

Species Datasheet

Datasheet No. A-061.035.006
(family.genus.species)

DBT- Network Programme

1. Taxon:

Species: *Coelogyne cristata* Lindl.

Subspecies:

Variety:

Cultivar

Hybrid

Image file

2. Synonyms:

[*Coelogyne cristata* f. *hololeuca* \(Rchb.f.\) M. Wolff & O. Gruss](#)

[*Coelogyne cristata* var. *hololeuca* Rchb.f.](#)

[*Cymbidium speciosissimum* D. Don](#)

[*Pleione speciosissima* \(D. Don\) Kuntze](#)

3. Systematic Position:

APG IV (2016)

- Kingdom: Plantae
- Clade: Angiosperms
- Clade: Monocots
- Order: Asparagales
- Family: Orchidaceae Juss.
- Subfamily: Epidendroideae
- Tribus: Arethuseae
- Subtribus: Coelogyneae
- Genus: *Coelogyne* Lindl.
- Species: *Coelogyne cristata* Lindl.

Bentham and Hooker (1862)

Kingdom: Plantae

Division: Phanerogamia

Class: Monocotyledonae

Series: Microspermae

Ordo: Orchideae

Tribus: Epidendreae

Subtribus: Coelogyneae

Genus: *Coelogyne* Lindl.

Species: *Coelogyne cristata* Lindl.

4. Distribution:

Global: India, Vietnam, India, Nepal, Bhutan, Java

India: Assam, Manipur, Meghalaya, Nagaland, Aunachal Pradesh, himachal Pradesh, Uttarakhand, extends from Garhwal to Sikkim and Khasi and Jaintia hills in temperate climates

5. Indigenous/Exotic/Endemic; Cultivated/Wild: Indigenous, wild and cultivated

6. Threat Status:

IUCN:

BSI:

7.Habit and Habitat:Grows as lithophyte in semi-exposed and very moist regions in Kumaon hills at 1300m

8.LifeForm: Phanerophyte

9.EconomicImportance:Cultivated ornamental, medicinal, pseudobulb given in constipation, their juice applied to boils and wound

10. Probable Progenitor of:

11.DNA

C-value Methodology

12.Basic chromosome number(s): $x=20$ ^{9, 12, 14, 15, 22, 31, 34}

13. Zygotic chromosome number(s): $2n=40$ ^{9, 12, 14, 15, 22, 31, 34} , 80 ^{30, 31}

14. Gametic chromosome number(s): $n=20$ ²²

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

Image file

16.Ploidylevel:Diploid^{9, 12, 14, 15, 22, 31, 34} , Tetraploid^{30, 31}

Image file

17.Agametoploidy:

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

19.Genomic formula:

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

21.Somaticchromosomes:Diploidcytotype^{9, 14, 15}

KaryotypeMedian, submedian 3 subterminal pairs^{9, 14, 15}

Chromosome size Small^{9, 14, 15}

NOR chromosome(s)

Degree of asymmetry Moderately asymmetrical^{9, 14, 15}

Image file

22. Banding pattern(s):

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 2011²²

Image file

27. Chromosome distribution at anaphase I:

28. Genetic diversity:

Chromosomal level

Image file

DNA level

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