

青藏高原小米草属(玄参科)一新种——短唇小米草

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Euphrasia brevilabris Y. F. Wang, Y. S. Lian & G. Z. Du, a new species of the Scrophulariaceae from the Qinghai-Tibetan Plateau, China

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Abstract *Euphrasia brevilabris* Y. F. Wang, Y. S. Lian & G. Z. Du, a new species of the Scrophulariaceae from Gannan grassland of Gansu belonging to the east edge of the Qinghai-Tibetan Plateau of China, is described and illustrated. It is related to *E. regelii* Wettst. by having dense tentacle on the leaves, bracts and calyces, but differs from plant shorter, 3–7 cm high, without ramification, leaves smaller, 3–5 mm long, corolla yellow, the back 3–5 mm long, and labium shorter than muffle. It is also similar to *E. pectinata* Ten. by bracts obviously bigger than vegetative leaves, but differs from plant shorter, leaves smaller, having dense tentacle on the leaves, bracts and calyces, corolla yellow, labium shorter than muffle.

Key words *Euphrasia*, *Euphrasia brevilabris* Y. F. Wang, Y. S. Lian & G. Z. Du, Scrophulariaceae, new species, Qinghai-Tibetan Plateau, China.

摘要 描述了青藏高原的甘南地区产玄参科Scrophulariaceae小米草属*Euphrasia*一新种——短唇小米草*E. brevilabris* Y. F. Wang, Y. S. Lian & G. Z. Du, 并绘制了形态图。本种以其叶、苞叶和花萼上具有密的腺毛与短腺小米草*E. regelii* Wettst.相似, 但植株矮小(高仅3–7 cm), 不分枝, 叶小(长仅3–5 mm), 花冠黄色, 背面长3–5 mm, 下唇比上唇短易与短腺小米草区别。本种又以其苞叶明显大于营养叶与小米草*E. pectinata* Ten.相似, 但其植株矮小, 不分枝, 叶小, 叶、苞叶与花萼被密的腺毛, 花冠黄色, 下唇比上唇短易与小米草区别。

关键词 小米草属; 短唇小米草; 玄参科; 新种; 青藏高原; 中国

在连续几年的属于青藏高原东缘的甘肃甘南高寒草甸的野外考察中, 开黄花的小米草引起了我们的注意, 因为在该地区小米草属*Euphrasia* L.主要分布有两个种, 即小米草*E. pectinata* Ten.和短腺小米草*E. regelii* Wettst., 且这两个种在该地分布相当普遍, 它们的花常为白色或淡紫色, 尤其在花完全开放时, 下唇明显要比上唇长。此后, 我们有意识地寻找和观察该种, 结果在海拔分别为2900 m合作的博拉沟和3200 m卓尼的车吧沟分别发现了该种的居群, 经过观察解剖和对兰州大学、西北师范大学和中国科学院寒旱研究所的标本的查阅, 确定该种为一新种。该种较为稳定的特征如植株矮小, 不分枝, 花黄色,

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下唇比上唇短, 与小米草属其他种, 特别是小米草和短腺小米草明显不同, 现报道如下。
短唇小米草 新种 图1

Euphrasia brevilabris Y. F. Wang, Y. S. Lian & G. Z. Du, sp. nov. Fig. 1

Species affinis *E. regelii* Wettst., a qua differt planta humile, tantum 3–7 cm alta, simplici, foliis minoribus, tantum 3–5 mm longis, corolla lutea, labio inferiore quam labio superiore brevior, sed haec 5–30 cm alba, 5–10 mm longa, labio inferiore longiore differt.

Species necnon affinis *E. pectinatae* Ten., a qua differt planta humile, simplici, foliis minoribus cum calyce glandulosis; corolla, labio inferiore brevior, sed haec 8–30 cm alta, simplici vel ramosa, foliis 5–15 cm longis cum calyce non glandulosis, corolla alba, vel lilacina, labio inferiore conspicue longiore differt.

Herba annua. Caulis erectus, 3–7 cm altus, simplex, pubescens. Folia et bractae sessiles, ovatae vel ovato-rotundatae, basi laticuneatae, 3–5 mm longae, margine dentatae, glandulosae setaceaeque. Inflorescentia spicata terminata, calyx tubulosus, quadrifidus, dense glandulosus et pauci-setaceus. Corolla bilabiata, lutea, labio superiore purpureo-pocilanthero, 3–5 mm longo, extus piloso, labio inferiore illo brevior; calcaris ad basim antherarum; ovarium superum, stylusque pubescens. Capsula longe oblonga, pubescens. Fl. Aug. Fr. Sept.–Oct.

China. Gansu (甘肃): Hezuo (合作), Bolagou (博拉沟), alt. 2900 m, in grassland of valley, 2005-08-15, Y. F. Wang (王一峰) 2005215 (holotype, NWTC); Jonê (卓尼), Chebagou (车吧沟), alt. 3200 m, in grassland of edge of forest, 2005-08-25, Y. F. Wang (王一峰) 2005232 (NWTC).

一年生草本。茎直立, 高3–7 cm, 不分枝, 被白色柔毛。叶与苞叶无柄, 卵形至卵圆

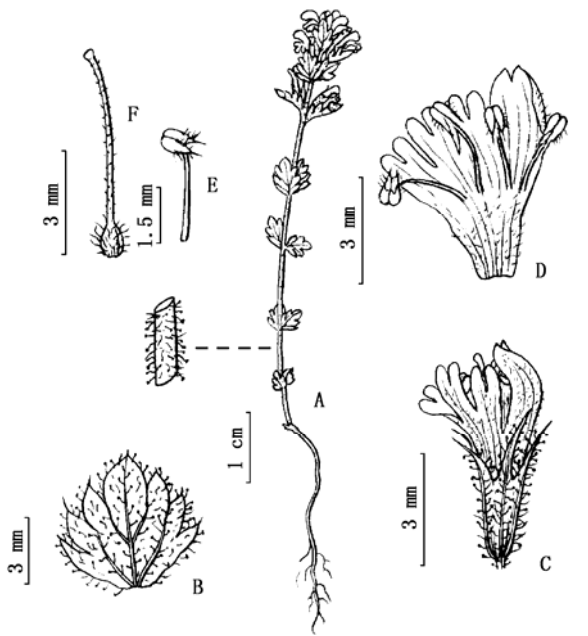


图1 短唇小米草 A, 植株; B, 叶; C, 花; D, 花冠; E, 雄蕊; F, 雌蕊。(陶明琴根据王一峰2005215号标本绘)

Fig. 1. *Euphrasia brevilabris* Y. F. Wang, Y. S. Lian & G. Z. Du. A, plant; B, leaf; C, flower; D, corolla; E, stamen; F, pistil. Drawn by M. Q. Tao from Y. F. Wang 2005215.

形, 基部宽楔形, 长3–5 mm, 边缘具齿, 被腺毛和刚毛。穗状花序顶生, 花萼筒状, 4 裂, 被密的腺毛, 夹杂少量的刚毛; 花冠黄色, 上唇带紫色斑点, 背面长3–5 mm, 外面被白色柔毛, 下唇短于上唇; 药室基部具芒状距, 子房上位, 子房与花柱均被毛。蒴果长矩圆形, 被柔毛。花期8月, 果期9–10月。

小米草属在我国产两个组, 即小米草组sect. *Semicalcaratae* Benth.和热带小米草组sect. *Paradoxae* Pugsley, 两个组在地理上明显间断。短唇小米草为一年生草本, 苞叶明显大于营养叶, 很明显属于前者, 它与小米草组中的短腺小米草*E. regelii* Wettst.近缘, 但植株矮小, 高仅3–7 cm, 不分枝; 叶小, 长仅3–5 mm; 花冠黄色, 背面长3–5 mm; 下唇比上唇短而不同。本种又与小米草*E. pectinata* Ten.相似, 但植株矮小, 不分枝; 叶小, 叶、苞叶和花萼被密的腺毛; 花冠黄色, 下唇比上唇短而不同。该种的植株矮小, 花冠黄色, 下唇比上唇短, 极易与该组中其他种相区别。

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