

## TWO NEW SPECIES OF ALLIUM (ALLIACEAE) FROM IRAN

(Dedicated to Prof. Dr. E. Esfandiari on the occasion of his 80th birthday).

F. Matin

Matin, F. 1989 12 31: Two new species of *Allium* (*Alliaceae*) from Iran. — *Iran. Journ. Bot.* 4(2): 165 - 170. Tehran.

Two new species of *Allium* are described: *A. esfandiarii* from NW. Iran and *A. wendelboi* from W. Iran, of the section *Allium*. Relatives or affinities of the new species are discussed and the differences are explained.

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دوگونه جدید از جنس *Allium* (*Alliaceae*) از ایران  
از: فریده متین

دوگونه جدید از جنس *Allium* به نامهای: *A. esfandiarii* از شمال غربی ایران و *A. wendelboi* از غرب ایران نامگذاری و معرفی می‌گردند. گونه‌های نزدیک به گونه‌های جدید مورد توجه قرار گرفته و اختلافاتشان مورد بررسی قرار می‌گیرد.

***Allium esfandiarii* Matin, sp. nov.**  
(Section *Allium*).

Bulbus 1–2 cm diametro, tunicae exteriores ignotae; bulbilli cymbiformes, apiculati, flavescenti-brunnei. Scapus usque 80cm longus, per 1/3 vaginis foliorum scabrido-ciliati obtectus. Folia 5, quam scapus breviora, c. 3 mm lata, canaliculata, margine distincte scabrido-ciliata. Spatha caduca, c. 2 cm longa, rostrum basin spathae c. 1/2 aequans. Umbella sphaerica, usque fasciculato-subsphaerica,  $\pm$  multiflora,  $\pm$  densa; pedicelli inaequales, usque 1.5 cm longi, bracteolae c. 5 mm longae laciniatae. Perigonium urceolato-campanulatum, purpureum, nervis saturatoribus. Tepala 3–4 mm longa, cymbiformia, cucullata, inaequalia; tepala exteriora quam interiora  $\pm$  manifeste angustiora, elliptica, obtusa, nervo centralia  $\pm$  carinato-elevato, dorso scabrido-papillosa; interiora late ovato-elliptica, apice retusa, dorso sublaevia. Filamenta quam tepala longiora, prope basin connata et tepalis adnata, indistincte ciliata; exteriora lineari-subulata; interiora tricuspidata, cuspis antherifera c. 1/3 longitudinis baseos lamina et c. 1/2 longitudinis cuspidum lateralium attingens; antherae atropurpureo-violaceum. Stylus exsertus. Capsula perigonio persistenti subaequans.

Typus: Persia, Azarbayejan: Kalibar, Veinagh, Amirkhanlu (forest), 1550 m, 5.7.1978, Termeh, Moussavi & Habibi s.n. (holotypus EVIN).

Bulb 1-2 cm broad, tunics not known; bulblets boat-shaped, apiculate, yellowish-brown. Scape up to 80 cm long, covered for 1/3 of its length by scabrid-ciliate leaf-sheaths. Leaves 5, shorter than the scape, canaliculate, c. 3 mm broad, distinctly scabrid-ciliate at margin. Spath caducous, c. 2 cm long, the beak about one-half as long as the blade. Umbel spherical or fasciculate-subspherical,  $\pm$  densely many-flowered. Pedicels unequal, c. 1.5 cm long with c. 5 mm long lacinate bracteoles at the base. Segments of the urceolate-campanulate perianth purple with darker nerve, 3–4 mm long, boat-shaped, cucullate, unequal; the outer  $\pm$  distinctly narrower than the inner, elliptic, obtuse, scabrid-papillose on back with a  $\pm$  carinate midvein; the inner tepals broadly ovate-elliptic, retuse at apex, subsmooth on back. Filaments longer than tepals, connate and adnate to the tepals near base, undistinctly ciliate; the outer linear-subulate; the inner tricuspidate, with the antheriferous cusp about one-third as long as the basal lamina, and about half as long as the lateral cusps. Anthers dark purplish-violet.

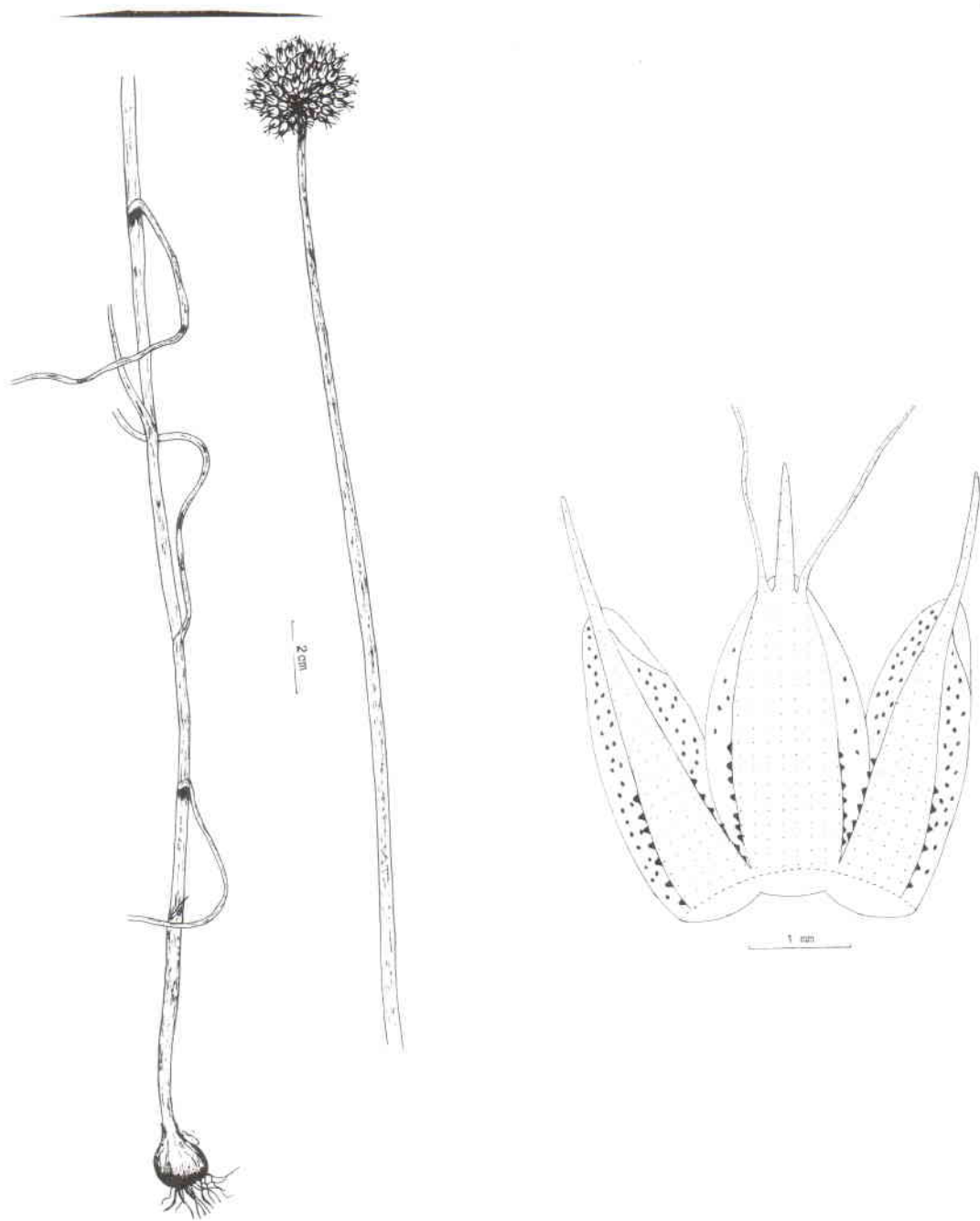


Fig. 1. *Allium esfandarii*

Style exserted. Capsule about as long as the perianth.

The new species is apparently most closely related to *A. qaradaghense* Feinbr. and *A. trachycoleum* Wendelbo, but differs markedly from these two species by the scabrid-ciliate leaf-sheaths and leaf margins, the colour of the tepals, which also have a strong nerve.

From *A. qaradaghense* it furthermore differs in having the purplish-violet anthers, and from *A. trachycoleum* in the length of the inner filaments, which in *A. trachycoleum* the lateral cusps have the same length as the antheriferous cusp, whereas they are twice as long in *A. esfandiarii*.

*Allium wendelboi* Matin, sp. nov.

(Section *Allium*).

Bulbus 1-2 cm diametro, globosus; tunicae exteriores coriaceae, brunneae; bulbilli pauci, flavescenti-brunnei. Scapus c. 26 cm altus, per 1/3 foliorum vaginis laevibus obtectus. Folia 2-3, scapo breviora, c. 5 mm lata, canaliculata, non fistulosa. Spatha caduca. Umbella densa, subsphaerica; pedicelli inaequales, usque ad 10 mm longi, + dense pustulosi, bracteolati. Perigonium c. 4 mm longum, urceolato-campanulatum, albidum, viridinervosum; tepala subacuta,

cymbiformia, apice saepe cucullata, margine verruculosa, dorso omnio vel secus nervos dense verruculosa; exteriora elliptico-ovata, quam interiora angustiora et sublongiora; interiora ovata. Filamenta quam tepala subbreviora, conata et tepalis prope basin adnata, ciliata; exteriora triangulari-subulata; interiora quam tepala, et filamenta exteriora circiter duplo latiora, tricuspidata, cuspis antherifera c. 1/4 longitudinis baseos ovato-oblongae et circiter 1/2 longitudinis cuspidum lateralium attingens; antherae c. 0.8 mm longae. Stylus exsertus. Capsula perigonio persistenti, aequans.

Typus: Persia, Zanjan towards Gheydar, 35 km S. of Soltaniyeh, kuhha-ye Gheydar, 2200-2650m, 3.7.1974, Tehrmeh & Moussavi s.n. (holotypus EVIN). Bulb 1-2 cm broad, globose, outer tunics brownish, coriaceous; bulblets few, yellowish-brown. Scape c. 26 cm long, covered to 1/3 with smooth leaf-sheaths. Leaves 2-3, not fistulous, canaliculate, c. 5 mm broad, shorter than the scape. Spathe deciduous. Umbel subspherical, dense; pedicels unequal, c. 10 mm long, subtended by bracteoles, + densely pustulous. Perianth urceolate-campanulate, whitish, with a green nerve, c. 4 mm long; tepals boat-shaped, subacute, cucullate at apex, densely

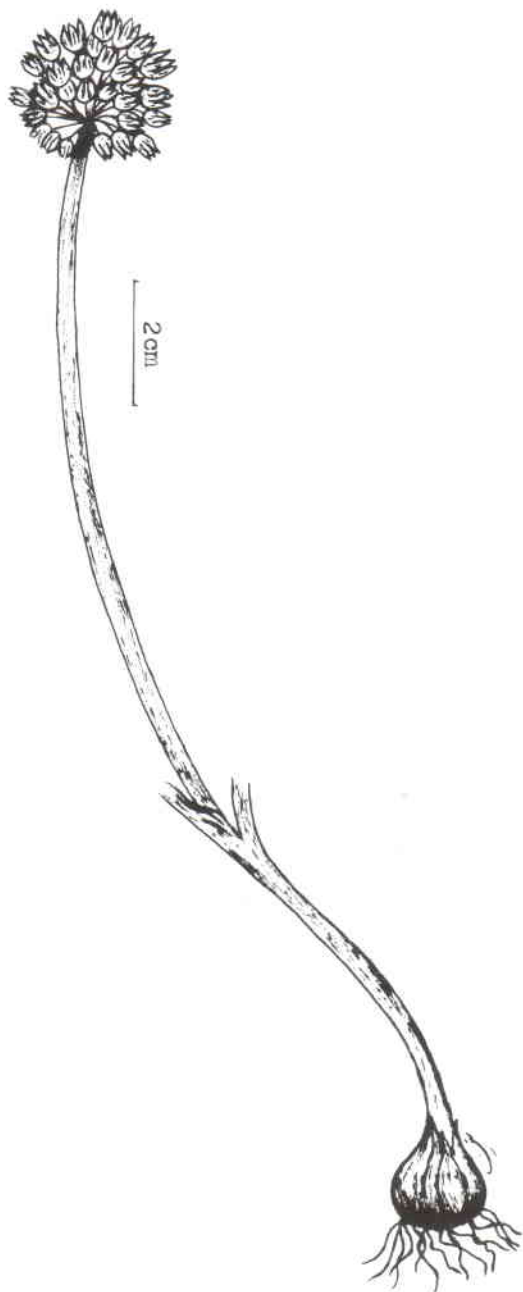
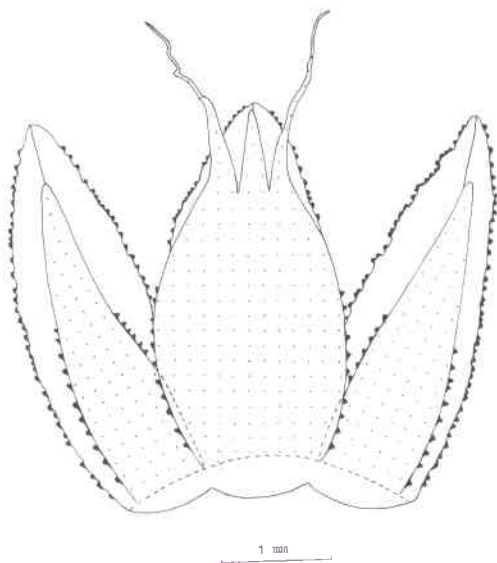
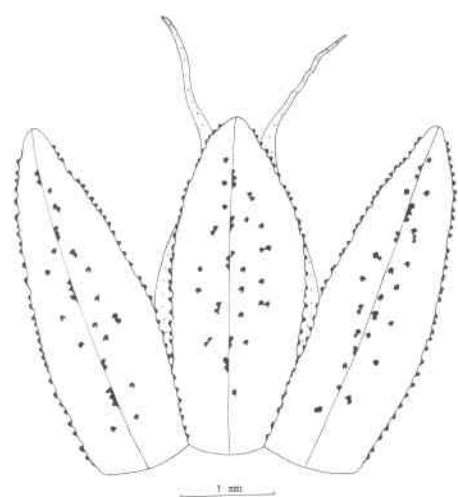


Fig. 2. *Allium wendelboi*

verruculose on back and margin or on the nerve; outer tepals elliptic-ovate, thinner and slightly longer than the inner ones; inner tepals ovate. Filaments slightly shorter than perianth segments, ciliate, connate and adnate to the perianth near base; outer triangular-subulate; inner about twice as broad as the outer filaments and tepals, tricuspidate; the antheriferous cusp about one-fourth the length of the basal lamina and about half as long as the lateral cusps. Anthers c. 0.8 mm long. Style exserted. Capsule as long as the perianth.

The new species shows considerable similarities to *A. notabile* Feinbr. and *A. subnotabile* Wendelbo. From the

former which occurs in NE. Iraq, it is distinguished by having the tepals with a strong green nerve, the included ciliate filaments, the inner filaments larger than tepals. From *A. subnotabile* which occurs in W. Iran, it differs clearly in having the pustulose pedicels, the tepals with a strong green nerve, the outer tepals somewhat longer not distinctly shorter than the inner ones, as well as the inner filaments larger than the inner tepals.

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