HYBRID CORN VARIETY

PACKAGE OF TECHNOLOGY

STEP 1 Securing hybrid seeds to plant

Use only I the Philippines seed Boarded (PSB) recommended hybrids. Approximately 18-20 kg of seeds is needed to plant one hectare

SMC 305	**IPB Var**	**E 25**
SMC 317	**P 3262**	**CPX 912**
P3228	**VM 2**	**CPX 912**
P 3274	**P 3234**	**P 3278**
CX 757	**SX 767**	

Note: Always buy new batch of seeds (F1 seeds) for each planting. F2 seeds or later germination seeds result to much lower yield by as much as 30-40% and will not produce uniform and vigorous plants due to breakdown of genetic traits.

STEP 2 Soil Testing (same with OPV)
STEP 3 Land Preparations (same with OPV)
STEP 4 Preparation of furrows (same with OPV)
STEP 5 Application of basal fertilizer (day of planting)

Apply basal fertilizer in the furrows at the rate of 6 bags of complete fertilizer (14-14-14) per hectare. This provides 42 kgs each Nitrogen (N), Phosphorous (P205) and Potassium (K20) per hectare. Cover fertilizer with soil to avoid contact with seed. When using organic fertilizer, provide equivalent amount of nutrient. (Note that actual rate of fertilizer application should be initially based on soil analysis)

STEP 6 Planting (day of planting)

For recommended hybrids, refer to your dealer or agricultural technologist for specific plant density requirements per hectare. Generally, seed companies recommend one (1) seed per hill, 20-25 cm apart. For hybrids with no genetic resistance to downy mildew, treat seeds with Apron 35 SD.

STEP 7 Pest Management
(just after planting to 10 days after planting)

If white grubs and seedlings maggots are present at this stage, apply basal granular insecticides. Apply one (1) bag Carbofuran per hectare to the soil, or spray young plants with Endosulfan or Methomyl; Chlorpyrifos + BPMC at the rate 2-3 tablespoons per 5 gallons of water. This can also control cutworms, semi-loopers, and early generations borers.

STEP 8 Herbicide Application (just after planting)

If weeds are expected to be a problem and cannot be controlled manually, apply Atrazine immediately at Kg active ingredient (a.i) per hectare or Pendimethalin at 1.5 Kg. a.i per hectare immediately after planting or before seedling emergence.

STEP 9 Cultivation and weed control (12 days after planting)

Undertake shallow cultivation and spot weeding to control weeds. To further control weeds, another shallow cultivation and spot weeding may be done 20 days after planting or spray 2-3-D Amine or MCPA to control broadleaves and sedges at the rate of 1 liter per hectare.
Note: Minimize herbicide contact with the corn plants.

STEP 10 Sidedressing of fertilizer (25-30 days after planting)

Sidedress with 3 bags urea (45-0-0). This provides 67 kgs of Nitrogen (N) per hectare. Cover fertilizer with soil by shallow hilling up. Avoid root injury.

STEP 11 Pest management (whorl stages)

If available, first use Trichogramma biocontrol of corn borer. The first release is done at 40-50 cards per hectare, 20-30 days after planting. The second release at 40-50 cards per hectare is done 2 to 3 days after the first release if parasitism of corn borer egg masses is below 20%. Simply hang a Tricho card near the base of one of the fully expanded leaves of a plant. Hang cards on plants in strategic spots of cornfield.

If trichogramma are not available, control corn borer by means of chemical pesticides. At mid-whorl stage (25-35 days after planting when 40-50% of plants show infestation, apply carbofuran granules onto the whorl of affected plants, or spray any of the following insecticides; endosulfan, methomyl, monocrotophos or carbaryl. These insecticides also control earworms and cutworms. At

late whorl stage (35-45 days after planting), a third Trichogramma release should be employed if previous releases result in parasitism below 20%.

STEP 12 Pest management (tasseling stage)

When corn borer infestation persists, employ a combination of detasseling and chemical control. Simply pull out the tassel (not break off) from the peduncle of plants of 3 rows for every 4 rows. Corn plant is ready for detasseling when one-half to three-fourth of the tassel (before pollen shedding) has emerged.

Note: Do not detassel all the plants; leave one row for every 4 rows with intact tassels.

Bring detached tassels out of the corn field, these may be used as cattle/Carabao feed if not sprayed with insecticides. If plants with tassels are heavily infested, spray with any of the recommended insecticides in Step II.

STEP 13 Harvesting
(100-105 days after planting)

Corn crop is ready for harvest 100 days after planting during dry season and 105 days after planting during wet season. As a guide, corn can be harvested when corn kernels are glazed and black layer is formed. This can be determined by detaching a few corn kernels from the cob.