

ROOTELLA®

Soil applied
Mycorrhizae product

GENERAL INFORMATION

Mycorrhizae are symbiotic associations that form between the roots of most plant species and fungi. The term Mycorrhiza literally means “fungus root”. It is estimated that 95% of all plant species belong to the genera that form Mycorrhizae. Crops not only respond positively to colonisation by Mycorrhizal fungi, but they may also suffer in their absence; providing natural protection and assistance when it comes to getting plants established.

Estimates of Mycorrhizal filaments present in healthy soil are astonishing. Several kilometres of filaments can be present in less than a thimbleful of soil associated with growing plants.

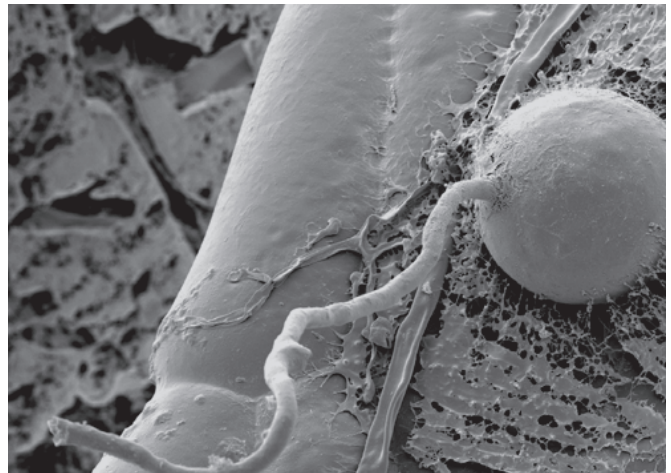
Rootella® contains endo mycorrhizae fungi that can enter the root system to help increase the flow of nutrients from the soil, whilst also providing protection from the harshness of soil micro fauna and flora.

ADVANTAGES + BENEFITS

Mycorrhizal root systems increase the absorbing area of roots 10 to 1000 times thereby greatly improving the ability of the plants to utilise the soil resources.

The fungi in **Rootella®** are able to absorb and transfer fifteen (15) major macro and micro nutrients required for plant growth. Mycorrhizal fungi release powerful chemicals into the soil that dissolve hard to capture nutrients and in particular Phosphorous.

The Mycorrhizal fungi in Rootella improves soil structure through their intricate web of hyphae. The organisms produce Humic compounds and Glomalin, which is a soil glue, binding soil aggregates and improving soil porosity. Furthermore, the Glomalin that these microscopic organisms produce is thought by researchers to be the earth’s carbon storehouse intricately involved in carbon sequestration.



PRODUCT COMPOSITION

ROOTELLA® G

GUARANTEED ANALYSIS

Soil Amending Ingredient.....	9%
<i>Glomus intraradices</i>	2,500 propagules/gr
Total Other Inert Ingredient (Vermiculite).....	91%

ROOTELLA® F

GUARANTEED ANALYSIS

Soil Amending Ingredient.....	10%
<i>Glomus intraradices</i>	20,800 propagules/gr
Total Other Inert Ingredients	
Clay.....	80%
Diatomaceous Earth.....	10%

ROOTELLA® T

GUARANTEED ANALYSIS

Soil Amending Ingredient.....	5%
<i>Glomus intraradices</i>	1,750 propagules/gr
<i>Glomus mosseae</i>	50 propagules/gr
Total Other Inert Ingredients (Vermiculite).....	95%

Plants and trees establish much faster and are less likely to suffer water stress. Mycorrhizae act as a physical barrier to detrimental organisms, increasing strike rate and reducing plant loss.

Rootella® can be used on, but not limited to, the following crops: Wine grapes, table grapes, deciduous fruits, nuts, citrus, raspberries, cotton, vegetables, asparagus, corn, carrots, onions, garlic, capsicums, potatoes, tomatoes, melons, legumes, sorghum, turf grass, ornamental, horticultural, and nursery plants.



APPLICATION GUIDELINES

ROOTELLA® G

PRODUCT APPLICATION

When Applying in Growing Media (best in nursery)

- Mix **Rootella® G** with horticulture growing media, approximately 10 kg/m³. Start with small amount, add more and blend until uniform.
- Avoid adding fertilisers or compost to the growing media.
- Fill seedling trays and continue according to standard growing protocol.
- Contact Roots, Shoots & Fruits for precise application rate for your media and seedling size.

When Coating Bare Root or Root Ball (best upon transplantation)

- Lightly coat root ball (or bare root) with **Rootella® G** granules on all sides to maximize root contact.
- Rates range from 3-8g per plant depending on size.
- Use moisture to stick or create a slurry.
- Transplant and continue according to standard growing protocol.

ROOTELLA® F

PRODUCT APPLICATION

Applicable Crops

Rootella® F may be mixed with seeds in a planter box or applied in-furrow.

Application Rate - Row Crops

- Planter box (dry): 120 g/ha
- In-furrow (dry, drip or spray): 200 g/ha.

Application Rate - Tubers, Bulbs and Vegetables

- In-furrow (dry, drip or spray): 300 g/ha

ROOTELLA® T

PRODUCT APPLICATION

Place **Rootella® T** grow packs in planting hole under seedling / sapling immediately prior to transplantation.

For information on application rates and timing for crops not listed on this brochure, please contact your local distributor or visit the RSF website at www.rd2.co.nz.

For tree crops, it is advisable that applications are done annually in the spring when the root system begins to grow.

COMPATIBILITY

Rootella® may be rendered ineffective in the presence of high rates of phosphorous fertiliser. This biological product may be killed if combined with certain fungicides, soil fumigants, aqueous ammonia, phosphoric acid, or Sulphuric acid. Please check with our compatibility tool on website www.rd2.co.nz/rootella-compatibility-tool/

If applied with large doses of fertilisers, there is a possibility of salt toxicity to the beneficial fungi.

PLANT + ENVIRONMENTAL SAFETY

Rootella® is totally harmless to plants even when recommended rates are exceeded. Exceeding recommended rates is however unnecessary.

Rootella® is totally harmless to both humans and wildlife and is environmentally friendly.

MYCORRHIZAL FUNGI IN CROP ESTABLISHMENT

Rootella® is available in a number of commercial formulations for various application methods. **Rootella® F** for fine power is developed for broad acre in furrow application, **Rootella® G** is a granular formulation for nurseries and bareroot or root ball dipping. There are **Rootella® T** grow packs which are small biodegradable bags that are placed straight into the planting hole with the new plant placed directly on top. We even have a formulation for seed coatings, so please contact RSF for your specific requirements.

Imported and distributed exclusively in New Zealand
By Roots, Shoots & Fruits Ltd • rsf@rd2.co.nz • 09 372 9155

Manufactured by Groundwork BioAg Ltd.