



ICAR-National Rice Research Institute (An ISO 9001: 2015 Certified Institute) Cuttack – 753 006, Odisha, India

## Agro-Advisory Service

## Strategies for Second Fortnight of August, 2024

## Transplanted Rice

- Transplanting of rice must be completed by second fortnight of August.
- For high yielding varieties, apply 35 kg of DAP + 27 kg of MOP or 18 kg of urea +100 kg of SSP + 27 kg MOP per acre as basal dose at the time of last puddling. In sandy soil apply 35 kg of DAP and 13.5 kg of MOP or 18 kg of urea +100 kg of SSP
  - + 13.5 kg of MOP per acre as basal dose.
- For hybrids, apply 53 kg of DAP + 27 kg of MOP or 26 kg of urea +150 kg of SSP + 27 kg MOP as basal dose at the time of final puddling.
- In zinc deficient areas. apply Zinc Sulphate @ 10 kg/acre or zinc-EDTA @ 6 kg/acre (once in two years) at the time of final land preparation.
- ✤ In boron deficient soil, apply Borax @ 2kg/acre at the time of final land preparation.
- Transplanting of 25-30 days old seedlings should be done at a spacing of 20 x15 cm at shallow depth, use only 2-3 seedlings per hill for high yielding varieties. For hybrids use 1-2 seedling per hill.
- For delayed transplanting by using the old age seedlings, farmers are advised to use up to 25-30 days old seedlings of early or medium early varieties and 45-50 days old seedling of long duration varieties. Transplant the old seedlings in puddled soil at shallow depth at a closer spacing of 15 x15 cm with 4-5 seedlings per hill.
- To control weeds, apply granular herbicide Bensulfuron methyl 0.6% + Pretilachlor 6% GR @ 4 kg/acre mixed with 4 kg of sand within 5 10 days after transplanting or Bispyribac sodium 10% SC @ 120 ml/acre in 8 tanks of 16 litre capacity sprayer at 8-10 days after emergence of weeds (or when the weeds are at 2-3 leaf stage) or, spray ready mix Penoxulam + Cyhalofop butyl (Vivaya) @ 900 ml/acre or, tank mix Fenoxaprop-p-ethyl + Ethoxysulfuron (Rice star + Sunrise) @ 240+50 g/acre at 15-20 DAT in 8 tanks of 16 litre capacity sprayer at 15-20 days after transplanting.

- In early transplanted rice, if problem of thrips is noticed, farmers can go for neem seed kernel-based insecticide like Azadirachtin 0.15% @ 1 lit/acre or spray Lambdacyhalothrin 5% EC @ 100 ml/acre or Thiamethoxam 25 % WG @ 40 g/acre in 200 litre of water.
- In Brown Planthopper (BPH) endemic areas, skip a row after each 8-10 rows of transplanting.
- In stem borer endemic areas, release egg parasitoid, *Trichogramma japonicum* @ 20000 eggs /acre (1-2 cards /acre) at weekly interval. 4-5 such releases to be made.
- Fix light trap @ 1/acre to attract and trap/kill adults of stem borer, leaf folder and other pests.
- Place 3 pheromone traps with lures/acre of rice field for monitoring the stem borer and leaf folder infestations. Whenever the number of male moths/trap reaches 4 or 5, apply Azadirachtin 0.15% EC @ 800 ml/acre or, Chlorantraniliprole 4% GR @ 4 kg/acre mixing with sand at 1:1 ratio or, spray Chlorantraniliprole 18.5% SC @ 60 ml/acre or Tetraniliprole 200 SC @ 100 – 120 ml/acre or Flubendiamide 20 WG 50g/acre in 200 litres of water or Cartap hydrochloride 4G @ 10 kg/acre
- Whenever two folded leaves/ hill observed, then to control leaf folder, spray Chlorantraniliprole 18.5% SC @ 60 ml/acre or, Flubendiamide 20 WG 50g/acre or, Cartap hydrochloride 50 WP@ 400 g/acre or, Tetraniliprole 200 SC @ 100 – 120 ml/acre in 200 litres of water.
- Undertake gap filling with aged seedlings or clones separated from the same field in order to maintain a plant population of 33 hills per m<sup>2</sup>.
- In Zinc deficient soil, if Zinc sulphate (ZnSO<sub>4</sub>) has not been applied during final land preparation, spray Zn-EDTA @ 0.5 g/litre of water at 30 and 45 days after transplanting of rice or, spray 0.5% ZnSO<sub>4</sub> solution (2 kg ZnSO<sub>4</sub> +10 kg of lime in 400 litres of water in one acre) thrice at 15 days' interval on appearance of deficiency symptom in the field.
- If there is infection of sheath blight, on appearance of disease in 1-2 tillers, spray Tebuconazole 50% + Trifloxystrobin 25% WG @ 0.4 g or, Propiconazole 75% @ 1ml per litre of water or, Hexaconazole 50% @ 2 ml per litre of water or, Validamycin 3 L @ 2 ml/litre. Repeat the spray at 7-10 days' interval. Use 200 litres solution for one-acre area.
- In case of incidence of Bacterial blight/Bacterial leaf streak, apply Plantomycin @ 1 g/litre along with Copper oxychloride @ 1 g/litre of water using 200 litres of water per acre.
- In case of leaf blast incidence, spray Tebuconazole 50%+ Trifloxystrobin 25% (Nativo 75 WG) @ 0.4 g/litre or, Edifenphos 50 EC @ 2 ml/litre or Tricyclazole 75WP

@ 0.6 g/litre of water may be done for controlling the disease. Otherwise, spraying of leaf extracts of Bael (25 g fresh leaves) or Tulsi (25 g fresh leaves) or Neem (200g fresh leaves) per litre of water can help in reducing the incidence of disease.

## Dry Direct Seeded Rice

- In semi deep/deep water areas, where direct seeding has been done and herbicide was not applied for weed control, '*beushening*' may be done after accumulation of sufficient water (at least 7-10 cm standing water) in the field. After '*beushening*,' apply 18 kg of urea/acre as top dressing
- In rainfed shallow lowland areas where direct seeding has been done and herbicide has not applied to control weeds, '*beushening*' may be done after accumulation of sufficient water (at least 7-10 cm standing water). After '*beushening*' apply 36 kg of urea/acre as top dressing.
- In direct seeded rice where were herbicide was used to control weeds, apply 18 kg urea/acre as 2<sup>nd</sup> top dressing at maximum tillering stage. In early upland varieties, apply 18 kg urea/acre at panicle initiation stage.
- In case of incidence of brown spot, spray Propiconazole 25 EC @ 1ml or, Mancozeb 75 WP or, Carbendazim 50 WP @ 2 g of water or, Carbendazim 64% + Mancozeb 8% 75 WP @ 1.5 g per litre of water.
- To control yellow stem borer, leaf folder, bacterial blight, sheath blight in direct seeded rice, follow the recommendations as mentioned for transplanted rice
- Farmers are advised to download and use NRRI developed riceXpert mobile App (available in Google Play store) for getting information on all aspects of rice crop.

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