

# Identification of Some Common Herbicides and Study of their Physical Properties

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## 1. Vichete® 5G (Butachlor)

- a.i. Butachlor 50 g/kg.
- Systemic herbicide for rice field.
- Marketed by – Semco (Setu Pesticides Ltd.).
- Weed control in Aus, Aman and Boro.
- Effective against different herbaceous annual, annual shrub, perennial and broad leaf weed.
- This herbicide translocated through stem and root of weed after germination and kill them.
- **Target weed:** Boro shama, Holde Mutha, Boro chucha, Joyna, Pani katchu, Pani Long, Chechra, Sushni Shak, Zhill Marich, Dubra etc.
- **Rate:** 25 kg/ha – soil applied. 100 g covers one decimal land.
- **Use:** 2-3 days after transplanting of rice and maintain 1-2 inches water up to 7 days.

## 2. Butabel® 5G

- a.i. Butachlor 50 g/kg.
- Systemic herbicides for rice (pre-emergence)
- Marketed by – Corbel International Ltd.
- Weed control in Aus, Aman and Boro.
- **Target weed:** Boro shama, Holde Mutha, Boro chucha, Joyna, Pani katchu, Pani Long, Chechra, Sushni Shak, Zhill Marich, Dubra etc.
- Translocated through stem and root to the whole plant and kill them with root.
- **Rate:** 10 kg/acre. 1 kg covers 10 decimal of land.
- **Use:** Apply in the soil at 3-5 days after transplanting and maintain 1.5 to 2 inches water up to 2-3 days.

## 3. Mchlor® 5G

- a.i. Butachlor 50 g/kg.
- Systemic herbicide.
- Marketed by – ACI Ltd.
- Translocated through stem and root to the whole plant and kill them with root.
- Weed control in Aus, Aman and Boro.
- **Target weed:** Boro shama, Holde Mutha, Boro chucha, Joyna, Pani katchu, Pani Long, Chechra, Sushni Shak, Zhill Marich, Dubra etc.
- **Rate:** 25 kg/hectare. 1 kg cover 10 decimal land.
- **Use:** Apply in the soil at 3-5 days after transplanting and maintain 1.5 to 2 inches water up to 2-3 days.

## 4. Clear® 500 EC

- a.i. Pretilachlor 500 g/litre.
- Systemic herbicide in rice field.
- Selective herbicide.
- **Target Weed:** Boro shama, Choto shama, Panikachu, Chandmala, Zheel morich, Panilong, Malancha etc.
- **Rate:** 400 ml/acre. 20 ml/10 litre water for 5 decimal land.
- **Use:** 3-5 days after transplanting of rice seedling in 1-2 inches standing water.



### 5. Rifit® 500 EC

- a.i. Pretilachlor 500 g/litre.
- Systemic herbicide.
- Marketed by – Syngenta.
- Systemic and selective herbicide for weed control in rice field.
- **Target Weed:** Boro shama, Choto shama, Panikachu, Chandmala, Zheel morich, Panilong, Malancha etc.
- **Rate:** 400 ml/acre. 20 ml/10 litre water for 5 decimal of land.
- **Use:** 3-7 days after transplanting and 1-2 inches standing water.

### 6. Oxstar® 25 EC

- a.i. Oxadiazon 250 ml/litre.
- Selective and systemic herbicide in liquid form.
- Marketed by – Semco (Setu Pesticide).
- **Target weed:** Grasses and broadleaf weeds.
- **Rate:** 800 ml/acre. 40 ml Oxstar/10 litre water in tank for 5 decimal of land.
- **Use:** 6-8 days after transplanting. 1-2 inches standing water during spray.

### 7. Topstar® 400 SC

- a.i. 400 g/l Oxadiargyl.
- Marketed by – Bayer CropScience.
- Pre-emergence contact herbicide acting at the emergence of seedlings.
- Weed controls in rice, vegetables and onion
- **Target weeds:** Annual weeds (grasses and dicotelydon).
- **Rate:** 0.5 liter/ha for rice, 0.8-1.0 litre/ha for onion.
- **Use:** For rice, treat 3 days after transplanting, then water for 2 to 3 days after transplanting.

### 8. Topstar® 80 WP

- a.i. 800 g/kg Oxadiargyl.
- Marketed by – Bayer CropScience.
- Pre-emergence, contact and selective herbicide acting at the emergence of seedlings.
- Weed controls in rice and onion
- Target weeds: Shama, holde mutha, boro chucha, pani kachu, tripotri shak, amrul shak.
- **Rate:** 75 g/ha for rice, 125 g/ha for onion.
- **Use:** For rice, treat 3 days after transplanting, then water for 2 to 3 days after transplanting

### 9. 2,4-D® Amine

- a.i. 720 g 2,4-D/litre.
- Marketed by – Bayer CropScience.
- Broadleaf selective herbicide.
- Weed controls in tea and rubber.
- Target weeds: Mikania lata, pig weeds and other dicotyledonous weeds.
- **Rate:** 2.24 liter/ha, 45 ml/10 liter water for 5 decimal land.
- **Use:** spray in the ground.

**Assignment:** List of herbicide marketed by different pesticide companies of Bangladesh.

- Name of herbicide (Trade name)
- Name of company
- Formulation
- Active ingredient
- Mode of action
- Target weeds
- Dose
- Application method

