

MetaGrow[™] Handling & Application Information

Filter Size: All MetaGrow products are filtered to 100 mesh (149 micron). Additional filtering up to 200 mesh (74 micron) is available. However, filtering to 200 mesh removes most of the beneficial fungal component, so it is not recommended unless it is necessary, e.g. for subsurface drip irrigation.

Storage: Store out of direct sun and at temperatures below 120° F. Opaque tanks and white painted totes help protect microbes from UV exposure. This applies to any microbial product.

Tank Mixing with Chemical Fertilizers and Pesticides: MetaGrow microbial products are in stasis, and may be tank mixed with most fertilizers, pesticides and fungicides.

PESTICIDES AND FUNGICIDES SHOULD BE CHECKED FOR COMPATIBILITY PRIOR TO TANK MIXING. All SGS microbial products that are in stasis are durable and likely compatible with most tank mixes. Active biological products like fresh compost teas and refrigerated microbe products should not be tank mixed with any synthetic chemicals.

Fertilizer Application Rates: Soil microbes can be sensitive to high fertilizer application rates. Generally, do not apply more than 100 units/acre N or 80 units/acre P in a single application together with or within a few days of a microbial application. It is always more effective to apply chemical fertilizers at lower rates with multiple applications rather than larger single doses.

Microbe Feeding: Microbial inputs are even most effective when applied with diverse microbial food. MetaGrow[™] MFOOD feeds the microbes, enabling successful colonization. Use 0.1 - 0.25 lb MFOOD per gallon of microbial products. Add MFOOD to the injection tank when the tank is half full during filling and minimize splashing to reduce or avoid foaming. Do not pre-mix microbes and MFOOD or CFOOD more than 24 hours before application to avoid activating the microbes. When feeding MetaGrow[™] C microbes, use CFOOD at a rate of 0.2 - 2.5 lb per gallon depending on the application objective.

<u>Application Methods</u>: MetaGrow microbe products can be applied by any application method: injected through irrigation systems, transplant dip, in transplant water, furrow run, sprayed on the berm, side dressed or foliar sprayed.

Soil applications: Soil temperatures below 60° F will result in slower microbe metabolism, so apply at warmer temperatures if feasible. Microbes will successfully colonize at cooler temperatures; they will just work slower. Best results are obtained by applying shortly before important plant growth stages, e.g. bud swell, fruit set, sizing, veraison, etc. When applying by irrigation, inject product at the middle part of an irrigation set for more even distribution through the field and through the soil profile. When spraying microbe solutions on a berm, it is best to irrigate within 4 hours to push the microbes into the soil.

Foliar applications: Apply when shaded temperatures are below 90° F. Dilute with 4 gallons water per gallon of product or more water as needed for good spray coverage. When foliarly applying any microbial product, it is essential to feed the microbes for successful colonization and to wake up microbes in stasis. Feed foliar microbe applications with **MetaGrow MFOOD** or **CFOOD**.