

Final Species Datasheet

Datasheet No. G-001.001.002
(family.genus.species)

1.Taxon:

Species:*Cycas circinalis* L.

Subspecies:

Variety:

Cultivar:

Hybrid:

Image file

2. Synonyms:*Cycas circinalis* var. *angustifolia* Miq., *C. circinalis* subsp. *Circinalis*, *C. circinalis* f. *circinalis*, *C. circinalis* f. *gothanii* J.Schust, *C. circinalis* f. *undulata* (Desf. ex Gaudich.) J.Schust., *C. rumphii* f. *undulata* (Desf. ex Gaudich.) Kaneh., *C. squamosa* Lodd. ex Dyer, *C. squarrosa* Lodd. ex Loudon, *C. undulata* Desf. ex Gaudich., *C. wallichii* Miq., *Palma polypodiifolia* Mill.

3.Systematic Position:

Christenhusz et al. (2011)

- Class: Equisetopsida C. Agardh
- Subclass: Cycadidae Pax
- Order: Cycadales Pers.
- Family: Cycadaceae Pers.
- Genus: *Cycas* L.
- Species: *C. circinalis* L.

Bentham and Hooker (1862)

Kingdom: Plantae
Division: Phanerogamia
Class: Gymnospermeae
Ordo: Cycadaceae Pers.
Tribus: Cycadeae Colla
Genus: *Cycas* L.
Species: *C. circinalis* L.

4.Distribution:

Global: India

India: Restricted to the Western Ghats, in the states of Kerala, Karnataka, Tamil Nadu, and may also occur south of Maharashtra.

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

6.ThreatStatus:

IUCN: Endangered

BSI:

7.Habit and Habitat:Evergreen shrub 3.5m high this species typically occurs in fairly dense, seasonally dry scrubby woodlands in hilly areas. Plants are also found in rocky areas (dried stream beds).

8.LifeForm:Phanerophytes

9.Economic Importance:

10. Probable Progenitor of:

11.DNA

C-value :2C (29.51pg)¹¹

Methodology :Feulgen densitometry¹¹

12.Basic chromosome number(s): $x=11$ ^{6, 9, 10, 11}

13. Zygotic chromosome number(s): $2n=22$ ^{9, 10, 11}

14. Gametic chromosome number(s): $n=$

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

Image file

16.Ploidylevel:Diploid^{9, 10, 11}

Image file

17.Agametoploidy:

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

19. Genomic formula:

20. Aberrant chromosome number(s) (aneuploidy, aneusomy, polysomy):

21. Somatic chromosomes:^{9, 10, 11}

Karyotype 12 terminal pairs rest median and submedian^{9, 10, 11}

Chromosome size Large^{9, 10, 11}

NOR chromosome(s)

Degree of asymmetry Asymmetrical^{9, 10, 11}

Image file

22. Banding pattern(s): CMA⁺ and DAPI⁺ bands⁹

Image file

23. Physical mapping of chromosomes:

In situ hybridization

Image file

Fluorescent in situ hybridization

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

DNA level²²

Image file

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