

## Contributions to the Flora of Tunceli (Turkey)

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### Abstract

This study was carried out in Tunceli between 2011-2014 years. Research area is located in the Irano-Turanian phytogeographic region and, according to Davis' Grid system, in B7 square. During the study 400 specimens have been collected. The identification of these samples resulted 55 families, 203 genera and 336 species. The analysis of the phytogeographic regions shows Irano-Turanian elements 85 (25.3 %), Mediterranean elements 23 (6.8 %), Europe-Siberian elements 14 (4.2 %), the ones with wide or unknown distribution 214 (63.7 %). The number of endemic taxa is 18.

**Key words:** Flora, Endemic, Tunceli, Turkey.

### 1. Introduction

Turkey has a rich and interesting flora due to the fact that very variable climatic and geomorphologic conditions occur in Turkey. Plants with Mediterranean, Irano-Turanian and Europe-Siberian distribution patterns can be found. This area serves as a bridge between South Europe and Southwest Asia (Davis, 1965-1985).

East Anatolia has a rich flora, due to its variable climate and different ecological zones (Özgökçe and Özçelik, 2004). This region has a high average altitude and with high mountains and deep valleys shows a very diverse structure. Due to the, low population density there are still near natural conditions in big areas. The area of the province of Tunceli with the Munzur Mountains is of special interest and has been visited by Davis & Hedge (Davis, 1965-1985) [results are e.g. the descriptions of *Eryngium ilex* P.H. Davis, *Stachys munzurdagensis* R. Bhattacharjee or *Stachys sericantha* P.H. Davis] and Sorger & Buchner in 1982 [result e.g. *Origanum munzureense* Kit Tan & Sorger]. Starting with Yıldırım (1995) recently taxonomic studies have increased in Tunceli and vicinity (Yıldırım et al., 2013; Karavelioğulları et al., 2014; Vitek et al., 2014).

This study started in connection with the intensive investigation of the genus *Gundelia* (Compositae) (results e.g. Vitek et al., 2014; 2017; Armagan, 2016). Many localities had to be visited during the search and analysis of populations of *Gundelia* L. This has been used to collect also other species for documenting the flora of Tunceli.

### 2. Material and Methods

Field study have been carried out 2011-2014. The plants were pressed in the field and prepared for identification. Specimens are deposited in the herbaria of the Munzur University and the Naturhistorisches Museum Wien (Herbarium W). Plants were identified using the standard text "Flora of Turkey and the East Aegean Islands" (Davis, 1965-1985; Davis et al., 1988) and in case of doubts the specimens have been compared with well determined material in Herbarium W.

The names of plant families are listed in alphabetic order. Scientific names of plant species are given according to the standards of the plant list ([www.theplantlist.org/](http://www.theplantlist.org/) and [www.ipni.org/](http://www.ipni.org/)) and the Turkey Plant List (Vascular plants) (Güner et al., 2012). The names of the species are followed by their subspecies or variety, if any, locality, habitat, altitude, date of collection, name of the collectors and collectors numbers. The information on the endemic status of the taxons and plant geography are listed after the tag information.

The abbreviations used in the floristic list are as follows; Medit: Mediterranean Element, E.Medit: East Mediterranean Element, Euro-Sib.: Europe-Siberian Element, Ir-Tur.: Irano-Turanian Element, Ç.:Çakılciöđlu, E.:Ergin, M.: Makal, V.:Vitek, Y.:Yüce

## 2.1. Study area

The study area is located on the east of the Anatolian diagonal, in the Upper Euphrates Region of Eastern Anatolia. This region has the coldest temperatures within Turkey (Şengün, 2007; Çakılciöđlu et al., 2008). Tunceli province is located on the north west of Eastern Anatolia (Figure 1). Tunceli belongs to the Irano-Turanian Plant Geography Region and falls within the B7 grid square according to the Grid classification system developed by Davis (Davis, 1965-1985; Davis et al., 1988).



Figure 1. Geographical location of the study area.

## 3. Results

### 3.1. Plant list of the area

#### ACANTHACEAE

##### *Acanthus dioscoridis* L. var. *dioscoridis*

Tunceli, Pulumür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0310, 2013-06-17.

Tunceli, Ovacık, c. 9.3 km W Ovacık, 1.6 km WSW Koyungölu, 1285 m, stony slope, V. Y. E. & M. 13-0029, 2013-06-12.

#### ALISMATACEAE

##### *Alisma lanceolatum* With.

Tunceli, Mazgirt, c. 3,3 km ESE Mazgirt, Yukarıoyumca, 1430 m, boggy area besides lake, V. Y. E. & M. 13-0017, 2013-06-11

#### AMARYLLIDACEAE

##### *Allium cardiostemon* Fisch. & C.A. Mey.

Tunceli, road Tunceli - Ovacık, c. 5.7 km NW of Tunceli, 940 m, dry meadow, V. Y. & C. 14-048-A, 2014-05-30. Ir-Tur.

##### *Allium scorodoprasum* L.

Tunceli, Mazgirt, c. 30 km ESE of Tunceli, c. 1 km E of Akdüven, 1430 m, dry meadow with rocks, V. Y. E. & M. 13-0145, 2013-06-13.

Tunceli, Pulumür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0332, 2013-06-17.

##### *Allium rotundum* L.

Tunceli, road Tunceli - Ovacık, c. 5.7 km NW of Tunceli, 940 m, dry meadow, V. Y. & C. 14-048, 2014-05-30

#### APOCYNACEAE

##### *Apocynum venetum* L.

Tunceli, Mazgirt, road Göktepe - Danaburan, c. 2,5 km NE of Göktepe 930 m, dry slope, V. Y. E. & M. 13-0011, 2013-06-11. Euro-Sib.

#### ARISTOLOCHIACEAE

##### *Aristolochia maurorum* L.

Tunceli, Tunceli center c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. & E. 11-0057, 2011-05-18. Ir-Tur.

#### **BORAGINACEAE**

##### ***Alkanna orientalis* (L.) Boiss. var. *orientalis***

Tunceli, Nazımiye, c. 27 km NE of Tunceli, above village Büyükyurt, 1775 m, dry slope, V. Y. & E. 13-0241, 2013-06-16

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, above village Büyükyurt 1780 m, V. E. 11-0168, 2011-05-21. E.Medit.

##### ***Alkanna froedinii* Rech. f.**

Tunceli, Tunceli center, c. 8.3 km EESE of Tunceli, road to Çukur, east of group of houses, 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0090, 2013-06-13. Endemic, Ir-Tur.

Tunceli, Pülümür, main road Tunceli - Erzincan, c. 3 km NW Pülümür, besides the salt fountain, 1620 m, wet place in meadow, V. Y. & U. 14-063, 2014-05-31. Ir-Tur.

Annotation: This species has been collected earlier in Prov. Tunceli by Huber-Morath (cited in Flora of Turkey 6: 420) and F. Sorger: B7, Tunceli, Sultan Baba Da. 1700-2900 m, F. Sorger 82-130-2, 1982-08-20.

##### ***Alkanna tinctoria* (L.) Tausch**

Tunceli, Ovacık, W Ovacık, Gözeler (Ziyaret), besides parking place at the fountains, 1330 m, semi ruderal, V. E., 11-0035, 2011-05-17

##### ***Anchusa aucheri* A. DC.**

Tunceli, Tunceli center, 9.3 km NW of Tunceli, at big bend of road near small waterfall, 990 m, roadside, V. E. 11-0027, 2011-05-17.

##### ***Anchusa azurea* Mill.**

Tunceli, road Tunceli - Ovacık, c. 4.6 km NW of Tunceli, 945 m, dry slope on roadside, E, V. Y. & U. 14-044, 2014-05-30

##### ***Anchusa leptophylla* subsp. *tomentosa* (Boiss.) D.F. Chamb.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0320, 2013-06-17

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 1.8 km NW Kovuklu, 1590 m, open places in oak forest, V. Y. E. & M. 13-0293, 2013-06-17. Endemic, Ir-Tur.

##### ***Anchusa strigosa* Banks & Sol.**

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. E. 11-0080, 2011-05-18

##### ***Arnebia densiflora* (Nordm.) Ledeb.**

Tunceli, Pülümür, 35 km NNNE Tunceli, road Kocatepe - Sarıgül Köyü, 2.9 km WSW of Kocatepe, 2160 m, mountain meadow, V. Y. E. & M. 13-0304, 2013-06-17. Ir-Tur.

##### ***Brunnera orientalis* LM. Johnst.**

Tunceli, Ovacık, road Ovacık - Hozat, c. 8.4 km SSSW Ovacık, 1825 m, open places in oak forest, V. Y. E. & M. 13-0055, 2013-06-12

##### ***Buglossoides incrassata* subsp. *splitgerberi* (Guss.) E. Zippel & Selvi**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E. 11-0059, 2011-05-18. Medit.

Annotation: This taxon is widely mixed with *Buglossoides arvensis*. Photos of the differentiating characters can be found under:

[http://www.bayernflora.de/web/Buglossoides\\_arvensis\\_und\\_Buglossoides\\_incrassata](http://www.bayernflora.de/web/Buglossoides_arvensis_und_Buglossoides_incrassata).

##### ***Cerintho minor* subsp. *auriculata* (Ten.) Domac**

Tunceli, Tunceli center, c. 8.3 km EESE of Tunceli, road to Çukur, east of group of houses, 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0097, 2013-06-13

##### ***Cynoglossum creticum* Mill.**

Tunceli, Tunceli center, c. 8.1 km ESE of Tunceli, road to Ambar, 970 m, roadside in oak forest, V. E. 11-0110, 2011-05-19

##### ***Cynoglossum officinale* L. subsp. *officinale***

Tunceli, Tunceli center, c. 8.3 km EESE of Tunceli, road to Çukur, east of group of houses 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0094, 2013-06-13

##### ***Lappula squarrosa* (Retz.) Dumort.**

Tunceli, Nazımiye, 34 km NNE Tunceli, main road Tunceli - Erzincan, 5 km SSW Mezra, 1180 m, roadside and dry slope, V. Y. E. & M. 13-0353, 2013-06-17

***Myosotis alpestris* F.W. Schmidt subsp. *alpestris***

Tunceli, Ovacık, c. 11.7 km WWSW Ovacık, 1.9 km ENE Ziyaret (fountains of river Munzur), 1300 m, besides water, V. Y. E. & M. 13-0032, 2013-06-12

***Myosotis heteropoda* Trautv.**

Tunceli, Mazgirt c. 12.8 km SSE of Tunceli, 3.4 km SE Mazgirt, 0.2 SW of Yukarıoyumca, 1365 m, humid meadow, E, V. E. 11-0154, 2011-05-20. Ir-Tur.

***Myosotis refracta* Boiss.**

Tunceli, Pülümür road D882 Tunceli - Pülümür, 11,6 km SSW Pülümür, 1245 m, below rocks, V. E. 11-0103, 2011-05-18

***Myosotis stricta* Roem. & Schult.**

Tunceli, Mazgirt, c. 14.5 km SSE of Tunceli, 5.3 km SSW Mazgirt, 1.2 km ENE Arslanyurdu, 1030 m, dry meadow, E, V. E. 11-0135, 2011-05-20. Euro-Sib.

Tunceli, Pülümür, c. 38 km NNE Tunceli, road to Kocatepe, 0.9 km SE Kovuklu, 1625 m, Astragalus spiny shrub steppe, V. Y. & C. 14-131, 2014-06-02

***Onosma elwendicum* Wettst.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezraa, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0341, 2013-06-17

***Onosma giganteum* Lam.**

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-120, 2014-06-02

Tunceli, Mazgirt, c. 6,2 km ESE Mazgirt, c. 0,6 km NW Avunca, 1315 m, dry meadow, V. Y. E. & M. 13-0016, 2013-06-11. E.Medit.

***Paracaryum cristatum* (Schreb.) Boiss. subsp. *cristatum***

Tunceli, Ovacık, c. 11.7 km WWSW Ovacık, 1.9 km ENE Ziyaret (fountains of river Munzur), 1300 m, stony slope, V. Y. E. & M. 13-0033, 2013-06-12

Tunceli, Nazımiye, c. 33 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, 1845 m, dry meadow in zone of oak forest, V. Y. & E. 13-0254, 2013-06-16. Endemic, Ir-Tur.

***Paracaryum strictum* (K.Koch) Boiss.**

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık, 940 m, former field and surrounding meadows and shrubland, V. E. 11-0092a, 2011-05-18. Ir-Tur.

**CAMPANULACEAE**

***Asyneuma amplexicaule***

Tunceli, Pülümür, 38 km NNE Tunceli, road to Kocatepe, 1.9 km WNW Mezraa, 1540 m, dry place in oak forest, V. Y. E. & M. 13-0271, 2013-06-17

Tunceli, Pülümür, 38 km NNE Tunceli, road to Kocatepe, 1.9 km WNW Mezra, 1540 m, dry place in oak forest, V. Y. E. & M. 13-027, 2013-06-17

Tunceli, Tunceli center, c. 13.6 km ESE of Tunceli, road Çukur - Güleç, 3 km S of Çukur, 1435 m, roadside in oak forest, V. Y. E. & M. 13-0140, 2013-06-13

***Asyneuma limonifolium* (L.) Janchen**

Tunceli, Ovacık, 27.5 km NNW Tunceli, road Aşağıtorunoba - Agdat, 1825 m, semihumid meadow, V. Y. E. & M. 13-0377, 2013-06-18

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 1.8 km NW Kovuklu, 1580 m, dry gravel slope, V. Y. E. & M. 13-0274, 2013-06-17

***Asyneuma lobelioides* (Willd.) Hand.-Mazz.**

Tunceli, Ovacık, c. 20 km NE of Ovacık, c. 1.6 km ENE above locality called Şahverdi, 1820 m, grazed and stony meadows, V. & Y. 14-179, 2014-06-03. Ir-Tur.

***Campanula conferta* A. DC.**

Tunceli, Ovacık, c. 2 km WWSW Ovacık, 1275 m, dry gravel plain, V. Y. E. & M. 13-0026, 2013-06-12

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba - Agdat, 1880 m, stony slope, limestone, V. Y. E. & M. 13-0404, 2013-06-18

Tunceli, Tunceli, c. 21 km E Tunceli, c. 2.2 km E Kilköy, Düzgün Baba Dağı, saddle, 1930 m, dry rocky slope, V. Y. E. & M. 13-0218, 2013-06-15

Tunceli, Mazgirt, c. 15 km E Tunceli, road Çukur - Gürbüzler, 1.3 km SW of Gürbüzler, 1370 m, dry gravel slope, V. Y. E. & M. 13-0192, 2013-06-14

***Campanula glomerata* subsp. *hispida* (Witasek) Hayek**

Tunceli, Tunceli center, c. 13.6 km ESE of Tunceli, road Çukur - Güleç, 3 km S of Çukur, 1435 m, roadside in oak forest, V. Y. E. & M. 13-0142, 2013-06-13

***Campanula involucrata* Aucher ex A. DC.**

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba – Agdat, 1860 m, stony slope, limestone, V. Y. E. & M. 13-0398, 2013-06-18

***Campanula ptarmicifolia* Lam.**

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 1.8 km NW Kovuklu, 1580 m, dry gravel slope, V. Y. E. & M. 13-0279, 2013-06-17. Endemic, Ir-Tur.

***Campanula strigosa* Banks & Sol.**

Tunceli, Mazgirt, c. 12.4 km SSE of Tunceli, 1.6 km SSSW Mazgirt, 1210 m, roadside, V. E. 11-0140, 2011-05-20

**CAPRIFOLIACEAE**

***Centranthus longiflorus* Steven subsp. *longiflorus***

Tunceli, Nazımiye, 34 km NNE Tunceli, main road Tunceli - Erzincan, 5 km SSW Mezra, 1180, roadside and dry slope, V. Y. E. & M. 13-0358, 2013-06-17. Ir-Tur.

***Valeriana alliarifolia* Adams**

Tunceli, Ovacık, c. 14 km WWSW Ovacık, 0.35 km W Ziyaret, near the fountains of river Munzur, 1320 m, near river, V. Y. E. & M. 13-0039, 2013-06-12.

**CARYOPHYLLACEAE**

***Cerastium davuricum* Fisch. ex Spreng.**

Tunceli, Ovacık, road Ovacık - Hozat, c. 8.4 km SSSW Ovacık, 1825 m, open places in oak forest, V. Y. E. & M. 13-0054, 2013-06-12. Euro-Sib.

***Cerastium dichotomum* subsp. *inflatum* (Link) Cullen**

Tunceli, Tunceli center, c. 8.1 km ESE of Tunceli, road to Ambar, 970 m, roadside in oak forest, V. E. 11-0109, 2011-05-19

***Cerastium perfoliatum* L.**

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. E. 11-0082, 2011-05-18

***Cerastium purpurascens* Adams**

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. E. 11-0081, 2011-05-18

***Dianthus orientalis* Adams**

Tunceli, Tunceli, c. 21 km E Tunceli, c. 2.2 km E Kilköy, Düzgün Baba Dağı, saddle, 1930 m, dry rocky slope, V. Y. E. & M. 13-0217, 2013-06-15

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 1.8 km NW Kovuklu, 1590 m, open places in oak forest, V. Y. E. & M. 13-0286, 2013-06-17

***Eremogone gypsophiloides* (L.) Fenzl**

Tunceli, Mazgirt, c. 21 km E Tunceli, c. 3 km SE Çevrecik, Düzgün Baba Dağı, around top, 2060 m, dry rocky mountain slope, V. Y. E. & M. 13-0199, 2013-06-15. Ir-Tur.

***Minuartia juniperina* (L.) Maire & Petitm.**

Tunceli, Ovacık, c. 19 km NE of Ovacık, E above locality called Şahverdi, 1630 m, grazed and stony meadows, V. & Y. 14-169, 2014-06-03

***Minuartia meyeri* (Boiss.) Bornm.**

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba – Agdat, 1825 m, dry sandy slope, V. Y. E. & M. 13-0386, 2013-06-18. Ir-Tur.

***Moenchia mantica* (L.) Bartl.**

Tunceli, Mazgirt, c. 14.5 km SSE of Tunceli, 5.3 km SSW Mazgirt, 1.2 km ENE Arslanyurdu, 1030 m, dry meadow, V. E. 11-0134, 2011-05-20

***Paronychia kurdica* Boiss. subsp. *kurdica* var. *kurdica***

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 3.5 km ENE of Kocatepe, 1520 m, meadow, V. Y. E. & M. 13-0299a, 2013-06-17

***Saponaria prostrata* Wild.**

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba – Agdat, 1825 m, dry sandy slope, V. Y. E. & M. 13-0385, 2013-06-18

Tunceli, Tunceli, valley of road Tunceli - Pülümür, c. 12.2 km ENE Tunceli, on the left side of river c. 0.4 km upstream of bridge of road to Kuyluca, 965 m, dry meadow, V. Y. & C. 14-081, 2014-06-01

***Silene ampullata* Boiss.**

Tunceli, Tunceli center, c. 9 km ESE of Tunceli, 0.9 km SW of Ambar, above castle, 1170 m, stony meadows, V. E. 11-0113, 2011-05-19. Ir-Tur.

*Silene chlorifolia*

Tunceli, road Tunceli - Ovacık, c. 6.4 km NW of Tunceli, 960 m, rocky slope besides road, V. Y. & C. 14-053, 2014-05-30

***Silene compacta* Fisch. ex Homem.**

Tunceli, Tunceli center, c. 8.3 km EESE of Tunceli, road to Çukur, east of group of houses, 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0096, 2013-06-13

Tunceli, Pülümür, main road Tunceli - Erzincan, c. 31 km NNE of Tunceli, c. 21 km SSW Pülümür, 1155 m, roadside and dry slope, V. Y. E. & M. 13-0364, 2013-06-17

Tunceli, between Ovacık and Tunceli, c. 20 km from Ovacık, Y. 11-42, 2011-06-20

***Silene muradica* Schischk.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, 39 21 48 N 39 47 10 V. Y. E. & M. 13-0328, 2013-06-17. Endemic, Ir-Tur.

***Silene spergulifolia* (Desf.) M.Bieb.**

Tunceli, Ovacık, c. 19 km NE of Ovacık, E above locality called Şahverdi, 1630 m, grazed and stony meadows, V. & Y. 14-172, 2014-06-03

Tunceli, Pülümür, c. 38 km NNE Tunceli, road to Kocatepe, 0.9 km SE Kovuklu, 1625 m, Astragalus spiny shrub steppe, E, V. Y. & U. 14-127, 2014-06-02. Ir-Tur.

***Silene vulgaris* var. *commutata* (Guss.) Coode & Cullen**

Tunceli, Nazımiye, 0.6 km NE Dereova, Dereova Şelalesi, 1525 m, besides rivulet, V. Y. E. & M. 13-0228, 2013-06-15

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, road to Büyükyurt 1220 m, roadside, V. E. 11-0176, 2011-05-21

***Velezia rigida* L.**

Tunceli, Tunceli center, c. 12.2 km EESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0124, 2013-06-13

**CHENOPODIACEAE**

***Dysphania botrys* (L.) Mosyakin & Clemants**

Tunceli, Ovacık, Y. 11-63, 2011-06-20

**COMPOSITAE**

***Achillea arabica* Kotschy**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0316, 2013-06-17

Tunceli, Tunceli center, c. 12.2 km EESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0120, 2013-06-13. Ir-Tur.

***Achillea grandifolia* Friv.**

Tunceli, Tunceli center, c. 13.6 km ESE of Tunceli, road Çukur - Güleç, 3 km S of Çukur, 1435 m, roadside in oak forest, V. Y. E. & M. 13-0139, 2013-06-13

***Anthemis cota* Sibth. & Sm.**

Tunceli, Tunceli center c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. Y. E. & M. 13-0076, 2013-06-13

***Anthemis cretica* L. subsp. *pontica***

Tunceli, Ovacık, road Ovacık - Hozat, c. 10 km SSSW Ovacık, 1755 m, roadside, V. Y. E. & M. 13-0061, 2013-06-12

Tunceli, Mazgirt, c. 21 km E Tunceli, c. 3 km SE Çevrecik, Düzgün Baba Dağı, around top, 2060 m, dry rocky mountain slope, V. Y. E. & M. 13-0212, 2013-06-15

***Carduus pycnocephalus* subsp. *albidus* (M.Bieb.) Kazmi**

Tunceli, Mazgirt, c. 14.5 km SSE of Tunceli, 5.3 km SSW Mazgirt, 1.2 km ENE Arslanyurdu, 1030 m, dry meadow, V. E. 11-0132, 2011-05-20

***Centaurea aggregata* Fisch. & C.A. Mey. ex DC.**

Tunceli, Tunceli center, c. 8.3 km EESE of Tunceli, road to Çukur, east of group of houses, 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0098, 2013-06-13

***Centaurea bornmuelleri* Hausskn.**

Tunceli, Ovacık, c. 20 km NE of Ovacık, c. 1.6 km ENE above locality called Şahverdi, 1820 m, grazed and stony meadows, V. & Y. 14-180, 2014-06-03

***Centaurea carduiiformis* DC.**

Tunceli, Pülümür, 38 km NNE Tunceli, road to Kocatepe, 1.9 km WNW Mezra, 1540 m, dry place in oak forest, V. Y. E. & M. 13-0272, 2013-06-17

Tunceli, Mazgirt, c. 29 km SE of Tunceli, road Darıkent - Ortaharman, c. 3.4 km S Darıkent, 1265 m, steppe, V. Y. E. & M. 13-0166, 2013-06-13

***Centaurea polypodiifolia* Boiss.**

Tunceli, Tunceli, 19 km NNNW Tunceli, valley of river Munzur, 1065 m, stony slope, V. Y. E. & M. 13-0408, 2013-06-18

***Centaurea saligna* (K.Koch) Wagenitz**

Tunceli, Pülümür, c. 39 km NNE Tunceli, side valley from road to Kocatepe to village Karagöz, 0.8 km SSW Dağbek, 1565 m, open place in bushland, V. Y. & U. 14-141, 2014-06-02. Endemic, Ir-Tur.

***Centaurea solstitialis* L.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. Y. E. & M. 13-0075, 2013-06-13

***Centaurea urvillei* DC. subsp. *hayekiana* Wagenitz**

Tunceli, Nazımiye, 17.3 km NE Tunceli, main road Tunceli - Erzincan, c. 5.4 km WSW Demirce, besides holy place, 1005 m, roadside, V. Y. E. & M. 13-0265, 2013-06-17. Ir-Tur.

***Cichorium intybus* L.**

Tunceli, Nazımiye, 34 km NNE Tunceli, main road Tunceli - Erzincan, 5 km SSW Mezra, 1180 m, roadside and dry slope, V. Y. E. & M. 13-0354, 2013-06-17

***Cota coelopoda* var. *coelopoda* (Boiss.) Boiss.**

Tunceli, Mazgirt, c. 12.4 km SSE of Tunceli, 1.6 km SSSW Mazgirt, 1210 m, roadside, V. E. 11-0143, 2011-05-20

***Cota melanoloma* (Trautv.) Holub**

Tunceli, Pülümür, 35 km NNNE Tunceli, road Kocatepe - Sarıgül Köyü, 1.3 km SW of Kocatepe, 1910 m, meadow, V. Y. E. & M. 13-0303, 2013-06-17

***Cota wiedemanniana* (Fisch. & C.A. Mey.) Holub**

Tunceli, Mazgirt, c. 14.5 km SSE of Tunceli, 5.3 km SSW Mazgirt, 1.2 km ENE Arslanyurdu, 1030 m, dry meadow, V. E. 11-0133, 2011-05-20

***Crepis alpina* L.**

Tunceli, Ovacık, c. 2 km WWSW Ovacık, 1275 m, dry gravel plain, V. Y. E. & M. 13-0027, 2013-06-12

Tunceli, Tunceli center, c. 12.2 km EESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0118, 2013-06-13

***Crepis foetida* L.**

Tunceli, Mazgirt, c. 14.5 km SSE of Tunceli, 5.3 km SSW Mazgirt, 1.2 km ENE Arslanyurdu, 1030 m, dry meadow, E, V. E. 11-0129, 2011-05-20

Tunceli, Tunceli center c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. Y. E. & M. 13-0073, 2013-06-13

***Crepis pulchra* L.**

Tunceli, Tunceli center, c. 12.2 km EESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0115, 2013-06-13

***Crupina crupinastrum* (Moris) Vis.**

Tunceli, Mazgirt, c. 32.7 km SE of Tunceli, road Ortharman - Elmalık, 1.5 km NNE Elmalık 995 m, dry slope, V. E. 11-0159, 2011-05-20

***Cyanus depressus* (M.Bieb.) Soják**

Tunceli, Mazgirt, c. 31 km ESE of Tunceli, road Akdüven - Geçitveren, 4 km E Geçitveren, small pass, 1205 m, dry slope in oak forest, V. Y. E. & M. 13-0160, 2013-06-13

Tunceli, Mazgirt, c. 12.8 km SSE of Tunceli, 3.4 km SE Mazgirt, 0.2 SW of Yukarıoyumca, 1365 m, humid meadow, E, V. E. 11-0152, 2011-05-20

Tunceli, Mazgirt, c. 32.7 km SE of Tunceli, road Ortharman - Elmalık, 1.5 km NNE Elmalık, 995 m, dry slope, V. E. 11-0161, 2011-05-20

***Echinops orientalis* Trautv.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0317, 2013-06-17

***Filago arvensis* L.**

Tunceli, Munzur Gözeleri (fountain of river Munzur) W of Ovacık, Y. 11-58, 2011-06-20

***Helichrysum armenium* DC.**

Tunceli, Ovacık, road Ovacık - Hozat, c. 3.2 km SSSW Ovacık, 1245 m, dry slope, V. Y. E. & M. 13-0041, 2013-06-12

***Iranecio eriospermus* (DC.) C. Jeffrey**

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba - Agdat, 1860 m, stony slope, limestone, V. Y. E. & M. 13-0396, 2013-06-18

***Klasea serratuloides* (DC.) Greuter & Wagenitz**

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 1.8 km NW Kovuklu, 1580 m, dry gravel slope, V. Y. E. & M. 13-0282, 2013-06-17

Tunceli, Nazmiye, road from Dereova to Dereova Şelalesi, 1535 m, dry gravel area, V. Y. E. & M. 13-0229, 2013-06-15. Ir-Tur.

***Leontodon asperrimus* (Willd.) Endl.**

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 1.8 km NW Kovuklu, 1590 m, open places in oak forest, V. Y. E. & M. 13-0292, 2013-06-17

Tunceli, Tunceli center, c. 6.8 km E of Tunceli, road to Kocakoç, c. 0.8 km ESE of locality called Atlanti, 960 m, dry slope besides road, V. Y. E. & M. 13-0081, 2013-06-13

Tunceli, Pülümür, c. 38 km NNE Tunceli, road to Kocatepe, 0.7 km ESE Kovuklu, 1605 m, gravel slope, V. Y. & C. 14-134, 2014-06-02

***Petasites hybridus* (L.) G.Gaertn., B.Mey. & Scherb.**

Tunceli, Ovacık, road Ovacık - Hozat, c. 3.2 km SSSW Ovacık, 1245 m, dry slope, V. Y. E. & M. 13-0045, 2013-06-12

***Pilosella setigera* Fr.**

Tunceli, Tunceli center, c. 12.2 km EESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0102, 2013-06-13

***Scorzonera tomentosa* L.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezraa, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0337, 2013-06-17. Endemic, Ir-Tur.

***Tanacetum argenteum* (Lam.) Willd.**

Tunceli, c. 7 km WNW Ovacık, Karagöl valley W Köşeler village, Y. 11-20, 2011-06-19

***Tanacetum eginense* (Bornm.) Grierson**

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba - Agdat, 1785 m, stony slope, limestone, V. Y. E. & M. 13-0407, 2013-06-18

***Tragopogon buphthalmioides* (DC.) Boiss. var. *latifolius* Boiss.**

Tunceli, Mazgirt, c. 31 km ESE of Tunceli, road Akdüven - Geçitveren, 4 km E Geçitveren, small pass, 1205 m, dry slope in oak forest, V. Y. E. & M. 13-0163, 2013-06-13

***Xeranthemum annuum* L.**

Tunceli, Tunceli center, c. 12.2 km EESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0114, 2013-06-13

**CONVOLVULACEAE**

***Convolvulus betonicifolius* Mill. subsp. *betonicifolius***

Tunceli, Mazgirt, c. 31 km ESE of Tunceli, c. 1.6 km ESE of Akdüven, 995 m, former field, V. Y. E. & M. 13-0151, 2013-06-13

***Convolvulus scammonia* L.**

Tunceli, Tunceli center, c. 8.3 km EESE of Tunceli, road to Çukur, east of group of houses, 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0086, 2013-06-13. E.Medit.

**CRASSULACEAE**



***Prometheum sempervivoides* (Fischer ex M. Bieb.) H. Ohba**

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 1.8 km NW Kovuklu, 1590 m, open places in oak forest, V. Y. E. & M. 13-0295a, 2013-06-17

***Rosularia libanotica* (Strand ex L.) Samuelsson**

Tunceli, Ovacık, road Ovacık - Hozat, c. 6.4 km SSSW Ovacık, 1645 m, dry stony slope, V. Y. E. & M. 13-0049, 2013-06-12. E.Medit.

***Sedum album* L.**

Tunceli, c. 5 km WNW from Ovacık, Karagöl valley W Köselers village, Y. 11-16, 2011-06-19

***Sedum pallidum* M. Bieb.**

Tunceli, Mazgirt, c. 30 km ESE of Tunceli, c. 1 km E of Akdüven, 1430 m, dry meadow with rocks, V. Y. E. & M. 13-0146, 2013-06-13.

**CRUCIFERAE**

***Aethionema arabicum* (L.) Andr. ex DC.**

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. E. 11-0078, 2011-05-18

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & C. 14-112, 2014-06-02

***Aethionema grandiflorum* Boiss. & Hohen. var. *grandiflorum***

Tunceli, Mazgirt, c. 21.7 km SE of Tunceli, road Mazgirt - Darikent, 1.3 km WNW Akkarak, 1405 m, roadside, V. E. 11-0158, 2011-05-20

***Aethionema iberideum* (Boiss.) Boiss.**

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, above village Büyükyurt 1925 m, rocky slope, V. E. 11-0172, 2011-05-21

***Aethionema membranaceum* D.C.**

Tunceli, Tunceli center, c. 8.1 km ESE of Tunceli, road to Ambar, 970 m, roadside in oak forest, V. E. 11-0107, 2011-05-19

***Aethionema speciosum* Boiss. & A. Huet subsp. *speciosum***

Tunceli, Nazımiye, road Nazımiye - Dereova, 3.9 km SE Dereova, 1415 m, dry gravel, V. Y. E. & M. 13-0221, 2013-06-15. Ir-Tur.

***Arabis alpina* L.**

Tunceli, Ovacık, c. 18 km NE of Ovacık, NE of small river dam, locality called Şahverdi, 1505 m, V. E. 11-0041, 2011-05-17

***Camelina rumelica* Velen.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezraa, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0322, 2013-06-17

***Cardamine tenera* S. G. Gmel. ex C.A. Mey.**

Tunceli, Ovacık, c. 11.7 km WWSW Ovacık, 1.9 km ENE Ziyaret (fountains of river Munzur), 1300 m, in water, V. Y. E. & M. 13-0037, 2013-06-12

***Cardamine penzesii* Ancev & Marhold**

Tunceli, Ovacık, W Ovacık, Gözeler (Ziyaret), at the fountains, 1315 m, in the water, V. & E. 11-0033, 2011-05-17

***Coluteocarpus vesicaria* subsp. *boissieri* (Hauskn. ex O. E. Schulz) Hedge**

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba - Agdat, 1825 m, dry sandy slope, V. Y. E. & M. 13-0390, 2013-06-18. Ir-Tur.

***Conringia clavata* Boiss.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E. 11-0075, 2011-05-18

***Draba nuda* (Belanger) Al-Shehbaz & M. Koch**

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, above village Büyükyurt 1815 m, V. E., 11-0169, 2011-05-21

***Erysimum artwinense* N. Busch**

Tunceli, Ovacık, road Ovacık - Hozat, c. 8.4 km SSSW Ovacık, 1825 m, open places in oak forest, V. Y. E. & M. 13-0050, 2013-06-12

***Erysimum collinum* (M. Bieb.) Andr. ex DC.**

Tunceli, Mazgirt, c. 21 km E Tunceli, c. 3 km SE Çevrecik, Düzgün Baba Dağı, around top, 2060 m, dry rocky mountain slope, V. Y. E. & M. 13-0212b, 2013-06-15

Tunceli, Mazgirt, c. 31 km ESE of Tunceli, road Akdüven - Geçitveren, 4 km E Geçitveren, small pass, 1205 m, dry slope in oak forest, V. Y. E. & M. 13-0158, 2013-06-13

Tunceli, Ovacık, road Ovacık - Hozat, c. 10 km SSSW Ovacık, 1755 m, meadow, V. Y. E. & M. 13-0060, 2013-06-12

Tunceli, Nazımiye, c. 33 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, 1845 m, dry meadow in zone of oak forest, V. Y. E. & M. 13-0255, 2013-06-16

***Erysimum pycnophyllum* J. Gay**

Tunceli, Ovacık, c. 17.8 km NE of Ovacık, S above small river dam, near locality called Şahverdi, 1510 m, V. E. 11-0036, 2011-05-17. Ir-Tur.

***Erysimum repandum* L.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E., 11-0060, 2011-05-18

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E. 11-0061, 2011-05-18

***Erysimum smyrnaeum* Boiss. & Balansa**

Tunceli, Tunceli center, c. 13 km SSW of Tunceli, 4.7 km SSW Aktuluk, side road of road Tunceli - Elazığ, 1030 m, meadow with shrubland, V. E. 11-0124, 2011-05-19

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, road to Büyükyurt 1200 m, roadside, V. E. 11-0164, 2011-05-21

Tunceli, Tunceli center, slope besides road Tunceli - Ovacık, 6.9 km NW of Tunceli, 915 m, V. E. 11-0025, 2011-05-17

Tunceli, Mazgirt, c. 14.5 km SSE of Tunceli, 5.3 km SSW Mazgirt, 1.2 km ENE Arslanyurdu, 1030 m, dry meadow, V. E. 11-0128, 2011-05-20

Tunceli, Tunceli center, c. 14.1 km NE of Tunceli, road D882 to Gökçek, 2.2 km SSW Gökçek, locality called Kutudere, 1000 m, dry meadows and oak forest, V. E. 11-0094, 2011-05-18

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. E. 11-0088, 2011-05-18

Tunceli, Ovacık, road Ovacık - Koyungözü, 3.2 km WSW Ovacık, 1285 m, gravel stepe, V. E. 11-0030, 2011-05-17

Tunceli, Tunceli, valley of road Tunceli - Pülümür, c. 12.2 km ENE Tunceli, on the left side of river c. 0.4 km upstream of bridge of road to Kuyluca, 965 m, dry meadow, V. Y. & U. 14-078, 2014-06-01

***Erysimum uncinatifolium* Boiss.**

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba - Agdat, 1825 m, dry sandy slope, V. Y. E. & M. 13-0388, 2013-06-18

***Fibigia clypeata* (L.) Medik.**

Tunceli, Tunceli center, c. 13 km SSW of Tunceli, 4.7 km SSW Aktuluk, side road of road Tunceli - Elazığ, 1030 m, meadow with shrubland, V. E. 11-0119, 2011-05-19

***Fibigia macrocarpa* (Boiss.) Boiss.**

Tunceli, Tunceli center, c. 8.3 km EESE of Tunceli, road to Çukur, east of group of houses, 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0091, 2013-06-13

***Hesperis cappadocica* Boiss.**

Tunceli, Ovacık, c. 9.2 km NE of Ovacık, road to locality called Şahverdi, 1400 m, scree slope, V. E. 11-0050, 2011-05-17

***Hesperis pendula* subsp. *campicarpa* (Boiss.) Dvorak**

Tunceli, Pülümür, road D882 Tunceli - Pülümür, 11,6 km SSW Pülümür, 1245 m, below rocks, V. E. 11-0102, 2011-05-18

***Iberis taurica* DC.**

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 1.8 km NW Kovuklu, 1590 m, open places in oak forest, V. Y. E. & M. 13-0291, 2013-06-17

***Isatis tinctoria* subsp. *tomentella* (Boiss.) P.H.Davis**

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, road to Büyükyurt 1200 m, roadside, V. E. 11-0165, 2011-05-21

***Lepidium draba* L.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0315, 2013-06-17

***Malcolmia africana* (L.) R. Br.**

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, road to Büyükyurt 1200 m, roadside, V. E. 11-0162, 2011-05-21

***Neslia paniculata* subsp. *thracica* (Velen.) Bomm.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E. 11-0076, 2011-05-18

***Pseudosempervivum aucheri* (Boiss.) Pobed.**

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 1.8 km NW Kovuklu, 1580 m, dry gravel slope, V. Y. E. & M. 13-0285, 2013-06-17. Endemic, Ir-Tur.

***Sisymbrium altissimum* L.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E. 11-0058, 2011-05-18

***Tchihatchewia isatidea* Boiss.**

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, road to Büyükyurt 1200 m, roadside, V. E. 11-0166, 2011-05-21

Tunceli, Nazımiye, 34 km NNE Tunceli, main road Tunceli - Erzincan, 5 km SSW Mezra, 1180 m, roadside and dry slope, V. Y. E. & M. 13-0357, 2013-06-17

Tunceli, Nazımiye, road from Dereova to Dereova Şelalesi, 1535 m, dry gravel area, V. Y. E. & M. 13-0230, 2013-06-15

Tunceli, Pülümür, c. 38 km NNE Tunceli, road to Kocatepe, 0.9 km SE Kovuklu, 1625 m, Astragalus spiny shrub steppe, V. Y. & U. 14-132, 2014-06-02

**CUPRESSACEAE**

***Juniperus communis* L.**

Tunceli, Tunceli center, c. 12.2 km EESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0119, 2013-06-13

***Juniperus excelsa* M. Bieb.**

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba - Agdat, 1880 m, stony slope, limestone, V. Y. E. & M. 13-0401, 2013-06-18

**CUSCUTACEAE**

***Cuscuta epithymum* (L.) L.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. Y. E. & M. 13-0070, 2013-06-13

Tunceli, Mazgirt, c. 15 km E Tunceli, road Çukur - Gürbüzler, 1.3 km SW of Gürbüzler, 1370 m, dry gravel slope, V. Y. E. & M. 13-0195, 2013-06-14

**CYPERACEAE**

***Carex divisa* Huds.**

Tunceli, Tunceli center, c. 13.5 km EESE of Tunceli, road Çukur - Güleç, 2.1 km S of Çukur, 1415 m, roadside, partly humid, in oak forest, V. Y. E. & M. 13-0135a, 2013-06-13

***Carex pachystylis* J.Gay**

Tunceli, Mazgirt, c. 14.5 km SSE of Tunceli, 5.3 km SSW Mazgirt, 1.2 km ENE Arslanyurdu, 1030 m, dry meadow, V. E. 11-0131, 2011-05-20. Ir-Tur.

***Scirpoides holoschoenus* (L.) Sojak s. lat.**

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 1.8 km NW Kovuklu, 1550 m, besides rivulet, V. Y. E. & M. 13-0296, 2013-06-17

**DIPSACACEAE**

***Cephalaria syriaca* (L.) Schrad.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. Y. E. & M. 13-0067, 2013-06-13

***Scabiosa calocephala* Boiss.**

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-108, 2014-06-02. Ir-Tur.

***Scabiosa micrantha* Desf.**

Tunceli, Ovacık, c. 20 km NE of Ovacık, c. 1.6 km ENE above locality called Şahverdi, 1820 m, grazed and stony meadows, V. & Y. 14-184, 2014-06-03

***Scabiosa rotata* M.Bieb.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0314, 2013-06-17

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. Y. E. & M. 13-0066, 2013-06-13. Ir-Tur.

**EQUISETACEAE**

***Equisetum arvense* L.**

Tunceli, Ovacık, road Ovacık - Hozat, c. 3.2 km SSSW Ovacık, 1245 m, dry slope, V. Y. E. & M. 13-0045a, 2013-06-12

***Equisetum palustre* L.**

Tunceli, Ovacık, c. 14 km NE of Ovacık, below road to locality called Şahverdi, 1405 m, small pond, V. E. 11-0047, 2011-05-17

**EUPHORBIACEAE**

***Andrachne telephioides* L.**

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, road to Büyükyurt 1220 m, roadside, V. E. 11-0179, 2011-05-21

***Euphorbia cheiradenia* Boiss. & Hohen.**

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba – Agdat, 1860 m, stony slope, limestone, V. Y. E. & M. 13-0399, 2013-06-18

Tunceli, Ovacık, road Ovacık - Koyungölü, 3.2 km WSW Ovacık, 1285 m, gravel stepe, V. E. 11-0032, 2011-05-17. Ir-Tur.

Tunceli, Nazımiye, c. 32 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, small side valley above ruins of village, 39°16'39"N 39°50'31"E - 39°16'47"N 39°50'21"E, 1820-1860 m, rocky dry slope and more humid places besides rivulet, V. Y. & C. 14-093, 2014-06-01

***Euphorbia denticulata* Lam.**

Tunceli, Ovacık, c. 17.8 km NE of Ovacık, S above small river dam, near locality called Şahverdi, 1510 m, V. E. 11-0039, 2011-05-17. Ir-Tur.

***Euphorbia falcata* L.**

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & C. 14-104, 2014-06-02

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. Y. E. & M. 13-0074, 2013-06-13

***Euphorbia macrocarpa* Boiss. & Buhse**

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba – Agdat, 1860 m, stony slope, limestone, V. Y. E. & M. 13-0399c, 2013-06-18

***Euphorbia petrophila* C.A.Mey.**

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba - Agdat, 1880 m, stony sloe, limestone, V. Y. E. & M. 13-0405, 2013-06-18. Euro-Sib.

**GENTIANACEAE**

***Gentiana cruciata* L.**

Tunceli, Ovacık, c. 11.7 km WWSW Ovacık, 1.9 km ENE Ziyaret (fountains of river Munzur), 1300 m, near river, V. Y. E. & M. 13-0036, 2013-06-12. Euro-Sib.

***Gentiana olivieri* Griseb.**

Tunceli, Ovacık, c. 19 km NE of Ovacık, E above locality called Şahverdi, 1630 m, grazed and stony meadows, V. Y. 14-171, 2014-06-03

Tunceli, Mazgirt, c. 30 km ESE of Tunceli, c. 1 km E of Akdüven, 1430 m, dry meadow with rocks, V. Y. E. & M. 13-0144, 2013-06-13. Ir-Tur.

**GERANIACEAE**

***Erodium ciconium* (L.) L'Her.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E. 11-0069, 2011-05-18

***Geranium tuberosum* L.**

Tunceli, Tunceli center, c. 14.1 km NE of Tunceli, road D882 to Gökçek, 2.2 km SSW Gökçek, locality called Kutudere, 1000 m, dry meadows and oak forest, V. E. 11-0098, 2011-05-18

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçik 940 m, former field and surrounding meadows and shrubland, 39 7 8 N 39 37 27 V. E. 11-0086, 2011-05-18. Ir-Tur.

#### **GLOBULARIACEAE**

##### ***Globularia trichosantha* Fisch. & C.A.Mey. subsp. *trichosantha***

Tunceli, Nazımiye, c. 32 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, small side valley above ruins of village, 1820 m, rocky dry slope and more humid places besides rivulet, V. Y. & U. 14-091, 2014-06-01

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, above village Büyükyurt 1925 m, rocky slope, V. E. 11-0171, 2011-05-21. Ir-Tur.

#### **GRAMINEAE**

##### ***Aegilops triuncialis* L.**

Tunceli, Tunceli center c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. Y. E. & M. 13-0069, 2013-06-13

##### ***Aegilops umbellata* Zhuk.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. Y. E. & M. 13-0071, 2013-06-13. Ir-Tur.

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & C. 14-114, 2014-06-02

##### ***Apera intermedia* Hack.**

Tunceli, Tunceli center c. 13.5 km EESE of Tunceli, road Çukur - Güleç, 2.1 km S of Çukur, 1415 m, roadside, partly humid, in oak forest, V. Y. E. & M. 13-0133, 2013-06-13. Ir-Tur.

##### ***Arrhenatherum palaestinum* Boiss.**

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba – Agdat, 1825 m, dry sandy slope, V. Y. E. & M. 13-0391, 2013-06-18. E.Medit.

##### ***Bromus danthoniae* Trin.**

Tunceli, Tunceli center c. 13.5 km EESE of Tunceli, road Çukur - Güleç, 2.1 km S of Çukur, 1415 m, roadside, partly humid, in oak forest, V. Y. E. & M. 13-0133, 2013-06-13

##### ***Calamagrostis epigejos* (L.) Roth**

Tunceli, Nazımiye, road from Dereova to Dereova Şelalesi, 1535 m, dry gravel area, V. Y. E. & M. 13-0235, 2013-06-15. Euro-Sib.

##### ***Calamagrostis pseudophragmites* (Haller f.) Koeler**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezraa, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0345, 2013-06-17

##### ***Dactylis glomerata* L. subsp. *hispanica* (Roth) Nyman**

Tunceli, Ovacık, 27.5 km NNW Tunceli, road Aşağıtorunoba – Agdat, 1825 m, semihumid meadow, V. Y. E. & M. 13-0380, 2013-06-18

##### ***Elymus hispidus* (Opiz) Melderis**

Tunceli, Pülümür, main road Tunceli - Erzincan, c. 31 km NNE of Tunceli, c. 21 km SSW Pülümür, 1155 m, roadside and dry slope, V. Y. E. & M. 13-0368, 2013-06-17

##### ***Eremopyrum bonaepartis* (Spreng.) Nevski**

Tunceli, Mazgirt, c. 12.8 km SSE of Tunceli, 1.7 km SSSE Mazgirt, road to Yukarıoyumca, 1330 m, dry slope, V. Y. E. 11-0150, 2011-05-20

##### ***Heterantherium piliferum* (Banks & Sol.) Hochst.**

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-113, 2014-06-02

Tunceli, Hozat, road Hozat - Tunceli, c. 3.7 km E Hozat, 1655 m, meadow, V. Y. E. & M. 13-0064, 2013-06-12. Ir-Tur.

##### ***Koeleria pyramidata* (Lam.) P. Beauv.**

Tunceli, Mazgirt, c. 29 km SE of Tunceli, road Darıkent - Ortaharman, c. 3.4 km S Darıkent, 1265 m, steppe, V. Y. E. & M. 13-0169, 2013-06-13. Euro-Sib.

##### ***Melica persica* Kunth**

Tunceli, Nazmiye, 34 km NNE Tunceli, main road Tunceli - Erzincan, 5 km SSW Mezraa, 1180 m, roadside and dry slope, V. Y. E. & M. 13-0355, 2013-06-17

***Oryzopsis holciformis* (M.Bieb.) Hack. var. *holciformis***

Tunceli, Mazgirt, c. 31 km ESE of Tunceli, road Akdüven - Geçitveren, 4 km E Geçitveren, small pass, 1205 m, dry slope in oak forest, V. Y. E. & M. 13-0164, 2013-06-13

***Phleum montanum* K. Koch subsp. *montanum***

Tunceli, Tunceli center c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. Y. E. & M. 13-0072, 2013-06-13

***Stipa holosericea* Trin.**

Tunceli, Mazgirt, c. 29 km SE of Tunceli, road Darıkent - Ortaharman, c. 3.4 km S Darıkent, 1265 m, steppe, V. Y. E. & M. 13-0167, 2013-06-13

Tunceli, Mazgirt, c. 15 km E Tunceli, road Çukur - Gürbüzler, 1.3 km SW of Gürbüzler, 1370 m, dry gravel slope, V. Y. E. & M. 13-0194, 2013-06-14. Ir-Tur.

***Taeniatherum caput-medusae* (L.) Nevski subsp. *crinitum* (Schreb.) Melderis**

Tunceli, Tunceli, valley of road Tunceli - Pülümür, c. 12.2 km ENE Tunceli, on the left side of river c. 0.4 km upstream of bridge of road to Kuyluca, 965 m, dry meadow, V. Y. & C. 14-082, 2014-06-01

**GUTTIFERAE**

***Hypericum elongatum* Ledeb. ex Rchb.**

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, southern part of Kovuklu, 1550 m, open place in bushland, V. Y. & C. 14-143, 2014-06-02

***Hypericum lysimachioides* Boiss. & Noe var. *lysimachioides***

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & C. 14-106, 2014-06-02

Tunceli, between Ovacık and Tunceli, Y. 11-32b, 2011-06-20

Tunceli, Tunceli center, c. 13.6 km ESE of Tunceli, road Çukur - Güleç, 3 km S of Çukur, 1435 m, roadside in oak forest, V. Y. E. & M. 13-0136, 2013-06-13

***Hypericum scabrum* L.**

Tunceli, Ovacık, c. 20 km NE of Ovacık, c. 1.6 km ENE above locality called Şahverdi, 1820 m, grazed and stony meadows, V. & Y. 14-182, 2014-06-03. Ir-Tur.

***Hypericum pseudolaevae* N. Robson**

Tunceli, Tunceli center, c. 12.2 km ESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0121, 2013-06-13. Ir-Tur.

***Hypericum spectabile* Jaub. & Spach**

Tunceli, Mazgirt, road Göktepe - Danaburan, c. 2,5 km NE of Göktepe, 930 m, dry slope, V. Y. E. & M. 13-0012, 2013-06-11. Ir-Tur.

**HYACINTHACEAE**

***Leopoldia comosa* (L.) Parl.**

Tunceli, Mazgirt, c. 30 km ESE of Tunceli, c. 1 km E of Akdüven, 1430 m, dry meadow with rocks, V. Y. E. & M. 13-0147, 2013-06-13

Tunceli, Pülümür, c. 38 km NNE Tunceli, road to Kocatepe, 0.9 km SE Kovuklu, 1625 m, Astragalus spiny shrub steppe, V. Y. & U. 14-133b, 2014-06-02

Tunceli, Nazımiye, c. 27 km NE of Tunceli, above village Büyükyurt, 1775 m, dry slope, V. Y. & E. 13-0238, 2013-06-16. Medit.

***Ornithogalum montanum* Cirillo**

Tunceli, Ovacık, 27.5 km NNW Tunceli, road Aşağıtorunoba - Agdat, 1825 m, semihumid meadow, V. Y. E. & M. 13-0374, 2013-06-18

Tunceli, Ovacık, 27.5 km NNW Tunceli, road Aşağıtorunoba - Agdat, 1825 m, semihumid meadow, V. Y. E. & M. 13-0375a, 2013-06-18. E.Medit.

***Ornithogalum pyrenaicum* L.**

Tunceli, Ovacık, c. 18.3 km NE of Ovacık, c. 0.5 km NNE of small river dam, near locality called Şahverdi, 1500 m, stony meadow, V. Y. 14-155, 2014-06-03

Tunceli, Ovacık, road Tunceli - Ovacık, c. 6.2 km ESE Ovacık, 0.2 km W of bridge at mouth of side river, 1215 m, meadow, V. Y. 14-146, 2014-06-03

***Ornithogalum sphaerocarpum* A. Kern.**

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, southern part of Kovuklu, 1550 m, meadow, V. Y. E. & M. 13-0297, 2013-06-17

Tunceli, Ovacık, 27.5 km NNW Tunceli, road Aşağıtorunoba - Agdat, 1825 m, semihumid meadow, V. Y. E. & M. 13-0379, 2013-06-18

Tunceli, Ovacık, road Tunceli - Ovacık, c. 6.6 km EESE Ovacık, 0.35 km SE of bridge at mouth of side river, 1230 m, humid meadow, V. Y. E. & M. 13-0023, 2013-06-12

#### **IRIDACEAE**

##### ***Gladiolus atroviolaceus* Boiss.**

Tunceli, Tunceli center, c. 14.1 km NE of Tunceli, road D882 to Gökçek, 2.2 km SSW Gökçek, locality called Kutudere, 1000 m, dry meadows and oak forest, V. E. 11-0096, 2011-05-18. Ir-Tur.

##### ***Gladiolus illyricus* W.D.J.Koeh**

Tunceli, Tunceli, 10 km NW Tunceli, valley of river Munzur, 1.4 km WSW Dilek, 1005 m, stony slope, V. Y. E. & M. 13-0409, 2013-06-18. Medit.

##### ***Gladiolus italicus* Mill.**

Tunceli, Tunceli center, c. 13.6 km ESE of Tunceli, road Çukur - Güleç, 3 km S of Çukur, 1435 m, roadside in oak forest, V. Y. E. & M. 13-0141, 2013-06-13

##### ***Gladiolus kotschyanus* Boiss.**

Tunceli, Nazımiye, c. 32 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, small side valley above ruins of village, 1820 m, meadow besides rivulet, V. Y. & U. 14-090, 2014-06-01. Ir-Tur.

#### **JUNCACEAE**

##### ***Juncus inflexus* L. subsp. *inflexus***

Tunceli, Tunceli center, c. 13.5 km EESE of Tunceli, road Çukur - Güleç, 2.1 km S of Çukur, 1415 m, roadside, partly humid, in oak forest, V. Y. E. & M. 13-0130, 2013-06-13

Tunceli, Tunceli center c. 13.5 km EESE of Tunceli, road Çukur - Güleç, 2.1 km S of Çukur, 1415 m, roadside, partly humid, in oak forest, V. Y. E. & M. 13-0129, 2013-06-13

##### ***Juncus rechingeri* Snogerup**

Tunceli, Tunceli center, c. 6.8 km E of Tunceli, road to Kocakoç, c. 0.8 km ESE of locality called Atlantı, 960 m, dry slope besides road, V. Y. E. & M. 13-0083, 2013-06-13. Ir-Tur.

#### **LABIATAE**

##### ***Ajuga chamaepitys* subsp. *laevigata* (Banks & Sol.) P.H. Davis**

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 3.5 km ENE of Kocatepe, 1520 m, meadow, V. Y. E. & M. 13-0299, 2013-06-17

##### ***Ajuga orientalis* L.**

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 1.8 km NW Kovuklu, 1580 m, dry gravel slope, V. Y. E. & M. 13-0284, 2013-06-17

##### ***Clinopodium graveolens* subsp. *rotundifolium* (Pers.) Govaerts**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0324, 2013-06-17

##### ***Lallemantia iberica* (M. Bieb.) Fisch. & C.A.Mey.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E. 11-0062, 2011-05-18

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. E. 11-0083, 2011-05-18. Ir-Tur.

##### ***Lallemantia peltata* (L.) Fisch. & C.A.Mey**

Tunceli, Ovacık, c. 19 km NE of Ovacık, E above locality called Şahverdi, 1630 m, grazed and stony meadows, V. & Y. 14-175, 2014-06-03. Ir-Tur.

##### ***Nepeta italica* L.**

Tunceli, Tunceli center, c. 8.3 km EESE of Tunceli, road to Çukur, east of group of houses, 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0089, 2013-06-13

Tunceli, Nazımiye, 34 km NNE Tunceli, main road Tunceli - Erzincan, 5 km SSW Mezra, 1180 m, roadside and dry slope, V. Y. E. & M. 13-0348, 2013-06-17. Medit.

Tunceli, Ovacık, Karagöl valley W Köşeler village, Y. 11-09, 2011-06-19

Tunceli, c. 5 km WNW from Ovacık, Karagöl valley W Köşeler village, Y. 11-10, 2011-06-19

Tunceli, Ovacık, Y. 11-61, 2011-06-20

Tunceli, c. 7 km WNW Ovacik, Karagöl valley W Köselier village, Y. 11-25, 2011-06-19

***Lamium album* subsp. *crinitum* (Montbret & Aucher ex Benth.) Mennema**  
Tunceli, Nazımiye, c. 33 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, 1845 m, dry meadow in zone of oak forest, V. Y. E. & M. 13-0257, 2013-06-16. Black Sea Element.

***Lamium garganicum* L.**  
Tunceli, Mazgirt, c. 21 km E Tunceli, c. 3 km SE Çevrecik, Düzgün Baba Dağı, around top, 2060 m, dry rocky mountain slope, V. Y. E. & M. 13-0200, 2013-06-15

***Lamium macrodon* Boiss. & Huet**  
Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0325, 2013-06-17. Ir-Tur.

***Marrubium parviflorum* Fisch. & Mey. subsp. *parviflorum***  
Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlanti, 935, grazed meadow and semi ruderal, V. Y. E. & M. 13-0068, 2013-06-13. Endemic, Ir-Tur.

***Origanum acutidens* (Hand.-Mazz.) Ietsw.**  
Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0346, 2013-06-17. Endemic, Ir-Tur.

***Prunella vulgaris* L.**  
Tunceli, Tunceli center, c. 8.3 km EESE of Tunceli, road to Çukur, east of group of houses, 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0099, 2013-06-13. Ir-Tur.

***Salvia microstegia* Boiss. & Balansa**  
Tunceli, Nazımiye, c. 27 km NE of Tunceli, above village Büyükyurt, 1730 m, dry slope, V. Y. E. & M. 13-0244a, 2013-06-16. Ir-Tur.

***Salvia multicaulis* Vahl**  
Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçik 940 m, former field and surrounding meadows and shrubland, V. & E. 11-0090, 2011-05-18  
Tunceli, Mazgirt, c. 12.8 km SSE of Tunceli, 1.7 km SSE Mazgirt, road to Yukarıoyumca, 1330 m, dry slope, V. & E. 11-0145, 2011-05-20. Ir-Tur.

***Salvia palaestina* Benth.**  
Tunceli, between Ovacik and Tunceli, Anafatma Ziyareti village, Y. 11-69, 2011-06-20  
Tunceli, between Ovacik and Tunceli, Anafatma Ziyareti village, Y. 11-69, 2011-06-20. Ir-Tur.

***Salvia sclarea* L.**  
Tunceli, Tunceli center, c. 8.3 km EESE of Tunceli, road to Çukur, east of group of houses, 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0087, 2013-06-13  
Tunceli, Nazımiye, 34 km NNE Tunceli, main road Tunceli - Erzincan, 5 km SSW Mezra, 1180 m, roadside and dry slope, V. Y. E. & M. 13-0350, 2013-06-17  
Tunceli, between Ovacik and Tunceli, Y. 11-46b, 2011-06-20

***Salvia trichoclada* Benth.**  
Tunceli, Tunceli center, c. 13 km SSW of Tunceli, 4.7 km SSW Aktuluk, side road of road Tunceli - Elazığ, 1030 m, meadow with shrubland, 39 0 1 N 39 29 2 V. E. 11-0123 2011-05-19. Ir-Tur.

***Salvia verticillata* L. subsp. *verticillata***  
Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0311, 2013-06-17  
Tunceli, Munzur Gözeleri (fountain of river Munzur) W of Ovacik, Y. 11-53, 2011-06-20  
Tunceli, between Ovacik and Tunceli, 7 km from Ovacik, Y. 11-38b, 2011-06-20  
Tunceli, between Ovacik and Tunceli, 7 km Tunceli, between Ovacik and Tunceli, c. 20 km from Ovacik, Y. 11-39b, 2011-06-20

***Scutellaria orientalis* L.**  
Tunceli, Tunceli center c. 13 km SSW of Tunceli, 4.7 km SSW Aktuluk, side road of road Tunceli - Elazığ, 1030 m, meadow with shrubland, V. & E. 11-0120, 2011-05-19  
Tunceli, Ovacik, 27.5 km NNW Tunceli, road Aşağıtorunoba - Agdat, 1825 m, semihumid meadow, V. Y. E. & M. 13-0381, 2013-06-18  
Tunceli, Tunceli, valley of road Tunceli - Pülümür, c. 12.2 km ENE Tunceli, on the left side of river c. 0.4 km upstream of bridge of road to Kuyluca, 965 m, dry meadow, V. Y. & C. 14-080, 2014-06-01  
Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & C. 14-122, 2014-06-02



Lamiaceae, *Scutellaria orientalis* L., Tunceli, between Ovacik and Tunceli, c. 10 km from Ovacik, Y. 11-43a, 2011-06-20

Tunceli, Munzur Gözeleri (fountain of river Munzur) W of Ovacik, Y. 11-57, 2011-06-20

Tunceli, between Ovacik and Tunceli, Y. 11-62, 2011-06-20

***Sideritis montana* L.**

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & C. 14-111, 2014-06-02. East Medit.

***Stachys burgsdorffoides* (Benth.) Boiss. subsp. *burgsdorffoides***

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & C. 14-107, 2014-06-02. Ir.-Tur.

***Stachys viscosa* Montbret & Aucher ex Benth.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0312, 2013-06-17

Tunceli, Nazımiye, road from Dereova to Dereova Şelalesi, 1535 m, dry gravel area, V. Y. E. & M. 13-0233, 2013-06-15. Ir.-Tur.

***Stachys woronowii* (Schischk. ex Grossh.) R.R.Mill**

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. E. 11-0089, 2011-05-18. Ir.-Tur.

***Teucrium chamaedrys* subsp. *sypshirese* (K.Koch) Rech. f.**

Tunceli, Mazgirt, c. 31 km ESE of Tunceli, road Akdüven - Geçitveren, 4 km E Geçitveren, small pass, 1205 m, dry slope in oak forest, V. Y. E. & M. 13-0159, 2013-06-13. Ir.-Tur.

***Teucrium orientale* L. var. *orientale***

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0327, 2013-06-17. Ir.-Tur.

Tunceli, between Ovacik and Tunceli, 40 km from Ovacik, Y. 11-59, 2011-06-20

***Teucrium parviflorum* Schreber**

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-097, 2014-06-02. Ir.-Tur.

***Teucrium polium* L. subsp. *polium***

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0331, 2013-06-17

Tunceli, Munzur Gözeleri (fountain of river Munzur) W of Ovacik, Y. 11-56, 2011-06-20

***Ziziphora capitata* L.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0326, 2013-06-17

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-121, 2014-06-02

Tunceli, Mazgirt, c. 31 km ESE of Tunceli, road Akdüven - Geçitveren, 4 km E Geçitveren, small pass, 1205 m, dry slope in oak forest, V. Y. E. & M. 13-0161, 2013-06-13

Tunceli, Mazgirt, c. 12.8 km SSE of Tunceli, 1.7 km SSSE Mazgirt, road to Yukarıoyumca, 1330 m, dry slope, V. E. 11-0149, 2011-05-20

Tunceli, Ovacik, Karagöl valley W Köşeler village, Y. 11-06, 2011-06-19

**LEGUMINOSAE**

***Astragalus suberosus* Banks & Sol. subsp. *anclyeus***

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E. 11-0064, 2011-05-18

***Astragalus macrocephalus* subsp. *finitimus* (Bunge) D. F. Chamb.**

Tunceli, Tunceli center, c. 8.3 km EESE of Tunceli, road to Çukur, east of group of houses, 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0093, 2013-06-13. Ir.-Tur.

***Cicer pinnatifidum* Jaub. & Spach**

Tunceli, Tunceli center, c. 13.6 km ESE of Tunceli, road Çukur - Güleç, 3 km S of Çukur, 1435 m, roadside in oak forest, V. Y. E. & M. 13-0137, 2013-06-13

***Coronilla scorpioides* (L.) W.D.J.Koch**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, 39 61 1 N 39 36 55 V. E. 11-0072, 2011-05-18

***Colutea cilicica* Boiss. & Balansa**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0338, 2013-06-17

***Dorycnium hirsutum* (L.) W.D.J.Koch**

Tunceli, Ovacık, road Ovacık - Hozat, c. 3.2 km SSSW Ovacık, 1245 m, dry slope, V. Y. E. & M. 13-0044, 2013-06-12. Medit.

***Genista albida* Willd.**

Tunceli, Mazgirt, c. 12.8 km SSE of Tunceli, 1.7 km SSSE Mazgirt, road to Yukarıoyumca, 1330 m, dry slope, V. E. 11-0144, 2011-05-20

***Glycyrrhiza glabra* L. var. *glabra***

Tunceli, Pülümür, main road Tunceli - Erzincan, c. 31 km NE of Tunceli 1130 m, roadside and dry slope, V. Y. E. & M. 13-0369, 2013-06-17

***Lathyrus aureus* (Steven) D. Brandza**

Tunceli, Nazımiye, c. 30 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, 1755 m, oak forest, shadow and humid of river, V. Y. & E. 13-0250, 2013-06-16. Black Sea Elementi

***Lathyrus laxiflorus* (Desf.) O.Kuntze subsp. *laxiflorus***

Tunceli, Nazımiye, c. 30 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, 1755 m, oak forest, shadow and humid of river, V. Y. & E. 13-0248, 2013-06-16

***Lathyrus roseus* Steven**

Tunceli, Nazımiye, c. 30 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, 1755 m, oak forest, shadow and humid of river, V. Y. & E. 13-0251, 2013-06-16

***Lathyrus rotundifolius* subsp. *miniatus* (M.Bieb. ex Steven) P.H.Davis**

Tunceli, Nazımiye, c. 30 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, 1755 m, oak forest, shadow and humid of river, V. Y. & E. 13-0252, 2013-06-16

***Lotus gebelia* Vent.**

Tunceli, Tunceli center c. 12.2 km EESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0125, 2013-06-13

Tunceli, Mazgirt, c. 21 km E Tunceli, c. 3 km SE Çevrecik, Düzgün Baba Dağı, around top, 2060 m, dry rocky mountain slope, V. Y. E. & M. 13-0207, 2013-06-15

Tunceli, Tunceli, valley of road Tunceli - Pülümür, c. 12.2 km ENE Tunceli, on the left side of river c. 0.4 km upstream of bridge of road to Kuyluca, 965 m, dry meadow, V. Y. & C. 14-083, 2014-06-01

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & C. 14-102, 2014-06-02

***Medicago lupulina* L.**

Tunceli, Tunceli center, c. 13.5 km EESE of Tunceli, road Çukur - Güleç, 2.1 km S of Çukur, 1415 m, roadside, partly humid, in oak forest, V. Y. E. & M. 13-0134, 2013-06-13

***Medicago minima* (L.) Bartal. var. *minima***

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0323, 2013-06-17

***Medicago rigidula* (L.) All.**

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & C. 14-115, 2014-06-02

***Medicago sativa* L. subsp. *sativa***

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0318, 2013-06-17

***Melilotus albus* Desr.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0340, 2013-06-17

***Melilotus officinalis* (L.) Desr.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0339, 2013-06-17

***Pisum sativum* L.**

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. E. 11-0087, 2011-05-18

Tunceli, Mazgirt, c. 12.4 km SSE of Tunceli, 1.6 km SSSW Mazgirt, 1210 m, roadside, V. Y. E. 11-0141, 2011-05-20

Tunceli, road Tunceli - Ovacık, c. 5.7 km NW of Tunceli, 940 m, dry meadow, V. Y. E. & C. 14-047, 2014-05-30

***Securigera orientalis* (Mill.) Lassen subsp. *orientalis***

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0334, 2013-06-17

Tunceli, Nazımiye, c. 27 km NE of Tunceli, above village Büyükyurt, 1730 m, dry slope, V. Y. E. & E. 13-0244, 2013-06-16

Tunceli, road Tunceli - Ovacık, c. 5.7 km NW of Tunceli, 940 m, dry meadow, V. Y. E. & C. 14-046, 2014-05-30

***Securigera varia* (L.) Lassen**

Tunceli, Tunceli center, c. 12.2 km EESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0122, 2013-06-13

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0335, 2013-06-17. E.Medit.

***Trifolium ambiguum* M. Bieb.**

Tunceli, Mazgirt, c. 14.5 km SSE of Tunceli, 5.3 km SSW Mazgirt, 1.2 km ENE Arslanyurdu, 1030 m, dry meadow, V. Y. E. 11-0130, 2011-05-20

***Trifolium arvense* L. subsp. *arvense***

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0321, 2013-06-17

***Trifolium dasyurum* C. Presl**

Tunceli, Mazgirt, c. 12.4 km SSE of Tunceli, 1.6 km SSSW Mazgirt, 1210 m, dry meadow, V. Y. E. 11-0137, 2011-05-20. E.Medit.

***Trifolium diffusum* Ehrh.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0333, 2013-06-17

***Trifolium echinatum* M. Bieb.**

Tunceli, Tunceli center, c. 12.2 km EESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0103a, 2013-06-13. E.Medit.

***Trifolium fragiferum* L. var. *fragiferum***

Tunceli, Tunceli center, c. 13.5 km EESE of Tunceli, road Çukur - Güleç, 2.1 km S of Çukur, 1415 m, roadside, partly humid, in oak forest, V. Y. E. & M. 13-0126, 2013-06-13

***Trifolium pauciflorum* d'Urv.**

Tunceli, Tunceli center, c. 2.2, km E of city center, at NW end of cementary, 935 m, semi ruderal, V. Y. E. 11-0053, 2011-05-18. E.Medit.

***Trifolium nigrescens* Viv. subsp. *nigrescens***

Tunceli, Tunceli center, c. 13.5 km EESE of Tunceli, road Çukur - Güleç, 2.1 km S of Çukur, 1415 m, roadside, partly humid, in oak forest, V. Y. E. & M. 13-0131, 2013-06-13

***Trifolium pilulare* Boiss.**

Tunceli, Tunceli center, c. 12.2 km EESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0103b, 2013-06-13

***Vicia cracca* L. subsp. *cracca***

Tunceli, Nazımiye, c. 30 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, 1755 m, oak forest, shadow and humid of river, V. Y. E. & E. 13-0253, 2013-06-16

***Vicia ervilia* (L.) Willd.**

Tunceli, Mazgirt, c. 12.4 km SSE of Tunceli, 1.6 km SSSW Mazgirt, 1210 m, roadside, V. Y. E. 11-0138, 2011-05-20

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. Y. E. 11-0084, 2011-05-18

***Vicia narbonensis* L.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı 935 m, grazed meadow and semi ruderal, V. Y. E. & M. 13-0077, 2013-06-13

***Vicia cracca* L. subsp. *cracca***

Tunceli, Mazgirt, c. 31 km ESE of Tunceli, road Akdüven - Geçitveren, 4 km E Geçitveren, small pass, 1205 m, dry slope in oak forest, V. Y. E. & M. 13-0157, 2013-06-13. Euro-Sib.

***Vicia sericocarpa* Fenzl**

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. E. 11-0085, 2011-05-18

Tunceli, Mazgirt, c. 12.4 km SSE of Tunceli, 1.6 km SSSW Mazgirt, 1210 m, roadside, V. E. 11-0139, 2011-05-20

Tunceli, Tunceli center c. 6.8 km E of Tunceli, road to Kocakoç, c. 0.8 km ESE of locality called Atlanti, 960 m, dry slope besides road, V. Y. E. & M. 13-0082, 2013-06-13

**IXIOLIRIACEAE**

***Ixiolirion tataricum* (Pall.) Schult. & Schult. f.**

Tunceli, Tunceli center, c. 14.1 km NE of Tunceli, road D882 to Gökçek, 2.2 km SSW Gökçek, locality called Kutudere, 1000 m, dry meadows and oak forest, V. E. 11-0095, 2011-05-18

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. E. 11-0077, 2011-05-18

Tunceli, Tunceli center c. 14.1 km NE of Tunceli, road D882 to Gökçek, 2.2 km SSW Gökçek, locality called Kutudere, 1000 m, dry meadows and oak forest, V. & E. 11-0099, 2011-05-18

**LILIACEAE**

***Gagea gageoides* (Zucc.) Vved.**

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, upper part of village Büyükyurt 1745 m, at fence, V. E. 11-01742011-05-21. Ir-Tur.

***Tulipa armena* Boiss. var. *armena***

Tunceli, Ovacık, c. 18 km NE of Ovacık, NE of small river dam, locality called Şahverdi, 1505 m, V. E. 11-0040, 2011-05-17. Ir-Tur.

**LINACEAE**

***Linum mucronatum* Bertol. subsp. *mucronatum***

Tunceli, Tunceli center, c. 6.8 km E of Tunceli, road to Kocakoç, c. 0.8 km ESE of locality called Atlanti, 960 m, dry slope besides road, V. Y. E. & M. 13-0079, 2013-06-13

Tunceli, Mazgirt, c. 15 km E Tunceli, road Çukur - Gürbüzler, 1.3 km SW of Gürbüzler, 1370 m, dry gravel slope, V. Y. E. & M. 13-0193, 2013-06-14

Tunceli, Tunceli center, c. 13 km SSW of Tunceli, 4.7 km SSW Aktuluk, side road of road Tunceli - Elazığ, 1030 m, meadow with shrubland, V. E. 11-0121, 2011-05-19. Ir-Tur.

**MORACEAE**

***Ficus carica* subsp. *rupestris* (Hausslm.) Browicz**

Tunceli, Tunceli center, 9.3 km NW of Tunceli, at big bend of road near small waterfall, 990 m, roadside, V. E. 11-0026, 2011-05-17. Ir-Tur.

**ORCHIDACEAE**

***Anacamptis pyramidalis* (L.) Rich.**

Tunceli, Ovacık, 27.5 km NNW Tunceli, road Aşağıtorunoba – Agdat, 1825 m, semihumid meadow, V. Y. E. & M., 13-0373, 2013-06-18

***Cephalanthera epipactoides* Fisch. & C.A.Mey.**

Tunceli, Tunceli center, c. 8.1 km ESE of Tunceli, road to Ambar, 970 m, roadside in oak forest, V. E. 11-0105, 2011-05-19, E.Medit.

***Dactylorhiza iberica* (M. Bieb. ex Willd.) SOO.**

Tunceli, Tunceli center, c. 14.1 km NE of Tunceli, road D882 to Gökçek, 2.2 km SSW Gökçek, locality called Kutudere, 1000 m, dry meadows and oak forest, V. E. 11-0097, 2011-05-18

***Dactylorhiza osmanica* var. *osmanica***

Tunceli, Ovacık, road Ovacık - Hozat, c. 6.4 km SSSW Ovacık, 1665 m, humid place in oak forest, V. Y. E. & M. 13-0046, 2013-06-12

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba - Agdat, 1860 m, stony slope, limestone, V. Y. E. & M. 13-0399b, 2013-06-18. Endemic, Ir-Tur.

Tunceli, Ovacık, c. 14 km WWSW Ovacık, 0.35 km W Ziyaret, near the fountains of river Munzur, 1320 m, near river, V. Y. E. & M. 13-0038, 2013-06-12

***Orchis sancta* L.**

Tunceli, Ovacık, 27.5 km NNW Tunceli, road Aşağıtorunoba - Agdat, 1825 m, semihumid meadow, V. Y. E. & M. 13-0372, 2013-06-18. E.Medit.

#### **OROBANCHACEAE**

##### ***Bunaea trifida* (Vahl) C.A.Mey.**

Tunceli, Pülümür, 35 km NNNE Tunceli, road Kocatepe - Sarıgül Köyü, 2.9 km WSW of Kocatepe, 2160 m, mountain meadow, V. Y. E. & M. 13-0305, 2013-06-17. Ir-Tur.

##### ***Melampyrum arvense* L. var. *arvense***

Tunceli, Ovacık, road Tunceli - Ovacık, c. 6.6 km EESE Ovacık, 0.35 km SE of bridge at mouth of side river, 1230 m, humid meadow, V. Y. E. & M. 13-0024, 2013-06-12. Euro-Sib.

##### ***Orobanche cernua* Loefl.**

Tunceli, Pülümür, c. 38 km NNE Tunceli, road to Kocatepe, 0.7 km ESE Kovuklu, 1605 m, gravel slope, V. Y. & Ç. 14-135, 2014-06-02

#### **PAEONIACEAE**

##### ***Paeonia mascula* (L.) Mill. subsp. *mascula***

Tunceli, Ovacık, road Ovacık - Hozat, c. 8.4 km SSSW Ovacık, 1825 m, open places in oak forest, 39 17 1 N 39 12 30 V. Y. E. & M. 13-0051, 2013-06-12

Tunceli, Nazımiye, c. 33 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, 1845 m, dry meadow in zone of oak forest, V. Y. & E. 13-0258, 2013-06-16

Tunceli, Pülümür, 38 km NNE Tunceli, road to Kocatepe, 1.9 km WNW Mezra, 1540 m, dry place in oak forest, V. Y. E. & M. 13-0269, 2013-06-17

Tunceli, c. 5 km WNW from Ovacık, Karagöl valley W Kösel village, Y. 11-18, 2011-06-19

#### **PAPAVERACEAE**

##### ***Corydalis oppositifolia* subsp. *erdellii* (Zucc.) Cullen & P.H.Davis**

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, above village Büyükyurt 1920 m, track, V. E. 11-0170, 2011-05-21

##### ***Fumaria asepalae* Boiss.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E. 11-0065, 2011-05-18

##### ***Hypocoum imberbe* Sm.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E. 11-0067, 2011-05-18

##### ***Glaucium acutidentatum* Hausskn. & Bornm.**

Tunceli, Pülümür, c. 38 km NNE Tunceli, road to Kocatepe, 1 km SE Kovuklu, 1590 m, roadside, V. Y. & U. 14-126, 2014-06-02. Endemic, Ir-Tur.

##### ***Glaucium grandiflorum* Boiss. & A.Huet**

Tunceli, Mazgirt, c. 31 km ESE of Tunceli, c. 2.7 km SE of Akdüven, road to mineral fountain, 1035 m, roadside, V. Y. E. & M. 13-0155, 2013-06-13

##### ***Papaver bracteatum* Lindl.**

Tunceli, Ovacık, c. 18.3 km NE of Ovacık, c. 0.5 km NNE of small river dam, near locality called Şahverdi, 1500 m, stony meadow, V. Y. 14-156, 2014-06-03

##### ***Papaver dubium* L. subsp. *dubium***

Tunceli, Mazgirt, c. 12.4 km SSE of Tunceli, 1.6 km SSSW Mazgirt, 1210 m, roadside, V. E. 11-0142, 2011-05-20

##### ***Papaver persicum* Lindl. subsp. *tauricola* (Boiss.) Kadereit**

Tunceli, road Tunceli - Ovacık, c. 6.4 km NW of Tunceli, 960 m, rocky slope besides road, V. Y. & U. 14-051, 2014-05-30

Annotation: In Flora Turkey 1:227 as *Papaver tauricola* Boiss.

##### ***Roemeria hybrida* (L.) DC. subsp. *hybrida***

Tunceli, Tunceli center, c. 2.2, km E of city center, at NW end of cementary, 935 m, semi ruderal, V. E. 11-0055, 2011-05-18

#### **PLANTAGINACEAE**

##### ***Anarrhinum orientale* Benth.**

Tunceli, Ovacık, road Ovacık - Hozat, c. 3.2 km SSSW Ovacık, 1245 m, dry slope, V. Y. E. & M. 13-0043, 2013-06-12

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 1.8 km NW Kovuklu, 1580 m, dry gravel slope, V. Y. E. & M. 13-0283, 2013-06-17

Tunceli, Pülümür, main road Tunceli - Erzincan, c. 31 km NNE of Tunceli, c. 21 km SSW Pülümür, 1155 m, roadside and dry slope, V. Y. E. & M. 13-0363, 2013-06-17. Ir-Tur.

***Linaria genistifolia* (L.) Mill. subsp. *genistifolia***

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba – Agdat, 1825 m, dry sandy slope, V. Y. E. & M. 13-0393a, 2013-06-18

Tunceli, Pülümür, main road Tunceli - Erzincan, c. 31 km NE of Tunceli, 1130 m, roadside and dry slope, V. Y. E. & M. 13-0371, 2013-06-17. Euro-Sib.

***Linaria simplex* (Willd.) DC.**

Tunceli, Tunceli center, c. 2.2, km E of city center, at NW end of cementary, 935 m, semi ruderal, V. E. 11-0054, 2011-05-18

***Plantago lanceolata* L.**

Tunceli, Tunceli center, c. 13.5 km EESE of Tunceli, road Çukur - Güleç, 2.1 km S of Çukur, 1415 m, roadside, partly humid, in oak forest, V. Y. E. & M. 13-0132, 2013-06-13

***Veronica anagallis-aquatica* L.**

Tunceli, Tunceli center, c. 13.5 km EESE of Tunceli, road Çukur - Güleç, 2.1 km S of Çukur, 1415 m, roadside, partly humid, in oak forest, V. Y. E. & M. 13-0127, 2013-06-13

Tunceli, Tunceli center, c. 8.3 km EESE of Tunceli, road to Çukur, east of group of houses, 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0092, 2013-06-13

***Veronica cinerea* Boiss. & Balansa**

Tunceli, Mazgirt, c. 21 km E Tunceli, c. 3 km SE Çevrecik, Düzgün Baba Dağı, around top, 2060 m, dry rocky mountain slope, V. Y. E. & M. 13-0205, 2013-06-15. Endemic, Medit.

***Veronica campylopoda* Boiss.**

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E. 11-0074, 2011-05-18. Ir-Tur.

***Veronica macrostachya* Vahl subsp. *macrostachya***

Tunceli, Pülümür, c. 38 km NNE Tunceli, road to Kocatepe, 0.9 km SE Kovuklu, 1625 m, Astragalus spiny shrub stepe, V. Y. & U. 14-130, 2014-06-02. Medit.

***Veronica orientalis* Mill. subsp. *orientalis***

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. E. 11-0090a, 2011-05-18

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E. 11-0073, 2011-05-18

Tunceli, Nazimiye, c. 33 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, 1845 m, dry meadow in zone of oak forest, V. Y. & E. 13-0256, 2013-06-16

**PLUMBAGINACEAE**

***Acantholimon acerosum* (Willd.) Boiss.**

Tunceli, Mazgirt, c. 6,2 km ESE Mazgirt, c. 0,6 km NW Avunca, 1315 m, dry meadow, V. Y. E. & M. 13-0014, 2013-06-11. Ir-Tur.

**POLYGALACEAE**

***Polygala transcaucasica* Tarnarnsch.**

Tunceli, Pülümür, 39 km NE Tunceli, road to Kocatepe, 1.8 km NW Kovuklu, 1590 m, open places in oak forest, V. Y. E. & M. 13-0295, 2013-06-17

**POLYGONACEAE**

***Fallopia convolvulus* (L.) Á. Löve**

Tunceli, Tunceli center, c. 8.3 km EESE of Tunceli, road to Çukur, east of group of houses, 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0085, 2013-06-13

***Persicaria alpina* (All.) H. Gross**

Tunceli, Ovacık, c. 14 km WWSW Ovacık, 0.35 km W Ziyaret, near the fountains of river Munzur, 1320 m, near river, V. Y. E. & M. 13-0040, 2013-06-12

***Polygonum arenarium* Waldst. & Kit.**

Tunceli, Tunceli center, c. 13.6 km ESE of Tunceli, road Çukur - Güleç, 3 km S of Çukur, 1435 m, roadside in oak forest, V. Y. E. & M. 13-0142b, 2013-06-13

***Rheum ribes* L.**

Tunceli, Ovacık, c. 20 km NE of Ovacık, c. 1.6 km ENE above locality called Şahverdi, 1820 m, grazed and stony meadows, V. Y. 14-176, 2014-06-03. Ir-Tur.

***Rumex scutatus* L.**

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0309, 2013-06-17

**RANUNCULACEAE**

***Adonis aestivalis* L.**

Tunceli, Tunceli center c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. & E. 11-0066, 2011-05-18

Tunceli, Tunceli center, c. 6 km E of Tunceli, road to Kocakoç, locality called Atlantı, 935 m, grazed meadow and semi ruderal, V. E. 11-0063, 2011-05-18

***Adonis eriocalycina* Boiss.**

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-117a, 2014-06-02

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-117, 2014-06-02. Ir-Tur.

***Aquilegia olympica* Boiss.**

Tunceli, Nazımiye, 0.6 km NE Dereova, Dereova Şelalesi, 1525 m, besides rivulet, V. Y. E. & M. 13-0225, 2013-06-15

***Ceratocephala falcata* (L.) Pers.**

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-116, 2014-06-02

***Consolida axilliflora* (DC.) Schrodinger**

Tunceli, Mazgirt, c. 31 km ESE of Tunceli, c. 1.6 km ESE of Akdüven, 995 m, former field, V. Y. E. & M. 13-0150, 2013-06-13

***Consolida oliveriana* (DC.) Schrodinger**

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-103, 2014-06-02

***Ranunculus arvensis* L.**

Tunceli, Tunceli center, c. 13.6 km ESE of Tunceli, road Çukur - Güleç, 3 km S of Çukur, 1435 m, roadside in oak forest, V. Y. E. & M. 13-0142a, 2013-06-13

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-109, 2014-06-02

Tunceli, Pülümür, main road Tunceli - Erzincan, c. 3 km NW Pülümür, besides the salt fountain, 1620 m, meadow, V. Y. & U. 14-061, 2014-05-31

***Ranunculus constantinopolitanus* (DC.) d'Urv.**

Tunceli, Ovacık, c. 18.3 km NE of Ovacık, c. 0.5 km NNE of small river dam, near locality called Şahverdi, 1515 m, riverside, V. E. 11-0044, 2011-05-17

***Ranunculus polyanthemos* L.**

Tunceli, Ovacık, 27.5 km NNW Tunceli, road Aşağıtorunoba - Agdat, 1825 m, semihumid meadow, V. Y. E. & M. 13-0378, 2013-06-18

**RESEDACEAE**

***Reseda lutea* L. subsp. *lutea***

Tunceli, Nazımiye, 0.6 km NE Dereova, Dereova Şelalesi, 1525 m, besides rivulet, V. Y. E. & M. 13-0227, 2013-06-15

Tunceli, Nazımiye, 34 km NNE Tunceli, main road Tunceli - Erzincan, 5 km SSW Mezra, 1180 m, roadside and dry slope, V. Y. E. & M. 13-0352, 2013-06-17

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, road to Büyükyurt 1220 m, roadside, V. E. 11-0178, 2011-05-21

**RHAMNACEAE**

***Paliurus spina-christi* P. Mill.**

Tunceli, Mazgirt, c. 12.4 km SSE of Tunceli, 1.6 km SSSW Mazgirt, 1210 m, roadside, V. E. 11-0143a, 2011-05-20

**ROSACEAE**

***Agrimonia eupatoria* L. subsp. *eupatoria***

Tunceli, Tunceli, valley of road Tunceli - Pülümür, c. 12.2 km ENE Tunceli, on the left side of river c. 0.4 km upstream of bridge of road to Kuyluca, 965 m, dry meadow, V. Y. & U. 14-084, 2014-06-01  
Tunceli, Ovacık, c. 11.7 km WWSW Ovacık, 1.9 km ENE Ziyaret (fountains of river Munzur), 1300 m, near river, V. Y. E. & M. 13-0034, 2013-06-12

***Cotoneaster nummularia* Fisch. & C.A.Mey.**

Tunceli, Mazgirt, c. 21 km E Tunceli, c. 3 km SE Çevrecik, Düzgün Baba Dağı, around top, 2060 m, dry rocky mountain slope, V. Y. E. & M. 13-0203, 2013-06-15

***Filipendula vulgaris* Moench**

Tunceli, Ovacık, c. 19 km NE of Ovacık, E above locality called Şahverdi, 1630 m, grazed and stony meadows, V. Y. 14-170, 2014-06-03. Euro-Sib.

***Geum urbanum* L.**

Tunceli, Nazımiye, c. 30 km NE of Tunceli, NE of Büyükyurt, road to former village Hormek, 1755 m, oak forest, shadow and humid of river, V. Y. & E. 13-0249, 2013-06-16. Euro-Sib.

***Sanguisorba minor* L. subsp. *minor***

Tunceli, Tunceli center, c. 12.2 km EESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0117, 2013-06-13

***Rosa hemisphaerica* J.Herrm.**

Tunceli, Mazgirt, c. 32.7 km SE of Tunceli, road Ortharman - Elmalık, 1.5 km NNE Elmalık, 995 m, dry slope, V. E. 11-0160, 2011-05-20. Ir-Tur.

**RUBIACEAE**

***Asperula comosa* Schönb.-Tem.**

Tunceli, c. 5 km WNW from Ovacık, Karagöl valley W Köşeler village, Y. 11-21a, 2011-06-19

***Asperula xylorrhiza* Nabelek**

Tunceli, Nazımiye, c. 27 km NE of Tunceli, above village Büyükyurt, 1775 m, dry slope, V. Y. & E. 13-0239, 2013-06-16. Ir-Tur.

***Callipeltis cucullaris* (L.) Steven**

Tunceli, Nazımiye, road Nazımiye - Dereova, 3.9 km SE Dereova, 1415 m, dry gravel, V. Y. E. & M. 13-0223, 2013-06-15. Ir-Tur.

***Galium aparine* L.**

Tunceli, Nazımiye, 34 km NNE Tunceli, main road Tunceli - Erzincan, 5 km SSW Mezra, 1180 m, roadside and dry slope, V. Y. E. & M. 13-0351, 2013-06-17

***Galium ceratocarpon* Boiss.,**

Tunceli, NW of Ovacık, Köşeler village, Y. 11-34, 2011-06-19. Endemic, Ir-Tur.

***Galium incanum* subsp. *elatius* (Boiss.) Ehrend.**

Tunceli, road Tunceli - Ovacık, c. 6.4 km NW of Tunceli, 960 m, rocky slope besides road, V. Y. & C. 14-050, 2014-05-30. Ir-Tur.

***Galium penicillatum* Boiss.**

Tunceli, road Tunceli - Ovacık, c. 6.4 km NW of Tunceli, 960 m, rocky slope besides road, V. Y. & C. 14-049, 2014-05-30. East Medit.

***Galium subuliferum* Sommier & Levier**

Tunceli, Nazımiye, road from Dereova to Dereova Şelalesi, 1535 m, dry gravel area, V. Y. E. & M. 13-0232, 2013-06-15

Tunceli, Pülümür, main road Tunceli - Erzincan, c. 31 km NNE of Tunceli, c. 21 km SSW Pülümür, 1155 m, roadside and dry slope, V. Y. E. & M. 13-0362, 2013-06-17

Tunceli, Mazgirt, c. 21 km E Tunceli, c. 3 km SE Çevrecik, Düzgün Baba Dağı, around top, 2060 m, dry rocky mountain slope, V. Y. E. & M. 13-0202, 2013-06-15

Tunceli, Ovacık, 27.5 km N Tunceli, road Aşağıtorunoba – Agdat, 1825 m, dry sandy slope, V. Y. E. & M. 13-0383, 2013-06-18

***Galium verticillatum* Danthoine ex Lam.**

Tunceli, Nazımiye, c. 27 km NE of Tunceli, above village Büyükyurt, 1775 m, dry slope, V. Y. & E. 13-0242, 2013-06-16. Medit.

***Galium verum* L. subsp. *verum***

Tunceli, Nazımiye, 34 km NNE Tunceli, main road Tunceli - Erzincan, 5 km SSW Mezra, 1180 m, roadside and dry slope, V. Y. E. & M. 13-0349, 2013-06-17. Euro-Sib.

**RUTACEAE**



***Ruta buxbaumii* Poir.**

Tunceli, Mazgirt, c. 15 km E Tunceli, road Çukur - Gürbüzler, 1.3 km SW of Gürbüzler, 1370 m, dry gravel slope, V. Y. E. & M. 13-0197, 2013-06-14

***Haplophyllum myrtifolium* Boiss.**

Tunceli, Mazgirt, c. 29 km SE of Tunceli, road Darıkent - Ortaharman, c. 3.4 km S Darıkent, 1265 m, stepe, V. Y. E. & M. 13-0171, 2013-06-13. Endemic, Ir-Tur.

Annotation: All accepted species of *Haplophyllum* are listed in the Plant List under the genus *Ruta*. *Haplophyllum myrtifolium* is given as unresolved.

**SCROPHULARIACEAE**

***Scrophularia libanotica* var. *cappadocica* R.R.Mill**

Tunceli, Pülümür, road D882 Tunceli - Pülümür, 11,6 km SSW Pülümür, 1245 m, below rocks, V. E. 11-01042011-05-18. Endemic, Ir-Tur.

***Scrophularia lucida* L.**

Tunceli, Tunceli center, c. 13 km SSW of Tunceli, 4.7 km SSW Aktuluk, side road of road Tunceli - Elazığ, 1030 m, meadow with shrubland, V. E. 11-0125, 2011-05-19. Medit.

***Scrophularia olympica* Boiss.**

Tunceli, Tunceli center, c. 9 km ESE of Tunceli, 0.9 km SW of Ambar, below castle, 1150 m, shrubland, V. E. 11-0111, 2011-05-19. Black Sea Element.

***Verbascum duzgunbadagensis* Karavel. & E. Yüce**

Tunceli, Mazgirt, c. 21 km E Tunceli, c. 3 km SE Çevrecik, Düzgün Baba Dağı, around top, 2060 m, vertical shady rocks, V. Y. E. & M. 13-0213, 2013-06-15. Endemic, Ir-Tur.

**THYMELAEACEAE**

***Daphne oleoides* Schreb.**

Tunceli, Nazımiye, c. 27 km NE of Tunceli, above village Büyükyurt, 1775 m, dry slope, V. Y. & E. 13-0240, 2013-06-16

Tunceli, Ovacık, c. 20 km NE of Ovacık, c. 1.6 km ENE above locality called Şahverdi, 1820 m, grazed and stony meadows, V. & Y. 14-181, 2014-06-03

Tunceli, Pülümür, 35 km NNNE Tunceli, road Kocatepe - Sarıgül Köyü, 2.9 km WSW of Kocatepe, 2160 m, mountain meadow, V. Y. E. & M. 13-0306, 2013-06-17

**TYPHACEAE**

***Typha minima* Funck.**

Tunceli, Tunceli, valley of road Tunceli - Pülümür, c. 12.2 km ENE Tunceli, on the left side of river c. 0.4 km upstream of bridge of road to Kuyluca, 965 m, edge of river, V. Y. & U. 14-079, 2014-06-01. Euro-Sib.

**UMBELLIFERAE**

***Actinolema macrolema* Boiss.**

Tunceli, Mazgirt, c. 31 km ESE of Tunceli, road Akdüven - Geçitveren, 4 km E Geçitveren, small pass, 1205 m, dry slope in oak forest, V. Y. E. & M., 13-0162, 2013-06-13

Tunceli, Mazgirt, road Göktepe - Danaburan, c. 2,5 km NE of Göktepe, 930 m, dry slope, V. Y. E. & M. 13-0013, 2013-06-11. Ir-Tur.

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-098, 2014-06-02

***Anthriscus nemorosa* (M.Bieb.) Spreng.**

Tunceli, Ovacık, road Ovacık - Hozat, c. 8.4 km SSSW Ovacık, 1825 m, open places in oak forest, V. Y. E. & M. 13-0052, 2013-06-12

Tunceli, Mazgirt, c. 12.8 km SSE of Tunceli, 3.4 km SE Mazgirt, 0.2 SW of Yukarıoyumca, 1365 m, small forest, V. E. 11-0151, 2011-05-20

Tunceli, Tunceli center, c. 8.1 km ESE of Tunceli, road to Ambar, 970 m, roadside in oak forest, V. E. 11-0108, 2011-05-19

***Artemisia squamata* L.**

Tunceli, Tunceli center, c. 8.3 km ESE of Tunceli, road to Çukur, east of group of houses, 995 m, roadside, meadow and along river, V. Y. E. & M. 13-0101, 2013-06-13

***Bunium microcarpum* (Boiss.) Freyn & Bornm.**

Tunceli, Mazgirt, c. 21 km E Tunceli, c. 3 km SE Çevrecik, Düzgün Baba Dağı, around top, 2060 m, dry rocky mountain slope, V. Y. E. & M. 13-0209, 2013-06-15. Ir-Tur.

***Bunium paucifolium* DC.**

Tunceli, Tunceli center, c. 12.2 km EESE of Tunceli, road Çukur - Güleç, 1.3 km SW of Çukur, 1250 m, meadow in oak forest, V. Y. E. & M. 13-0116, 2013-06-13. Ir-Tur.

***Oenanthe silaifolia* M. Bieb.**

Tunceli, Mazgirt, c. 3,3 km EESE Mazgirt, Yukarıoyumca 1430 m, boggy area besides lake, V. Y. E. & M. 13-0019, 2013-06-11.

***Scandix pecten-veneris* L.**

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. E. 11-0079, 2011-05-18

***Smyrniium cordifolium* Boiss.**

Tunceli, Ovacık, c. 11.7 km WWSW Ovacık, 1.9 km ENE Ziyaret (fountains of river Munzur), 1300 m, stony slope, V. Y. E. & M. 13-0031, 2013-06-12

Tunceli, Mazgirt, c. 21 km E Tunceli, c. 3 km SE Çevrecik, Düzgün Baba Dağı, around top, 2060 m, dry rocky mountain slope, V. Y. E. & M. 13-0208, 2013-06-15. Ir-Tur.

***Torilis leptocarpa* (Hochst.) C.C. Towns.**

Tunceli, Nazımiye, 17.3 km NE Tunceli, main road Tunceli - Erzincan, c. 5.4 km WSW Demirce, besides holy place, 1005 m, roadside, V. Y. E. & M. 13-0264, 2013-06-17. Ir-Tur.

***Torilis leptophylla* (L.) Rchb. f.**

Tunceli, Ovacık, c. 14 km WWSW Ovacık, 0.35 km W Ziyaret, near the fountains of river Munzur, 1320 m, near river, V. Y. E. & M. 13-0040a, 2013-06-12

Tunceli, Pülümür, 35.6 km NNE Tunceli, main road Tunceli - Erzincan, 3.5 km SW Mezra, 1200 m, roadside and dry slope, V. Y. E. & M. 13-0330, 2013-06-17

***Turgenia latifolia* (L.) Hoffm.**

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-100, 2014-06-02

***Zosima absinthifolia* (Vent.) Link**

Tunceli, Tunceli center, c. 6.8 km E of Tunceli, road to Kocakoç, c. 0.8 km ESE of locality called Atlanti, 960 m, dry slope besides road, V. Y. E. & M. 13-0080, 2013-06-13

**URTICACEAE**

***Parietaria judaica* L.**

Tunceli, Tunceli center, c. 7.4 km ENE of Tunceli, road D882 to Gökçek, locality called Marçık 940 m, former field and surrounding meadows and shrubland, V. E. 11-0092, 2011-05-18

Tunceli, Nazımiye, side valley of road D882 Tunceli - Erzincan, road to Büyükyurt 1200 m, roadside, V. E. 11-0163, 2011-05-21

***Urtica dioica* L.**

Tunceli, NW of Ovacık, Kösel village, Y. 11-35, 2011-06-19

**VALERIANACEAE**

***Valerianella coronata* (L.) DC.**

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-119, 2014-06-02

***Valerianella vesicaria* (L.) Moench**

Tunceli, Tunceli, area of the University of Munzur, c. 7 km SSE of city center, 975 m, shrubland and semi-ruderal, V. Y. & U. 14-118, 2014-06-02

***Valeriana officinalis* L.**

Tunceli, Mazgirt, c. 12.8 km SSE of Tunceli, 3.4 km SE Mazgirt, 0.2 SW of Yukarıoyumca, 1365 m, humid meadow, V. E. 11-0153, 2011-05-20

**XANTHORRHOACEAE**

***Asphodeline tenuior* (Fisch. ex M.Bieb.) Ledeb. subsp. *tenuiflora* (K.Koch) Tuzlaci**

Tunceli, Nazımiye, road Nazımiye - Dereova, 3.9 km SE Dereova 1415 m, dry gravel, V. Y. E. & M. 13-0222, 2013-06-15. Endemic, Ir-Tur.

**4. Conclusions and Discussion**

This study was carried out 2011-2014 in Tunceli Province. Samples have been collected from ca. 400 plants. The identification of these samples results in 55 families, 203 genera and 336 taxa. The distribution ratio of phytogeographic elements is shown in Table 1: Irano-Turanian 85 (25.3 %),

Mediterranean elements 23 (6.8 %), Europe-Siberian elements 14 (4.2 %), the ones with wide distribution and unknown distribution 214 (63.6 %).

**Table 1.** Comparison between “taxon distribution in plant geography regions” of the present study and of other studies.

Research area	Plant geography region - %		
	Ir-Tur.	Euro-Sib.	Medit.
Tunceli	25.3	4.2	6.8
Maden- Tekevler vil. Çakılcıoğlu and Civelek, 2011)	34.2	4.3	4.5
Çitli Low. (Çakılcıoğlu et al., 2008)	31.7	6.1	4.5
Harput (Çakılcıoğlu, 2012)	33,8	5.1	2.0
Salkaya and Dambüyük (Hayta and Bağcı, 2013)	38.4	4.3	4.5
Cip Dam Lake-Arındık village (Doğan, 2009)	32.5	2.1	4.2
Mt. Karga (Türkoğlu, 2005)	32.5	3.7	5.1
Gözeli and Kavak Low. (Türkoğlu, 2006)	38.5	5.2	4.5
Baskil- Altinkürek vil. (Kurşat, 2005)	38.2	3.5	4.5
Baskil (Behçet, 1999)	41.7	7.0	4.1
Islands in Keban Dam Lake (Ayvaz et al., 1993)	30.0	3.4	4.5

In Table 1 the distribution ratio of phytogeographic elements of the studied area is shown and compared with the results of other investigations in nearby areas. It can be stated that Irano-Turanian plant geography takes the first place in every study. The number of endemic taxons was 18, with a ratio of 5.3 % to the total flora (Davis, 1965-1985; Yıldırım, 1995; Karavelioğulları et al., 2014; Vitek, et al., 2014; Davis et al., 1988).

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