

A NEW CONIFER FOSSIL FROM VEMAVARAM (EARLY CRETACEOUS), ANDHRA PRADESH, INDIA

Genus—*ELATOCLADUS* Halle 1913

Elatocladus vemavaramensis sp. nov.

Figs. 1, 2

Diagnosis—Leafy twig, 3.2×1.4 cm in size. Stem prominent, 2 mm wide, mostly concealed by decurrent leaf bases. Leaves bifacial, fairly thick, linear-oblong, 4-6 mm long and 1.5-2 mm wide, spirally arranged, closely occurring in one plane. Margin of leaves entire, base contracted, twisted and prominently decurrent, apex obtuse. Midrib prominent, persisting up to apex.

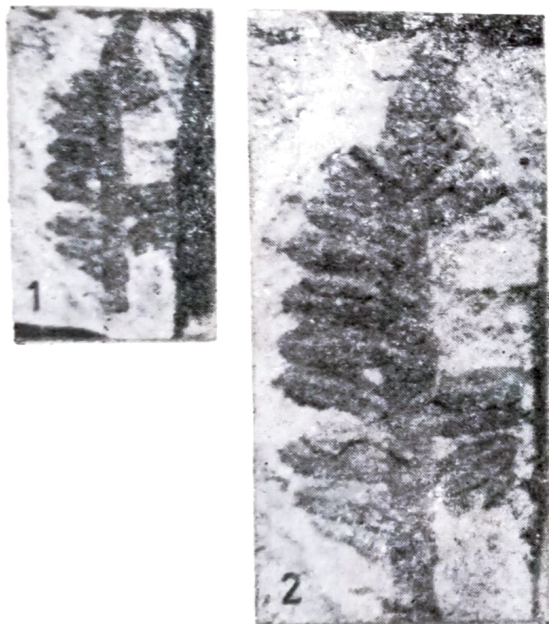


Figure 1—*Elatocladus vemavaramensis* sp.; holotype. BSIP specimen no. 56540, $\times 1$; Fig. 2. Same specimen enlarged, $\times 2$.

Holotype—Specimen No. BSIP 36540.

Locality—Vemavaram, Parkashan District, Andhra Pradesh.

Horizon & age—Vemavaram Shale, Early Cretaceous.

Comparison—*Elatocladus vemavaramensis* is characterised by bifacial fairly thick and stout leaves, having a thick midrib and decurrent contracted, twisted base. In a combination of these characters it differs from the already known species of the genus. However, *E. confertus* (Oldham & Morris) Halle (Bose & Banerji, 1984) matches with the present species in having closely arranged leaves and decurrent base, but it differs in having comparatively small and narrow leaves and their 'swept-back' nature. *E. vemavaramensis* resembles *E. jabalpurensis* (Feistmantel) Sahn (Bose & Banerji, 1984) in having stout stem. However, the former has comparatively stiff, small and thick leaves with prominent midrib and strongly decurrent twisted base.

References

- Bose, M. N. & Banerji, J. (1984). The fossil flora of Kachchh.—1. Mesozoic megafossils. *Palaeobotanist*, **33**(1): 1-189.
- Halle, T. G. (1913). The Mesozoic flora of Grahamland. *Wiss. Ergeb. Schwed. Südpol. Exped.*, 1901-1903, **3**: 1-122.

NEERU PANDYA, V. B. SRIVASTAVA
& SUKH-DEV

Birbal Sahn Institute of Palaeobotany, 53, University Road, Lucknow-226 007, India,