

# Final Species Datasheet JamU+CaIU+SUK-Phase I

Datasheet No. A-416.018.001  
(family.genus.species)

DBT- Network Programme

## 1. Taxon:

Species: *Daucus carota* L.

Subspecies

Variety

Cultivar

Hybrid

Image file

**2. Synonyms:** *Daucus carota* var. *acaulis* (Bréb.) P.D.Sell, *D. carota* subsp. *bocconei* (Guss.) Bonnier, *D. carota* var. *boissieri* Schweinf., *D. carota* var. *brachycaulos* Reduron, *D. carota* var. *brachycentrus* Maire, *D. carota* f. *carota*, *D. carota* var. *carota*, *D. carota* var. *commutatus* Paol., *D. carota* subsp. *dentatus* (Bertol.) Fiori, *D. carota* f. *epurpuratus* Farw., *D. carota* var. *excelsus* Maire, *D. carota* f. *fischeri* Moldenke, *D. carota* var. *fontanesii* (Thell.) Reduron, *D. carota* f. *goodmanii* Moldenke, *D. carota* var. *gummifer* Syme, *D. carota* var. *herculeus* (Pau) Maire, *D. carota* var. *hipponensis* Maire, *D. carota* subsp. *hispidus* Masclef, *D. carota* var. *intermedius* (Corb.) Reduron & Lambinon, *D. carota* subsp. *intermedius* (Corb.) Reduron & Lambinon, *D. carota* var. *linearis* Reduron, *D. carota* var. *maritimus* (Lam.) Steud., *Daucus carota* var. *mauritanicus* (L.) Spreng., *Daucus carota* subsp. *parviflorus* (Desf.) Thell., *D. carota* var. *petroselinifolius* Alleiz., *D. carota* var. *pseudocarota* (Rouy & E.G. Camus) Reduron, *D. carota* f. *roseus* Millsp., *D. carota* f. *roseus* Farw., *D. carota* var. *serotinus* (Pomel) Batt., *D. carota* var. *serratus* (Moris) Lange, *D. carota* subsp. *siculus* (Tineo) Maire, *D. carota* var. *tenuiflorus* Alleiz., *D. carota* var. *tenuisectus* (Degen ex Palyi) Reduron

## 3. Systematic Position:

### APG IV (2016)

- Kingdom: Plantae
- Clade: Angiosperms
- Clade: Eudicot
- Clade: Asterids
- Clade: Campanulids
- Order: Apiales Nakai
- Family: Apiaceae Lindl.
- Genus: *Daucus* L.
- Species: *Daucus carota* L.

### Bentham and Hooker (1862)

- Kingdom: Plantae
- Division: Phanerogamia
- Class: Dicotyledons
- Subclass: Polypetalae
- Series: Calyciflorae
- Cohors: Umbellales
- Ordo: Umbelliferae Juss.
- Genus: *Daucus* L.
- Species: *Daucus carota* L.

## 4. Distribution:

**Global:** Afghanistan, Albania, Algeria, Austria, Azores, Balears, Baltic States, Belarus, Belgium, Bulgaria, Canary Island, China, Corse, Czechoslovakia, Denmark, East Aegean Island, East European Russia, France, Germany, Great Britain, Greece, Hungary, Iran, Iraq, Ireland, Italy, Kazakhstan, Kirgizstan, Kriti, Krym, Madeira, Morocco, Nepal, Netherlands, Northwest European R, Norway, Pakistan, Poland, Portugal, Romania, Sardegna, Sicilia, South European Russia, Spain, Sweden, Switzerland, Tadzhikistan, Transcaucasus, Tunisia, Turkey, Turkey-in-Europe, Turkmenistan, Ukraine, Uzbekistan, Yugoslavia, Alabama, Amsterdam-St. Paul Island, Andaman Island, Angola, Argentina Northeast, Argentina Northwest, Argentina South, Bangladesh, Brazil South, Cape Provinces, Chile Central, Chile South, Colorado, Cuba, Desventurados Island, Dominican Republic, Easter Island, Ecuador, El Salvador, Finland, Guatemala, Haiti, Illinois, India, Jamaica, Kentucky, Kermadec Island, Korea, Leeward Island, Mexico Central, Mexico Northeast, New Mexico, New Zealand North, New

Zealand South, Nicobar Island, North European Russi, Northern Provinces, Peru, Puerto Rico, Sri Lanka, Sudan, Tennessee, Uruguay, Vermont, Vietnam, WestSiberia

**India:** Throughout India

**5. Indigenous/Exotic/Endemic; Cultivated/Wild:**Cultivated

**6. Threat Status:**

**IUCN**

**BSI**

**7. Habit and Habitat:**Herb

**8. Life Form:**Geophyte

**9. Economic Importance:**Used as food

**10. Probable Progenitor of:**

**11. DNA**

**C-value**

2C (0.940 ± 0.013pg)<sup>1</sup>

**Methodology**

Flow cytometry<sup>1</sup>

**12. Basic chromosome number(s):**

**13. Zygotic chromosome number(s):** 2n=18<sup>2,3,4,5,6</sup>

**14. Gametic chromosome number(s):** n=9<sup>6,7</sup>

**15. Specialized chromosomes (B chromosomes/Sex chromosomes/Polytene chromosomes/Neocentric chromosomes):**

Image file

**16. Ploidy level:**

Image file

**17. Agametoploidy:**

**18. Nature of polyploidy (auto, segmental, allo, autoallo):**

**19. Genomic formula:**

**20. Aberrant chromosome number(s) (aneuploidy, aneusomaty, polysomaty):**

**21. Somatic chromosomes:**

**Karyotype:** Majority metacentric or sub-telocentric chromosomes<sup>5</sup>

**Chromosome size:** 2.0-4.0µm<sup>5</sup>

**NOR chromosome(s):** 2NOR<sup>5</sup>

**Degree of asymmetry**

Image file

**22. Banding pattern(s):**

Image file

**23. Physical mapping of chromosomes:**

**In situ hybridization**

Image file

**Fluorescent in situ hybridization<sup>8</sup>**

Image file

**24. Genomic in situ hybridization:**

Image file

**25. Linkage map:**

Image file

**26. Chromosome associations:**

**Female meiosis**

**Male meiosis**

Image file

**27. Chromosome distribution at anaphase I:**

**28. Genetic diversity:**

**Chromosomal level**

Image file

**DNA level<sup>9</sup>**

**29. Any other information (Apomixis; Inversion; Male sterility; Pollen grain mitosis; Pollen stainability; Translocation etc):**