

杜鹃花科 *Vaccinium wardii* Adamson 的订正

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摘要: 通过对模式标本和原始文献的研究, 确认 *Vaccinium wardii* Adamson 是红粉白珠(*Gaultheria hookeri* C. B. Clarke)的异名, 而不是乌鸦果(*Vaccinium fragile* Franch.)的异名。

关键词: *Vaccinium wardii* Adamson; 红粉白珠; 新异名

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Critical Notes on *Vaccinium wardii* Adamson (Ericaceae)

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Abstract: Based on the study of type specimens and protologues, *Vaccinium wardii* Adamson is treated as a synonym of *Gaultheria hookeri* C. B. Clarke, instead of *Vaccinium fragile* Franch.

Key words: *Vaccinium wardii* Adamson; *Gaultheria hookeri* C. B. Clarke; New synonym

Vaccinium L., consisting of ca. 450 species^[1], is the largest genus in Vaccinioideae, Ericaceae. It is mainly distributed in the Northern Hemisphere, but most species are found in tropical Asia. Morphologic diversification in *Vaccinium* is so remarkable that many specimens of other genera are often misidentified as *Vaccinium* species, especially *Gaultheria*. Although *Gaultheria* resembles *Vaccinium* in appearance, it is easy to distinguish it from the latter by having 2–4 awned anthers and a superior or semi-inferior ovary, while *Vaccinium* has anthers without awns and an inferior ovary.

Vaccinium wardii Adamson was described by Adamson^[2] based on a collection from Kangding County, Sichuan Province, China, with the protologue as follows: *suffrutex; caules basi decumbentes, radicanes, supra ramosi pilis vel setis longis rigidisque*

tenuiter tecti; folii lanceolati, coriacei, serrati, breviter petiolati, apice acuti basi plerumque cuneati, venis infra prominentibus supraque vallecucosis, infra et in petiolis pilis similibus caulibus tecti, superne glabri; inflorescentia ramosa, axillaria pilis brevibus mollibusque intacta; flores pedicellati; bracteae at bracteoli conspicue persistentes, flores fere aequantes; flores parvi rubri; calyx dimidio corollae brevior; corolla purpurea subglobosa. Sleumer^[3] then merged *V. wardii* with *V. fragile* Franch. according to the description, but he stated that he did not see the type specimen of *V. wardii*. Later, Sleumer's treatment was followed in Flora Reipublicae Popularis Sinicae and Flora of China^[4-5].

However, after careful examination of the specimens, it turns out that *V. wardii* and *V. fragile* are totally different species (Figs. 1, 2). According to

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Fig. 1 Isotype of *Vaccinium wardii* Adamson

the type specimen of *V. wardii*, we found some more important characters that Adamson did not mention: leaf blade 3 – 6.3 cm × 1.4 – 2.6 cm, secondary veins ca. 4 pairs, secondary and fine veins slightly impressed adaxially, raised abaxially; anthers 2-awned; ovary superior, puberulous. The 2-awned anthers and the superior ovary sufficiently indicated that this species should be a member of *Gaultheria*. Further comparison work demonstrated that *V. wardii* is identical to *Gaultheria hookeri* C. B. Clarke, which is a common species in Sichuan, China. They both have hirsute

branches, elliptic leaves, pubescent racemes, large bracts and ovate not acute calyx lobes. The leaf base of the isotype of *V. wardii* is cuneate while it is round in the lectotype of *G. hookeri*, but it is an unstable character. The hirsute branch is the key character to separate *G. hookeri* from other *Gaultheria* species, which is shown on the type specimens of the two species.

Thus, according to Art. 11.4 of the ‘International Code of Nomenclature for Algae, Fungi and Plants (Melbourne Code)^[6], the subsequent name *Vaccinium*



Fig. 2 Lectotype of *Vaccinium fragile* Franch.

wardii Adamson should be reduced to the synonym of *Gaultheria hookeri* C. B. Clarke:

Gaultheria hookeri C. B. Clarke in J. D. Hooker, Fl. Brit. India **3**: 458. 1882. Lectotype: India. Sikkim: Lachen, 10000 – 11000 ft., 2 August 1849, J. D. Hooker s. n. [K, image catalogue number K00442396 (Fig. 3)].

Vaccinium wardii Adamson in J. Bot. **51**(4): 130. 1913, **syn. nov.** Type: China. Sichuan: Kangding, 8000 ft., 12 June 1910, Frank Kingdon-Ward, s.n. (holotype: CGE? isotype: E, image catalogue number E00438124).

Additional specimens examined: China. Sichuan: without precise locality, Anonymous 3916, F. T. Wang 20983, K. L. Chu 2970, T. T. Yu 1978, W. P. Fang 8239; Baoxing County, K. L. Chu 3082; Luding County, G. R. Xu 23262, 23481, H. L. Tsiang 34096, 34180, H. L. Tsiang & T. H. Hsiung 37721, Z. A. Liu 22302; Shimian County, C. C. Hsieh 39772, 39852, 39884, 39924, 40080, 40105, 40383, 41108, 41146; Tianquan County, H. L. Tsiang 35377, H. L. Tsiang & T. H. Hsiung 34255, K. L. Chu 2544, Y. B. Yang 40051. (All the cited specimens are preserved in IBSC).



Fig. 3 Lectotype of *Gaultheria hookeri* C. B. Clarke

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