

# MycoApply® Ultrafine Endo/Ecto

Product Specifications & Application Instructions

### **Quick Facts:**



# **Product Name:**

MycoApply® Ultrafine Endo/Ecto

#### **Formulation:**

Suspendable Powder Endomycorrhizal and Ectomycorrhizal Fungi

### **Concentration:**

130,000 Endo & 110 million Ecto Propagules per lb. (286.8 Endo & 242,509 Ecto Propagules per gram)

### **Packaging Options:**

1 lb. Bags (Case = 10) 20 lb. Bags 120 lb. Bulk Barrels 260 lb. Bulk Barrels

### **Applications & Uses:**

Horticulture, Landscaping, Propagation, Turf Care, Arbor Care, Forestry, Restoration, and Erosion Control



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#### 1.0 Overview:

MycoApply® Ultrafine Endo/Ecto is a suspendable powder mycorrhizal inoculum consisting of 4 species of endomycorrhizal fungi and 7 species of ectomycorrhizal fungi. Approximately 95% of the world's plant species form symbiotic relationships with at least one of these types of symbiotic soil fungi. These beneficial fungi greatly increase the effective rooting area of plants, thereby enhancing plant growth, vigor, and tolerance of environmental extremes. MycoApply® Ultrafine Endo/Ecto is a concentrated, fine, suspendable material with a particle size less than 300 microns (will pass a #50 mesh screen) containing mycorrhizal propagules, which colonize roots and extend into the surrounding soil forming an essential link between plants and soil resources. Increasing the rooting area allows improved access to water and nutrients, promoting plant quality and crop performance.

## 2.0 Application Instructions:

MycoApply® Ultrafine Endo/Ecto is a suspendable powder mycorrhizal inoculant that can be sprayed onto bare roots, used as a root dip, drenched into porous soils, hydromulched, or blended into potting media. Use higher rates for propagation or high-stress circumstances.

The goal is to create physical contact between the inoculant and the growing roots.

Soil Drench	Mix with water at a minimum rate of <b>1 oz/gal (7.5 g/L)</b> . Mix well and keep agitated. Spray plant roots or dip roots prior to transplant, or water in as a soil drench (for porous soils only).  1 gal of suspension treats roughly 75 1-gal potted plants.
Restoration	Use 7 to 10 lb/a (7.8 to 11.2 kg/ha) for broadcast or hydromulch operations before or during the seeding operation.
Nurseries and Greenhouses	Inoculum can be incorporated into growing media at a rate of <b>0.5 lb/yd³</b> ( <b>0.3 kg/m³</b> ) for pots and containers. Plug and liner trays used for propagation will require a rate of <b>1 lb/yd³</b> ( <b>0.6 kg/m³</b> ). The higher rate is required to ensure that the propagules are present uniformly in all small cells or cavities.
Turf	Apply during installation or aerification. Use a rate of $0.67$ to $1.62$ oz/ $1,000$ ft <sup>2</sup> ( $204.5$ to $494.3$ g/ $1,000$ m <sup>2</sup> ).
Seed Coat	Use <b>0.7 to 1 lb/a (0.78 to 1.12 kg/ha)</b> of seed.
Landscape Planting	Touch damp roots to the inoculum so a small amount sticks to the roots, or sprinkle into planting holes. Potted plants: <b>0.18 oz/plant</b> ( <b>5 g/plant</b> ). Trees: <b>0.53 oz/in</b> ( <b>5.92 g/cm</b> ) of stem caliper.



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**Product Specs & Application Instructions (continued)** 

# Key Benefits:

# **Root System Growth**

- Mycorrhizal fungi support faster plant establishment
- Mycorrhizal hyphae access water and nutrients beyond the root zone and deliver them to the plant's vascular network
- Increases root absorption area
- Increases overall root biomass



# **Nutrient Efficiency**

- Mycorrhizal hyphae absorb and actively deliver nutrients directly to the roots
- Improves utilization of soil nutrients including:
- Nitrogen
- Phosphorus
- Potassium
- Micronutrients



## Water Absorption

- Mycorrhizal hyphae absorb and transport soil moisture from beyond the root zone to the plant's roots
- The mycorrhizal symbiosis increases the plant's effective water utilization capability:
- Improved tolerance to stress



#### 3.0 Label Guarantee:

### **CONTAINS NON-PLANT FOOD INGREDIENTS**

Soil Amending Guaranteed Analysis

Endomycorrhizal fungi: (130,000 prop/lb Total)

Rhizophagus irregularis, Funneliformis mosseae, Claroideoglomus claroideum,

Claroideoglomus etunicatum (71.7 prop/g each)

Ectomycorrhizal fungi: (110,000,000 prop/lb Total)

Rhizopogon villosulus (11,000 prop/g)

Pisolithus tinctorius (220,509 prop/g) Scleroderma cepa (11,000 prop/g

Total Inert Ingredients: 99.89%

Clay (as carrier)

"This Product is not a Plant Food"

Information regarding the contents and levels of metals in this product is available on the internet at: http://www.aapfco.org/metals.html

### 4.0 Hazard Communication Standard:



**Warning:** Avoid breathing dust. Use outdoors or in a well-ventilated area. If inhaled remove person to fresh air and keep comfortable for breathing. Avoid eye contact. If in eyes rinse cautiously for several minutes. Dispose of contents/container in accordance with local regulation.

First Aid Measures		
If on Skin:	No first aid should be needed.	
If in Eyes:	Rinse opened eye for several minutes under running water. If irritation persists or for foreign body in the eye, get medical attention.	
If Swallowed:	If symptoms persist consult doctor.	
If Inhaled:	Move to fresh air. If irritation or other symptoms occur, get medical attention.	

## 5.0 Physical Properties:

- **5.1 State:** Powder
- **5.2 Appearance:** Grey

### 6.0 Storage & Handling:

- **Storage:** Store in a dry, cool, well ventilated area. Keep sealed in a properly labeled container. Do not expose to temperatures in excess of 140°F or 60°C.
- **6.2 Handling:** Minimize dust generation and accumulation. Use outdoors, or ensure good ventilation/exhaustion when used indoors.
- **Oisposal:** Dispose of all waste in accordance with local, state, and federal regulations.

# 7.0 Limited Warranty & Disclaimer of Warranties:

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

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