ICAR - National Rice Research Institute

(An ISO 9001: 2015 Certified Institute)

Cuttack – 753 006, Odisha, India

Agro-Advisory Service

Strategies for Second Fortnight of September 2024

- In shallow lowland/ medium land transplanted rice, apply 35 kg urea/acre for HYV and 42 kg of urea/acre for hybrids at tillering stage (20-25 DAT). In normal transplanted rice, apply second top dressing of fertilizer at Panicle Initiation stage (50-55DAT) with 17.5 kg of urea per acre whereas in sandy soil apply 17.5 kg of urea and 13 kg of MOP.
- To control leaf folder, whenever two folded leaves/hill are observed, spray Chlorantraniliprole 18.5% SC @ 60 ml/acre or Tetraniliprole 200 SC @ 100 – 120 ml/acre or Flubendiamide 20 WG 50 g/acre or Quinalphos 25 EC 400 ml/acre. Use 200 litres of water per acre for spraying.
- In case of infestation of Swarming caterpillar/Case worm/ Hispa, spray Chlorpyriphos 20 EC @ 500 ml/ acre or Phenthoate 50% EC @ 400 ml/acre.Use 200 litres of water per acre for spraying.
- In case of Gall midge infestation, spray Fipronil 05% SC @ 400-600 ml/acre or Lambda-cyhalothrin 5% EC @ 100 ml/acre or Chlorpyriphos 20 EC @ 500 ml/ acre or Carbofuran 3G @ 10 kg/acre.
- Put 3 pheromone traps with 5mg lure/acre in the rice field for monitoring of the yellow stem borer. Whenever the number of male moths/trapreaches 4 or 5, spray Azadiractin 0.15% neem seed kernel based EC formulation @ 800 ml/acre or broadcast granular insecticide Chlorantraniliprole 0. 4% GR @ 4 kg/ acre or Cartap hydrochloride 4G @ 10 kg/acre mixing with sand at 1:1 ratio or spray Chlorantraniliprole 18.5% SC @ 60 ml/acre in 200 litre of water.
- If population of Brown Planthopper (BPH) exceeds ETL (5-10 hoppers/hill), it isadvised to alter the micro-climate of the rice field by alternate wetting and drying technique (water should not stand in the field for long time). If problem still persists, spray Triflumezopyrim 10% SC @ 94 ml/acre or Pymetrozine 50% WG @ 120 g/acre or Dinotefuran 20% SG @ 80 g/acre or Imidacloprid 17.8% SL @ 50 ml/acre or Acephate 75% SP @ 400 g/acre. Use insecticides recommended for BPH at specified dose only. Avoid using nitrogenous fertilizers during infestation of BPH.
- On appearance of sheath blight disease in 1-2 tiller, spray Propiconazole 25 EC @ 200 ml/acre or Hexaconazole 5EC @ 400 ml/acre or Validamycin 3L @ 400 ml/acre or Tebuconazole 50% + Trifloxystrobin 25% WG @ 80 g/acre. Repeat the spray at 7-10 days interval. Use 200 litre solution for one acre area.

- In case of appearance of bacterial blight/ bacterial leaf streak disease, stop top dressing of nitrogenous fertilizers (Urea/DAP). If there is facility of draining, drain out stagnant water and apply 5 kg potassic fertilizer (MOP) per acre. ApplyStreptomycin sulphate (9%) + Tetracycline hydrochloride (1%) @ 120 g/acre and Copper oxychloride @ 200 g/acre in 200 litre of water. Spray should be done in the early morning or afternoon.
- In case of leaf blast disease incidence, spray Tebuconazole 50% + Trifloxystrobin 25% (Nativo 75 WG) @ 80 g/acre. Use 200 litre of water per acre for controlling the disease. Alternatively, spraying of leaf extracts of Bael (25 g fresh leaves) or Tulsi (25 g fresh leaves) or Neem (200 g fresh leaves) per litre of water can help in reducing the incidence of disease. Also, biocontrol agent like *Trichoderma viridae/harzianum* (minimum 10^8 CFU)@ 2 kg/acre can be used. Use 200 litre solution for one-acre area.
- In case of incidence of Brown spot in direct seeded rice, spray Propiconazole 25 EC @ 200 ml/acre or Carbendazim 64% + Mancozeb 8% 75 WP @ 300 g/acre. Use 200 litre solution for one-acre area.
- In upland rice when the population of Gundhi bug exceeds the Economic Threshold Level (ETL) i.e., 2 adults/hill or 5 adults/m^2, do dusting of Malathion 5% @ 10 kg/acre or spray Etofenprox 10 EC @ 200 ml/acre or Chloropyriphos 20% EC @ 1000 ml/acre.
- Farmers are advised to download and use NRRI-developed **riceXpert** mobile App (available in Google Play store) for all aspects of rice cultivation.
- Wherever rice has not been grown due to moisture stress, farmers are advised to grow short duration pre *rabi* crops like Amaranths, Ragi, Horse gram, Green gram, Black gram, Cowpea, Sweet potato and Sesame in upland/medium lands utilizing the available soil moisture in the field.

Contingent Agro-advisory for areas received heavy rainfall due to low pressure

- It has been observed that due to heavy and continuous rain for last few days, most of the rice fields are either completely or partially submerged. Under the said conditions, farmers are suggested to follow the following practices:
- Drain out the excess water from rice fields wherever possible.
- Due to low pressure formation, some districts (e.g., Mayurbhanj, Keonjhar, Balasore, Bhadrak, Jaipur, Cuttack, Ganjam, Jagatsingpur, Kendrapada, Puri, Nayagarh, Khorda, Malkangiri, and Koraput) may receive substantial rainfall in upcoming few days. Postpone spraying activities, complete weeding and other intercultural operations. For paddy, complete top dressing of N fertilizer (e.g., Urea). Make bunds to maintain water level of 3-5 cm and remove excess water where necessary.
- In case of late transplanted rice, infestation of swarming caterpillar may occur. In such case, apply kerosene @ 2 l/ha and shake the rice plants rigorously by

crossing ropes. If infestation continues apply any contact insecticide such as Chlorpyriphos 20 EC @ 500 ml/acre or Lambda-Cyhalothrin 5% EC @ 200 ml/acre or Quinalphos 25% EC @ 800 ml/acre.

- The present condition (cloudy sky, high humidity, intermittent rainfall with high day temperature but low night temperature) is highly favourable for incidence of many diseases like Bacterial Blight, Bacterial Leaf Streak, Leaf Blast etc. So, keep vigil on your field. Apply 100 g Plantomycin and 200 g Copper Oxychloride in 200 litres of water per acre for bacterial diseases. In case of Blast incidence, spraying of Tebuconazole 50% + Trifloxystobin 25% (Nativo 75WG) @ 80 g/acre or Edifenphos 50 EC @ 100 ml/acre or Carbendazim 50 WP @ 400 g/acre may be done for controlling the disease.

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