



CR DHAN 506



Farmer FIRST
Enriching Knowledge - Integrating Technology

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Production Technology for Rice Variety

CR DHAN 506

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Waterlogged ecology faces frequent flooding and also drought. Rice production and productivity is very low from this ecology. CR Dhan 506 is suitable for this type of ecology. This variety is recommended for cultivation in semi-deep water ecology in the states of Andhra Pradesh, Karnataka and Assam. The variety takes around 160 days for maturity, but it is strongly photosensitive type. The variety is a semi-tall type with an average plant height of around 140cm. It possesses long bold grain with a long heavy panicle having moderate test weight (23g per 1000 grains). The variety gives around 5 t/ha with a potential yield of 8t/ha. It is moderately resistant to leaf blast, neck blast, brown spot, sheath blight, sheath rot, tungo virus, stem borer (both dead heart and white ear heads), leaf folder and whorl maggot. CR Dhan 506 has good hulling, milling, head rice recovery, intermediate amylose content and other desirable grain quality parameters for the consumers. The variety responds to higher dose of fertilizer application.

Package of practices for high yield

SEED SELECTION

- Ensure genetic purity with more than 80% germination by obtaining seeds from a reliable source.
- Select well-filled seeds from a healthy crop, free from insect and disease attack.

LAND PREPARATION

- Plough the land immediately after the harvest of wet season rice, preferably with a mould board plough.
- One or two summer ploughings after pre-monsoon rain during April-May and ploughing before sowing makes the soil to a fine tilth.



SEED TREATMENT

- Use 40-50 kg seeds/ha. for direct sowing of the crop in semideep water ecology. Treat the seeds with Agrosan GN or Ceresan (dry) or Bavistin at the rate of 2g/Kg of seed before sowing.

TIME AND METHOD OF SOWING

- The optimum time of sowing is from last week of May to first week of June.
- Sowing should be done after receiving pre-monsoon rain for proper plant stand establishment before accumulation of water in the semi deep water rice fields.

FERTILIZER MANAGEMENT

- Apply N: P: K @ 60:30:30 kg/ha in case of poor soil fertility status (based on soil test results).
- Apply half N, full P and three fourths of K as basal dose in the furrows in the line sown rice with farm yard manure at the rate of 5t/ha.
- Apply 10 kg of N as top dressing at beushening in broadcast rice and after weeding on line sown rice and the rest N and K fertilizers at panicle initiation stage, if water recedes.

WEED MANAGEMENT

- Before accumulation of rain water, the beushening and weeding operations are to be completed which is around 45-60 days after seeding.
- Spray herbicide Bispyribac Sodium at the rate of 30g a.i/ha in direct seeded rice (DSR) for control of major grasses, sedges and broad leaf weeds. This is a post-emergence herbicide and it can be applied after 12 days of sowing.

WATER MANAGEMENT

- It is a rainfed cop. Rain water should be managed with proper field bunding and drainage facility.

PEST AND DISEASE MANAGEMENT

Insect Pests

- For controlling the insect attack, spray is not feasible due to semi-deepwater situation.
- Use of bio-control method is preferable. Release of *Trichogramma japonica*, an egg parasite at the rate of 50,000 numbers/ha is recommended for control of the pest.
- If water level reduces apply Monocrotophos at the rate of 0.5Kg a.i/ha or apply granular insecticides Carbofuran 3G at the rate of 33 Kg/ha or Cartap 4G at the rate of 25 Kg/ha on the basis of economic threshold level (ETL) (One egg mass/ m² or 5% dead heart).

Diseases

- Apply Streptocyclin (150mg) + Copper Oxychloride (1g) in one litre of water for controlling bacterial leaf blight disease.
- For controlling sheath rot disease, soak the seeds in 0.05%-0.1% Bavistin for 30 minutes before sowing.
- After raising the crop, minimize the disease by foliar spray of 0.05%-0.1% Bavistin or 0.4% Dithane M-45 or 0.1% Hinosan.

HARVESTING

- Harvest the crop at 25-30 days after flowering.
- Thresh immediately after harvesting and dry gradually under shed up to 12% moisture content for seed purpose and up to 14% moisture for milling.