



Heat-Tolerant Pigeonpea

Source: BL

Scientists have developed a **heat-tolerant pigeonpea (tur dal) variety** named **ICPV 25444** using **speed breeding technique**, with the potential to transform fallow lands and reduce reliance on imports.

- **Key Features:** It can **withstand temperatures up to 45°C**, making it ideal for **India's hot, semi-arid regions**, and can **utilize 12 million hectares of rice fallows** left uncultivated post-kharif due to **water scarcity and heat**.
 - It enables **4 crop generations/year**, cutting development time from **15 to 5 years**, **doubling yields** from **1.1-1.2 to 2 tonnes/ha**, and **reducing harvest time to 4 months** from the usual **6-7**, improving rotation and profitability.
 - It could drastically **reduce India's pigeonpea imports**, which cost **USD 800 million annually**, by bridging the **1.5 million tonne shortfall** in domestic production.
- **About Pulses:** India is the **world's largest producer, consumer, and importer of pulses** and aims to **eliminate imports by 2028**.
 - The **top 3 pulses-producing states** are **Madhya Pradesh, Maharashtra, and Rajasthan**.
 - **Tur dal (Pigeon Pea)** is a **key protein-rich legume** in India, thriving in **tropical and semi-arid regions**.
 - Under the **Price Support Scheme (PSS)**, the government ensures **procurement of notified pulses, oilseeds, and copra** from farmers at **Minimum Support Price (MSP)** when **market prices fall below MSP**.
- The **Union Budget 2025-26** announced a **6-year Mission for Self-Reliance in Pulses**, aiming to achieve **self-sufficiency** in crops like **Tur, Urad, and Masur**

Speed breeding accelerates plant growth by controlling light, temperature, and humidity, enabling **multiple crop cycles per year**.

Read More: [India to Import Tur Dal from Mozambique](#)