

Studia Orchidacearum Japonicarum IV*

Orchidaceae Formosanae Novae Atque Criticae

auctore

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32) *Orchis taiwanensis* FUKUYAMA, sp. nov.

Terrestris, gracilis, erecta vel stricta, glaberrima, 7-18 cm. alta, tuberculis pilosiusculis globosis vel ovoideis ellipsoideisve. Caulis plerumque remote bifolius interdum trifolius, basi 1-2-vaginatus, vaginis membranaceis apice acutis obtusisve caulem arcte amplectentibus.

Folia erecto-patentia, linearia vel lanceolato-linearia lanceolatae, in exsiccato chartacea, apice acuta vel acuminata, basi foliis superioribus abrupte contracta vel gradatim attenuata et caulibus articulata, basi foliis inferioribus in vaginam decurrentia et amplectentia, c. 3.5-9 cm. longa, medio 4-15 mm. lata, utrinque glabra, trinervata.

Racemus terminalis, suberectus, secundus, 2-5 cm. longus, laxiuscule 3-11-floratus, bracteis lanceolatis apice acuminatis basi contractis utrinque glabris c. 1-1.5 cm. longis superioribus sensim brevioribus.

Flores rosei, apertientes, pedicellis rectis glabris bracteis subaequilongis raro duplo longioribus. Sepalum intermedium ellipticum, apice obtusiusculum, ad basin angustatum, concavum, dorso medio costa prominens, membranaceum, c. 5 mm. longum, medio 2.5 mm. latum, utrinque glabrum, uninervatum. Sepala lateralia posteriore valde reflexa, oblique oblonga vel ovato-oblonga, latere superiore lente truncata, apice obtusiuscula, basi paullo contracta, margine superiore leviter revoluta, dorso medio costis prominentia, c. 5-6 mm. longa, infra medium 3-3.5 mm. lata, utrinque glabra, uninervata. Petala cum sepalo intermedio in galeam conniventia, oblique oblonga, apice obtusa, basi contracta, margine lente irregulariter undulata, membranacea, sepalis paullo minora, medio c. 2.5 mm. lata, utrinque glabra, uninervata.

Labellum sessile, erecto-patens, circuitu semi-orbiculatum vel ovato-orbiculatum, c. 1 cm. longum, inter apices loborum lateralium c. 1.1 cm. latum, supra minutissime pilosiusculum, basi truncatum vel obtusum, medio leviter vel manifeste trilobatum, lobis lateralibus oblique oblongis vel

* Continued from Bot. Mag. (Tokyo). 48 (1935), p. 442.

Terrestris, erecta, aphylla, 40–50 cm. alta, rhizomate adscendente rigido ad nodos squamulato, squamulis inter se remotis brevibus rigidiusculis rhizomatem circumdantibus.

Caulis e rhizomate assurgens, strictus, gracilis, teres, glaber, ochraceus, simplex vel ad infimam ramosus, in exsiccato medio 1.5–2 mm. diametens, remotissime paucè squamatus, squamis in exsiccato nigricantibus inferioribus vaginiformibus superioribus minoribus et sensim in bracteas decrescentibus.

Racemus florifer 3–7 cm. longus, erectus, laxiuscule 4–7-floratus, bracteis quam pedicellis multo brevioribus deltoideis acutis 3–5 mm. longis glabris.

Flores apertientes vel subclausi, cerini, pedicellis cum ovariis erecto-patentibus gracilibus fere 2–3 cm. longis glabris apice margine irregulariter eroso-denticulatis. Sepalum intermedium lineari-oblancoelatum, apice acutiusculum, deorsum gradatim attenuatum, membranaceum, utrinque glabrum, c. 2.5 cm. longum, supra medium 4 mm. latum, 5-nervatum, sepalis lateralibus intermedio similibus sed vix brevioribus angustioribusque. Petala sepalo intermedio subaequiformia, sed paullo falcato-obliqua, utrinque glabra, c. 2.5 cm. longa, supra medium 5 mm. lata, 5-nervata.

Labellum petalis brevius, c. 2 cm. longum, dimidio inferiore columnae margini adnatum, parte superiore dilatatum et obsolete trilobatum, inter apices lorum lateralium explanatorum c. 8 mm. latum, lobis lateralibus inconspicuis latere interiore 1.5 mm. longis apice obtusis columnam vix superantibus, lobo intermedio margine eroso-crenulato apice emarginato 7–8 mm. lato infra apicem supra pilis longis barbato. Columna gracilis, semiteres, glabra, labello brevior, c. 1.4 cm. longa, infra apicem subito membranaceo-dilatata. Anthera subquadrangularis.

Nom. Jap. Roobai-sukerokuran (nov.)

Hab. Formosa; praef. Taihoku, in laurisilvis monte Daitoo-zan, prope Shinten, (N. FUKUYAMA! Apr. 11, 1934, no. 4534. Typus in Herb. Orch. Fuk.)

35) *Zeuxine rupicola* FUKUYAMA, sp. nov.

Rupestris, humilis, erecta, 2–7 cm. alta, tota glabra, rhizomate repente brevissimo vix radicante. Caulis ascendens, simplex, teres, carnosus, basi vaginis vel foliis rudimentariis ornatus, ceterum totus foliatus, apice racemosus.

Folia erecta, alterna, linearia, apice acuminata, basi non contracta et tubuloso-vaginantia, in exsiccato membranacea, utrinque glabra, c. 1–3 cm. longa, medio c. 3 mm. lata, uninervata, nervis supra impressa et subtus elevata, partibus vaginiformibus brevibus 2–3 mm. longis caulem complete

amplectentibus.

Flores glabri, albescentes, 3–10 in apice caulis dense racemosi, racemo erecto subsecundo, bracteis ovato-lanceolatis apice acuminatis basi paullo contractis membranaceis utrinque glabris margine integris vel plus minusve irregulariter dentatis pedicellos paullo superantibus, pedicellis ellipsoideis c. 5 mm. longis glaberrimis.

Sepalum intermedium oblongo-lanceolatum, concavum, apice obtusiusculum, basi paullo contractum, utrinque glabrum, membranaceum, c. 5.5 mm. longum, supra basin 2–2.5 mm. latum, trinervatum. Sepala lateralia sub labello patentia, intermedio paullo minora, oblique ovato-oblonga, sursum sensim angustata, apice obtusiuscula, basi leviter contracta, utrinque glabra, c. 4 mm. longa, supra basin 1.5 mm. lata, trinervata. Petala sepalis lateralibus similia, sed plus minusve majora, cum sepalis intermedio in galeam conniventia, utrinque glabra, membranacea, subhyalina, trinervata.

Labellum sessile, integrum, elobatum, ovato-oblongum, 4 mm. longum, supra basin 2 mm. latum, sursum gradatim angustatum, anteriore cymbiforme sulcatum, apice acutiusculum, posteriore paullo ventricosum, membranaceum, utrinque glaberrimum, basi intus non tuberculatum, trinervatum. Columna brevis, crassa. Anthera cordata.

Nom. Jap. Chikushi-kinuran (nov.)

Hab. Formosa; praef. Taihoku, in saxis inter Chikushiko et Shirin, (N. FUKUYAMA! Mart. 1934. no. 4600. Typus in Herb. Orch. Fuk.)

The present species is nearly related to *Zeuxine strateumatica* SCHLECHTER. It is, however, to be distinguished from it chiefly by the form of lips. Moreover, these two species show very different mode of oecological adaptation. The present species has been found only on the surface of andesite in the mountainous region, while *Zeuxine strateumatica* SCHLECHTER is a common and widely distributed species growing in the secondary grass-land in Formos at lower altitude.

36) *Tainia elliptica* FUKUYAMA, sp. nov.

Terrestris, erecta, 20–35 cm. alta, rhizomate repente brevissimo, radicibus rigidis elongatis teretibus brevissime lanuginosis in exsiccato 2–2.5 mm. diametentibus. Pseudobulbus elongato-ovoideus, sursum sensim rostrato-angustatus, carnosus, glaberrimus, 3.5–5 cm. longus, medio 5–10 mm. in diametro, interdum basi squamatus, squamis pseudobulbum superantibus scariosis nervosis.

Folia solitaria, erecta, ex apice pseudobulbi oriunda, petiolata, lamina elliptica vel oblongo-elliptica, c. 16–17 cm. longa, medio 5–6 cm. lata, apice acuta, basi abrupte angustata et ad petiolum gracilem 5 cm. longum abeuntia, margine integra, chartacea, utrinque glabra, vivo supra subnitida,