

A new record for the Flora of Turkey: *Tripleurospermum subnivale* Pobed. (Asteraceae)

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Abstract: *Tripleurospermum subnivale* Pobed. (Asteraceae) is reported for the first time (A8 Rize) for the Flora of Turkey.

Key Words: *Tripleurospermum*, new record, Asteraceae, Turkey.

Türkiye Florası için yeni bir kayıt: *Tripleurospermum subnivale* Pobed. (Asteraceae)

Özet: *Tripleurospermum subnivale* Pobed. (Asteraceae) türü Türkiye'den (A8 Rize) ilk defa kaydedilmiştir.

Anahtar Sözcükler: *Tripleurospermum*, yeni kayıt, Asteraceae, Türkiye.

Introduction

The genus *Tripleurospermum* Sch. Bip. belongs to the tribe *Anthemideae* of the family *Asteraceae* (*Compositae*) and is composed of about 38 species distributed mainly in Europe and temperate Asia, with a few species also in North America and North Africa (Bremer & Humphries, 1993).

It is very similar to the genus *Matricaria* L. in its morphological characteristics and is also similar to many other *Anthemideae* genera in its habitat. Therefore, it has been confused both taxonomically and nomenclaturally with the genus *Matricaria* and other *Anthemideae* genera (Jeffrey, 1979; Xifreda, 1985; Kerguélen et al., 1987).

The genus is represented by 26 taxa at the level of species and variety in the Flora of Turkey (Yıldırım, 1999). Most of these are distributed in north-east Anatolia. The first author collected some unrecognised *Tripleurospermum* specimens during doctoral studies in north-east Anatolia. Some of them were later identified as *T. subnivale* Pobed. using the account in the Flora of the USSR (Pobedimova, 1995).

Materials and Methods

This study is based on herbarium specimens collected from north-east Anatolia in June 2001. Descriptions were written with the aid of the Flora of Turkey (Grierson, 1975), Flora Iranica (Podlech, 1986) and Flora of the USSR (Pobedimova, 1995). The morphological drawings were made with a drawing attachment. Specimens were deposited at the Herbarium at Karadeniz Technical University, Department of Biology (KTUB).

Results

T. subnivale Pobed. in Bot. Mat. Gerb. Bot. Inst. AN SSSR 20 (1960) 490 (Figure 1)

Syn: *Chamaemelum caucasicum* (Willd.) Boiss. var. *pumilum* Boiss., Fl. Or. 3 (1875) 331. *Ch. melanolepis* An. Fedor. in Bot. Mat. Gerb. Bot. Inst. AN SSSR 11 (1949) 165, non Boiss. *Ch. caucasicum* auct., Fl. Cauc., non Willd.; Grossh., Fl. Kavk. 4: 128.

Rhizomatous perennial, 15-35 cm. Stems 1-2, unbranched. Leaves 1-2 pinnatisect; laciniae oblong or

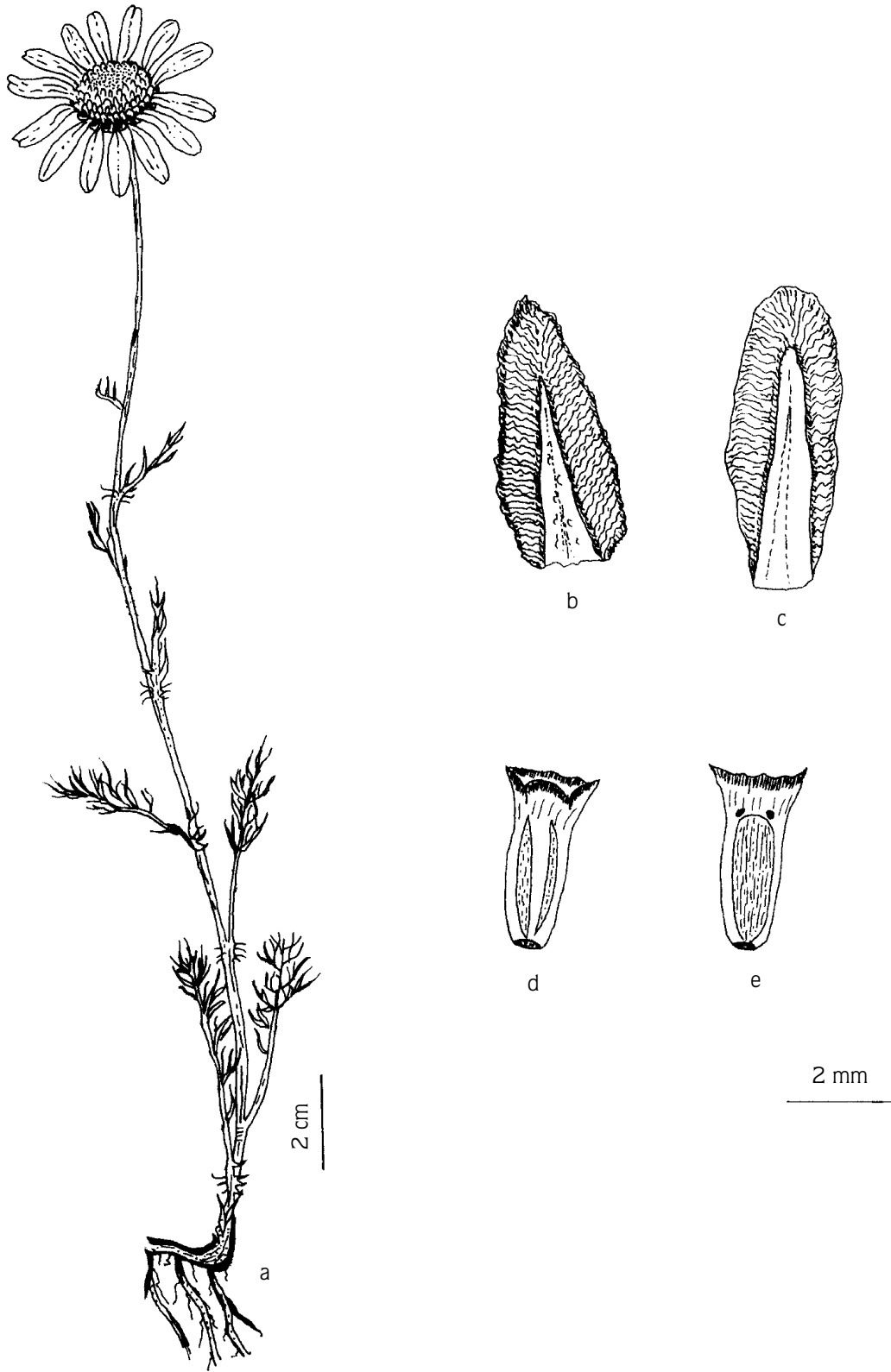


Figure 1. *Tripleurospermum subnivale*. a: habit, b: outer phyllari, c: inner phyllari, d: achene from ventral side, e: achene from dorsal side.

oblanceolate, acute. Capitula solitary, terminal, radiate, 1-2.3 cm broad (exclude ligules), borne on long, naked \pm glabrous peduncle. Outer phyllaries triangular-acute, glabrous or \pm glabrescent, inner oblong, glabrous, all with black-brownish, crisped, membranous margins. Receptacle hemispherical. Ligules 14-22 mm; corolla lobes of disc flowers eglandular. Achenes 2-2.5 x 0.9-1.2 mm, oblong-angular, non-mucilaginous, anteriorly smooth, posteriorly 3-ribbed, fissures broad; ribs white, moderately thickened; corona large, 1/3 as long as achene, 3-lobed, with 3 identical lobes ventrally and entire dorsally, of the same height, reddish-brown or dark-brown at tips. Flowering June-July. Grassy stream banks, stony pastures on limestone.

Type: Described from Azerbaijan (Mts. Shah-Dag).

A8 Rize: İkizdere, above Ayder, 1600 m, 20.06.2001, Inceer 118, KTUB.

General Distribution: Caucasia.

Discussion

In this paper, *T. subnivale* is added as a new record for Turkey. The total number of *Tripleurospermum* taxa in Turkey is 27 at present.

T. subnivale is similar to *T. caucasicum* (Willd.) Hayek but it differs in the following aspects: heads with a large involucre; involucre bracts with a broad black membranous margin, long and wide ligules, hemispheric receptacle, equal lobes of corona in achenes. It also resembles *T. melanolepis* (Boiss. & Buhse) Pobed. but it differs in its heads with a large involucre, long and wide bracts, ligules and achenes.

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