A NEW PODOSTEMACEA FROM THAILAND, POLYPLEURELLA MICRANTHERA

by

P. VAN ROYEN

(Rijksherbarium, Leiden)

(Issued 15. VI. 1957).

Among Mr T. Smitinand's[1]) collections made in Thailand a new Podostemacea has been discovered, a description of which follows:

Polypleurella micranthera van Royen, nov. sp. — *Fig. 1.*

Herba nana, basi lichenoidea; individua foliata parvula folia 3 vel 4 naviculiformia, apice obtusa gerentia. Flores terminales, a spathella membranacea inclusa, pedicellis brevibus. Tepala dua, staminis basi in utraque latere posita, oblanceolata, apice acuta. Stamen unum, filamentis linearibus; antherae dorsifixae, ovoideae, apice obtusae, basi incisae, 2-loculares, rimis dua longitudinalibus lateraliter dehiscens; grana pollinis 2-locularia. Ovarium ellipsoideum, compressum, apice acutum, basi decurrens, 12-costatum, costus suturalibus longitudinaliter dimidiatis, 2-locularem septis caducis, placenta centrali, ovulis paucis; styli 2, ovato-lanceolati, basi coherentes, papillati. Capsula ovario exacte similis vel eo paullum maior, septicide, seminibus oblongo-obovoideis.

Thalloid base up to 7 cm in diam. Shoots suberect, 1—1.5 mm long. *Leaves* c. 0.7 by 0.5 mm. Spathella rupturing at apex with a few irregular lobes, pedicels c. 0.5 cm long. *Tepals* oblanceolate, 2—2.5 mm long, one-nerved, acute. *Stamen* 1, inserted at side of ovary directed to the thalloid base, 4—5 mm long, filaments linear, 3.5—4.5 mm long, anther ovoid, c. 0.5 mm long, apex obtuse or truncate, deeply cleft at base. *Ovary* 1.5—2 by c. 1 mm, acute at apex, with 12 distinct nerves of which the two sutural ones divide later longitudinally, originally 2-celled, but septae soon disappearing. Styles c. 0.5 mm long. *Capsule* as large as ovary or slightly larger.

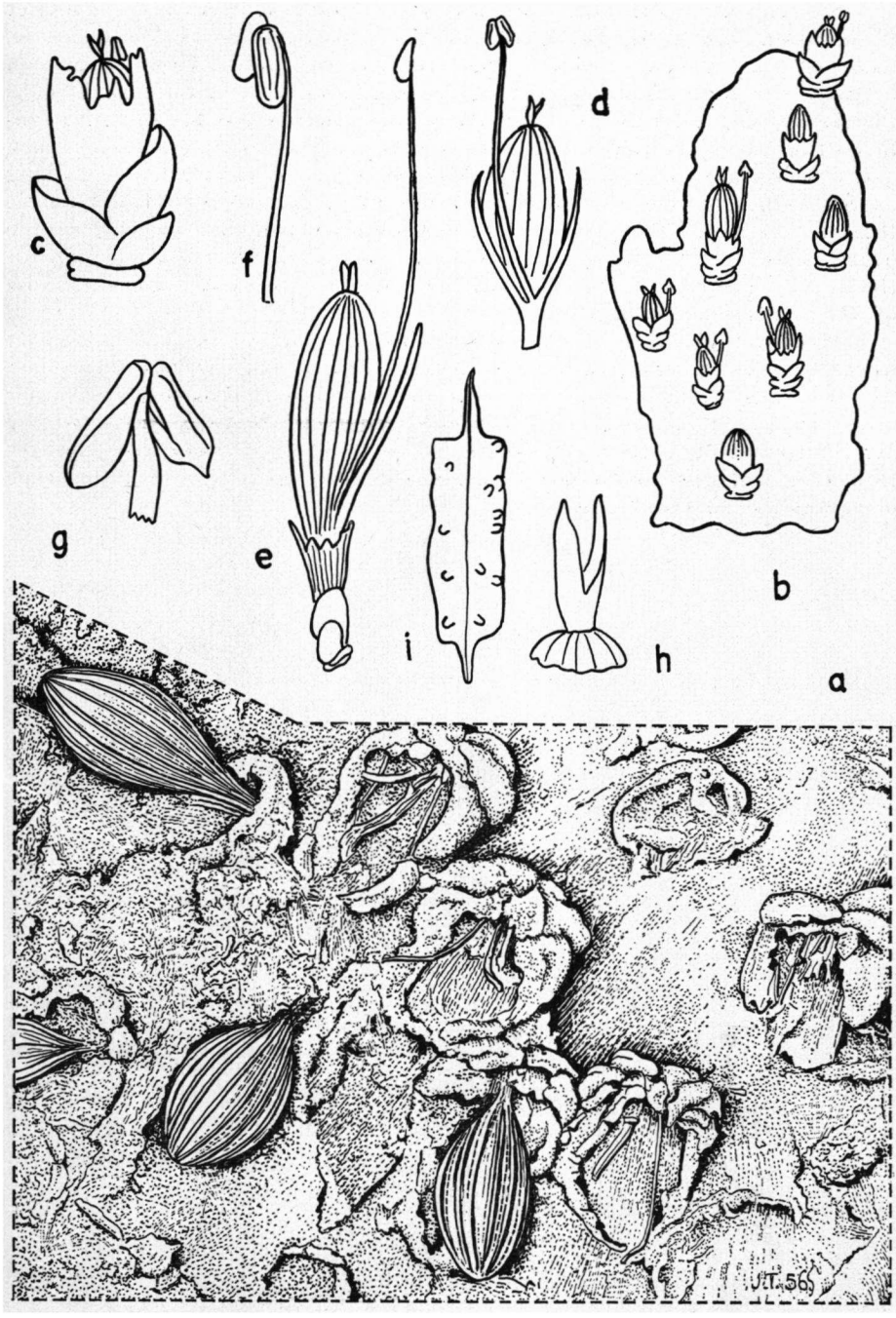
Type specimen: *Smitinand 3185* in L.

Distr.: Thailand.

THAILAND. Chanburi, Khao Soidao, alt. c. 600 m, on rocks in river: *Smitinand 3185 & 3185 A* (L), thalloid herb, January.

Fig. 1. *Polypleurella micranthera*, a. part of plant covering a stone, b. schematic drawing of part of the thalloid base and a few shoots, c. one shoot with opened spathella, d. flower from below, e. one shoot with a fully developed flower seen from aside, f. apical part of stamen, g. anther, h. top of ovary and two styles, i. placenta.. (from *Smithinand 3185* and *3185 A*).

[1]) Chief, Section of Botany, Forest Department, Bangkok, Thailand.


c
f
d
g
e
i
h
b
a
VT. 56

Remarks: The other species, *P. schmidtiana* (Warming) Engler (Engl. Bot. Jahrb. 61, Beibl. 138 (1927) 9), in the genus *Polypleurella,* differs from the new species in the linear leaves, the different proportion between tepals and stamens, (in *P. schmidtiana* the tepals are as long as the stamen or the filaments), and also in the subulate tepals. In *P. micranthera* the leaves are boat-shaped, the tepals are half as long as the stamen and oblanceolate in shape. In *P. schmidtiana* the filament is twice as long as the anther but in *P. micranthera* the filaments are 8—9 times longer than the anther. The styles in *P. schmidtiana* are half as long as the ovary, those of *P. micranthera* about a third or a fourth of the size of the ovary. The ribs of the ovary of the latter are strongly pominent, those of *P. schmidtiana* weak.

Though the leaves of *P. micranthera* are said to be squamiform it might be asked whether in a juvenile state they do not carry a linear limb which breaks off as soon as the shoot becomes older. This happens rather often in the Podostemaceae in South America. Material collected by Mr Smitinand of a very young thallus in which the shoots were not yet flowering, did show squamiform leaves only, forcing us to accept this type of leaves as the usual one.