

***Paulownia serrata* - a New Species from China**

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Abstract: A new species of *Paulownia*, *Paulownia serrata* D. L. Fu et T. B. Zhao, sp. nov., was described in this paper. The species appears to be similar to *P. kawakamii* Ito, but it has some particular characteristics which can be distinguished with *P. kawakamii* Ito and other species of *Paulownia*. The main distinguishing features are that the margin of leaf is irregularly serrate, the inflorescent conical triplicate-ternate-cymes, the cyme 1~3-flowers generally 1-flower sine peduncles, the flower white, and there are sparse verruciform, cyathiform or acetabuliform glands on leaf, petiole and the inflorescent ramifications. The species was found and collected on April 25, 1999 in Zhuzhou, Hunan Province of China by Da-Li Fu. The holotype is kept at Henan Agricultural University, No. 199904251. [Nature and Science 2003;1(1):37-38].

Key words: *Paulownia*; *P. serrata* D. L. Fu et T. B. Zhao; New species; China

***Paulownia serrata* D. L. Fu et T. B. Zhao, sp. nov.**

Plate I

Species *P. kawakamii* Ito. similis, sed ramulis foliisque juvenilibus et petiolis dense pilis longi-glandulosus et glandulis mastoideis, breviter pilis glandulosus sparse villis rare dendro-pilis. foliis cordatis margine irregulariter serraturis interdum supra medium minute integris undulatis vel integris inter sparse serraturas vel (3~)~5 lati-trianguste lobis, margine dense ciliis longi-glandulosus rare stellato-pilis et villis fortuito longe stipitatis dendrociliis. foliis petiolisque cum rami-inflorescentiis sparse verrucis glandulosus, glandibus cyathiformibus et glandibus acetabuliformibus. inflorescentiis coniciformibus triplicato-ternati-cymis; cymis 1~3-floribus, generaliter 1-flore, sine pedunculis; pedicellis et calycibus floribus extus dense flavo-brunnei-dendro tomentosus. floribus albis minute purpurascensibus, labellis et extus tubis dense minute pubescentibus, densio-pilis glandulosus rare dendro-pilis, tubis in ventralibus 2-plicis longitudinalibus valde elevatis 4~5 mm altis, striis purpureis vel 20~23-striis in interrupte purpureis inter flavidos; calycibus fructibus patelliformibus, lobis planis apice mucronibus inflexis extus glabris.

Arbor decidua, 8 m alta. ramuli grossi pallide brunnei, lenticellis expresse elevatis, juveniles virides dense pili longi-glanduliferi, pili-glanduliferi papillati et breviter pili glandulosus sparse villi et stellato-pili longi-stipitati. Folia cordata vel late triangusti-cordata 8~20 cm longa 10~17 cm lata supra atro-viridia sparse breviter pili glandulosa et pubescentes rare stellato-pila, costis et nervis lateralibus densioris pilis glandulosus, pilis glandulosus papillatis rare pilis et pilis dendro-brevi-stipitatis, subtus viridula densiora pilia, breviter pili-glandulosa et stellato-pila rare dendro-pili brevi-stipitata et villi, costis et nervis lateralibus expresse elevatis

dense pilis longe glandulosus, pilis glandulosus, pili-glandulosus papillatis rare villis et verrucis glandulosus, glandulis cyathiformibus et glandulis acetabuliformibus, fortuito dendro-pilis, apice acuminata vel acuta basi cordata margine irregulariter serratura interdum supra medium minute undulati-integra, integra inter sparse serraturas vel (3~)~5 lati-trianguste lobis, dense ciliis longe glandulosus rare stellato-pilis et villis fortuito dendro-ciliis; petioli 7~14 cm longi viriduli interdum minute pallide purpurascensibus dense breviter pilis glandulosus et pilis glandulosus papillatis rare villis glandulosus et dendro-pilis. Inflorescentiae coniciformes triplicato-ternati-cymae; ramuli inflorescenti brunnei glabri, in juvenile pilis et glandulosus cum ramulis juvenilibus; cymis 1~3-floribus, generaliter 1-flore, sine pedunculis. Alabastra ob-ovoidea dense dendro-tomentosa flavo-brunnea apice obtusa basi ob-trianguste conica 5-lobis lobis triangulatis suturis expressis, pedicellis 8~12 mm longis supra medium ampliatis dense tomentosus flavo-brunneis; calycibus ob-trianguste infundibuliformibus basi conicis 5-lobis extus dense flavo-dendro-tomentosus brunneis; flores albi minute purpurascensibus, corollis 4.2~5.0 cm longis tubis 2.5~3.0 cm longis diam. ca. 1.5 cm apice 5-lobis fauce diam. 4.0~4.5 cm, labellis ca. longitudinem 1/3 tubi partes aequanlibus, supra 2-labellis semiorbiculatis erectis vel minute posticis margine irregulariter rotundiserratis dense minute glanduli-cilis et dendro-cilis, tubis labellisque extus dense minute pubescentibus, pilis densioribus glandulosus, intus labellis minute pubescentibus, intus tubis glabris, tubis in ventralibus 2-plicis longitudinalibus valde elevatis 4~5 mm altis, striis purpureis vel 20~23-striis interrupte purpureis inter flavidos; stamina 4 aequilonga antheris flavidis glabris filamentis 1.2~1.5 cm longis basi curvatis sparse breviter pilis glandulosus; ovariis viridulis ovoideis

dense glandibus papillatis, stylis 1.2~1.5 cm longis sparse glandibus papillatis. Capsulae ovoideae 1.5~2.5 cm longae diam. 1.2~1.8 cm, apice acutae apiculis ca. 3 mm longis basi rotundatae cinerei-brunneae; calycibus fructibus patelliformibus 5-lobis planis fortuito reflexis

lobis apice mucronibus inflexis extus glabris. Florescentiae Apr., Fructus maturatione Aug.

Hunan: Zhuzhou, 25. 04. 1999. D. L. Fu, No. 199904251(holotype, HNAC); ibidem. 28. 05. 1999. D. L. Fu, No. 199905281.



Plate 1 *Paulownia serrata* D. L. Fu et T. B. Zhao

1-3. leaf; 4. inflorescent; 5. flower buds, flowers and corolla; 6. ramification of inflorescent; 7. capsules