

THE ADDITIONAL RECORDS FOR THE FLORA OF ISTANBUL [A2(A) ISTANBUL: OMERLI, FORMULA 1 AREA]

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S U M M A R Y

In this paper, 9 taxa are added to the flora of Istanbul with the specimens collected grown Omerli district, Asiatic part of Istanbul, additionally the presence of *Stellaria nemorum* L. subsp. *nemorum* in Turkey is confirmed.

Ö Z E T

Bu makalede, Omerli [A2(A) Istanbul]'dan toplanan örneklerle İstanbul florasına, 9 takson ilave edilmiş ayrıca *Stellaria nemorum* L. subsp. *nemorum* taksonunun Türkiye'deki varlığı doğrulanmıştır.

Key Words: Turkish Flora, Istanbul, new records, *Stellaria nemorum* L. subsp. *nemorum*

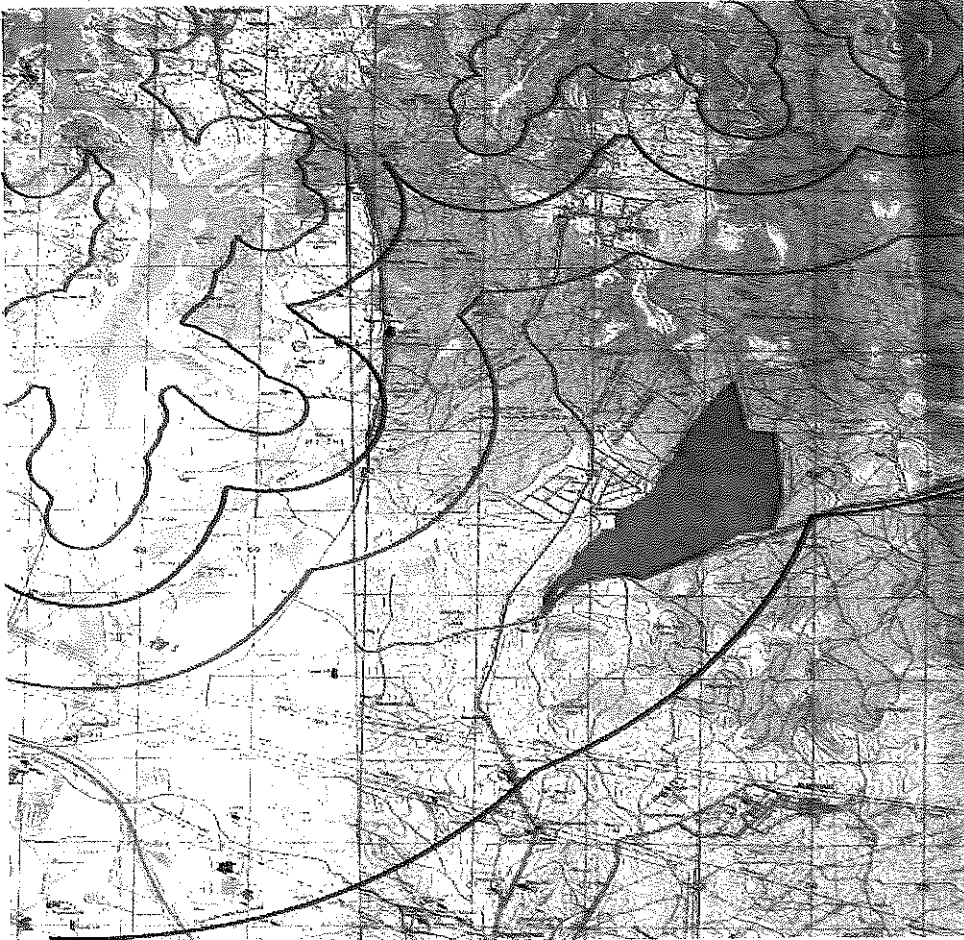
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I N T R O D U C T I O N

The wide diversity of unusual habitats, variety of soils, position between the vastly different floras of two continents, (Europe and Asia), varying climate due to its position between the two seas (from the damp cool climate of the Black Sea coast to the sea of Marmara) have allowed the development of an astonishingly rich flora in Istanbul. The province covers just 5110 km² and its flora comprises appr. 2500 vascular plant taxa. Of particular importance to nature conservation are the province's rare species. Over 270 species that are regarded as nationally rare and threatened occur within the province. Of these some 40 species are more abundant here than anywhere else on earth (1).

Istanbul is Europe's fastest growing city, with the population increasing by up to half a million inhabitants annually, its population is 13 million.

The effect of such growth on the province's rural environment are immense. Much of the province of Istanbul is of importance to nature conservation, with four sites wholly or partly in a critical conservation status including Omerli [A2(A)] Istanbul. Already, areas of heathland and wetland have been irreparably damaged. Conservationists at the Istanbul based Society for the Protection of Nature (DHKD) are particularly worried by two developments: a new Formula 1 racetrack and plans for a third bridge across the Bosphorus. In one of Istanbul's major water catchment areas and in one of city's seven Important Plants Areas; a new formula 1 racetrack was constructed for the providing the best scientific information DHKD and ISTE (Herbarium of the Faculty of Pharmacy, Istanbul University) made a project, based on detailed field study, site visited several times (each weekend) by MSc. Mustafa Keskin and collected over 1000 specimens. After identification of the specimens it was found that 9 taxa are new for Istanbul flora and the presence of 1 taxon has been confirmed (8-10). At least 3 Bern-listed species, 9 endemic taxa and about 460 taxa occur within area appr. 1000 ha. and shown in Map1.



Map 1: Formula 1 area topographical map (darker area is Formula 1 racing park)

The name of the added taxa and their collected localities are given below:

A-The Presence of *Stellaria nemorum* L. subsp. *nemorum* in Turkey:

This species is recorded nr.A9 Artvin (Grossheim 3: map 183) in Flora Turkey vol.2:70, but not seen by Coode (8).

A2(A) Istanbul: Tuzla, Akfırat Beldesi, Formula 1 area, 13.vi.2005, 93 m, N 40° 45.8' 31.8", E 29° 23' 39.6", M.Keskin 4187, ISTE 83469 !

General distribution: Most of Europe, except the extreme North and South.

Its presence of Turkey is confirmed with the cited specimen.



Photo 1. Photo of *Stellaria nemorum* subsp. *nemorum*

B-The New Records for Istanbul Flora:

ISOETACEAE

***Isoetes duriei* Bory (Fl. Turk.1 : p.38)**

A2(A) Istanbul: Tuzla, Akfırat beldesi, Formula 1 area, near lake, 13.vi.2005, 121 m, N 40° 57' 44.2'', E 29° 25' 31.9'', M.Keskin 4167, ISTE 83468 !

Distribution in Turkey: A8 Rize

General distribution: W. Mediterranean region

CARYOPHYLLACEAE

***Dianthus pubescens* Sibth. & Sm. (Fl. Turk.2 : p.126)**

A2(A) Istanbul: Tuzla, Akfırat beldesi, Formula 1 area, 19.v.2005, 155 m, N 40° 57' 07.8'', E 29° 25' 09.5'', M.Keskin 3900, ISTE 83469 !

Distribution in Turkey: B1 Balıkesir, İzmir, İ. Lesvos

General distribution: S. Balkans

COMPOSITAE

***Hiearicum labillardierei* Arvet-Touvet (Fl. Turk.5 : p.722)**

A2(A) Istanbul: Tuzla, Akfırat beldesi, Formula 1 area, 28.v.2005, 155 m, N 40° 57' 07.8'', E 29° 25' 09.5'', M.Keskin 4045, ISTE 83470 !

Distribution in Turkey: A3 Ankara, A5 Kastamonu, Amasya, Corum, A7 Gumushane A8 Rize, B1 Balıkesir

General distribution: Lebanon

***Crepis dioscoroides* L. (Fl. Turk.5 : p.837)**

A2(A) Istanbul: Tuzla, Akfırat beldesi, Formula 1 area, 04.vi.2005, 128 m, N 40° 56' 59.1'', E 29° 23' 59'', M.Keskin 4153, ISTE 83471 !

Distribution in Turkey: C1 Mugla, C2 Antalya, C3 Antalya

General distribution: Greece, Aegean islands

GENTIANACEAE

***Centaurium tenuiflorum* (Hoffmans. & Link) Fritsch subsp.*tenuiflorum* (Fl. Turk.6 : p.181)**

A2(A) Istanbul: Tuzla, Akfırat beldesi, Formula 1 area, 19.vi.2005, 124 m, N 40° 56' 57.3'', E 29° 24' 54.5'', M.Keskin 4236, ISTE 83473 !

Distribution in Turkey: A1(E) Çanakkale, A1(A) Çanakkale, B1 Balıkesir, Izmir, C1 Izmir, C2 Denizli, Mugla, C3 Isparta, Konya, Antalya, Is.Samos, Rodhos, Gaidaros

General distribution: N.W. Africa, W. & S. Europe, Cyprus, Crimea, Caucasia, Iran, Iraq, Syria, Palaestine, Lebanon

LABIATAE

***Prunella orientalis* Bornm. (Fl. Turk.7 : p.296)**

A2(A) Istanbul: Tuzla, Akfırat beldesi, Formula 1 area, 28.v.2005, 120 m, N 40° 56' 49.9'', E 29° 24' 03.7'', M.Keskin 4056, ISTE 83472 !

Distribution in Turkey: B6 Kahramanmaraş, Adana B8 Siirt, C3 Antalya, Isparta C5 Icel, Adana, C6 Adana, Hatay, Kahramanmaraş

General distribution: Latakia, Lebanon, N. Iraq

JUNCACEAE

***Juncus rechingeri* Snog. (Fl. Turk.9 : p.15)**

A2(A) Istanbul: Tuzla, Akfırat beldesi, Formula 1 area, 04.vi.2005, 178 m, N 40° 50' 03.7'', E 29° 25' 44.9'', M.Keskin 4160, ISTE 83474 !

Distribution in Turkey: A4 Ankara, B6 Sivas, B7 Malatya, B9 Bitlis

General distribution: W., C. & S. Iran, Afghanistan, C. Asia

***Juncus turkestanicus* V.Krecz. & Gontsch. (Fl. Turk.9 : p.18)**

A2(A) Istanbul: Tuzla, Akfırat beldesi, Formula 1 area, 04.vi.2005, 178 m, N 40° 50' 03.7'', E 29° 25' 44.9'', M.Keskin 4161, ISTE 83475 !

Distribution in Turkey: A8 Artvin, C2 Mugla, Antalya, C3 Antalya, C5 Icel, C9 Hakkari

General distribution: Azerbaijan, N.W., N., W. & C. Iran, Afghanistan, Pakistan, C. & E. Asia

Juncus is predominant genus in the flora of Formula 1 area (Omerli/Istanbul) representing 10 species which are *J. striatus*, *J. hybridus*, *J. rechingeri*, *J. capitatus*, *J. pygmaeus*, *J. conglomeratus*, *J. turkestanicus*, *J. minutulus*, *J. thomasi* and *J. bulbosus*.

ORCHIDACEAE

***Serapias politisii* Renz (Fl. Turk.11 : p.296)**

A2(A) Istanbul: Tuzla, Akfırat beldesi, Formula 1 area, 04.vi.2005, , 124 m, N 40° 56' 57.3'', E 29° 24' 54.5'', M.Keskin 4143, ISTE 83476 !

It is dominant species in wet meadows of Formula 1 area.

Distribution in Turkey: B1 Izmir, C1 Aydın, C2 Mugla, C3 Antalya

General distribution: Italy, Montenegro, Albania, Greece

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