



# NutraSul 90

KEGRIVER

## Keg River Sulfur: Specifications

### Product Description:

- NutraSul 90 is a Sulfur-Bentonite mixture that contains two complimentary types of Bentonite Clay to thoroughly break down Sulfur pastilles when activated by water:
  - One clay is very high swelling, but hydrates slower
  - The other clay swells less, but hydrates very quickly
  - Keg River testing determined specific clay mix ratios to optimize pastille disintegration
- NutraSul 90 degrades to fine particles to create very high surface area exposure to soil microbes for a good oxidation rate in the soil



### Specifications:

- Guaranteed Analysis: 90% Sulfur (Actual)
- Angle of Repose: 29 degrees
- Particle Size: Size guide number (SGN): 260
- Bulk Density: 75 lbs per ft<sup>3</sup> (1230 Kg per m<sup>3</sup>)
- Packaging: Bulk Truck or Rail, 2700 lb (1225 kg) MBB, 50 lb (22.68 kg) Bags

### Application Recommendations:

- Applied alone or blended with other granular fertilizers
- Application rate is based on agronomic recommendations from soil tests and crop removal rates of Sulfur
- If soil Sulfur is deficient, soluble Sulfate should be applied to crops requiring high Sulfur (e.g. oil seeds & legumes).
- NutraSul 90 can be used in Soil Amendment
- NutraSul 90 can be banded or broadcasted, however broadcasting in the fall has the benefit of exposing the pastilles to freeze-thaw and moisture over the winter—this ensures thorough disintegration.
- Repeat applications of NutraSul 90 results in the improvement of soil populations of Sulfur processing bacteria—the soil becomes more efficient in processing Sulfur to Sulfate.

### Safety Considerations for Fertilizer Dealers

Fertilizer Dealers should be aware of safety considerations when handling degradable sulfurs. These concerns are not usually as important to growers because sulfur is often received blended with other nutrients – this essentially nullifies most safety considerations.

- Sulfur is classified as non-hazardous and non-toxic, but awareness of potential problems must be stressed to ensure safe handling of this material:

### Minimize Dust Formation

- Handle solid sulfur no more than necessary
- Use gentle conveyance systems such as conveyer belts at speeds of 250' per minute or less. Screw conveyors generate considerably more dust. Drag conveyors work well but should not be run dry.
- When finished unloading bulk material, another bulk product such as MAP or KCl can be used to chase sulfur residue from the system.
- Minimize transfer points and drops at transfer points to reduce attrition of sulfur prills.
- Where possible, use storage bins with steep bottom cones (e.g. 55° or 60°) to minimize pastille fractures as they are dropped.
- Reduce drop heights to less than 12'.
- Dust control agent should be applied during load out. Keg River's dust control agent reduces flammability of the product by 80%.
- Dust suppressants are less effective over time, and after repeated handling
- Conveyor and storage systems should be grounded
- Hand tools used in sulfur handling area should be non-sparking Engine – driven equipment should be equipped with spark arrestors and protected muffler and exhaust systems
- Check inventory after unloading to ensure there is no fire. This is more risk of fire at the end of the transfer as the equipment is run dry and accumulated fines appear in the system.
- Avoid enclosed spaces
- Wear suitable protective clothing, gloves and eye protection