

# 金佛山附地菜, 重庆紫草科一新种

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## *Trigonotis jinfoshanica*, a new species of Boraginaceae from SW China

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**Key words:** Boraginaceae; *Trigonotis*; *T. jinfoshanica*; new species; Chongqing; China

四川重庆市南川的金佛山拥有丰富的植物区系,其紫草科附地菜属有5种,1变种:长梗附地菜(*Trigonotis mairei* (Lévl.) Johnst.),毛果附地菜(*T. macrophylla* Van. var. *trichocarpa* Hand.-Mazz.),西南附地菜(*T. cavaleriei* (Lévl.) Hand.-Mazz.),附地菜(*T. peduncularis* (Trev.) Benth. ex Bader & Moore),以及二金佛山特有种,狭叶附地菜(*T. compressa* Johnst.)和南川附地菜(*T. laxa* Johnst.)。最近,作者在鉴定一批近年从金佛山采集的紫草科标本时,又发现一特产该山的附地菜属新种,现在描述于下。

### 金佛山附地菜

*Trigonotis jinfoshanica* W. T. Wang, sp. nov.

Ob folia orbiculari-ovata, bostrycem inferne paucibracteatum, et nuculas tetrahedrales species nova haec *T. rotundatae* Johnst. similis, quae foliis apice mucronatis basi rotundatis vel cordatis, pedicellis longioribus (longitudine 5~10 mm), corollae limbo majore 7 mm in diametro differt.

Herba perennis, parva. Rhizoma obliquum, grac-

ile, circ. 5 cm longum, inferne radices densas filiformes 1~2 cm longas edens, ad nodos residuis partium basali-um petiolorum instructum. Caules unici vel bini, ascendentes vel erecti, graciles, 9~14 cm alti, cum petio-ulis adpresse pubescentes, supra basin ramosi, 1~2-foli-ati. Folia basalia circ. 12, longe petiolata; laminae membranaceae, orbiculari-ovatae, suborbiculares vel late ovatae, 0.8~1.8 cm longae, 0.8~1.5 cm latae, apice rotundatae vel obtusae, basi rotundatae vel sub-truncatae, utrinque dense adpressequae puberulae, nervis lateralibus utrinsecus 2~3 obscuris; petioli graciles, 3~5 cm longi. Folia caulina eis basalibus similia, sed brevius petiolata. Bostryx terminalis, pedunculatus, 5~12 cm longus, multiflorus, inferne 2~4-bracteatus; bractee foliis caulinis similes; rhachis cum pedicellis gracilis, adpresse pubescens. Flos caeruleus; pedicel-lus 1~3 mm longus; calyx late campanulatus, circ. 1.6 mm longus, prope basin 5-partitus vel 5-sectus, segmentis anguste oblongis vel anguste obovato-oblon-gis 0.5 mm latis apice acutis intus glabris extus ad-

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presse puberulis; corolla subrotata, glabra, tubo 0.8~1.1 mm longo, limbo 2.5~5 mm in diametro 5-lobato, lobis obovato-orbicularibus 0.8~1.8 mm latis, appendicibus 5 sublunatis 0.4 mm longis; stamina 5 corollae tubi medio inserta, antheris ellipsoideis 0.3 mm longis.

Nuculae 4, tetrahedrales, atrobrunneae, laeves, leviter nitidae, glabrae, haud stipitatae, pagina dorsali triangulari-ovata 0.8~1.1 mm longa 0.6~0.8 mm lata leviter convexa, paginis ventralibus duabus aequalibus oblique triangularibus, angulis angustissime marginatis,

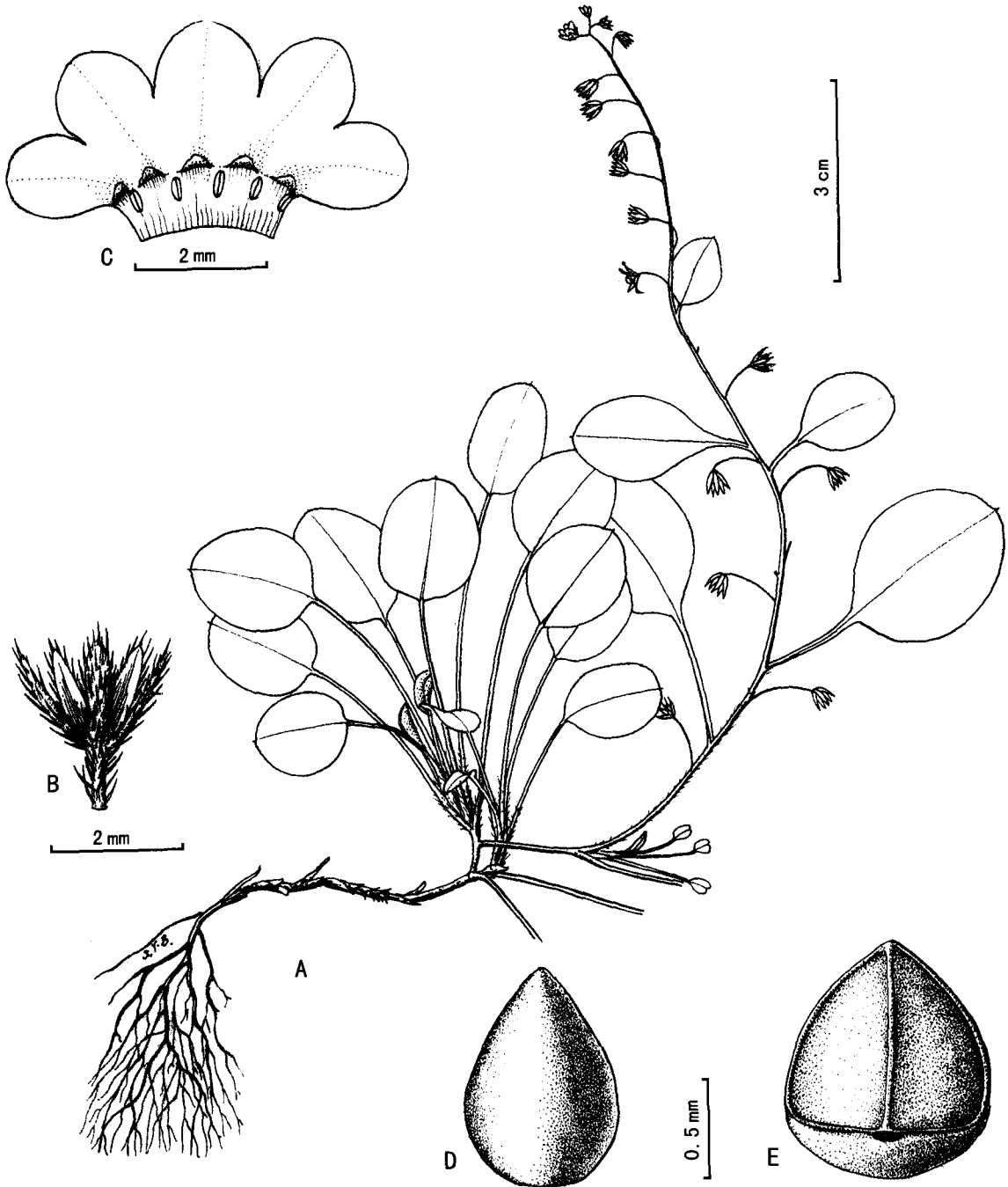


图1 金佛山附地菜 A. 体态; B. 花萼; C. 花冠打开, 示5枚花冠附属物和5枚雄蕊; D. 小坚果(背面观); E. 小坚果(腹面观)。 据刘正宇 15111号标本绘。(孙英宝 绘图)

Fig. 1 *Trigonotis jinfoshanica* W. T. Wang A. habit; B. calyx; C. opened corolla, showing the five corolla appendices and five stamens; D. nutlet (dorsal view); E. nutlet (ventral view). From Liu Zheng-yu 15111. (Drawn by Sun Ying-Bao)

pagina basali parva inconspicua.

多年生小草本。根状茎斜生, 细, 长约 5 cm, 下部密生丝形长 1~2 cm 的细根, 在节上有残留的叶柄基部。茎 1 或 2 条, 渐升或直立, 高 9~14 cm, 与叶柄被贴伏柔毛, 在基部之上分枝, 有 1~2 茎生叶。基生叶约 12 枚, 具长柄; 叶片膜质, 圆卵形, 近圆形或宽卵形, 长 0.5~1.8 cm, 宽 0.8~1.5 cm, 顶端圆形或钝, 基部圆形或近截形, 两面密被贴伏短柔毛, 侧脉每侧 2~3 条, 不明显; 叶柄长 3~5 cm。茎生叶似基生叶, 但具短柄。螺状聚伞花序顶生, 具梗, 长 5~12 cm, 有多数花, 下部 2~4 枚苞片; 苞片似茎生叶; 轴和花梗细, 被贴伏柔毛。花淡蓝色; 花梗长 1~3 mm; 花萼宽钟状, 长约 1.6 mm, 5 深裂近基部或 5 全裂, 裂片狭长圆形或狭倒卵状长圆形, 宽 0.5 mm, 内面无毛, 外面被贴伏短柔毛; 花冠近辐状, 无毛, 筒长 0.8~1.1 mm, 冠檐直径 2.5~5 mm, 5 裂, 裂片倒卵状圆形, 宽 0.8~1.8 mm, 附属物 5, 近新月形, 长 0.4 mm; 雄蕊 5, 着生于花冠筒中部, 花药椭圆球形, 长 0.3 mm。小坚果 4, 四面体形, 黑褐色, 光滑, 稍有光泽, 无柄; 背面三角状卵形, 长 0.8~1.1 mm, 宽 0.6~0.8 mm, 稍鼓起, 2 腹面等大, 斜三角形, 稜有极狭边缘, 基生面小, 不明显。

重庆 (Chongqing), 南川 (Nanchuan): 金佛山 (Jinfo Shan), 古佛洞 (Gufodong), alt 1890 m, 洞口干燥地 (in dry places near cave mouth), 果黄褐色 (fruits fulvous), 1995-09-19, 刘正宇 (Liu Zheng-

yu) 15111 (主模式 holotype, PE); 同地 (same locality), 仙女洞 (Xiannudong), alt. 1970 m, 阴湿处 (in shady moist places), 花淡蓝色 (fl. bluish), 1994-09-07, 刘正宇 14412 (副模式 paratype, PE); 同地 (same locality), 仙女洞, alt. 1950 m, 阴湿石缝中 (in shady fissures of moist rocks), 1993-09-23, 刘正宇 14351 (副模式 paratype, PE)。

本种的叶呈圆卵形, 螺状聚伞花序下部具少数苞片, 以及小坚果呈四面体形, 而与圆叶附地菜 (*Trigonotis rotundata* Johnst.) (产云南西北, 四川西南部) 相似, 但后者的叶顶端具短尖头, 基部圆形或心形, 花梗较长, 长 5~10 mm, 花冠较大, 檐部直径 7 mm (王庆瑞, 1989) 而与本种不同。

上引采自古佛洞的主模式与采自仙女洞的副模式的小坚果很相似, 但在叶和花冠的大小方面存在差异: 在主模式, 叶片长达 2 cm, 宽达 1.5 cm, 花冠直径 5 mm; 在副模式, 叶片长达 1.5 cm, 宽达 1.1 cm, 花冠直径 2.5 mm。上述有关区别在上述二地居群中是否存在变异, 值得进行研究。

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