



Active 30-30™

30% Zinc + 30% Manganese
Germination Booster

High-analysis Zinc and Manganese suspension with germination booster to ensure plants get a healthy and vigorous start in life.

PRODUCT CHARACTERISTICS

Specific gravity: 1.76 g/cm³

| Analysis | % w/v | % w/w |
|--|-------|-------|
| Zinc (Zn) as oxide | 30.0 | 17.0 |
| Manganese (Mn) as carbonate | 30.0 | 17.0 |
| Germination Booster (<i>Ecklonia máxima</i>) | 10.0 | 6.0 |



Benefits of Active 30-30™

- Accelerates seedling development because nutrients and plant hormones are available from germination
- Promotes healthy and vigorous root systems to access essential nutrients from the soil
- Extremely safe for application to all seeds due to nutrient forms and source
- Compatible with many other chemical seed treatments
- One product suitable for seed dressing, foliar or soil application, no need for separate products
- Has micro-fine particles ensuring even coverage and effective plant uptake
- Can be applied with a wide range of other agricultural chemicals reducing the number of spray applications needed
- Is pre-mixed in carefully controlled ratios so the crop receives the essential nutrients specific to its growth stage

Germination Booster

Apart from the supply of essential Zinc and Manganese, **Active 30-30™** contains a unique germination booster (*Ecklonia maxima*) which supplies plant hormones (auxins and cytokinins) in a ratio which assists in the stimulation of seed germination and root growth. This booster will work either as a seed or foliar treatment.

The Role of Manganese

Manganese is essential as an enzyme activator which helps with nitrate assimilation. It is also primarily involved in photosynthesis and chlorophyll production.

The Role of Zinc

Zinc forms an enzyme which produces carbon dioxide and maintains CO₂ levels for photosynthesis. Zinc plays an important role in the production of auxins.

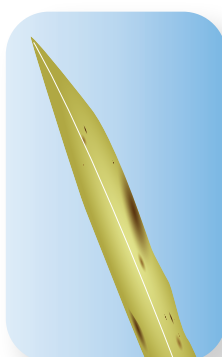
Directions for Use

Agitate contents well before dilution.
Suitable for applications by:

- Seed Dressing
- Foliar
- Aerial

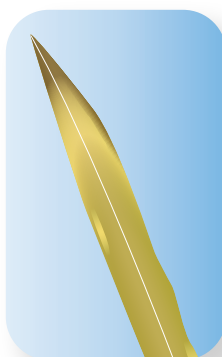
Important Note:

The suggested rates of application are designed for typical South African conditions and such should be used as a guide only. Each farmer's climatic conditions, water quality, soil types, application processes and practices may differ and therefore necessitate corrections to ensure optimum results. Good agricultural practice requires that application be avoided under extreme weather conditions such as temperatures over 28°C, high humidity, frost, rain etc. It is recommended that when applying to a crop or area for the first time, or in combination with other chemicals, a small test area should be sprayed and observed prior to the total spray. Where possible, it is recommended that regular leaf (sap) tests are conducted to determine actual plant nutrient availability during each growth cycle. Soil tests at least once per year are essential.



Manganese Deficiency

- Leaf Speckling
- Susceptibility to root diseases



Zinc Deficiency

Zinc has poor mobility in plants which generally leads to deficiency problems such as:

- Chlorosis
- Stunting
- Dieback
- Rosetting
- Small irregular leaves
- Reduced yield

Application Rates

Seed Dressing

| Crop | Rate/ ton of seed | Min. Dilution | Comments |
|--|-------------------------|---|---|
| Barley, Oats, Triticale, Wheat | 5-8 Lt | Mix sufficient water to ensure adequate coating of seed | If using the lower rate follow-up tissues tests may be required to determine the need for foliar application after emergence. |
| Cotton, Canola, Grain, Legumes (Soybean) | 5-8 Lt | | If these products are applied without dilution uneven coverage will usually occur. Uneven or lumpy coatings can cause dusting when the treated grain goes into subsequent augur operations. Apply between 1 and 3 Lt water / ton of seed depending on seed moisture percentage and ambient temperature. |
| Maize, Rice, Sorghum | 5-8 Lt | | Active 30-30 is compatible with innoculants. |

Foliar Application

| Crops | Rate/Ha | Min. Dilution | Comments |
|--|---------|------------------|-------------------------|
| Barley, Canola, Cotton, Legumes, Maize, Oats, Rice, Sorghum, Triticale Wheat & Tobacco | 1-2 Lt | 1:30 | Apply at 3-4 leaf stage |

MINIMUM DILUTION: A dilution of 1 : 100 means 1 part product: 100 parts water. In hot weather use higher dilution rates.