

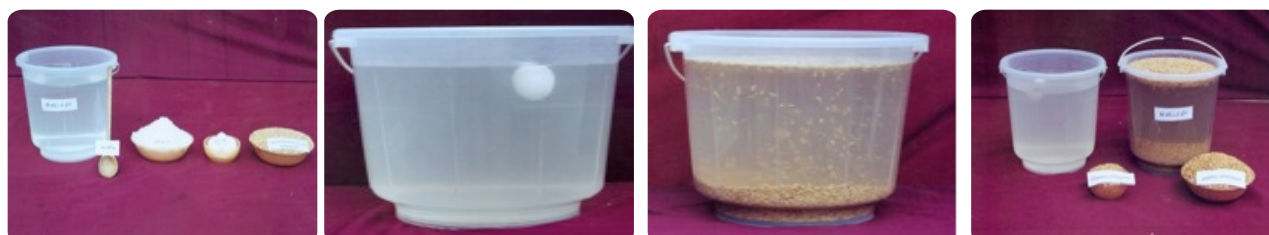
## Seed Treatment :: An Introduction



**Rice Seed Treatment**

### Seed Treatment

- In dormant cultivars, break the seed dormancy by soaking the seeds in equal volume of 0.1 N conc.  $\text{HNO}_3$  or 0.5 %  $\text{KNO}_3$  for 12 - 16 h.
- Upgrade the seeds by specific gravity grading method with salt solution by dissolving 1.5 kg of common salt in 10 lit of water. Remove the floaters, and use the sinkers for sowing after repeated washing with water.



**Specific gravity grading in rice seeds**

- For rainfed or direct sowing, harden the seeds by soaking in equal volume of 1% KCl solution for 16 h, and dry back the seeds to original moisture content.
- For sowing in saline / sodic soils, soak the seeds in equal volume of 80 micro molar of sodium nitroprusside for 16 h.

### Seed Treatment with Biofertilizers

- **Carrier Based Formulation:** Treat seeds required for one hectare with 1 kg each of biofertilizers viz., Azospirillum, Phosphobacteria, (or) Azophos, Silicate solubilizing bacteria (SSB) / Potash bacteria (KRB) using rice gruel, shade dry for 30 minutes before sowing.
- **Zinc Deficient Soils:** Along with existing recommended biofertilizers, treat seeds required for one hectare with 1 kg of zinc solubilizing bacterium using rice gruel, shade dry for 30 minutes before sowing.



**Seed Treatment with Carrier Based Biofertilizers**

- **Liquid Formulation:** Treat seeds required for one hectare with 125 ml of each biofertilizers viz., Azsopirillum, Phosphobacteria (or) Azophos, Silicate solubilizing bacteria (SSB) / Potash bacteria (KRB), shade dry for 30 minutes before sowing.
- **Zinc Deficient Soils:** Along with existing recommended biofertilizers, treat seeds required for one hectare with 125 ml of zinc solubilizing bacterium, shade dry for 30 minutes before sowing.



**Seed Treatment with Liquid Biofertilizers**