root hair development and auxin production. Zinc is not very mobile within the plant and can be the limiting factor for root growth and development. **Manni-Turf Root Builder** makes sure this is not an issue.

BORON

Boron is essential for cell wall development and the translocation of sugars throughout the plant membranes. Deficiencies can lead to the failure of roots to spread out and develop properly. Boron accumulates in older leaves and transport of boron from leaves to roots through the phloem is only facilitated in plants where the boron is complexed to a sugar. **Manni-Turf Root Builder** makes sure this happens.

COPPER

Copper is necessary for protein, carbohydrate and nitrogen metabolism. Copper is an essential element for lignin synthesis aiding in cell wall strengthening and prevention of wilting. More importantly copper encourages turf stolonisation.

MAGNESIUM & MANGANESE

Magnesium and Manganese combine to form a major role in chlorophyll production. Both elements contribute to enhance the “greening” effect desired by turfgrass managers. Both elements also assist in cell wall division necessary for increased root mass production.

ANALYSIS

0.24% Boron (B), 0.06% Copper (Cu), 0.6% Magnesium (Mg), 1.08% Manganese (Mn), 5.69% Zinc (Zn)

Pack Size

10 litre



APPLICATIONS INSTRUCTIONS

GENERAL RECOMMENDATIONS: For use as part of a balanced nutritional program when improved root growth is desired.

FOLIAR APPLICATIONS: Apply 50-100 ml per 100 m² of turf (5-10 Liters per hectare) in a convenient volume of water (not less than 400 liters per hectare)
Apply four applications at 4-6 week intervals during the growing season.

MIXING INSTRUCTIONS

1. Put 1/3 of water in tank
2. Add fertilizers and adjuvants. Do not mix with Phosphate based fertilizers
3. Fill tank with water and agitate
4. Add Manni-Turf Root Builder
5. Agitate until mixed

Always conduct a jar test to determine compatibility.