

## BRINJAL

*Solanum melongena* L.

### Variety:

**Long:** Pusa Purple Cluster, Borbengena and BWR-34. Pusa Kranti, Pusa Purple Long

**Round:** Pusa Purple Round, Pusa Bhairav, BWR-12

**Oblong:** BB-7, Pant Samrat

### Description:

**Pusa Kranti:** Dwarf and spreading growth habit, leaf long, narrow and highly lobbed, green coloured, non-spiny, fruit are 15-20 cm long, attractive dark purple in colour, less seeded, yield about 270 q/ha.

**Pusa Purple Long:** Plant semi-erect and dwarf, in habit; fruit glossy, light purple in colour, 25-30 cm long, smooth and tender; av. yield 275 (q/ha), maturity 100-110 days.

**Pusa Purple Cluster:** Plant tall erect, compact, sturdy with purple pigmentation on stem; leaf purple, non-spiny; fruits born in clusters of 4-8, 10-12 cm long, deep purple colour, av. yield 175 q/ha, maturity 75 days, relatively resistant to bacterial wilt and little leaf disease.

**Pusa Purple Round:** Plant very tall with thick stem of greenish purple colour, leaf highly lobbed with deep green colour; av. weight 137 g with only 6 fruits per plant, resistant to shoot borer and little leaf disease.

**Pusa Bhairav:** Resistant to phomopsis blight.

**BB-7:** Fruit oblong, borne in cluster, purple, yield about 200 q/ha, tolerant to bacterial wilt.

**BWR-34:** Fruit elongated, borne in cluster, purple; yield about 100q/ha, tolerant to bacterial wilt.

**Pant Samrat:** Resistant to fruit and shoot borer and bacterial wilt. (Recommended for bacterial wilt endemic areas)

### Soil:

Well drained rich sandy loam for early and silt loam to clay loam for late crop. pH 5.5 – 7.0 is ideal.

### Seed bed preparation and seedling raising:

Refer “Procedure for nursery raising of transplanted vegetable crops”.

### Field Preparation:

The land should be prepared to a fine tilth and FYM to be applied. Clothianidin

50WDG 80 g ai/ha should be incorporated. It is advisable to apply lime every three years @ 20 q/ha depending upon soil test result. Liming should be done at least 30 days before planting.

**Seed rate:** 200 g/ha (30 g/bigha)

**Time of sowing:**

First week of September to October for winter crop and January to February for spring crop.

**Spacing:**

75 cm x 60 cm (Row to Row and Plant to Plant)

**Manure and fertilizer:**

FYM @ 10 t, N 50 kg, P<sub>2</sub>O<sub>5</sub> 50 kg and K<sub>2</sub>O 50 kg/ha (1.3 t FYM, 14.7 kg Urea, 42.0 kg SSP, 11.3 kg MOP). Half of N and full doses of FYM, P<sub>2</sub>O<sub>5</sub> and K<sub>2</sub>O should be applied as basal and the remaining half of N to be top dressed in one or two instalments.

**Interculture:**

1. Irrigation: Same as in tomato
2. Weeding: Same as tomato

**Brinjal-Okra Cropping Sequence:**

FYM 10 t/ha and NPK @ 10:30:15 kg/ha is recommended for 1<sup>st</sup> crop of brinjal followed by 2<sup>nd</sup> crop of okra without FYM and with recommended dose of NPK.

**Plant protection:**

**1. Fruit and shoot borer:**

- a) Apply Emmamectin benzoate 5 SG @220 g/ha. Flubendiamide 39.35 EC @ 0.1%.Chlorantraniliprole 18.5 SC @ 40 gai/ha.
- b) Apply Lamda-cyhalothrin 5EC@ 20 g ai/ha.
- c) Growing of garlic as intercrop or boarder crop reduces the infestation

**2. Biointensive IPM against shoot and fruit borer**

- Azadirachtin 1500 ppm @ 2 ml/liter of water
- *Lecanicillium lecanii* @ 1x 10<sup>8</sup> spores/ml (5 g/lit of water)
- Eight releases of *Trichogramma chilonis* (MITS) @1,00,000 Nos./ha (13500 Nos./bigha) at weekly interval starting from initiation of flowering

3. **Bacterial wilt:** Soil drenching with 100 ppm of Streptomycin should be done.
4. **Fungal wilt:** Soil drenching with Carboxin @ 0.2% should be done
5. **White blight** (white mould): Spray Azoxystrobin 23SC @ 0.5 g/lit. of water

**Yield:** 200 q/ha