

Species Data Sheet

DBT- Network Programme

Datasheet No. A-098.009.064
(family.genus.species)

1. Taxon: *Fimbristylis* Vahl

Species: *Fimbristylis miliacea* (L.) Vahl;

Subspecies

Variety

Cultivar

Hybrid

Image file

2. Synonyms: *Fimbristylis quinquangularis*

3. Systematic position:

APG IV (2016)

- Kingdom: Plantae
- Clade: Angiosperm
- Clade: Monocots
- Clade: Commelinids
- Order: Poales Small
- Family: Cyperaceae Juss.
- Genus: *Fimbristylis* Vahl
- Species: *F. miliacea*

Bentham and Hooker (1862)

Kingdom: Plantae

Division: Phanerogamia

Class: Monocotyledones

Series: Glumaceae

Ordo: Cyperaceae Juss.

Genus: *Fimbristylis* Vahl

Species: *F. miliacea*

4. Distribution:

Global: Bangladesh, Bhutan, Cambodia, India, Indonesia, Malaysia, Myanmar, Nepal, Pakistan, Philippines, Sri Lanka, Thailand and Vietnam

India: Uttar Pradesh, Assam, Kerala and Chennai.

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

6. Threat Status:

IUCN:

BSI:

7. Habit and Habitat: Herb

8. Life Form: Annual

9. Economic Importance: In India, it is one of the most harmful weeds in rice fields.

10. Probable Progenitor of:

11. DNA

C-value

Methodology:

12. **Basic chromosome number(s):** $x=5^{2,7,13,22,23,28}$

13. **Zygotic chromosome number(s):** $2n=10^{6,7,45,48,55}$

14. **Gametic chromosome number(s):** $n=5^{2,6,13,22,23,27,28,42,46,47}$

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

Image file

16. **Ploidy level:** Diploid^{2,6,13,22,23,27,28}

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:**

;

Karyotype: Mostly metacentric⁷, Mostly Submetacentric and Telocentric²⁷

Chromosome size: Small size⁷, Medium Size²⁷

NOR chromosome(s): 4NOR⁷, 6NOR²⁷

Degree of asymmetry: Symmetrical, Slightly Symmetrical²⁷ (**Pollen Mitosis**)

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: $5n^{6,7,22,23}$

Image file

27. Chromosome distribution at anaphase I:

28. Genetic diversity:

Chromosomal level:

Image file

DNA level

29. Any other information (Apomixis; Inversion; Male sterility; Pollen grain mitosis; Pollen stainability; Translocation etc): Pollen mitosis: $n=5^{11,27,28}$