

Cowpea

(*Vigna unguiculata*)

Cowpea is an important annual herbaceous leguminous forage crop usually grown mixed with cereal fodders and grasses to improve the nutritive values of the herbage. This crop is suitable for warm, moist subtropical climate. It can be grown in a wide range of soils but sandy worm soil is more suitable.

Climate: Cowpea can be grown in all the three season. Its germination is rapid at the temperature of 65°F. It is very much susceptible to frost and prolonged water logging. Very cold temperature causes slow germination. It can also be cultivated in higher elevations even up to 1500 m above sea level. It is moderately adapted to shade and a wide precipitation range (650-2,000 mm).

Land Preparation: The plants can grow well on well drained clays, sandy loams and light soils where pH ranges 5.5-6.5 and also on low fertility soil. It grows well on strongly acid soils and heavy textured strongly alkaline soils. Heavy clay soils encourage vegetative growth.

Improved varieties:

Area of Cultivation	Varieties
North India	IGFRI-450, UPC-5287
North, West and Central India	IFC-8503, EC-4216
Whole Country	UPC-5286, IFC-8401
North-East Region	UPC-4200
Gujarat	GFC-1,2&3
Maharashtra	Sheweta

Sowing time: The usual sowing time extends from March to middle of July. In irrigated areas sowing can be done during summer while in rainfed areas, it can be done after commencement of rains. In southern region, the crop can be sown throughout the year.

Seed rate: The seed rate is 35-40 kg/ha.

Sowing method: Sowing should be done in lines at an inter row spacing of 25-30 cm and 10-15 cm space between plants. The seed should be sown with seed drill or behind the plough at 3-5 cm depth.

Manures and fertilizers: Apply 5 tonnes/ ha of FYM at the time of land preparation. The fertilizer requirement (per ha) for this crop is 9kg urea, 87 kg DAP and 33kg MOP (NPK: 20:40:20).

Seed treatment: Seed treatment with Rhizobium culture (200g for 10 kg seed) may be done before sowing.

Irrigation: Normally the monsoon crop does not require irrigation. Summer sown crop requires 6-7 irrigations at 8-10 days interval. During long dry spells the crop should be irrigated at an interval of 10-12 days.

Harvesting: Harvest is done at 50% flowering stage (around 60-65days)

Yield: Green fodder yield: 200-2500 quintals/ha and dry fodder yield: 75-80 quintals/ha.

Intercropping: Can be intercropped with many crops (Maize, Jowar, Bajra, Hybrid napier, guinea grass etc.).

