GADELLA, T. W. J.: The chromosome number of Anthocleista djalonensis Chev.

Few cytological data are available of the *Loganiaceae*. Its subfamily *Buddleioideae*, often considered a separate family, is a well-defined group, as far as could be concluded from the chromosome number. On the other hand, nothing can be said with certainty of the other subfamily, the *Loganioideae*, because the available data are still insufficient. Hitherto, the chromosome numbers of the following seven species of *Loganioideae*, studied by MOHRBUTTER (1936) and MOORE (1947), are known:

Gelsemium sempervirens	2n = 16	(MOORE, 1947)
Strychnos laurina	2n = 24	(MOHRBUTTER, 1936)
Strychnos nux-vomica	2n = 24	(MOHRBUTTER, 1936)
Strychnos sansibariensis	2n = 24	(MOHRBUTTER, 1936)
Spigelia marilandica	2n = 48	(MOORE, 1947)
Fagraea fragrans	2n = 12	(MOHRBUTTER, 1936)
Fagraea litoralis	2n = 12	(MOHRBUTTER, 1936)

These data seem to indicate that the basic chromosome number of the *Loganioideae* is X = 6.

The chromosome number of none of the species of the genus *Anthocleista* being known, Dr. Leeuwenberg asked me to examine *Anthocleista djalonensis* Chev., of which he collected herbarium material (Leeuwenberg 3285, WAG, UC) and mature fruits near Bouaké in the Ivory Coast in 1959. The chromosome number of this species might give valuable indications with regard to the relationship of this genus with the other genera of *Loganiaceae*.

Seedlings of this herbarium number have been grown in the greenhouses of the Hortus Botanicus at Utrecht and of the State Agricultural University at Wageningen.

Roottips were fixed in Karpechenko, embedded in paraffin, sectioned at 15 μ, and stained according to Heidenhain's haematoxylin method. The drawing was made with the aid of a "Carl Zeiss-Zeichenaufsatz".

18.3 μ

2n = 60

The chromosomes are very small, rod-shaped, 0,7–1,5 μ long, i.e. they have about the same size as those of *Spigelia marilandica*. The number, 2n = 60, is in accordance with other numbers known in the *Loganioideae* up to the present.

If the basic number for *Anthocleista* should, indeed, be X = 6, *Anthocleista djalonensis* would be dekaploid. However, further cytotaxonomic investigations of this genus and of other genera of *Loganioideae* are needed to corroborate this statement.

REFERENCES

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