

Species Datasheet

Datasheet No. G-007.005.015
(family.genus.species)

1.Taxon:

Species: *Pinus nigra* J.F. Arnold

Subspecies:

Variety:

Cultivar:

Hybrid:

Image file

2. Synonyms: *Abies marylandica* Dallim. & A.B.Jacks., *A. novae-angliae* K.Koch, *Pinus austriaca* Hoss, *P. banatica* (Georgescu&Ionescu) Georgescu&Ionescu, *P. laricio* var. *austriaca* (Hoss) Loudon, *P. laricio* subsp. *austriaca* (Hoss) Endl., *P. laricio* var. *moseri* J.J.Moser, *P. laricio* var. *nigricans* (Host) Parl., *P. laricio* var. *prostrata* Beissn., *P. laricio* var. *pygmaea* Carriere, *P. laricio* var. *pyramidata* Carriere, *P. nigra* Link, *P. nigra* var. *austriaca* (Hoss) Badoux, *P. nigra* var. *banatica* Georgescu&Ionescu, *P. nigra* subsp. *croatica* Lovric, *P. nigra* var. *gocensis* Georgev., *P. nigra* f. *hornibrookiana* Slavin, *P. nigra* f. *moseri* (J.J.Moser) Rehder, *P. nigra* var. *nigra*, *P. nigra* f. *prostrata* (Beissn.) Rehder, *P. nigra* f. *pygmaea* (Carriere) Rehder, *P. nigra* f. *pyramidalis* Slavin, *P. nigra* var. *pyramidata* (Carriere) Fitschen, *P. nigricans* Host

3.Systematic Position:

Christenhusz et al. (2011)

- Class: Equisetopsida C. Agardh
- Subclass: Pinidae Cronquist
- Order: Pinales Gorozh.
- Family: Pinaceae Spreng.
- Genus: *Pinus* L.
- Species: *P. nigra* J.F. Arnold

Bentham and Hooker (1862)

Kingdom: Plantae

Division: Phanerogamia

Class: Gymnospermeae

Ordo: Coniferae

Tribus: Abietineae Eichler

Genus: *Pinus* L.

Species: *P. nigra* J.F. Arnold

4.Distribution:

Global: Native to Albania, Austria, Bosnia and Herzegovina, Bulgaria, Croatia, Czech Republic, France, Germany, Italy, Macedonia, the former Yugoslav Republic of, Montenegro, Poland; Romania; Serbia, Slovakia, Slovenia, Switzerland, Ukraine

India: Uttarakhand

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

6. Threat Status:

IUCN:Least Concern

BSI:

7. Habit and Habitat: Tree of the [Mediterranean forests, woodlands, and scrubbiome](#), It is generally a lower montane species

8. Life Form: Phanerophytes

9. Economic Importance: Timber, ornamental

10. Probable Progenitor of:

11. DNA

C-value

2C (23.00 pg) ⁴

2C (25.40 pg) ⁹⁶

2C (26.93 pg) ²⁰

Methodology

Flow cytometry⁴

Flow cytometry⁹⁶

Flow cytometry²⁰

12. Basic chromosome number(s): $x=12$ ^{3, 8, 16, 26, 33, 35, 37, 44, 49, 54, 56, 73, 78, 79}

13. Zygotic chromosome number(s): $2n=24$ ^{3, 8, 16, 26, 33, 37, 44, 49, 54, 56, 73, 78, 79}

14. Gametic chromosome number(s): $n=12$ (female gametophyte) ⁶⁴

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

Image file

16.Ploidylevel:Diploid 3, 8, 16, 26, 33, 37, 44, 49, 54, 56, 64, 73, 78, 79

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: 23, 26, 33, 44, 49

Karyotype Median 11th and 12th pairs submedian^{23, 26, 33, 44, 49}

Chromosome size Large^{23, 33, 44, 49}

NOR chromosome(s) 8²³ , 12²⁶

Degree of asymmetry Symmetrical^{23, 33, 44, 49}

Image file

22. Banding pattern(s): C-bands⁴⁴

Image file

23.Physical mapping of chromosomes:Telomere repeat, centromere repeat (PCSR), rDNA²⁶

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^{56, 33}

Image file

DNA level

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