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RESEARCH PAPER

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# A Critical Checklist of Turkish Freshwater Fishes (2026)

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## Abstract

Türkiye, a key biogeographic bridge between Europe and Asia, has experienced major advances in taxonomic knowledge of its freshwater fishes, but existing faunal lists lag behind recent revisions. We present a revised checklist that compiles and standardises records using the latest IUCN assessments, published descriptions and revisions (to 2026), museum collections and expert-verified data. Unestablished introductions and strictly marine visitors were excluded. We recognise 390 freshwater fish species in 37 families, including 367 native species and 23 established non-native taxa, of which 202 natives (55%) are endemic to Türkiye. Species richness is concentrated in Leuciscidae (113 species), Nemacheilidae (59) and Cyprinidae (53), which together comprise 61.5% of the native fauna. At the catchment scale, total richness ranges from 11 species in the Van Basin to 65 in the Sakarya drainage, endemic richness was highest in Antalya (28 species) and non-native richness in the Sakarya drainage (10 species). The checklist provides updated nomenclature, distributions within Türkiye and standardised common names, establishing an agreed taxonomic baseline for biodiversity assessment, fisheries and conservation management.

## Introduction

Türkiye harbours a highly rich freshwater fish fauna as a result of its complex topography, diverse climatic zones, and wide range of endorheic basins and independent river systems (Kaya, 2019; Giannetto & İnnal, 2021). The country lies within three major biodiversity hotspots—the Caucasus, Iran–Anatolia, and the Mediterranean Basin—which contributes to its ecological significance and high faunal and floral richness (Myers et al., 2000). As a result, Türkiye is characterised by high levels of endemism and faunal diversity, particularly in freshwater environments, driven by the variety of hydrological systems, numerous isolated basins and heterogeneous climatic and geological conditions (Giannetto & İnnal, 2021). This biogeographical diversity has attracted ichthyologists for decades, who have been documenting and cataloguing its ichthyofauna (Kaya et al., 2021, 2025).

Until the early 2000s, the freshwater fish fauna of Türkiye remained relatively understudied (Geldiay & Balık, 1999; Kuru et al., 2004). Since then, an increased volume of taxonomic research has clarified the status and distribution of many groups, particularly following the publication of the first large-scale DNA barcode library for Mediterranean freshwater fish by Geiger et al. (2014). This study revealed numerous candidate and cryptic species in the Levant, leading to more comprehensive integrative revisions (Yoğurtçuoğlu et al., 2020, 2022; Bektaş et al., 2020; Freyhof et al., 2018, 2019, 2022). Over this period, at least 136 species have been newly described (Kaya et al., 2025), several others have been recorded for the first time in Türkiye (e.g. Ünlü et al., 2011; Bayçelebi et al., 2015; Kaya, 2020a; Kaya et al., 2020a).

Kuru (2004) provided the first comprehensive synthesis of Türkiye's freshwater fishes, reporting 236 taxa from 26 families. However, subsequent checklists have revised these numbers: Fricke et al. (2007) listed 261 taxa while Ekmekçi et al. (2013) reported 310. Kuru et al. (2014) then raised the total to 371, representing a 57% increase on the number reported by Kuru (2004). Çiçek et al. (2015, 2018) then increased the total to 386 and 409 species respectively, primarily due to newly described taxa, range extensions, and taxonomic changes. Later compilations suggested totals of 384 (Çiçek et al., 2020) and 427 species (Çiçek et al., 2023), although these lists included several species not currently confirmed from Türkiye (e.g. *Oxynoemacheilus bureschi, O. chomanicus, O. insignis*). At the same time, new species continue to be described, whereas others have been rendered invalid through synonymization. This rapid turnover in names and species counts has created uncertainty about the true composition of the fauna, making it difficult to compare studies, track trends, or set conservation priorities.

Given this ongoing taxonomic change and the lack of a critically evaluated, standardized fauna, there is a clear need for a reliable national checklist that reconciles competing treatments and applies explicit inclusion rules. Here we present a critical checklist of the freshwater fishes of Türkiye for 2026. We integrate recent taxonomic revisions, museum and literature records, and expert opinion to produce an agreed list of native and established non-native taxa, with updated nomenclature, distribution, and common names. This checklist is intended to provide an agreed taxonomic reference for future research, monitoring, and management of Türkiye's freshwater fish diversity.

## Material and Method

### *Species Compilation and Listing Procedure*

We compiled an updated checklist of the freshwater fishes of Türkiye by integrating recent taxonomic revisions with a critical re-evaluation of earlier national and regional checklists. As a baseline, we used the species list and taxonomic concepts adopted during the IUCN Red List assessments of West Asian freshwater fishes, including all taxa occurring in the Anatolian part of Türkiye. This baseline was subsequently updated by incorporating published taxonomic changes, new species descriptions, and new records appearing after the assessment period and up to the end of 2025. For the Thracian part of Türkiye, we additionally screened recent ichthyological surveys and taxonomic papers focusing on the transboundary Meriç drainage ("Maritsa" is the Bulgarian and "Evros" is the Greek name) and the coastal streams along the southwest of the Marmara and Black Sea to ensure coverage of all currently recognised freshwater taxa.

All candidate records were critically examined in relation to their original sources, including species descriptions, taxonomic revisions, and field surveys. The initial list was refined by regional experts familiar with the ichthyofauna of Türkiye and was revised iteratively through internal and external peer review. Synonymies, resurrected taxa, and recently described species were treated in line with Freyhof et al. (2025a) and other contemporary systematic works.

The species selection was based on the ecological and biogeographic framework outlined by Freyhof et al. (2025a). The following species were included: (i) primary-division freshwater families, whose members are physiologically intolerant of seawater and complete their life cycle in freshwater (e.g. Cypriniformes);

(ii) secondary-division families of marine origin, which now mainly or entirely occur in freshwater, including euryhaline taxa capable of exploiting brackish habitats;

(iii) diadromous species (anadromous and catadromous), which naturally use freshwater at some point in their life cycle. In addition, we retained sporadic euryhaline species from predominantly marine families when they are known to occur regularly beyond estuaries in inland freshwater within Türkiye.

Non-native species were included only when their successful establishment in freshwaters was supported by evidence (e.g., repeated records over multiple years and/or confirmed reproduction). Introduced taxa represented solely by occasional, non-reproducing occurrences, stocking experiments without persistence, or unconfirmed

reports were not considered part of the established freshwater fish fauna and were therefore excluded.

We excluded strictly marine species and all records confined to coastal or estuarine waters. Marine fish recorded only occasionally in inland waters whose presence is considered accidental, vagrant, or otherwise unpredictable were also omitted from the checklist. This filtering process ensured that the final list represents the established freshwater and freshwater-associated ichthyofauna of Türkiye, rather than transient marine visitors.

The families were arranged in accordance with the taxonomic hierarchy established by Van der Laan et al. (2017). Higher-level (supra-familial) classification was not standardised or discussed, meaning that orders or higher ranks are not included in the checklist. Within each family, species are listed in strict alphabetical order. Common names were primarily extracted from FishBase if they accurately reflected the species' distribution range and/or diagnostic morphological characteristics. Where existing common names were misleading, inconsistent, or absent, we proposed new names to better reflect the identity and distinctiveness of the species.

***Species Richness and Endemism Metrics***

In defining the taxonomic composition of the Turkish freshwater fish fauna, we quantified species richness and endemism at national and family levels. To compile for the full checklist, we first calculated the total number of freshwater fish species recorded in Türkiye (including all native and successfully established non-native taxa, as defined above), as well as the total number of endemic species. Endemism was strictly defined at the political country scale: a species was considered endemic to Türkiye if its entire known natural distribution was within Turkish national borders. Species whose native ranges extend beyond Türkiye into neighbouring countries were treated as non-endemic, even when the majority of their distribution falls within Turkish territory. For each family represented in the checklist, we then computed (i) the total number of species occurring in Türkiye and (ii) the number of endemic species belonging to that family, according to the above definition. The family-level endemism rate was expressed as a percentage and calculated as follows: the number of endemic species in the family/total number of species in the family in Türkiye x 100. Similarly, catchment-level species richness was also calculated by a partitioning among endemic, native, non-native and cross-basin introduced species per catchment.

## Results

The freshwater fishes of Türkiye are reviewed, and 390 species from 37 families are recognized. Of these, 367 are native and 23 are non-native established species. Three of the non-native taxa (*Oncorhynchus mykiss, Hypophthalmichthys molitrix,* and *H. nobilis*) lack documented natural reproduction in the wild but are retained in the checklist because they are repeatedly recorded from multiple localities and years, consistent with our inclusion criteria. At least five additional species (*Sterletus baerii, Rubricatochromis letourneuxi, Pangasius sanitwongsei, Pygocentrus nattereri,* and *Ctenopharyngodon idella*) have been recorded only sporadically from Turkish freshwaters with no evidence of establishment and were therefore excluded. Among the native fauna, 202 species (55%) are endemic to Türkiye.

Family-level patterns of richness and endemism are summarized in Figure 1. Leuciscidae (113 species), Nemacheilidae (59), and Cyprinidae (53) are by far the most speciose families and together account for 61.5% of all native species (30%, 16%, and 14%, respectively). Other families with noteworthy numbers of species are Cobitidae (27 species), Salmonidae (24 species), Aphaniidae (21 species), and Gobionidae (15 species).

The highest family-level endemism rate is found in Aphaniidae with 90.5% of its species restricted to Türkiye, followed by Salmonidae (87%), Cobitidae (74.1%) and Nemacheilidae (72.9%) (Figure 1). Of the 370 native species, 364 (98.4%) have a recent IUCN Red List category. Six species are listed as Extinct (EX): *Anatolichthys splendens, Cobitis kellei, Alburnus adanensis, Alburnus akili, Pseudophoxinus handlirschi,* and *Acanthobrama centisquama*; all but *A. centisquama* are endemic, and the historical range of *A. centisquama* was largely in Türkiye. Nearly 38% of all assessed native species are threatened (CR+EN+VU). Among assessed endemic species, ca. 58% are threatened.

The catchment-level species richness ranged from 11 species in the Van Basin to 65 species in the Sakarya drainage (Figure 2). The most species-rich systems were the Sakarya (65 spp. [species]), Marmara (64 spp.), Euphrates (63 spp.), Kızılırmak (57 spp.) and Antalya and Western Black Sea (both 53 spp.), followed by the Tigris (51 spp.). Endemic richness was highest in Antalya (28 endemic spp.), Konya and Ceyhan (25 spp. each). Cross-basin translocations were particularly numerous in Antalya, the Büyük Menderes and the Ceyhan drainages (eight to ten species), while non-native richness peaked in the Sakarya drainage (ten species) and was also high in the Euphrates and the Kızılırmak river drainages (four to eight species). This indicates basins where human-mediated introductions have most significantly impacted the local fauna.

## CHECKLIST

**FAMILY PETROMYZONTIDAE BONAPARTE, 1831**

***Lampetra lanceolata* (Kux & Steiner, 1972)** - **[EN]**

**Common names.** Turkish brook lamprey / Dere dokuz gözlüsü

**Distribution.** Endemic. İyidere, Baltacı, and Kara streams in northeast Anatolia, Black Sea drainages, also in the upper Büyük Melen River, and streams draining into Lake Sapanca. It has not been recorded in Sapanca Lake Basin, despite regular sampling, possibly extinct there.

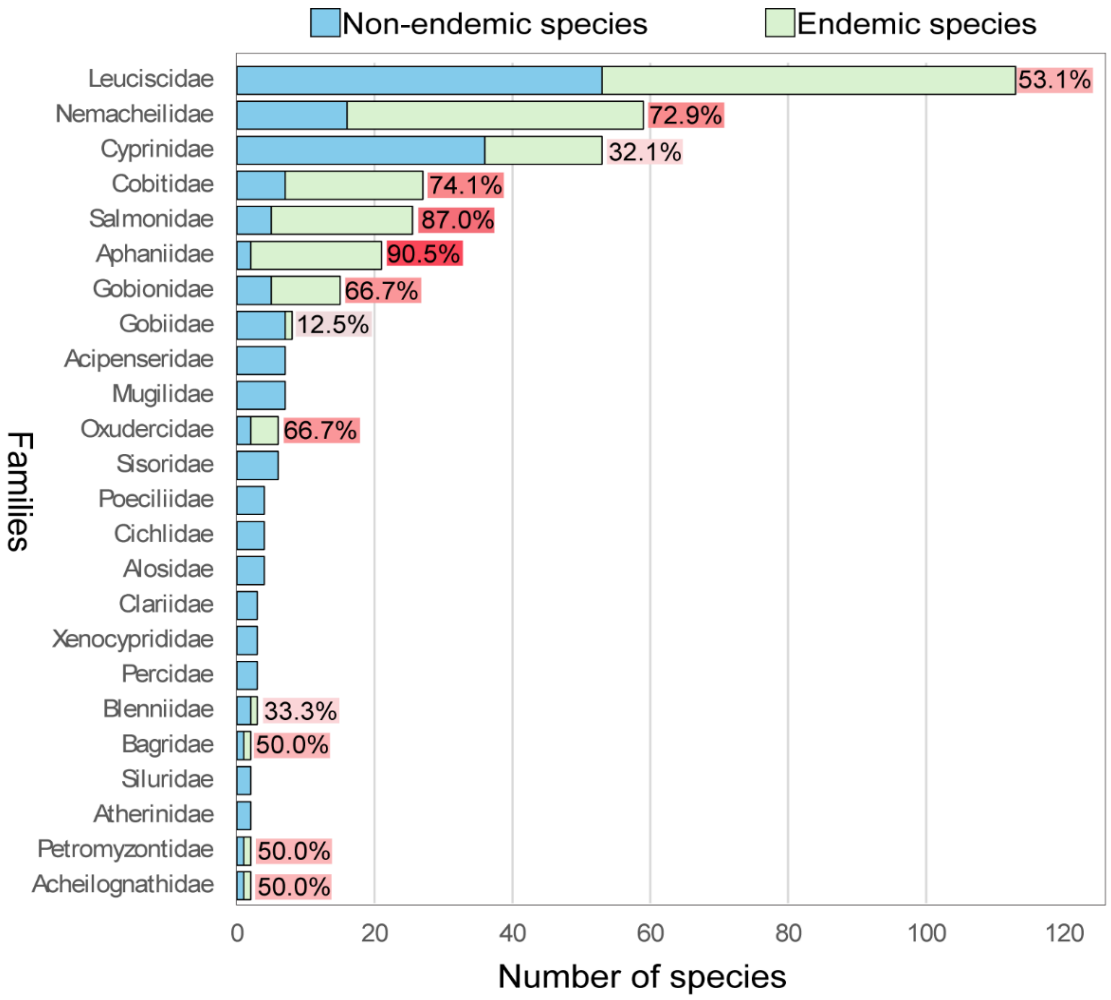


**Figure 1.** Family-level patterns of richness and endemism in Turkish freshwaters.

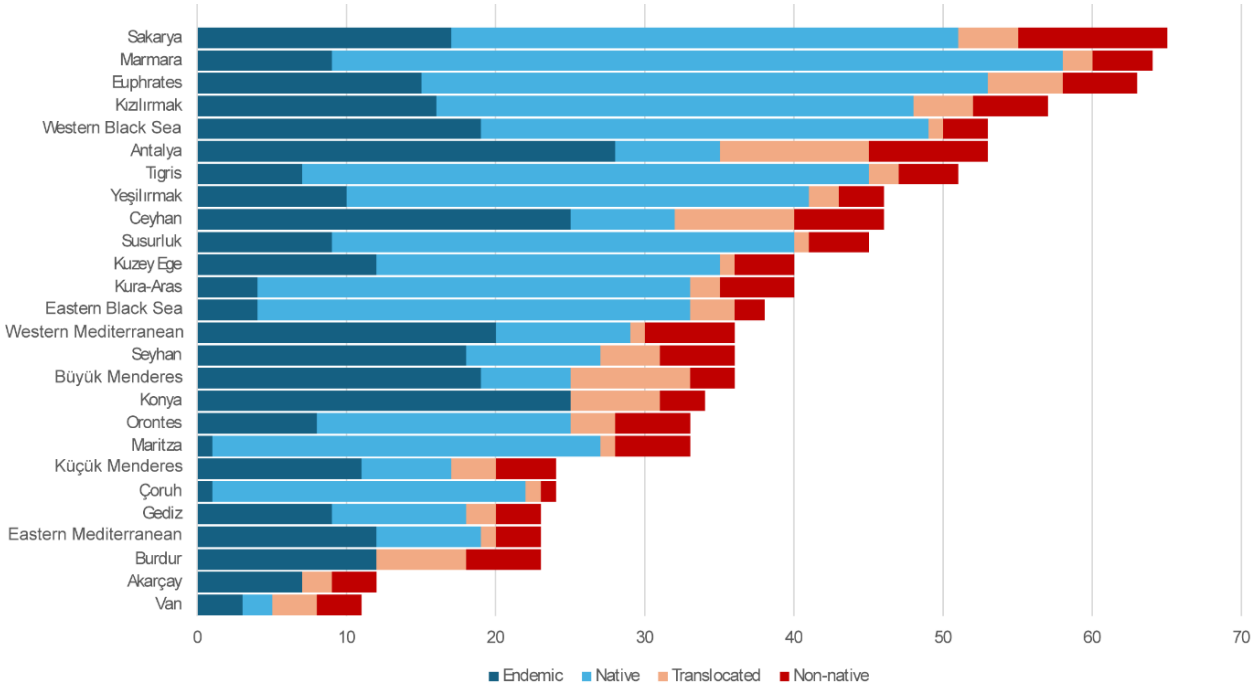


**Figure 2.** Catchment-level freshwater fish species richness partitioned into endemic, native, translocated and non-native species.

***Petromyzon marinus* Linnaeus, 1758** - **[LC]**

**Common names.** Sea lamprey / Deniz dokuz gözlüsü

**Distribution.** Occurs erratically in Türkiye's Mediterranean rivers. Also in marine and brackish water.

**FAMILY ACIPENSERIDAE BONAPARTE, 1831**

***Sterletus gueldenstaedtii* (Brandt & Ratzeburg, 1833)** - **[CR]**

**Common names.** Russian Sturgeon / Karaca mersini

**Distribution.** Black Sea Basin. Also in marine and brackish water.

***Sterletus huso* (Linnaeus, 1758)** - **[CR]**

**Common names.** Beluga / Mersin morinası

**Distribution.** Turkish Aegean, Marmara, and Black Sea waters harbor. Also in marine and brackish water.

***Sterletus nudiventris* (Lovetsky, 1828)** - **[CR]**

**Common names.** Ship sturgeon / Şip

**Distribution.** Black Sea Basin. Also in marine and brackish water.

**Remarks.** There is not any record about the occurrence of the species in the last decades. Probably extirpated.

***Sterletus persicus* (Borodin, 1897)** - **[CR]**

**Common names.** Persian sturgeon / Hazar Mersini

**Distribution.** Southeastern Black Sea Basin. Also in marine and brackish water.

**Remarks.** *Sterletus colchicus* has been proposed as a valid species for the Black Sea population, but molecular and other data do not support this hypothesis. Freyhof et al. (2025a) treat *S. colchicus* as a synonym of *S. persicus* and highlights the lack of evidence supporting the distinction between *S. persicus* and *S. gueldenstaedtii*. While these two species are consistently treated as morphologically distinct, especially in the Caspian Basin, further research is needed to resolve this taxonomic issue (Freyhof et al., 2025a).

***Sterletus stellatus* (Pallas, 1771)** - **[CR]**

**Common names.** Stellate sturgeon / Uzunburun mersin

**Distribution.** Black Sea Basin. Also in marine and brackish water.

***Acipenser sturio* Linnaeus, 1758** - **[CR]**

**Common names.** Atlantic sturgeon / Kolan

**Distribution.** Black Sea, Marmara, and Aegean Sea basins. Also in marine and brackish water.

**Remarks.** There has been no record of the species' occurrence for years. Seems extirpated.

**FAMILY ANGUILLIDAE RAFINESQUE, 1810**

***Anguilla anguilla* (Linnaeus, 1758)** - **[CR]**

**Common names.** European eel / Avrupa yılan balığı

**Distribution.** All coasts of Turkish seas, as well as lakes connected to coastal water. Also in marine and brackish water.

**EHIRAVIDAE DERANIYAGALA, 1929**

***Clupeonella cultriventris* (Nordmann, 1840)** - **[LC]**

**Common names.** Common tyulka / Tülka

**Distribution.** Marmara and Black Sea basins. Also, in lakes Sapanca and Apolyont. Also in marine and brackish water.

**Remarks.** *Clupeonella muhlisi* from Lake Apolyont in Western Anatolia and Caspian *C. caspia* were classified as distinct species. No morphological or molecular characters were found to differentiate these populations from *C. cultriventris* (Freyhof et al., 2025a). Consequently, they are regarded as synonyms.

**FAMILY ALOSIDAE SVETOVIDOV, 1952**

***Alosa agone* (Scopoli, 1786)** - **[NE]**

**Common names.** Twaite shad / Dişli tirsi

**Distribution.** All coasts of Turkish seas. Also in marine and brackish water.

***Alosa immaculata* Bennett, 1835** - **[LC]**

**Common names.** Large Black Sea shad / Karadeniz tirsisi

**Distribution.** Black Sea watersheds. The presence in the Marmara Sea Basin is questionable. Also in marine and brackish water.

***Alosa maeotica* (Grimm, 1901)** - **[LC]**

**Common names.** Azov shad / Azak tirsisi

**Distribution.** Black Sea watersheds. Freshwater, brackish and marine species.

***Alosa tanaica* (Grimm, 1901)** - **[LC]**

**Common names.** Little Black Sea shad / Küçük Karadeniz tirsisi

**Distribution.** Black and Marmara Sea watersheds. Also in marine and brackish water.

**FAMILY CYPRINIDAE RAFINESQUE, 1815**

***Arabibarbus grypus* (Heckel, 1843)** - **[VU]**

**Common names.** Shabout / Şabut or Şabot

**Distribution.** Tigris and Euphrates River drainages. Extirpated from the Qweiq drainage.

***Barbus anatolicus* Turan, Kaya, Geiger & Freyhof, 2018** - **[LC]**

**Common names.** Anatolian barbel / Anadolu bıyıklı balığı

**Distribution.** Endemic. Kızılırmak and Yeşilırmak River drainages.

***Barbus cyclolepis* Heckel, 1837** - **[LC]**

**Common names.** Maritsa barbel / Meriç bıyıklı balığı

**Distribution.** Meriç and Marmara drainages in the Thrace Region, also in Durusu drainage.

***Barbus cyri* De Filippi, 1865** - **[LC]**

**Common names.** Kura barbel / Kura bıyıklı balığı

**Distribution.** Widespread in the Kura and Aras River systems in northeastern Anatolia, also recorded in Turkish Urmia drainages (Kaya, 2020a).

***Barbus escherichii* Steindachner, 1897** - **[LC]**

**Common names.** Sakarya barbel / Sakarya bıyıklı balığı

**Distribution.** Endemic. Sakarya River drainage in the northern Anatolian Black Sea watersheds.

***Barbus ida* Güçlü, Kalaycı, Özuluğ, Küçük & Turan, 2021** - **[LC]**

**Common names.** İda barbel / Kazdağı bıyıklı balığı

**Distribution.** Endemic. Gönen and Biga streams, southern Marmara Sea drainages.

***Barbus lacerta* Heckel, 1843** - **[LC]**

**Common names.** Lizard barbel / Mezopotamya bıyıklı balığı

**Distribution.** Tigris and Euphrates River drainages, as well as in the Lake Van basin. Extirpated from the Qweiq drainage.

**Taxonomic notes.** *Barbus ercisianus*, was known from the Lake Van Basin, and *B. kosswigi,* described from the upper Great Zap are considered synonyms of this species
(Khaefi et al., 2017).

***Barbus niluferensis* Turan, Kottelat & Ekmekçi, 2008** - **[NT]**

**Common names.** Simav barbel / Simav bıyıklı balığı

**Distribution.** Endemic. Susurluk River drainage in the northwestern Anatolia Marmara Sea basin.

***Barbus pergamonensis* Karaman, 1971** - **[LC]**

**Common names.** Pergamon barbel / Bergama bıyıklı balığı

**Distribution.** Karamenderes River, south to Madra, Bakırçay, and Gediz rivers, Aegean Basin.

***Barbus rionicus* Kamensky, 1899** - **[LC]**

**Common names.** Colchic barbel / Çoruh bıyıklı balığı

**Distribution.** Çoruh River drainage the southwest Black Sea Basin.

***Barbus tauricus* Kessler, 1877** - **[LC]**

**Common names.** Crimean barbel / Karadeniz bıyıklı balığı

**Distribution.** All rivers in Anatolia flow into the Black Sea. Also, in southern tributaries of the Marmara Sea from Lake İznik west to Karamenderes. Also in brackish water.

**Taxonomic notes.** *Barbus oligolepis* is a synonym (Freyhof et al., 2025a)

***Barbus xanthos* Güçlü, Kalaycı, Küçük & Turan, 2020** - **[LC]**

**Common names.** Eşen barbel / Eşen bıyıklı balığı

**Distribution.** Endemic. The species recently was described from the Eşen, Dalaman, Tersakan, and Büyük Menderes rivers in southwestern Anatolia (Güçlü et al., 2020).

***Capoeta antalyensis* (Battalgil, 1944)** - **[VU]**

**Common names.** Pamphylian scraper / Antalya sirazı

**Distribution.** Endemic. The species found from Köprüçay and Aksu rivers and streams Boğa and Gündoğdu, all around Antalya, Mediterranean Sea watersheds in southwestern Anatolia (Kaya et al., 2019).

***Capoeta aydinensis* Turan, Küçük, Kaya, Güçlü & Bektaş, 2017** - **[LC]**

**Common names.** Carian scraper / Karya sirazı

**Distribution.** Endemic. Büyük Menderes River and the streams Tersakan, Dalaman and Namnam in southwestern Türkiye (Turan et al., 2017).

***Capoeta banarescui* Turan, Kottelat, Ekmekçi & İmamoğlu, 2006** - **[LC]**

**Common names.** Cholchic scraper / Çoruh sirazı

**Distribution.** The species is known from east of Yeşilırmak to the Çoruh River Black Sea watersheds in northern Anatolia (Kaya, 2019).

***Capoeta barroisi* Lortet, 1894** - **[EN]**

**Common names.** Orontes scraper / Benekli Asi sirazı

**Distribution.** Orontes River drainages, Mediterranean Sea watersheds in southern Anatolia.

***Capoeta bergamae* Karaman, 1969** - **[NT]**

**Common names.** Aegean scraper / Ege sirazı

**Distribution.** Endemic. Gediz River drainage and the Biga Peninsula.

***Capoeta caelestis* Schöter, Özuluğ & Freyhof, 2009** - **[LC]**

**Common names.** Taurus scraper / Toros sirazı

**Distribution.** Endemic. *Capoeta caelestis* inhabits coastal streams and rivers between Manavgat River in the west and Göksu River (Silifke-Mersin) in the east (Kaya et al., 2019, Küçük et al., 2020).

***Capoeta capoeta* (Güldenstädt, 1773)** - **[LC]**

**Common names.** Caucasian khramulya / Kafkas sirazı

**Distribution.** Kura and Aras River drainages in northeastern Türkiye.

***Capoeta damascina* (Valenciennes, 1842)** - **[LC]**

**Common names.** Levantine scraper / Şam sirazı

**Distribution.** Widespread in the Orontes, Seyhan, Ceyhan, and some parts of the Euphrates River drainages in southern Anatolia.

**Taxonomic notes.** *Capoeta umbla* is a synonym (Kaya et al., 2019, Freyhof et al., 2025a).

***Capoeta erhani* Turan, Kottelat & Ekmekçi, 2008** - **[LC]**

**Common names.** Cilician scraper / Benekli Akdeniz sirazı

**Distribution.** Endemic. Ceyhan and Seyhan River drainages in southern Anatolia. **Taxonomic notes.** *Capoeta turani,* described from Seyhan, is a synonym (Turan et al., 2022a).

***Capoeta kaput* Levin, Prokofiev & Roubenyan, 2019**-**[LC]**

**Common names.** Blue scraper / Mavi siraz

**Distribution.** Aras River drainage in northeastern Türkiye.

***Capoeta oguzelii* Elp, Osmanoğlu, Kadak & Turan, 2018** - **[CR]**

**Common names.** Ezine scraper / Ezine sirazı

**Distribution.** Endemic. Known only from the upper Ezine at Devrekani, a coastal stream in the southern Black Sea.

***Capoeta pestai* (Pietschmann, 1933)** - **[VU]**

**Common names.** Long-snout scraper / Eğirdir sirazı

**Distribution.** Endemic. Eğirdir and Beyşehir Lake drainages, and Melendiz Stream in Central Anatolia.

**Taxonomic notes.** *Capoeta mauricii* described from Lake Bayşehir is a synonym (Çiçek et al., 2021).

***Capoeta sieboldii* (Steindachner, 1864)** - **[LC]**

**Common names.** Nipple-lip scraper / Saçaklı siraz

**Distribution.** Çoruh, Kızılırmak, Yeşilırmak, and Sakarya River drainages. Also in some small coastal Black Sea drainages in northwestern Anatolia.

***Capoeta tinca* (Heckel, 1843)** - **[LC]**

**Common names.** Fourbarbel scraper / Marmara sirazı

**Distribution.** Endemic. Lakes İznik, Eber, and Akşehir basins and Susurluk (Marmara basin) east to Kızılırmak drainage.

**Remarks**. *Capoeta baliki* was described from Sakarya and Kızılırmak is a synonym (Çiçek et al., 2021).

***Capoeta trutta* (Heckel, 1843)** - **[LC]**

**Common names.** Spotted scraper / Benekli siraz

**Distribution.** Qweiq, Tigris, and Euphrates River drainages in southeastern Anatolia.

***Carasobarbus chantrei* (Sauvage, 1882)** - **[LC]**

**Common names.** Orontes himri / Asi himrisi

**Distribution.** Orontes River drainage in southeastern Anatolia.

***Carasobarbus kosswigi* (Ladiges, 1960)** - **[LC]**

**Common names.** Kiss-lip himri / Dudaklı himri

**Distribution.** Tigris and Euphrates River drainages in southeastern Anatolia.

***Carasobarbus luteus* (Heckel, 1843)** - **[LC]**

**Common names.** Mesopotamian himri / Sarı bizir

**Distribution.** Tigris, Euphrates, and Qweiq River drainages in southeastern Anatolia.

***Carassius auratus* (Linnaeus, 1758)** - **[Non-native]**

**Common names.** Goldfish / Kırmızı havuz balığı

**Distribution.** It has been introduced into many lakes, ponds, and reservoirs.

***Carassius carassius* (Linnaeus, 1758)** - **[Translocated]**

**Common names.** Crucian carp /Havuz balığı

**Distribution.** Locally in Lake Akgöl (lower Sakarya), Lake Durusu (Black Sea drainage), lower Susurluk drainages where it might be native, and Lake Çıldır (upper Aras drainage) where it may be non-native.

***Carassius gibelio* (Bloch, 1782)** - **[Non-native]**

**Common names.** Prussian carp / Gümüşi havuz balığı

**Distribution.** It is an introduced alien species known from Aegean, Mediterranean, and Black Sea watersheds, Tigris, Euphrates, Kura drainages, and some other freshwater and transitional waters. Also in brackish water.

***Carassius langsdorfii* Temminck & Schlegel, 1846** - **[Non-native]**

**Common names.** Ginbuna / Ginbuna

**Distribution.** The true distribution of this species is obscured by widespread hybridisation within the *C. auratus* complex, which includes *C. auratus* and *C. gibelio*, as well as common misidentifications.

***Cyprinion macrostomum* Heckel, 1843** - **[LC]**

**Common names.** Largemouth lotak / Beni balığı

**Distribution.** Tigris, Euphrates and Qweiq River basins.

**Remarks.** *Cyprinion macrostomum* is frequently reported to occur also in the Orontes River (e.g Fricke et al., 2007). Based on our many field work experiments in the area, we have no doubt this species does not occur in the Orontes Basin.

***Cyprinion kais* Heckel, 1843** - **[LC]**

**Common names.** Smallmouth lotak / Küçükağızlı beni balığı

**Distribution.** Tigris, Euphrates, and Qweiq River basins.

***Cyprinus carpio* Linnaeus, 1758** - **[LC, Translocated]**

**Common names.** Common carp / Sazan

**Distribution.** Originally from Black Sea watersheds but introduced elsewhere.

**Remarks.** Some Caspian and Black Sea populations might be native as they have selenderer and yellowish body form. Widely introduced in Türkiye.

***Garra caudomaculata* (Battalgil, 1942)** - **[LC]**

**Common names.** Orontes golden barbel / Altın saz balığı

**Distribution.** Orontes River drainages in southern Anatolia.

***Garra culiciphaga* (Pellegrin, 1927)** - **[LC]**

**Common names.** Red stripe barb / Kızıl saz balığı

**Distribution.** Endemic. Tarsus, Seyhan, and Ceyhan River drainages in southern Anatolia.

***Garra kemali* (Hanko, 1925)** - **[VU]**

**Common names.** Tuz golden barb / Ereğli saz balığı

**Distribution.** Endemic. Ereğli marshes and Lake Meyil in Lake Tuz Basin (Gaygusuz et al., 2009). Lake Beyşehir Basin and Hirfanli Reservoir (Kızılırmak River) (Yoğurtçuoğlu et al,. 2018).

***Garra klatti* (Kosswig, 1950)** - **[VU]**

**Common names.** Anatolian golden barb / Anadolu saz balığı

**Distribution.** Endemic. Lakes Işıklı, Eğirdir, Gölcük, and upper Köprüçay River basins (Küçük & İkiz, 2004).

**Remarks.** *Hemigrammocapoeta menderesensis* is a synonym.

***Garra orontesi* Bayçelebi, Kaya, Turan & Freyhof, 2021** - **[LC]**

**Common names.** Orontes garra / Asi yağlı balığı

**Distribution.** Orontes River, southern Anatolia.

***Garra rezai* Mousavi-Sabet, Eagderi, Saemi-Komsari, Kaya & Freyhof, 2022** - **[LC]**

**Common names.** Tigris garra / Dicle yağlı balığı

**Distribution.** Stream Kaynarca (Murat drainage) in Euphrates, and Yanarsu, Botan, Menfez, Hezil, and Batman drainages, as well as from Aktoprak in the upper Tigris River.

***Garra rufa* (Heckel, 1843)** - **[LC]**

**Common names.** Doctor fish; Red garra / Doktor balığı

**Distribution.** Tigris and Euphrates River drainages, extirpated from the Qweiq drainage.

***Garra turcica* Karaman, 1971** - **[LC] [Translocated]**

**Common names.** Cilician garra **/** Kilikya yağlı balığı

**Distribution.** Endemic. Seyhan, Ceyhan, and Göksu River drainages, and small rivers south to Arsuz. Translocated to Ilıca Stream and Karpuz Creek (Antalya) (Güçlü et al., 2025a; Güçlü et al., 2025b).

***Garra variabilis* (Heckel, 1843)** - **[LC]**

**Common names.** Small-mouth garra **/** Yapışkan balık

**Distribution.** Tigris, Euphrates, and Qweiq River drainages.

***Luciobarbus capito* (Güldenstaedt, 1773)** - **[LC]**

**Common names.** Bulatmai barbel / Bulatmai bıyıklı balığı

**Distribution.** Aras River drainage, northeast Türkiye. Also in brackish water.

***Luciobarbus esocinus* Heckel, 1843** - **[VU]**

**Common names.** Pike barbel / Fırat turnası; Cero

**Distribution.** Euphrates and Tigris River drainages. Extirpated from the Qweiq drainage.

***Luciobarbus graecus* (Steindachner, 1895)** - **[LC]**

**Common names.** Greek barbel **/** Yunan bıyıklı balığı

**Distribution.** Bakacak on the Biga Peninsula, west of Çanakkale and south of the Büyük Menderes River.

***Luciobarbus mursa* (Güldenstaedt, 1773)** - **[VU]**

**Common names.** Mursa / Murzu

**Distribution.** Kura and Aras River drainages, northeast Anatolia.

***Luciobarbus pectoralis* (Heckel, 1843)** - **[LC]**

**Common names.** Laventina barbel / Kilikya bıyıklı balığı

**Distribution.** Göksu east to Orontes River drainage.

***Luciobarbus subquincunciatus* (Günther, 1868)** - **[CR]**

**Common names.** Leopard barbel / Leopar sazanı; Komando balığı

**Distribution.** Tigris and Euphrates River drainages.

***Luciobarbus schejch* Heckel, 1843** - **[LC]**

**Common names.** Yellowfin barbel / Maya balığı

**Distribution.** Tigris and Euphrates River drainages. Extirpated from the Qweiq drainage.

**Taxonomic notes.** *Luciobarbus kersin, L. xanthopterus,* and *L. barbulus* synonyms of this species (Freyhof et al., 2025b).

**FAMILY ACHEILOGNATHIDAE BLEEKER, 1863**

***Rhodeus amarus* (Bloch, 1782)** - **[LC]**

**Common names.** European bitterling / Acıbalık

**Distribution.** Marmara Sea Basin, as well as in the south and southwest Black Sea coast of Türkiye. It was also recorded in the Aras River in Iğdır, probably an introduced population (Kaya et al., 2020a).

***Rhodeus tugbae* Kalaycı, Kurtul, Bayçelebi, Kaya & Turan, 2025** - **[NE]**

**Common names.** Aegean bitterling / Ege Acıbalığı

**Distribution.** Endemic. Gediz, Büyük Menderes, Tahtalı, and Bakır rivers on the Turkish Aegean Sea coast.

**FAMILY XENOCYPRIDIDAE GÜNTHER, 1868**

***Hypophthalmichthys molitrix* (Valenciennes 1844) - [Non-native]**

**Common names.** Silver carp / Asya sazanı

**Distribution.** Meriç River in northwest Türkiye. It is also observed in Keban Dam (Euphrates drainage).

***Hypophthalmichthys nobilis* (Richardson 1845) - [Non-native]**

**Common names.** Bighead carp / Kocabaş sazan

**Distribution.** Meriç River in northwest Türkiye.

**FAMILY GOBIONIDAE BLEEKER, 1863**

***Gobio artvinicus* Turan, Japoshvili, Aksu & Bektaş, 2016** - **[LC]**

**Common names.** Colchic gudgeon / Çoruh derekayası

**Distribution.** The species was known only from the Çoruh River drainages, where it was described. However, a potentially introduced population of this species was recorded in a drainage of the Aras River in Türkiye (Kaya et al., 2020a).

***Gobio baliki* Turan, Kaya, Bayçelebi, Aksu, Bektaş, 2017** - **[VU]**

**Common names.** Melen gudgeon / Melen derekayası

**Distribution.** Endemic. Büyük Melen River drainage in the southern Black Sea.

***Gobio bulgaricus* Drensky, 1926** - **[LC]**

**Common names.** Meriç gudgeon / Meriç derekayası

**Distribution.** Northern Marmara Basin and Ergene River Aegean Sea watersheds in northwestern Türkiye.

***Gobio fahrettini* Turan, Kaya, Bayçelebi, Aksu, Bektaş, 2018** - **[EN]**

**Common names.** Ilgın gudgeon / Ilgın derekayası

**Distribution.** Endemic. Lake Ilgın tributaries in Central Anatolia.

***Gobio gymnostethus* Ladiges, 1960** - **[CR]**

**Common names.** Cappadocian gudgeon / Kapadokya derekayası

**Distribution.** Endemic. Melendiz River, southeastern Tuz Lake Basin in Central Anatolia.

***Gobio hettitorum* Ladiges, 1960** - **[VU]**

**Common names.** Taurus gudgeon / Larende derekayası

**Distribution.** Endemic. Yeşildere, Deliçay, Gödet, and Ayrancı Stream drainages (Karaman), and Ereğli marshes.

***Gobio insuyanus* Ladiges, 1960** - **[CR]**

**Common names.** Cihanbeyli gudgeon / Cihanbeyli derekayası

**Distribution.** Endemic. İnsuyu (Cihanbeyli) drainage, western Tuz Lake Basin in Central Anatolia.

***Gobio intermedius* Battalgil, 1944** - **[EN]**

**Common names.** Eber gudgeon / Eber derekayası

**Distribution.** Endemic. Akşehir and Eber Lake basins in Central Anatolia.

***Gobio kizilirmakensis* Turan, Japoshvili, Aksu & Bektaş, 2016** - **[EN]**

**Common names.** Filyos gudgeon **/** Filyos derekayası

**Distribution.** Endemic. Upper reaches of Filyos River drainages in southwestern Black Sea (Yoğurtçuoğlu et al., 2020).

***Gobio kovatschevi* Chichkoff, 1937**- **[LC]**

**Common names.** Thracian gudgeon / Trakya derekayası

**Distribution.** Istranca, Bakacak, and Karamenderes streams in Thrace Region, as well as in the rivers in Biga Peninsula and outflow of Lake Abant, northwestern Türkiye.

***Gobio maeandricus* Naseka, Erk'akan & Küçük, 2006 - [EN]**

**Common names.** Işıklı gudgeon / Işıklı derekayası

**Distribution.** Endemic. Işıklı Lake Basin in West Anatolia.

***Gobio microlepidotus* Battalgil, 1942 - [VU]**

**Common names.** Beyşehir gudgeon / Yağlıca; Beyşehir derekayası

**Distribution.** Endemic. The species was known from Lake Beyşehir Basin in Central Anatolia. Recently, it has been recorded from stream Limon and Göksu River (tributaries of Mediterranean Sea) (Turan & Bayçelebi, 2019).

**Taxonomic notes.** *Gobio battalgili* is a synonym of this species (Turan et al., 2018).

***Gobio sakaryaensis* Turan, Ekmekçi, Luskova & Mendel, 2012 - [LC]**

**Common names.** Sakarya gudgeon / Sakarya derekayası

**Distribution.** Endemic. Sakarya and Filyos River drainages in the southern Black Sea.

***Pseudorasbora parva* (Temminck & Schlegel, 1842) - [Non-native]**

**Common names.** Stone moroko / Çakıl balığı

**Distribution.** Firstly introduced into the Meriç River, then to Mediterranean Sea watersheds; later introduced to the Kızılırmak and Sakarya rivers (Black Sea watersheds), Sarıçay Stream, and Gediz, Bakırçay, and Büyük Menderes rivers (Aegean Sea watersheds), and Kura and Aras drainages.

***Romanogobio macropterus* (Kamensky, 1901) - [VU]**

**Common names.** Caucasian stone gudgeon / Kafkas derekayası

**Distribution.** Kura and Aras River drainages in northeastern Türkiye.

**FAMILY LEUCISCIDAE BONAPARTE, 1835**

***Abramis brama* (Linnaeus, 1758) - [LC]**

**Common names.** Bream / Çapak balığı

**Distribution.** Middle and western Turkish coast of Black Sea, Lake Durusu, Marmara Sea basin, and Thrace Region (İlhan et al., 2020; Freyhof et al., 2025a).

***Acanthobrama centisquama* Heckel, 1843 - [EX]**

**Common names.** Long-spine bream / Amik akçapağı

**Distribution.** It was identified from Amik Lake and is distributed in the Orontes River.

***Acanthobrama marmid* Heckel, 1843 - [LC]**

**Common names.** Mesopotamian bream / Akçapak

**Distribution.** Tigris, Euphrates, and Qweiq River basins.

***Acanthobrama punctulata* (Kessler, 1877) - [VU]**

**Common names.** Caucasian bream / Kafkas akçapağı

**Distribution.** Kura and Aras River drainages in northeastern Türkiye.

***Acanthobrama orontis* Berg, 1949 - [LC]**

**Common names.** Cilician bream / Asi akçapağı

**Distribution.** From Göksu River east to the Orontes River.

***Acanthobrama thisbeae* Freyhof & Özuluğ, 2014 - [LC]**

**Common names.** Ceyhan bream / Ceyhan akçapağı

**Distribution.** Lower Ceyhan and Orontes River basins.

***Alburnoides coskuncelebii* Turan, Kaya, Aksu, Bayçelebi & Bektaş, 2016 - [VU]**

**Common names.** Büyük Melen spirlin / Melen noktalı incisi

**Distribution.** Büyük Melen, Çayağzı (Düzce), and Alaplı (Zonguldak) drainages, in northeastern Anatolia (Turan et al., 2019).

***Alburnoides diclensis* Turan, Bektaş, Kaya & Bayçelebi, 2016 - [LC]**

**Common names.** Great Zab spirlin / Zap noktalı incisi

**Distribution.** Greater Zap in southeastern Anatolia.

**Note.** Turan et al. (2016) described this species from the headwater of Greater Zap and its drainage, the stream Erziki, northern Hakkari, which is very close to the border of Iraq. The species most probably occurs also in Iraq. Therefore, we did not treat it as an endemic species to Türkiye.

***Alburnoides eichwaldii* De Filippi, 1863 - [LC]**

**Common names.** Kura spirlin / Kura noktalı incisi

**Distribution.** Kura and Aras River drainages in northeastern Anatolia.

***Alburnoides emineae* Turan, Kaya, Ekmekçi & Doğan, 2014 - [EN]**

**Common names.** Khabur spirlin / Habur noktalı incisi

**Distribution.** Beyazsu Stream, eastern Anatolia, drainage of the Euphrates River, Persian Gulf basin.

***Alburnoides fasciatus* (Nordmann, 1840) - [LC]**

**Common names.** Colchic spirlin / Kafkasya noktalı incisi

**Distribution.** Tributaries of the Black Sea coast in northeastern Anatolia.

***Alburnoides freyhofi* Turan, Kaya, Bayçelebi, Bektaş & Ekmekçi, 2017 - [LC]**

**Common names.** Kızılırmak spirlin / Kızılırmak noktalı incisi

**Distribution.** Endemic. Known only from Kızılırmak River drainages in northern Anatolia.

***Alburnoides kosswigi* Turan, Kaya, Bayçelebi, Bektaş & Ekmekçi, 2017 - [LC]**

**Common names.** Sakarya spirlin / Sakarya noktalı incisi

**Distribution.** Endemic. Known from Sakarya River drainages in northwestern Anatolia, as well as in Lake Ilgın Basin.

***Alburnoides kurui* Turan, Kaya, Bayçelebi, Bektaş & Ekmekçi, 2017 - [LC]**

**Common names.** Yeşilırmak spirlin / Yeşilırmak noktalı incisi

**Distribution.** Endemic. Known only from Yeşilırmak River drainages in northern Anatolia.

***Alburnoides manyasensis* Turan, Ekmekçi, Kaya & Güçlü, 2013** - **[LC]**

**Common names.** Manyas spirlin / Manyas noktalı incisi

**Distribution.** Endemic. Known from southern Marmara Sea tributaries.

***Alburnoides petrubanarescui* Bogutskaya & Coad, 2009** - **[EN]**

**Common names.** Urmia spirlin / Urmia noktalı incisi

**Distribution.** The species is known from only Lake Urmia drainages.

**Note.** *Alburnoides petrubanarescui* was described by Bogutskaya & Coad (2009) based on the specimens collected by V.D. Vladykov in 1962 from Qasemlou Chay (37°21´N, 45°09´E), Urmia basin. Iranian researchers speculate that the species may have never been there and it was described by the mislabelled materials because the species had not been found again after the description. Fortunately, the species has recently been found in Stream Esendere, a western drainage of Lake Urmia in Türkiye (Kaya, 2020a).

***Alburnoides smyrnae* Pellegrin, 1927** - **[LC]**

**Common names.** Eastern Aegean spirlin / Ege noktalı incisi

**Distribution.** Endemic. Originally described from stream Meles (Kemer, İzmir) as *A. bipunctatus* var. *smyrnae.* Despite several attempts, this species could not be found again from the type locality and the other streams around İzmir. The specimens collected from stream Banaz, a tributary of the Büyük Menderes River, by Turan et al. (2013) exhibited character states similar to those known in *A. bipunctatus* var. *smyrnae.* Therefore, they treated Büyük Menderes spirlin populations as *Alburnoides* cf. *smyrnae*.

***Alburnoides turani* Kaya, 2020** - **[LC]**

**Common names.** Filyos spirlin / Filyos noktalı incisi

**Distribution.** Endemic. The species is known only in Filyos River drainages of northern Anatolia.

***Alburnoides tzanevi* (Chichkoff, 1933)** - **[VU]**

**Common names.** Thracian spirlin / Trakya noktalı incisi

**Distribution.** The Western Black Sea Basin in Thrace from Veleka south to İstanbul and east to Karasu (Sinop) drainage.

***Alburnoides velioglui* Turan, Kaya, Ekmekçi & Doğan, 2014** - **[LC]**

**Common names.** Mesopotamian spirlin / Mezopotamya noktalı incisi

**Distribution.** Euphrates River drainage eastern Anatolia.

***Alburnus adanensis* Battalgazi, 1944** - **[EX]**

**Common names.** Adana bleak / Adana inci balığı

**Distribution.** Endemic. Seyhan and Ceyhan River drainages in southern Anatolia (Feyhof et al., 2025a).

***Alburnus akili* Battalgil, 1942** - **[EX]**

**Common names.** Beyşehir bleak / Gövce

**Distribution.** Endemic. The species was known from Lake Beyşehir Basin in Central Anatolia. However, it was reported that the species became extinct (Küçük, 2012).

***Alburnus alburnus* (Linnaeus, 1758)** - **[LC]**

**Common names.** Bleak **/** İnci balığı

**Distribution.** Known from Meriç and Susurluk River drainages in northwestern Türkiye.

***Alburnus atropatenae* Berg, 1925** - **[LC]**

**Common names.** Urmia bleak **/** Urmia inci balığı

**Distribution.** The species is endemic to the Lake Urmia basin. Recorded in Türkiye in Onbaşılar Stream, a drainage of Nazlu River (Kaya, 2020a).

***Alburnus baliki* Bogutskaya, Küçük & Ünlü, 2000** - **[VU]**

**Common names.** Antalya spotted bleak / Antalya inci balığı

**Distribution.** Endemic. Between Aksu and Karpuz, in southwestern Anatolia, Mediterranean Sea drainage.

***Alburnus caeruleus* Heckel, 1843** - **[LC]**

**Common names.** Black spotted bleak / Benekli inci balığı

**Distribution.** Qweiq, Tigris, and Euphrates River drainages, eastern Anatolia.

***Alburnus carianorum* Freyhof, Kaya, Bayçelebi, Geiger & Turan, 2019** - **[LC]**

**Common names.** Carian bleak / Karya inci balığı

**Distribution.** Endemic. Dalaman and Büyük Menderes River drainages in southeastern Anatolia.

**Taxonomic note.** *Alburnus kurui* Mangıt & Yerli, 2018 became a junior secondary homonym of *A. kurui* (Bogutskaya, 1995) and *A. carianorum* was proposed as its replacement name (Freyhof et al., 2018).

***Alburnus demiri* Özuluğ & Freyhof, 2007** - **[EN]**

**Common names.** Eastern Aegean bleak / Tahtalı inci balığı

**Distribution.** Endemic. Tahtalı and Küçük Menderes River drainages in western Anatolia.

***Alburnus derjugini* Berg, 1923** - **[LC]**

**Common names.** Georgian shemaya / Karadeniz inci balığı

**Distribution.** Marmara and Black Sea basins, and also the Bakırçay, Güzelhisar, and Gediz River drainages in the Aegean Sea basin.

**Taxonomic note.** Because of the large overlap in morphological characters and no difference in COI DNA sequences *Alburnus attalus*, *A. battalgilae*, *A. carinatus*, *A istanbulensis*, and *A. nicaeensis* accepted as synonyms of *A. derjugini* (Sarıahmetoğlu, 2024).

***Alburnus escherichii* Steindachner, 1897** - **[LC]**

**Common names.** Sakarya bleak / Sakarya inci balığı

**Distribution.** Endemic. Sakarya River drainage and the Lake Eber, Akşehir, and Ilgın basins. Locally in Kızılırmak drainage (likely introduced). Introduced in the Lake Beyşehir, Karamık, Eber basins and the Manavgat drainage, and Elmadere (Karaman) maybe in other locations.

**Note.** *Alburnus nasreddini* is a synonym of this species (Bayçelebi et al., 2020).

***Alburnus filippii* Kessler 1877** - **[LC]**

**Common names.** Kura bleak / Kura inci balığı

**Distribution.** Kura and Aras River drainages in northeastern Anatolia.

***Alburnus goekhani* Özuluğ, Geiger & Freyhof, 2018** - **[LC]**

**Common names.** Kızılırmak bleak / Kızılırmak inci balığı

**Distribution.** Endemic. Abdal, Yeşilırmak, and Kızılırmak River drainages, northern Anatolia.

***Alburnus hohenackeri* Kessler, 1877** - **[LC]**

**Common names.** Caspian bleak / Hazar incisi

**Distribution.** It has been recently recorded in a drainage of the Aras River in Türkiye (Kaya et al., 2020a). Also in brackish water.

***Alburnus kotschyi* Steindachner, 1863** - **[LC]**

**Common names.** İskenderun bleak / İskenderun inci balığı

**Distribution.** Endemic. Widespread in Tarsus, Seyhan, and Ceyhan River drainages, as well as coastal streams flowing to the Gulf of İskenderun north of Orontes.

***Alburnus kurui* (Bogutskaya, 1995)** - **[EN]**

**Common names.** Yüksekova bleak / Yüksekova inci balığı

**Distribution.** Endemic. Yüksekova wetland (Hakkari) upper Greater Zap.

**Taxonomic notes.** *Leuciscus kurui* (Bogutskaya, 1995) was recorded for the first time by Freyhof et al. (2018) since its collection by Mustafa Kuru in 1974. Freyhof et al. (2018) evaluated this species in the genus *Alburnus* based on molecular and morphological features.

***Alburnus magnificus* Freyhof & Turan, 2019** - **[VU]**

**Common names.** Hatay spotted bleak / Hatay inci balığı

**Distribution.** Orontes River drainage in southern Anatolia.

***Alburnus orontis* Sauvage, 1882** - **[VU]**

**Common names.** Orontes spotted bleak / Asi inci balığı

**Distribution.** Orontes River drainages, southern Anatolia.

***Alburnus sellal* Heckel, 1843** - **[LC]**

**Common names.** Shah kuli / Doğu inci balığı

**Distribution.** Very widespread in Tigris and Euphrates River drainages, as well as Qweiq River. Introduced to Lake Gölbaşı and Ceyhan drainage.

**Taxonomic notes.** *Alburnus heckeli, A. mossulensis*, *A. selcuklui,* and *A. zagrosensis* are synonyms (Freyhof et al., 2025a).

***Alburnus tarichi* (Güldenstadt, 1814)** - **[LC]**

**Common names.** Tarek / İnci kefali

**Distribution.** Endemic. Widespread in Lake Van Basin in eastern Anatolia, also in lakes Nazik and Aygır.

***Alburnus timarensis* Kuru, 1980** - **[EN]**

**Common names.** Karasu tarek / Karasu incisi

**Distribution.** Endemic. Stream Karasu, an eastern tributary of Lake Van drainages.

***Blicca bjoerkna* (Linnaeus, 1758)** - **[LC]**

**Common names.** Silver bream / Tahta balığı

**Distribution.** North and northeastern Turkish Black Sea coasts, Marmara Sea basin, northwestern Anatolia. Besides, it has been recently recorded in a drainage of Aras River in Türkiye (Kaya et al., 2020a). Also in brackish water.

***Chondrostoma beysehirense* Bogutskaya, 1997** - **[VU]**

**Common names.** Beyşehir nase / Beyşehir kababurunu

**Distribution.** Endemic. Lake Beyşehir drainage in Central Anatolia.

***Chondrostoma ceyhanense* Küçük, Turan, Güçlü, Mutlu & Çiftci, 2017** - **[LC]**

**Common names.** Cilician nase / Kilikya kababurunu

**Distribution.** Endemic. Ceyhan, Seyhan, and Berdan River drainages in southern Anatolia.

***Chondrostoma colchicum* Derjugin, 1899** - **[LC]**

**Common names.** Colchic nase / Kafkasya kababurunu

**Distribution.** Sakarya (excluding Lake Sapanca) east to Çoruh River.

**Taxonomic note.** *Chondrostoma angorense* is a synonym (Küçük et al., 2023).

***Chondrostoma cyri* Kessler, 1877** - **[VU]**

**Common names.** Southern Caspian nase / Hazar kababurunu

**Distribution.** Kura and Aras River drainages, northeastern Anatolia.

***Chondrostoma holmwoodii* (Boulenger, 1896)** - **[VU]**

**Common names.** Eastern Aegean nase / İzmir kababurunu

**Distribution.** Endemic. Bakır and Gediz River drainages.

***Chondrostoma kinzelbachi* Krupp, 1985** - **[EN]**

**Common names.** Levantine nase / Asi kababurunu

**Distribution.** Orontes River drainage, southern Anatolia.

***Chondrostoma meandrense* Elvira, 1987** - **[EN]**

**Common names.** Işıklı nase / Işıklı kababurunu

**Distribution.** Endemic. Known from the upper Büyük Menderes River drainage (Stream Küfi near Işıklı Spring, Karasandıklı Stream near Sandıklı, Büyük Menderes River at Çal).

***Chondrostoma nasus* (Linnaeus, 1758)** - **[LC]**

**Common names.** Nase / Kababurun

**Distribution.** Susurluk and Hoşap drainages on Biga Peninsula.

***Chondrostoma regium* (Heckel, 1843)** - **[LC]**

**Common names.** Mesopotamian nase / Mezopotamya kababurunu

**Distribution.** Widespread in Tigris and Euphrates River drainages, extirpated from Qweiq.

***Chondrostoma toros* Küçük, Turan, Güçlü, Mutlu & Çiftci, 2017** - **[LC]**

**Common names.** Taurus nase / Toros kababurunu

**Distribution.** Endemic. Göksu River drainages in southern Anatolia.

***Chondrostoma turnai* Güçlü, Küçük, Turan, Çiftci & Mutlu, 2017** - **[LC]**

**Common names.** Menderes nase / Menderes kababurunu

**Distribution.** Endemic. Tahtalı, Küçük Menderes, and Büyük Menderes River drainages eastern Anatolia.

***Chondrostoma vardarense* Karaman, 1928** - **[LC]**

**Common names.** Vardar nase / Vardar kababurunu

**Distribution.** Meriç River drainages, northwestern Türkiye.

***Egirdira nigra* (Kosswig & Geldiay, 1952)** - **[VU]**

**Common names.** Egirdira / Eğirdir yağ balığı

**Distribution.** Endemic. Lake Eğirdir Basin, Eflatunpınarı in Lake Beyşehir Basin, and Yeşilyurt Spring in upper Aksu drainage.

***Ladigesocypris ghigii* (Gianferrari, 1927)** - **[LC]**

**Common names.** Gizani **/** İlik balığı

**Distribution.** Isolated populations around Marmaris, Lake Köyceğiz, and in lower Dalaman drainage.

***Leucalburnus satunini* (Berg, 1910)** - **[LC]**

**Common names.** Ardahan mountain dace / Ardahan incisi

**Distribution.** Endemic. Upper Kura River drainages in northeastern Türkiye.

***Leucaspius delineatus* (Heckel, 1843)** - **[LC]**

**Common names.** Sun bleak / Cüce inci balığı

**Distribution.** Thrace region in northwestern Türkiye, also in Lake Sapanca (Sakarya) (İlhan et al., 2024) west to Susurluk drainage in Marmara Sea basin, including lakes Apolyont and Manyas.

***Leuciscus aspius* (Linnaeus, 1758)** - **[LC]**

**Common names.** Asp / Kocaağız

**Distribution.** Western Turkish Black Sea drainages and Thrace Region, also in upper Aras River in northeastern Türkiye. Also in brackish water.

***Leuciscus vorax* (Heckel, 1843)** - **[LC]**

**Common names.** Mesopotamian asp / Sis balığı

**Distribution.** Tigris and Euphrates River basins.

**Note.** *Leuciscus vorax* is also reported in the Orontes River. Based on our many fieldwork experiments in the area, we did not confirm records of this species from the Turkish Orontes.

***Petroleuciscus borysthenicus* (Kessler, 1859)** - **[LC]**

**Common names.** Bobyretz / Bodur tatlısu kefali

**Distribution.** Widespread in Marmara Sea watersheds and known from some streams draining to the Thracian Black Sea. Also was recorded from Gökçeada-Çanakkale (Ağdamar et al., 2021) and two coastal drainages in Samsun.

***Petroleuciscus ninae* Turan, Kalaycı, Kaya, Bektaş & Küçük, 2018** - **[LC]**

**Common names.** Menderes chub / Menderes bodur tatlısu kefali

**Distribution.** Endemic. Büyük Menderes, Küçük Menderes, Sarıçay (Muğla), and Tahtalı drainages. Locally introduced to Acıgöl (Kaya et al., 2024; Saç et al., 2025).

***Petroleuciscus smyrnaeus* (Boulenger, 1896)** - **[LC]**

**Common names.** Smyrna chub / Gediz bodur tatlısu kefali

**Distribution.** Gediz and Bakır River drainages, in eastern Anatolia.

***Phoxinus abanticus* Turan, Bayçelebi, Özuluğ, Gaygusuz & Aksu, 2023** - **[LC]**

**Common names.** Abant minnow / Abant golyan balığı

**Distribution.** Endemic. Lake Abant Basin.

***Phoxinus colchicus* Berg, 1910** - **[LC]**

**Common names.** Caucasian minnow / Kafkas golyan balığı

**Distribution.** Recorded from Çoruh River by Bayçelebi et al. (2015).

***Phoxinus kottelati* Bayçelebi, 2025** - **[NE]**

**Common names.** Anatolian minnow / Anadolu golyan balığı

**Distribution.** Stream Koca, drainage of Lake Manyas, Marmara Sea basin, and the streams Uludere and Akgüney, Black Sea basin.

***Phoxinus radeki* Bayçelebi, Aksu & Turan, 2024** - **[NE]**

**Common names.** Ergene minnow / Ergene golyan balığı

**Distribution.** Ergene River drainages in Aegean Sea Basin.

***Phoxinus strandjae* Drensk, 1926** - **[LC]**

**Common names.** Strandzha minnow / Rezve golyan balığı

**Distribution.** Veleka and Resowska (Rezve) drainages, draining from Yıldız (Strandzha) Mountains to Black Sea (Bulgaria, Türkiye), east to İstanbul, Lake Sapanca.

***Pseudophoxinus alii* Küçük, 2007** - **[VU]**

**Common names.** Pamphylian spring minnow / Manavgat ot balığı

**Distribution.** Endemic. Ilıca, Aksu, Köprüçay, and Kömürcüler streams, all around Antalya, southwestern Anatolia.

***Pseudophoxinus anatolicus* (Hanko, 1925)** - **[VU]**

**Common names.** Giant spring minnow / Yağ balığı

**Distribution.** Endemic. Lake Beyşehir, Suğla, Hotamis, and Akgöl (Ereğli) basins, Central Anatolia.

***Pseudophoxinus antalyae* Bogutskaya, 1992** - **[EN]**

**Common names.** Antalya spring minnow / Çiçek balığı

**Distribution.** Endemic. Düden and Kırkgöz springs around Antalya and out flowing stream Yediarıklar in Bay of Antalya, southern Anatolia.

***Pseudophoxinus battalgilae* Bogutskaya, 1997** - **[LC]**

**Common names.** Lycaonian spring minnow / Beyşehir ot balığı

**Distribution.** Endemic. Lake Ilgın, Akgöl, Beyşehir, and Suğla basins, as well as around water sources near Niğde and Manavgat drainages, and Gödet Reservoir (Küçük et al., 2024).

***Pseudophoxinus burduricus* Küçük, Gülle, Güçlü, Çiftçi & Erdoğan, 2013** - **[EN]**

**Common names.** Burdur spring minnow / Burdur ot balığı

**Distribution.** Endemic. Salda and Yarışlı (Sazak Spring) basins, Değirmendere, Karamanlı, Düğer, and Bozçay

streams (a southwest tributary of Lake Burdur). Extirpated from Lake Karataş.

***Pseudophoxinus cilicicus* Saç, Özuluğ, Geiger & Freyhof, 2019 - [LC]**

**Common names.** Cilician spring minnow / Kilikya ot balığı

**Distribution.** Endemic. Lower Tarsus, Seyhan, and Ceyhan drainages and a small stream at Arsuz southeastern Anatolia (Saç et al., 2019a).

***Pseudophoxinus crassus* (Ladiges, 1960) - [EN]**

**Common names.** Fat spring minnow / İnsuyu ot balığı

**Distribution.** Endemic. İnsuyu Stream in Lake Tuz Basin, also Lake Kozanlı and Samsam basins, springs south of Eşmekaya and near Aksaray and Niğde.

***Pseudophoxinus elizavetae* Bogutskaya, Küçük & Atalay, 2006 - [CR]**

**Common names.** Sultansazlığı minnow / Sultansazlığı ot balığı

**Distribution.** Endemic. Known only from Sultansazlığı (=Sultan Marshes) in Kayseri.

***Pseudophoxinus evliyai* Freyhof & Özuluğ, 2010 - [EN]**

**Common names.** Lycian spring minnow / Likya ot balığı

**Distribution.** Endemic. Kırkpınar spring, Lake Söğüt and Avlan basins, Akçay drainage (Finike).

**Taxonomic note.** Originally described as *P. evliyae*, it was changed to *P. evliyai* based on gender rules (Freyhof et al., 2025a).

***Pseudophoxinus fahrettini* Freyhof & Özuluğ, 2010 - [EN]**

**Common names.** Pisidian spring minnow / Isparta ot balığı

**Distribution.** Endemic. Known from upper and middle Köprüçay drainage, around Isparta.

***Pseudophoxinus firati* Bogutskaya, Küçük & Atalay, 2006 - [LC]**

**Common names.** Euphrates spring minnow / Fırat ot balığı

**Distribution.** Endemic. Described from Spring Yazyurdu, upper drainage of Tohma Stream, headwater Euphrates River. However, the distribution range of the species has been recently expanded by Saç et al. (2019b). Accordingly, the species also recorded from Süt Kaynağı Stream, one of the eastern most tributaries of upper Murat River (Bitlis); Balıklıtohma and Tohma streams, western Euphrates River tributaries (Sivas); Göz Spring and Çağlayan and Aksu streams, upper Ceyhan River tributaries (Kahramanmaraş); Karahalka Spring, an uppermost tributary of Seyhan River (eastern Pınarbaşı).

***Pseudophoxinus handlirschi* (Pietschmann, 1933) - [EX]**

**Common names.** Eğirdir minnow / Kavinne

**Distribution.** Endemic. Lake Eğirdir.

***Pseudophoxinus hittitorum* Freyhof & Özuluğ, 2010 - [VU]**

**Common names.** Hittite spring minnow / Hitit ot balığı

**Distribution.** Endemic. Tributaries of Lake Beyşehir.

***Pseudophoxinus iconii* Küçük, Gülle & Güçlü, 2016 - [CR]**

**Common names.** Tuz spring minnow / Konya ot balığı

**Distribution.** Endemic. Gölyazı, Büget, Tersakan, and Bolluk drainages in Lake Tuz Basin.

***Pseudophoxinus libani* (Lortet 1883) - [LC]**

**Common names.** Lebanese minnow / Lübnan ot balığı

**Distribution.** Orontes River drainages, southern Anatolia.

**Taxonomic notes.** *Pseudophoxinus kervillei* is a synonym of this species (Bariche & Freyhof, 2016).

***Pseudophoxinus maeandri* (Ladiges, 1960) - [EN]**

**Common names.** Apamean spring minnow / Işıklı ot balığı

**Distribution.** Endemic. Tributaries of Lake Işıklı, upper Büyük Menderes River in southwest Central Anatolia.

***Pseudophoxinus maeandricus* (Ladiges, 1960) - [CR]**

**Common names.** Sandıklı spring minnow / Menderes ot balığı

**Distribution.** Endemic. Streams Küfi and Karadirek upper Büyük Menderes River drainages.

***Pseudophoxinus mehmeti* Ekmekçi, Atalay, Yoğurtçuoğlu, Turan & Küçük, 2015 - [CR]**

**Common names.** Alanköy spring minnow / Alanköy ot balığı

**Distribution.** Endemic. Lake Çorak (Akgöl) Basin.

***Pseudophoxinus ninae* Freyhof & Özuluğ, 2006 - [EN]**

**Common names.** Onaç spring minnow / Onaç ot balığı

**Distribution.** Endemic. Streams Onaç (Burdur), Karaevli and Kestel marshes, Central Anatolia.

***Pseudophoxinus turani* Küçük & Güçlü, 2014 - [VU]**

**Common names.** Karasu spring minnow / İncesu ot balığı

**Distribution.** Endemic. Spring İncesu, a tributary of the Orontes River, southern Anatolia.

***Pseudophoxinus zekayi* Bogutskaya, Küçük & Atalay, 2006 - [EN]**

**Common names.** Ceyhan spring minnow / Ceyhan ot balığı

**Distribution.** Endemic. Eastern Ceyhan drainage, in springs around Çöçelli and Lake Gölbaşı.

***Pseudophoxinus zeregi* (Heckel, 1843) - [EN]**

**Common names.** Levantine spring minnow / Asi ot balığı

**Distribution.** Orontes and Qweiq River drainages, southern Anatolia.

***Rutilus frisii* (Nordmann, 1840) - [LC]**

**Common names.** Vyrezub; Kutum / Levkit

**Distribution.** Southern Marmara and Black Sea coasts of Türkiye, also in Lake İznik and Lake Durusu basin. Also in brackish water.

***Rutilus lacustris* (Pallas, 1814) - [LC]**

**Common names.** Taran / Taran

**Distribution.** Known only from the Aras River in eastern Anatolia. Also in brackish water.

***Rutilus rutilus* (Linnaeus, 1758) - [LC]**

**Common names.** Roach / Kızılgöz

**Distribution.** Southern Marmara Sea Basin and Thrace Region, also in Sakarya drainage, northwest Türkiye. Also in brackish water.

***Scardinius elmaliensis* Bogutskaya, 1997 - [VU]**

**Common names.** Elmali rudd / Elmalı kızılkanadı

**Distribution.** Endemic. Akçay drainage: Lake Avlan, Karagöl and its canals in Elmalı (Antalya) and Çayboğazı Reservoir. Dalaman drainage: Lake Gölhisar,, Çavdır, and Yapraklı reservoirs. Burdur basin: Lake Karataş and Belenli Reservoir (Saç et al., 2025). In the endorheic former Söğüt basin as in Osmankalfalar Reservoir.

***Scardinius erythrophthalmus* (Linnaeus, 1758)** - **[LC]**

**Common names.** Rudd / Kızılkanat

**Distribution.** Marmara and Black Sea basins east to Kızılırmak, also in Thracian Black Sea drainages.

***Squalius agdamicus* Kamensky, 1901** - **[LC]**

**Common names.** Kura dace / Kura tatlısu kefali

**Distribution.** The species has been reported from upper Kura River drainages in northeast Anatolia (Bayçelebi, 2019).

***Squalius anatolicus* (Bogutskaya, 1997)** - **[LC]**

**Common names.** Beyşehir pike dace / Beyşehir tatlısu kefali

**Distribution.** Endemic. Lake Beyşehir and Tuz basins, as well as Manavgat River.

***Squalius aristotelis* Özuluğ & Freyhof, 2011** - **[EN]**

**Common names.** Tuzla chub / Tuzla tatlısu kefali

**Distribution.** Endemic. Stream Behramkale, a coastal stream draining to the Aegean Sea at Assos at the southwestern Biga Peninsula, Tuzla drainage.

***Squalius berak* Heckel, 1843** - **[LC]**

**Common names.** Euphrates chub / Fırat tatlısu kefali

**Distribution.** Qweiq, Tigris, and Euphrates River drainages.

**Remarks.** In several earlier studies from the Euphrates and Tigris River basins, the species was reported under different names such as *Leuciscus cephalus orientalis*, *Leuciscus cephalus*, and *Squalius orientalis*. These names are currently regarded as junior synonyms of *Squalius berak*.

***Squalius cappadocicus* Özuluğ & Freyhof, 2011** - **[LC]**

**Common names.** Anatolian chub / Anadolu tatlısu kefali

**Distribution.** Endemic. Anatolian Black Sea coasts west of Çoruh. Eastern tributaries of Sakarya and in Melendiz drainage (Lake Tuz basin). Seyhan, Sırlı, Toprakkale, Serçeme (tributaries of Karasu), and Pülümür in northeastern Euphrates.

***Squalius carinus* Özuluğ & Freyhof, 2011** - **[EN]**

**Common names.** Chocklate chub / Takoz tatlısu kefali

**Distribution.** Endemic. Lake Işıklı Basin, western Anatolia.

***Squalius cephalus* (Linnaeus, 1758)** - **[LC]**

**Common names.** European chub / Avrupa tatlısu kefali

**Distribution.** Thracian Black Sea drainages. Also in brackish water.

***Squalius cii* (Richardson, 1857)** - **[LC]**

**Common names.** Marmara chub / Marmara tatlısu kefali

**Distribution.** Endemic. The streams drain to the southern Marmara Sea Basin, also in Lake İznik, Sapanca basins, and Stream Karamenderes flowing to Aegean Sea in the Biga Peninsula.

***Squalius fellowesii* (Günther, 1868)** - **[LC]**

**Common names.** Aegean chub / Ege tatlısu kefali

**Distribution.** Endemic. Known from Eşen north to Madra, absent from Tahtalı and Küçük Menderes, Aegean Sea Basin. Also, introduced into the Stream Aksu (near Antalya).

***Squalius kosswigi* (Karaman, 1972)** - **[LC]**

**Common names.** Striped chub / Bantlı tatlısu kefali

**Distribution.** Endemic. Küçük Menderes, Tahtalı drainages, and four coastal streams west to Azmak, in Aegean Sea Basin.

***Squalius kottelati* Turan, Yilmaz & Kaya, 2009** - **[LC]**

**Common names.** Cilician pike chub / Kilikya tatlısu kefali

**Distribution.** Orontes, Seyhan, and Ceyhan River drainages.

***Squalius lepidus* Heckel, 1843** - **[LC]**

**Common names.** Mesopotamian pike chub / Akbalık

**Distribution.** Tigris and Euphrates River drainages, southeastern Anatolia.

***Squalius orientalis* Heckel, 1847** - **[LC]**

**Common names.** Georgian chub / Çoruh tatlısu kefali

**Distribution.** Çoruh River drainage, northeastern Anatolia.

***Squalius orpheus* Kottelat & Economidis, 2006** - **[LC]**

**Common names.** Thrace chub / Trakya tatlısu kefali

**Distribution.** Meriç River drainage, Aegean Sea Basin.

***Squalius pursakensis* Hanko, 1925** - **[LC]**

**Common names.** Sakarya chub / Sakarya tatlısu kefali

**Distribution.** Endemic. Sakarya River drainage, Black Sea Basin. Also, in Lake Eber, Akşehir and Ilgın basins.

***Squalius turcicus* De Filippi, 1865** - **[LC]**

**Common names.** South Caspian chub / Hazar tatlısu kefali

**Distribution.** Aras River drainages, northeastern Anatolia.

***Squalius verepi* Turan, 2022** - **[LC]**

**Common names.** Tigris chub / Dicle tatlısu kefali

**Distribution.** Tigris River drainages, eastern Anatolia.

***Turcichondrostoma fahirae* (Ladiges, 1960)** - **[EN]**

**Common names.** Tefenni nase / Tefenni kababurunu

**Distribution.** Endemic. Kırkpınar (Başpınar) Spring near Karamusa (Tefenni), Değirmendere flowing into Karamanlı Reservoir (Turan et al., 2021), Lake Karataş, Elmacık Reservoir, and Bozçay in Burdur Basin (Saç et al., 2025).

***Vimba vimba* (Linnaeus, 1758)** - **[LC]**

**Common names.** Vimba bream / Eğrez

**Distribution.** Known from the Aegean basin (from Gediz to Eşen), southern Marmara Basin (including lakes Apolyont, Manyas, İznik, and Sapanca), and in Black Sea rivers. Lake Eğirdir Basin, Aksu River and Köprüçay which flow to the Gulf of Antalya. Also, in the Thrace region. Also in brackish water.

**Remarks.** *Vimba melanops* and *V. mirabilis* are synonyms (Freyhof et al., 2025a).

**FAMILY TINCIDAE JORDAN, 1878**

***Tinca tinca* (Linnaeus, 1758)** - **[LC]**

**Common names.** Tench / Kadife balığı

**Distribution.** It is thought to be native to Black Sea basins. Now widely introduced in Anatolia, including Aegean and Mediterranean Sea drainages. Also in brackish water.

**FAMILY DANIONIDAE BLEEKER, 1863**

***Barilius mesopotamicus* Berg, 1932** - **[LC]**

**Common names.** Mesopotamian barilius / Kaşık balığı

**Distribution.** Tigris and Euphrates River drainages in southeastern Anatolia.

**FAMILY COBITIDAE SWAINSON, 1838**

Cobitidae was one of the poorest known families in Türkiye. Fortunately, the genus *Cobitis* has been reviewed by Freyhof et al. (2018). They resolved the richest genus of the family and recognized 25 species (with eight new species) throughout Türkiye.

***Cobitis afifeae* Freyhof, Bayçelebi & Geiger 2018** - **[LC]**

**Common names.** Menderes spined loach / Menderes taşemeni

**Distribution.** Endemic. Küçük Menderes and Büyük Menderes River drainages and Lake Işıklı Basin.

***Cobitis aliyeae* Freyhof, Bayçelebi & Geiger 2018** - **[LC]**

**Common names.** Cilician spined loach / Kilikya taşemeni

**Distribution.** Endemic. Lower part of the Tarsus, Ceyhan, and Seyhan River drainages.

***Cobitis anabelae* Freyhof, Bayçelebi & Geiger 2018** - **[VU]**

**Common names.** Hatay spined loach / Hatay taşemeni

**Distribution.** Orontes River drainage, Mediterranean Sea Basin.

**Notes.** Turkish part of the Orontes populations formerly known as *Cobitis levantina*. This species was restricted to Syria by Freyhof et al. (2018).

***Cobitis battalgilae* Băcescu, 1962** - **[VU]**

**Common names.** Beyşehir spined loach / Beyşehir taşemeni

**Distribution.** Endemic. Lake Beyşehir Basin and Manavgat River drainage were also reported below the Apa Reservoir by Perdices et al. (2018).

***Cobitis bilseli* Battalgil, 1942** - **[EN]**

**Common names.** Great Beyşehir spined loach / Büyük Beyşehir taşemeni

**Distribution.** Endemic. Streams Sarıöz and Sarıçay, Lake Beyşehir Basin, the stream flowing from Lake Suğla to Lake Beyşehir, in Central Anatolia.

***Cobitis dorademiri* Erk'akan, Özdemir & Özeren, 2017** - **[EN]**

**Common names.** Köyceğiz spined loach / Köyceğiz taşemeni

**Distribution.** Endemic. Lake Köyceğiz basin, lower Dalaman drainage, and some small coastal streams in between, Mediterranean Basin.

***Cobitis elazigensis* Coad & Sarıeyyüpoğlu, 1988** - **[LC]**

**Common names.** Euphrates spined loach / Fırat taşemeni

**Distribution.** Endemic. Upper part of Euphrates River drainages.

**Remarks.** Freyhof et al. (2018) claimed that the species might be more widespread in the Euphrates drainages, even the Syrian Euphrates where Coad (2010) recorded *Cobitis*. However, we treated this species endemic to Türkiye until the taxonomic position of the Syrian population was confirmed.

***Cobitis emrei* Freyhof, Bayçelebi & Geiger 2018** - **[VU]**

**Common names.** Sapanca spined loach / Sapanca taşemeni

**Distribution.** Endemic. Lake Sapanca Basin, northwestern Anatolia.

***Cobitis erkakanae* Freyhof, Bayçelebi & Geiger 2018** - **[EN]**

**Common names.** Gölbaşı spined loach / Gölbaşı taşemeni

**Distribution.** Endemic. Lake Gölbaşı Basin, south of Adıyaman.

***Cobitis evreni* Erk'Akan, Özeren & Nalbant 2008** - **[EN]**

**Common names.** Ceyhan spined loach / Ceyhan taşemeni

**Distribution.** Endemic. The middle Ceyhan River drainage, southern Anatolia, Mediterranean Sea Basin.

***Cobitis fahirae* Erk'Akan, Atalay-Ekmekçi & Nalbant 2008** - **[LC]**

**Common names.** Aegean spined loach / Ege taşemeni

**Distribution.** Endemic. Between the south to the Madra River drainage to the upper Dalaman River drainage, western Anatolia, Aegean Sea Basin.

**Taxonomic note.** *Cobitis kurui* and *C. damlae* are synonyms of this species. See Freyhof et al. (2018) for details.

***Cobitis indus* Eagderi, Seçer & Freyhof, 2022** - **[DD]**

**Common names.** Dalaman spined loach / Dalaman taşemeni

**Distribution.** Endemic. Middle Dalaman drainage, southwestern Anatolia.

***Cobitis joergbohleni* Freyhof, Bayçelebi & Geiger 2018** - **[CR]**

**Common names.** Sultansazlığı spined loach / Sultansazlığı taşemeni

**Distribution.** Endemic. Sultan Marshes in the Develi depression, Central Anatolia.

***Cobitis kellei* Erk'akan, Atalay-Ekmekçi & Nalbant, 1998** - **[EX]**

**Common names.** Diyarbakır spined loach / Diyarbakır taşemeni

**Distribution.** Endemic. Stream Göksu, upper Tigris River drainage, Persian Gulf basin.

***Cobitis phrygica* Battalgazi, 1944 - [EN]**

**Common names.** Phrygian spined loach / Firigya taşemeni

**Distribution.** Endemic. Acı, Burdur, Salda and Söğüt lakes, upper Dalaman and Eşen River drainages, also in Aksu, north of Bucak, and in one spring area east of Gemiş in Acıgöl Basin.

***Cobitis pirii* Freyhof, Bayçelebi & Geiger 2018 - [VU]**

**Common names.** Pisidian spined loach / Eğirdir taşemeni

**Distribution.** Endemic. Köprüçay and Aksu River drainages, Lake Eğirdir drainage, Mediterranean Sea Basin.

***Cobitis pontica* Vasil'eva & Vasil'ev, 2006 - [NT]**

**Common names.** Burgas spined loach / Burgaz taşemeni

**Distribution.** Rezve River drainage, in northwest Türkiye.

***Cobitis puncticulata* Erk'akan, Atalay-Ekmekçi & Nalbant, 1998 - [EN]**

**Common names.** Brown spined loach / Kahverengi taşemeni

**Distribution.** Lake Manyas and Ulubat basins. These lakes are a part of the Simav River drainage, northwestern Anatolia.

***Cobitis saniae* Eagderi, Jouladeh-Roudbar, Jalili, Sayyadzadeh & Esmaeili, 2017 - [LC]**

**Common names.** Western Caspian spined loach / Hazar taşemeni

**Distribution.** Recently recorded from Streams Selim and Kars, Aras River drainages, northeastern of Türkiye (Freyhof et al., 2018).

***Cobitis satunini* Gladkov, 1935 - [LC]**

**Common names.** Colchic spined loach / Kafkas taşemeni

**Distribution.** The species is distributed in İyidere and Hopa within the eastern Black Sea basin, Filyos and Bartın drainages in the western Black Sea basin, and from Tuzla (northernmost Aegean region) eastward to the Lake İznik basin, including the Susurluk drainage.

***Cobitis simplicispina* Hanko 1925 - [LC]**

**Common names.** Galatian spined loach / Sakarya taşemeni

**Distribution.** Endemic. Known from Lake Eber, Ilgın, and Akşehir basins, as well as Sakarya and Kızılırmak River drainages.

***Cobitis sipahilerae* Erk'akan, Özdemir & Özeren, 2017 - [EN]**

**Common names.** Kırkgöz spined loach / Kırkgöz taşemeni

**Distribution.** Endemic. Düden and Kırkgöz springs and the outflowing stream Yediarıklar, Mediterranean Sea Basin.

***Cobitis splendens* Erk'akan, Atalay-Ekmekçi & Nalbant, 1998 - [LC]**

**Common names.** Bithynian spined loach / Akçakoca taşemeni

**Distribution.** Endemic. Small coastal streams around Akçakoca and Büyük Melen, Black Sea Basin, northwest Anatolia.

***Cobitis strumicae* Karaman, 1955 - [LC]**

**Common names.** Struma spine loach / Struma taşemeni

**Distribution.** Endemic. Thrace Region, Kocaçay in Çanakkale, and a doubtful record from Terme (Samsun, Black Sea Basin).

***Cobitis troasensis* Freyhof, Bayçelebi & Geiger 2018 - [EN]**

**Common names.** Dardanelles spined loach / Troya taşemeni

**Distribution.** Endemic. Tuzla River, Aegean Sea Basin, northwestern Anatolia.

***Cobitis turcica* Hankó, 1925 - [EN]**

**Common names.** Central Anatolian spined loach / Anadolu taşemeni

**Distribution.** Endemic. Ereğli, Melendiz (Ihlara Valley), springs in Sultanhanı north of Sarı Yayla and Gölyazı.

***Sabanejewia aurata* (De Filippi, 1863) - [LC]**

**Common names.** Caspian golden Loach / Dikenli taşemen

**Distribution.** Kura and Aras River drainages northeastern Anatolia.

**FAMILY NEMACHEILIDAE REGAN, 1911 - [CR]**

***Oxynoemacheilus amanos* Kaya, Yoğurtçuoğlu & Freyhof, 2021**

**Common names.** Hassa loach / Hassa çöpçü balığı

**Distribution.** Endemic. İncesu Spring in Hassa, lower Orontes River in southwestern Anatolia.

***Oxnoemacheilus anatolicus* Erk'akan, Özeren & Nalbant, 2008 - [VU]**

**Common names.** Burdur loach / Burdur çöpçü balığı

**Distribution.** Endemic. Dalaman drainage and four spring-fed streams in Central Anatolia: Düger, Ereçay at Elmacık near Kemer, Karamanlı Reservoir, and Pınarbaşı south Anatolia.

***Oxynoemacheilus angorae* (Steindachner, 1897) - [LC]**

**Common names.** Angora loach / Ankara çöpçü balığı

**Distribution.** Endemic. Susurluk east to Kızılırmak drainages and endorheic lakes İznik and Ilgın basins.

***Oxynoemacheilus araxensis* (Banarescu & Nalbant, 1978) - [LC]**

**Common names.** Erzurum loach / Erzurum çöpçü balığı

**Distribution.** Endemic. Stream Karasu, uppermost Eupharates River drainage, southeastern Anatolia.

***Oxynoemacheilus argyrogramma* (Heckel, 1847) - [LC]**

**Common names.** Two-spot loach / Çift benekli çöpçü balığı

**Distribution.** Qweiq River and southwestern Euphrates River drainages in Türkiye.

***Oxynoemacheilus arsaniasus* Freyhof, Kaya, Turan & Geiger, 2019 - [LC]**

**Common names.** Murat loach / Murat çöpçü balığı

**Distribution.** Endemic. The species was described in the upper Murat River drainages (Freyhof et al., 2019).

***Oxynoemacheilus axylos*** **Yoğurtçuoğlu, Kaya & Freyhof, 2022** - **[VU]**

**Common names.** Central Anatolian loach / Beyşehir çöpçü balığı

**Distribution.** Endemic. Spring İnsuyu, lakes Samsam and Gök in Kozanlı, and Melendiz drainage (Ihlara Valley), all in Lake Tuz Basin.

***Oxynoemacheilus banarescui*** **(Delmastro, 1892)** - **[LC]**

**Common names.** Paphlagonian sportive loach / Devrekani çöpçü balığı

**Distribution.** Endemic. Filyos and Devrekani drainages in Black Sea Basin northern Anatolia.

***Oxynoemacheilus bergianus*** **(Derjavin, 1934)** - **[LC]**

**Common names.** Sportive loach / Sportif çöpçü balığı

**Distribution.** Kızılırmak drainage in Anatolian Black Sea Basin, upper Zamantı (Seyhan) drainage in Mediterranean Basin, upper Euphrates and upper Tigris including Greater Zab.

**Taxonomic notes.** *Oxynoemacheilus erdali* from the upper Murat drainage in Türkiye, *O. lenkoranensis* from Azerbaijan, *O. longipinnis* and *O. parvinae* from Iran, and *O. samanticus* from Seyhan are synonyms (Freyhof et al., 2022).

***Oxynoemacheilus brandtii*** **(Kessler, 1877)** - **[LC]**

**Common names.** Caucasian loach / Kafkasya çöpçü balığı

**Distribution.** Kura and Aras River drainages in northeastern Anatolia.

***Oxynoemacheilus cemali*** **Turan, Kaya, Kalaycı, Bayçelebi & Aksu, 2019** - **[LC]**

**Common names.** Çoruh loach / Çoruh çöpçü balığı

**Distribution.** Çoruh and Yeşilırmak drainages, northeastern Anatolia (Turan et al., 2019).

***Oxynoemacheilus ceyhanensis*** **(Erk'akan, Nalbant & Özeren, 2007)** - **[LC]**

**Common names.** Elbistan loach / Elbistan çöpçü balığı

**Distribution.** Endemic. Upper Ceyhan River drainages (Kahramanmaraş).

***Oxynoemacheilus chaboras*** **Kaya, Kurtul, Aksu, Oral & Freyhof, 2024** - **[EN]**

**Common names.** Khabur two-spot loach **/** Habur çöpçü balığı

**Distribution.** Beyazsu Stream, eastern Anatolia, drainage of Euphrates River, Persian Gulf Basin.

***Oxynoemacheilus ciceki*** **Sungur, Jalili & Eagderi 2017** - **[CR]**

**Common names.** Sultansazlığı loach **/** Sultansazlığı çöpçü balığı

**Distribution.** Endemic. Recently described from Sultan Marshes (Kayseri).

***Oxynoemacheilus cilicicus*** **Kaya, Turan, Bayçelebi, Kalaycı & Freyhof, 2020** - **[LC]**

**Common names.** Cilician loach / Kilikya çöpçü balığı

**Distribution.** Endemic. The species has been recently described from the Göksu, Seyhan, and Ceyhan drainages, all from the Mediterranean Sea basin (Kaya et al., 2020b).

***Oxynoemacheilus cyri*** **(Berg, 1910)** - **[LC]**

**Common names.** Kura banded loach / Kura çöpçü balığı

**Distribution.** Endemic. Upper Kura River, northeastern Anatolia, Kura drainages.

***Oxynoemacheilus eliasi*** **Yoğurtçuoğlu, Kaya & Freyhof, 2022** - **[EN]**

**Common names.** Küçük Menderes loach / Küçük Menderes çöpçü balığı

**Distribution.** Endemic. Küçük Menderes, Tahtalı, and Gediz drainages.

***Oxynoemacheilus elsae*** **Eagderi, Jalili & Çiçek, 2018** - **[LC]**

**Common names.** Urmia loach / Urmia çöpçü balığı

**Distribution.** The species is endemic to the Lake Urmia Basin. Recorded in Türkiye in Esendere Stream (Kaya, 2020a).

***Oxynoemacheilus ercisianus*** **(Erk'akan & Kuru, 1986)** - **[VU]**

**Common names.** Van loach / Van çöpçü balığı

**Distribution.** Endemic. Lake Van and its tributaries Zilan, Deli, Bendimahi, and Karasu, in eastern Anatolia.

***Oxynoemacheilus eregliensis*** **(Banarescu & Nalbant, 1978)** - **[VU]**

**Common names.** Eregli loach / Ereğli çöpçü balığı

**Distribution.** Endemic. Known from Lake Tuz drainages, Ereğli (Konya) and around Karaman, and Manavgat drainage in Central Anatolia.

***Oxynoemacheilus euphraticus*** **(Banarescu & Nalbant, 1964)** - **[LC]**

**Common names.** Euphrates loach / Fırat çöpçü balığı

**Distribution.** Widespread in Euphrates and Tigris drainages.

***Oxynoemacheilus evreni*** **(Erk'akan, Nalbant & Özeren, 2007)** - **[LC]**

**Common names.** Ceyhan sportive loach / Tekir çöpçü balığı

**Distribution.** Endemic. Upper Ceyhan River.

***Oxynoemacheilus fatmae*** **Turan, Aksu, Güçlü & Kalaycı, 2024** - **[NE]**

**Common names.** Güzelhisar loach / Güzelhisar çöpçü balığı

**Distribution.** Endemic. Güzelhisar drainage in northeastern Aegean Basin.

***Oxynoemacheilus fatsaensis*** **Saygun, Ağdamar & Özuluğ, 2021** - **[LC]**

**Common names.** Yeşilırmak sportive loach / Yeşilırmak çöpçü balığı

**Distribution.** Endemic. Yeşilırmak drainage and adjacent coastal stream Elekçi.

***Oxynoemacheilus frenatus*** **(Heckel, 1843)** - **[LC]**

**Common names.** Mesopotamian loach / Mezopotamya çöpçü balığı

**Distribution.** Described from Mosul but recently recorded from tributaries of the upper Tigris and Batman drainages (Freyhof et al., 2017).

***Oxynoemacheilus germencicus*** **(Erk'akan, Nalbant & Özeren, 2007)** - **[LC]**

**Common names.** Carian loach / Karya çöpçü balığı

**Distribution.** Endemic. Büyük Menderes and Gediz River drainages in western Anatolia.

***Oxynoemacheilus hamwii*** **(Krupp & Schneider, 1991)** - **[VU]**

**Common names.** Orontes sportive loach / Asi çöpçü balığı

**Distribution.** Known from Orontes River drainages in southern Anatolia.

***Oxynoemacheilus hazarensis*** **Freyhof, & Özuluğ, 2017** - **[EN]**

**Common names.** Hazar loach / Hazar çöpçü balığı

**Distribution.** Endemic. Lake Hazar Basin, Elazığ.

***Oxynoemacheilus isauricus*** **Yoğurtçuoğlu, Kaya, Özuluğ & Freyhof, 2021** - **[EN]**

**Common names.** Beyşehir sportive loach / Beyşehir çöpçü balığı

**Distribution.** Endemic. Lake Beyşehir and Suğla basin.

***Oxynoemacheilus kaynaki*** **Erk'akan, Özeren & Nalbant, 2008** - **[LC]**

**Common names.** Melid loach / Göksu çöpçü balığı

**Distribution.** Endemic. Upper Göksu, Kaynarca, and Gül, which are headwaters of Peri Suyu, Sultan Suyu, which flows to Karakaya Reservoir, and Kangal, which flows to Keban Reservoir, all in Euphrates drainage.

***Oxynoemacheilus kentritensis*** **Freyhof, Kaya & Turan, 2017** - **[LC]**

**Common names.** Botan loach / Botan çöpçü balığı

**Distribution.** Headwater of the Botan River, also reported from streams Hezil and Nerduş rivers, which are small rivers draining to the Tigris in the border area of Türkiye (Kaya et al., 2016; Freyhof et al., 2017).

***Oxynoemacheilus kottelati*** **Turan, Aksu, Güçlü & Kalaycı, 2024** - **[NE]**

**Common names.** Havran loach / Havran çöpçü balığı

**Distribution.** Endemic. Havran and Karınca in northeastern Aegean Basin.

***Oxynoemacheilus marmaraensis*** **Turan, Bayçelebi & Kalaycı, 2023** - **[EN]**

**Common names.** Emet loach / Emet çöpçü balığı

**Distribution.** Endemic. Emet drainage, a tributary of Susurluk. Havran and Karınca in northeastern Aegean basin.

***Oxynoemacheilus marunensis*** **Sayyadzadeh, & Esmaeili, 2020** - **[LC]**

**Common names.** Tigris two-spot loach / Dicle çöpçü balığı

**Distribution.** Widespread in Tigris River in southeastern Anatolia.

***Oxynoemacheilus mediterraneus*** **(Erk'akan, Nalbant & Özeren, 2007**) - **[LC]**

**Common names.** Pamphylian loach / Pamfilya çöpçü balığı

**Distribution.** Endemic. Aksu and Köprüçay drainages in the Gulf of Antalya.

***Oxynoemacheilus muefiti*** **Freyhof, Kaya, Turan & Geiger, 2019** - **[LC]**

**Common names.** Stout Euphrates loach / Ağrı çöpçü balığı

**Distribution.** Endemic. The species was described in the upper Murat River drainage as well as in the Eğri, a tributary to Atatürk Reservoir (Freyhof et al., 2019).

***Oxynoemacheilus namiri*** **(Krupp & Schneider, 1991)** - **[LC]**

**Common names.** Levantine loach / Akdeniz çöpçü balığı

**Distribution.** Orontes River, southern Anatolia, Mediterranean Sea drainages.

***Oxynoemacheilus nasreddini*** **Yoğurtçuoğlu, Kaya & Freyhof, 2021** - **[VU]**

**Common names.** Eber loach / Eber çöpçü balığı

**Distribution.** Endemic. Lakes Akşehir, Eber, Eğirdir, and Ilgın basins.

***Oxynoemacheilus paucilepis*** **(Erk'akan, Nalbant & Özeren, 2007)** - **[EN]**

**Common names.** Tohma loach / Tohma çöpçü balığı

**Distribution.** Endemic. Mancınık, Çetinkaya, and Kalkım drainages in upper Euphrates.

***Oxynoemacheilus sarali*** **Turan, Kocabaş & Aksu, 2025** - **[NE]**

**Common names.** Merziman loach / Merziman çöpçü balığı

**Distribution.** Endemic. Merziman River in Euphrates drainage.

***Oxynoemacheilus sarus*** **Freyhof, Yoğurtçuoğlu & Kaya, 2021** - **[LC]**

**Common names.** Sarus loach / Sarus çöpçü balığı

**Distribution.** Endemic. Lower Seyhan and Ceyhan drainages.

***Oxynoemacheilus seyhanensis*** **(Banarescu, 1968)** - **[LC]**

**Common names.** Lycaonian loach / Seyhan çöpçü balığı

**Distribution.** Endemic. Kızılırmak and Yeşilırmak drainages, also in upper and middle Seyhan, and in Çerkeş, in upper Filyos drainage. Recorded from Sultan Marshes, where it was introduced through the Zamantı tunnel.

***Oxynoemacheilus seyhanicola*** **(Erk'akan, Nalbant & Özeren, 2007)** - **[LC]**

**Common names.** Adana loach / Adana çöpçü balığı

**Distribution.** Endemic. Seyhan and Ceyhan drainages.

***Oxynoemacheilus simavicus*** **(Balik & Banarescu, 1978)** - **[LC]**

**Common names.** Mysian loach / Simav çöpçü balığı

**Distribution.** Endemic. Susurluk, Sakarya, and Büyük Melen drainages.

***Oxynoemacheilus theophilii*** **Stoumboudi, Kottelat & Barbieri, 2006** - **[EN]**

**Common names.** Aeolian loach / Midilli çöpçü balığı

**Distribution.** Bakırçay drainage western Anatolia.

***Oxynoemacheilus tigris*** **(Heckel, 1843)** - **[EN]**

**Common names.** Halap loach / Halep çöpçü balığı

**Distribution.** Qweiq River drainage.

***Oxynoemacheilus veyselorum* Çiçek, Eagderi & Sungur 2018 - [LC]**

**Common names.** Aras loach / Aras çöpçü balığı

**Distribution.** Aras River drainage in northeastern Anatolia.

**Note.** The species was recently described by Çiçek et al. (2018) from Stream Bozkuş, a drainage of Aras River. Jouladeh-Roudbar et al. (2020) recorded the species in Iran. Probably it is more widespread in Aras and maybe also occurs in Armenia.

***Paracobitis salihae* Kaya, Turan, Kalaycı, Bayçelebi & Freyhof, 2020 - [VU]**

**Common names.** Euphrates crested loach / Fırat sorguçlu balığı

**Distribution.** Endemic. Distribution of this recently described species is poorly known and restricted in Göksu River (a drainage of Euphrates River) near Gölbaşı Adıyaman (Kaya et al., 2020c).

***Paracobitis zabgawraensis* Freyhof, Esmaeili, Sayyadzadeh & Geiger, 2014 - [LC]**

**Common names.** Greater Zab crested loach / Dicle sorguçlu balığı

**Distribution.** Upper Yanarsu, Botan, Nerduş, and Greater Zab drainages, in south eastern Türkiye.

***Schistura chrysicristinae* Nalbant, 1998 - [EN]**

**Common names.** Batman loach / Batman çöpçü balığı

**Distribution.** Endemic. Ambar and Batman drainages. Probably extirpated in Ambar.

***Seminemacheilus ahmeti* Sungur, Jalili, Eagderi & Çiçek 2018 - [CR]**

**Common names.** Sultansazlığı pond loach **/** Sultansazlığı pınar balığı

**Distribution.** Endemic. Known from Sultan Marshes (Kayseri).

***Seminemacheilus attalicus* Yoğurtçuoğlu, Kaya, Geiger & Freyhof, 2020 - [EN]**

**Common names.** Kırkgöz pond loach / Kırkgöz pınar balığı

**Distribution.** Endemic. Known from spring Kırkgöz, in Antalya.

***Seminemacheilus ekmekciae* Yoğurtçuoğlu, Kaya, Geiger & Freyhof, 2020 - [EN]**

**Common names.** Central Anatolian Pond loach / İnsuyu pınar balığı

**Distribution.** Endemic. Known only from Lake Tuz Basin and Ereğli marshes, Central Anatolia.

***Seminemacheilus ispartensis* Erk'akan, Nalbant & Özeren, 2007 - [EN]**

**Common names.** Southern pond loach / Isparta pınar balığı

**Distribution.** Endemic. Lake Eğirdir and Salda basins and stream Beşevler near Eğirdir in northeast to Burdur basin.

***Seminemacheilus lendlii* (Hankó, 1924) - [VU]**

**Common names.** Northern pond loach / Sakarya pınar balığı

**Distribution.** Endemic. Lake Eymir-Mogan basins (Ankara), Porsuk drainage, a tributary of upper Sakarya, and Lake Akşehir, Eber, and Ilgın basins.

***Seminemacheilus tubae* Yoğurtçuoğlu, Kaya, Geiger & Freyhof, 2020 - [EN]**

**Common names.** Golden spring loach / Altın pınar balığı

**Distribution.** Endemic. Lake Beyşehir Basin (Central Anatolia) and Göksu drainage (Mediterranean Basin).

**Remarks.** *Seminemacheilus dursunavsari* is a synonym.

***Turcinoemacheilus ekmekciae* Kaya, Yoğurtçuoğlu, Aksu, Bayçelebi & Turan, 2023 - [LC]**

**Common names.** Anatolian dwarf loach / Anadolu cüce çöpçüsü

**Distribution.** Endemic. Upper Murat in Euphrates, Yanarsu, Botan, Nerduş, and Batman in upper Tigris drainage.

***Turcinoemacheilus kosswigi* Banarescu & Nalbant, 1964 - [CR]**

**Common names.** Hakkari dwarf loach / Hakkari cüce çöpçüsü

**Distribution.** Endemic. Upper Greater Zab drainage.

***Turcinoemacheilus minimus* Esmaeili, Sayyadzadeh, Özuluğ, Geiger & Freyhof, 2014 - [LC]**

**Common names.** Euphrates dwarf loach / Fırat cüce çöpçüsü

**Distribution.** Endemic. Known from Göksu River and tributaries in upper Euphrates River.

**FAMILY LORICARIIDAE RAFINESQUE, 1815**

***Pterygoplichthys disjunctivus* x *Pterygoplichthys pardalis* - [Non-native]**

**Common names.** Hybrid sailfin catfish / Hibrit vatoz

**Distribution.** Pınarbaşı Stream (near the town of İnönü), possibly also in Orontes.

**FAMILY BAGRIDAE BLEEKER, 1858**

***Mystus misrai* Anuradha, 1986 - [CR]**

**Common names.** Hatay zugzug / Hatay kedi balığı

**Distribution.** Endemic. Lower Orontes drainage, southern Türkiye.

***Mystus pelusius* (Solander, 1794) - [LC]**

**Common names.** Zugzug catfish / Mezopotamya kedi balığı

**Distribution.** Tigris, Euphrates and Qweiq River drainages, extirpated from Qweiq.

**FAMILY CLARIIDAE BONAPARTE, 1845**

***Clarias* sp. - [Non-native]**

**Common names.** Walking catfish / Yürüyen kedibalığı

**Distribution.** Pınarbaşı near İnönü in upper Sakarya River north Anatolia.

**Taxonomic notes.** This species has often been misidentified as *C. batrachus*, which is actually restricted to Java, Indonesia. Records from other regions indicate the presence of distinct species or hybrids, highlighting the need for proper

identification of non-native populations (Freyhof et al., 2025a).

***Clarias gariepinus*** **(Burchell, 1822)** - **[Non-native]**

**Common names.** Sharptooth catfish / Kara balık

**Distribution.** Sakarya, Orontes, Aksu, Göksu, Seyhan, and Ceyhan River drainages in southern Anatolia.

***Heteropneustes fossilis*** **(Bloch, 1794)** - **[Non-native]**

**Common names.** Stinging catfish / Sokan kedibalığı

**Distribution.** It was recorded from the Tigris River Basin (around Diyarbakır) in southeastern Anatolia. Also in brackish water.

**FAMILY SILURIDAE RAFINESQUE, 1815**

***Silurus glanis*** **Linnaeus, 1758** - **[LC]**

**Common names.** European catfish / Yayın

**Distribution.** Widespread in Türkiye, except Tigris and Euphrates basins.

***Silurus triostegus*** **Heckel, 1843** - **[LC]**

**Common names.** Mesopotamian catfish / Mezopotamya yayını

**Distribution.** Tigris and Euphrates River drainages in southeastern Anatolia.

**FAMILY SISORIDAE BLEEKER, 1858**

***Glyptothorax armeniacus*** **(Berg, 1918)** - **[LC]**

**Common names.** Euphrates torrent catfish / Fırat bodur yayını

**Distribution.** Upper Euphrates drainages.

***Glyptothorax cous*** **(Linnaeus, 1766)** - **[LC]**

**Common names.** Mesopotamian torrent catfish / Mezopotomya bodur yayını

**Distribution.** Qweiq, Euphrates, and Tigris drainages.

***Glyptothorax daemon*** **Freyhof, Kaya, Abdullah & Geiger, 2021** - **[LC]**

**Common names.** Ghost torrent catfish / Hayalet bodur yayını

**Distribution.** Upper Tigris and Great Zab drainages.

***Glyptothorax kurdistanicus*** **(Berg, 1931)** - **[LC]**

**Common names.** Tigris torrent catfish / Vantuzlu bodur yayın

**Distribution.** Upper Tigris drainages.

***Glyptothorax sardashtensis*** **Jokar, Kamangar, Ghaderi & Freyhof, 2023**

**Common names.** Sardasht torrent catfish / Batman bodur yayını

**Distribution.** Upper Tigris drainages.

***Glyptothorax steindachneri*** **(Pietschmann, 1913) [NE]**

**Common names.** Longfin torrent catfish / Vantuzlu yayın

**Distribution.** Ilısu Dam reservoir (Upper Tigris) (Ünlü, 2021).

**FAMILY COREGONIDAE JORDAN, 1963**

***Coregonus albula*** **(Linnaeus, 1758)** - **[Non-native]**

**Common names.** Baltic cisco / Baltık alası

**Distribution.** Lake Aktaş, Eastern Anatolia.

**FAMILY ESOCIDAE RAFINESQUE, 1815**

***Esox lucius*** **Linnaeus, 1758** - **[LC]**

**Common names.** Pike / Turna

**Distribution.** Akarçay, Seyhan, Kızılırmak, Sakarya, Büyük Menderes, Meriç, and Susurluk River drainages. Lake Terkos, Büyükçekmece Reservoir, and some lake drainages in Central Anatolian lake basins. Also in brackish water.

**FAMILY SALMONIDAE JAROCKI OR SCHINZ, 1822**

***Oncorhynchus mykiss*** **(Walbaum, 1792)** - **[Non-native]**

**Common names.** Rainbow trout / Gökkuşağı alabalığı

**Distribution.** Not native to Türkiye. But very widespread in the inland waters of Türkiye due to escapes from fish farms.

***Salmo abanticus*** **Tortonese, 1954** - **[VU]**

**Common names.** Abant trout / Abant alası

**Distribution.** Endemic. Lake Abant Basin, northwestern Anatolia. Introduced to several Turkish lakes (Sülüklü, Sünnet), streams (Çal, Serke), and ponds (Topardıç, Geyik, Beyderesi, Sirinyazı, Adalı, Dereçatı, Banaz, Sorgun, and Karagöl) for recreational fisheries. Not established outside of the Abant Basin.

***Salmo araxensis*** **Turan, Kottelat & Kaya, 2022** - **[LC]**

**Common names.** Aras trout / Aras alası

**Distribution.** Endemic. Kırkpınar, Alacasu, Porsuklu, and İncilipınar in upper Aras drainage, eastern Anatolia.

***Salmo ardahanensis*** **Turan, Kottelat & Kaya, 2022** - **[LC]**

**Common names.** Ardahan trout / Ardahan alası

**Distribution.** Endemic. Kura River drainage, eastern Anatolia.

***Salmo baliki*** **Turan, Aksu, Oral, Kaya & Bayçelebi, 2021** - **[EN]**

**Common names.** Murat trout / Murat alası

**Distribution.** Endemic. Sinek and Cumaçay in upper Murat drainage, potentially in adjacent streams, eastern Anatolia.

***Salmo brunoi*** **Turan, Bayçelebi, Aksu & Oral, 2024** - **[NE]**

**Common names.** Nilüfer trout / Nilüfer alası

**Distribution.** Endemic. Aras, Deliçay, and Ericek, all tributaries to Nilüfer in Susurluk drainage.

***Salmo chilo*** **Turan, Kottelat & Engin, 2012** - **[NE]**

**Common names.** Ceyhan trout / Ceyhan alası

**Distribution.** Endemic. Göksu, Tekir, Fırnız, Göçüksu, and other tributaries to upper Ceyhan and Sarız, a tributary to upper Seyhan.

***Salmo ekmekciae*** **Küçük, Kalaycı, Güçlü, Oral & Turan, 2024** - **[EN]**

**Common names.** Köprüçay trout / Köprüçay alası

**Distribution.** Endemic. Köprüçay drainage.

***Salmo emireae*** **Turan, Kocabaş, Kaya, Oral Kaba & Aksu, 2025** - **[NE]**

**Common names.** Ağrı trout / Ağrı alası

**Distribution.** Endemic. Lake Balık (Aras drainage) in northern Anatolia (Turan et al., 2025, in press).

***Salmo euphrataeus* Turan, Kottelat & Engin, 2014 - [LC]**

**Common names.** Northern Euphrates trout / Fırat alası

**Distribution.** Endemic. Şenyurt, Erzincan, Kuzgun, Rizekent, Ağırcık, and Sırlı (Karasu drainage) in northern Euphrates.

***Salmo fahrettini* Turan, Kalaycı, Bektaş, Kaya & Bayçelebi 2020 - [EN]**

**Common names.** Euphrates trout / Erzurum alası

**Distribution.** Endemic. Known from streams Tekke and Ömertepesuyu, upper Euphrates drainages around Erzurum, also recorded in and Terme drainage, east of Samsun, in Black Sea basin.

***Salmo kottelati* Turan, Doğan, Kaya & Kanyılmaz, 2014 - [EN]**

**Common names.** Alakır trout / Alakır alası

**Distribution.** Endemic. Stream Alakır, a coastal drainage of Mediterranean Sea, near Antalya.

***Salmo labecula* Turan, Kottelat & Engin, 2012 - [VU]**

**Common names.** Eastern Mediterranean trout / Seyhan alası

**Distribution.** Endemic. Ecemiş, lower Zamantı, and Çakıt in Seyhan drainage.

***Salmo labrax* Pallas, 1814 - [LC]**

**Common names.** Black Sea trout / Karadeniz alası

**Distribution.** Marmara and Black Sea basins. Also in marine and brackish water.

**Remarks.** *Salmo coruhensis* is a synonym (Ninua et al., 2023)

***Salmo munzuricus* Turan, Kottelat & Kaya, 2017 - [LC]**

**Common names.** Munzur trout / Munzur alası

**Distribution.** Endemic. Munzur and Murat in upper Euphrates drainage. Also, in Keban Reservoir and a tributary south of Keban drainage.

***Salmo murathani* Turan, Kottelat & Kaya, 2022 - [LC]**

**Common names.** Sarıkamış trout / Sarıkamış alası

**Distribution.** Endemic. Lake Çıldır, upper Aras, Keklik, Kızılçubuk, Arpaçay, and Maksutçuk in Aras drainage, eastern Anatolia.

***Salmo okumusi* Turan, Kottelat & Engin, 2014 - [LC]**

**Common names.** Western Euphrates trout / Gökpınar alası

**Distribution.** Endemic. Göksu, Lake Gökpınar Basin (in Tohma drainage), and Sürgü in Euphrates drainage.

***Salmo opimus* Turan, Kottelat & Engin, 2012 - [LC]**

**Common names.** Alara trout / Alara alası

**Distribution.** Endemic. Alara, a coastal Mediterranean drainage.

***Salmo platycephalus* Behnke, 1968 - [LC]**

**Common names.** Flathead trout / Yassıbaş ala

**Distribution.** Endemic. Soğuksu, Uzunyayla, and Karagöz in upper Zamantı drainage.

***Salmo rizeensis* Turan, Kottelat & Engin, 2010 - [LC]**

**Common names.** Pontic brook trout / Rize alası

**Distribution.** The upper part of the streams and rivers of the middle and eastern Black Sea coast of Anatolia.

***Salmo sengulae* Oral Kaba, Güçlü, Küçük, Kalaycı & Turan, 2025 - [NE]**

**Common names.** Berdan trout / Berdan alası

**Distribution.** Endemic. Known from the Berdan (a drainage of Mediterranean Sea) and İvriz (a drainage of Konya closed basin) streams (Oral Kaba et al., 2025, in press).

***Salmo tigridis* Turan, Kottelat & Bektaş, 2011 - [EN]**

**Common names.** Tigris trout / Dicle alası

**Distribution.** Endemic. Çatak and Müküs in upper Tigris drainage south of Lake Van.

***Salmo trutta* Linnaeus, 1758 - [Non-native]**

**Common names.** Brown trout / Kahverengi alabalık

**Distribution.** Two established populations of the introduced *S. trutta* were recorded in a southeastern drainage of Lake Van and one of the uppermost tributaries of Tigris River (Kaya, 2020b). Also in marine and brackish water.

***Salmo* sp. - [NE]**

**Common names.** Marmara trout / Marmara alası

**Distribution.** Endemic. Ayazma, a headwater stream in Karamenderes drainage and upper tributaries of Gönen on Biga Peninsula.

**Remarks.** This species was described as *S. duhani* in 2021, but the name is a nomen nudum and is not valid from the description.

**FAMILY GOBIIDAE CUVIER, 1816**

***Babka gymnotrachelus* (Kessler, 1857) - [LC]**

**Common names.** Racer goby / Sarıkaya balığı

**Distribution.** Turkish Black Sea and Marmara drainages. Freshwater and brackish species.

***Mesogobius batrachocephalus* (Pallas, 1814) - [LC]**

**Common names.** Knout goby / Kurbağa kayası

**Distribution.** Turkish Black Sea and Marmara drainages. Also in marine and brackish water.

***Neogobius fluviatilis* (Pallas, 1814) - [LC]**

**Common names.** Monkey goby / Tatlısu kayabalığı

**Distribution.** The species is known from Marmara and Turkish Black Sea drainages. It was also recorded in a drainage of Aras River in Türkiye (Kaya et al., 2020a). Also in brackish water.

***Neogobius melanostomus* (Pallas, 1814) - [LC]**

**Common names.** Round goby / Kocabaş kayabalığı

**Distribution.** Known from Turkish Black Sea drainages. Also in brackish water.

***Ponticola constructor* (Nordmann, 1840) - [LC]**

**Common names.** Caucasian goby / Kafkas kayabalığı

**Distribution.** Çoruh River in northeast Anatolia.

***Ponticola cyrius* (Kessler, 1874) - [LC]**

**Common names.** Kura goby / Kura kayabalığı

**Distribution.** Kura River drainages in northeast Anatolia.

***Ponticola rizensis* Kovaćić & Engin, 2008 - [VU]**

**Common names.** Colchic goby / Rize kayabalığı

**Distribution.** Endemic. Coastal streams draining to eastern Black Sea in northeastern Anatolia.

**Remarks.** *Ponticola turani* is a synonym (Freyhof et al., 2025a).

***Proterorhinus semilunaris* (Heckel, 1837) - [LC]**

**Common names.** Western tubenose goby / Batı tüpburunlu kayabalığı

**Distribution.** Marmara and Black Sea basins, and Meriç drainages. Also in brackish water.

**FAMILY OXUDERCIDAE GUNTHER, 1861**

***Knipowitschia byblisia* Ahnelt, 2011 - [EN]**

**Common names.** Köyceğiz dwarf goby / Köyceğiz kayabalığı

**Distribution.** Endemic. Lake Köyceğiz Basin, a small stream flowing to Gökova Bay, and lower Dalaman drainage. Also in brackish water.

***Knipowitschia caucasica* (Berg, 1916) - [LC]**

**Common names.** Caucasian dwarf goby / Cüce kayabalığı

**Distribution.** Coasts of the Black, Azov, Caspian, and Marmara Seas. Also, along the northern Aegean west the Aliakmonon drainage (Greece). Introduced in Karamanlı Reservoir, Lakes Beyşehir, Eğirdir, and Eber basins, Büyük Menderes drainage, and some places around Antalya (Türkiye). Also in marine and brackish water.

***Knipowitschia caunosi* Ahnelt, 2011 - [EN]**

**Common names.** Kaunos dwarf goby / Kaunos cüce kayabalığı

**Distribution.** Endemic. Köyceğiz Lake, southwest Türkiye.

***Knipowitschia mermere* Ahnelt, 1995 - [VU]**

**Common names.** Gediz dwarf goby / Gediz cüce kayabalığı

**Distribution.** Endemic. Lower Gediz and Madra drainages. Also in brackish water.

***Knipowitschia ricasolii* (Di Caporiacco, 1935) - [EN]**

**Common names.** Ephesus dwarf goby / Efes cüce kayabalığı

**Distribution.** Endemic. Lakes Gebekirse and Kocagöz basins and Eleman marshes in lower Küçük Menderes drainage. Also in brackish water.

**Remarks.** *Knipowitschia ephesi* is a synonym of this species.

***Rhinogobius* sp. - [Non-native]**

**Common names.** Stream goby / Nehir cüce kayabalığı

**Distribution.** Endemic. Aras River, very close to the Armenia border. Also in brackish water.

**FAMILY SYNGNATHIDAE RAFINESQUE, 1810**

***Syngnathus nigrolineatus* Risso, 1827 - [LC]**

**Common names.** Black Sea pipefish / Deniz iğnesi

**Distribution.** Coastal habitats and lower reaches of rivers in Black Sea basin. Also in marine and brackish water.

**FAMILY ATHERINIDAE RISSO, 1827**

***Atherina pontica* Eichwald, 1831 - [LC] [Translocated]**

**Common names.** Eastern sand smelt / Gümüş balığı

**Distribution.** Native to Aegean, Marmara, and Black Sea basins. Translocated into freshwater habitats, including Konya closed basin, reservoirs in Kızılırmak drainage, Devegeçidi Reservoir (Tigris drainage), Keban Reservoir (Euphrates drainage) and reservoirs in Levant (Ekmekçi et al., 2013; Ünlü et al., 2017). Also in marine and brackish water.

**Taksonomic notes.** All populations in Türkiye had been accepted as *A. boyeri*. However, recent data demonstrated that *A. boyeri* being restricted to the western Mediterranean (Freyhof et al., 2025a).

**FAMILY APHANIIDAE HOEDEMAN, 1949**

Freyhof & Yoğurtçuoğlu (2020) proposed separation of Aphaniidae into eight monophyletic genera: *Anatolichthys*, *Aphaniops*, *Aphanius*, *Apricaphanius*, *Kosswigichthys*, *Paraphanius*, and *Tellia*, in addition to the new genera *Esmaeilius*. According to their new proposal, in Türkiye, there are three genus (*Anatolichthys*, *Aphanius*, *Kosswigichthys,* and *Paraphanius*) which were listed below.

***Anatolichthys anatoliae* (Leidenfrost, 1912) - [VU]**

**Common names.** Lake Tuz killifish / Anadolu dişlisazancığı

**Distribution.** Endemic. Lakes Tuz, Beyşehir and Suğla basins, around Konya and eastward to Niğde.

***Anatolichthys danfordii* (Boulenger, 1890) - [CR]**

**Common names.** Sultansazlığı killifish / Sultansazlığı dişlisazancığı

**Distribution.** Endemic. The species known only from Sultan Marshes in Central Anatolia.

**Remarks.** *Cyprinodon chantrei* is a synonym.

***Anatolichthys fontinalis* Akşıray, 1948 - [EN]**

**Common names.** Yarışlı killifish / Yarışlı dişlisazancığı

**Distribution.** Endemic. Karapınar Spring near Yeşilova, Düğer and Gümbet springs near Lake Yarışlı and southwest of Lake Burdur, springs in former Lake Karaevli southeast of Lake Burdur and lakes Karataş and Salda basins.

***Anatolichthys iconii* Akşıray, 1948 - [VU]**

**Common names.** Eğirdir killifish / Eğirdir dişlisazancığı

**Distribution.** Endemic. Lakes Eğirdir and Kovada drainages.

***Anatolichthys irregularis* Yoğurtçuoğlu & Freyhof, 2018 - [CR]**

**Common names.** Kaklık killifish / Kaklık dişlisazancığı

**Distribution.** Endemic. Known only from spring Kaklık, in Büyük Menderes drainage.

***Anatolichthys maeandricus* Akşıray, 1948 - [EN]**

**Common names.** Büyük Menderes killifish / Menderes dişlisazancığı

**Distribution.** Endemic. Lake Işıklı (Denizli) and Düden Spring (Afyonkarahisar).

***Anatolichthys marassantensis* Pfleiderer, Geiger & Herder, 2014 - [LC]**

**Common names.** Kızılırmak killifish / Kızılırmak dişlisazancığı

**Distribution.** Endemic. Kızılırmak drainage and lower and middle Yeşilırmak drainage; also in adjacent coastal wetlands west of Sinop.

***Anatolichthys meridionalis* Akşıray, 1948 - [VU]**

**Common names.** Lycian killifish / Likya dişlisazancığı

**Distribution.** Endemic. Upper Eşen River drainage and Sögüt, Avlan, and Gölhisar lake basins. Also, in a small reservoir in Lake Salda basin (potentially introduced).

***Anatolichthys saldae* Akşıray, 1955 - [CR]**

**Common names.** Salda killifish / Salda dişlisazancığı

**Distribution.** Endemic. Lake Salda (Burdur).

***Anatolichthys splendens* (Kosswig & Sözer, 1945) - [EX]**

**Common names.** Gölcük killifish / Gölcük dişlisazancığı

**Distribution.** Endemic. Lake Gölcük in Isparta.

***Anatolichthys sureyanus* (Neu, 1937) - [EN]**

**Common names.** Burdur killifish / Burdur dişlisazancığı

**Distribution.** Endemic. Lake Burdur, especially in the lake shore and spring discarhge points.

***Anatolichthys transgrediens* (Ermin, 1946) - [CR]**

**Common names.** Acıgöl killifish / Acıgöl dişlisazancığı

**Distribution.** Endemic. Freshwater spring system of Lake Acıgöl (Afyon-Denizli).

***Anatolichthys villwocki* Hrbek & Wildekamp, 2003 - [LC]**

**Common names.** Sakarya killifish / Sakarya dişlisazancığı

**Distribution.** Endemic. Known from Lake Ilgın (Konya), a spring about 11 km east of Emirdağ (Afyonkarahisar), and upper Sakarya River drainages, Black Sea basin.

***Aphanius almiriensis* Kottelat, Barbieri & Stoumboudi, 2007 - [LC]**

**Common names.** Almiri killifish / Almiri dişlisazancığı

**Distribution.** Tuzla Estuary and thermal springs, Lake Bafa, and coastal lagoons around İzmir (Homa Lagoon), Aegean shores of Anatolia. Also in brackish water.

***Aphanius fasciatus* (Valenciennes, 1821) - [LC]**

**Common names.** Mediterranean killifish / Akdeniz dişlisazancığı

**Distribution.** Deltaic areas of Köyceğiz, Göksu, Seyhan, and Ceyhan, in a stream near İskenderun, lowermost Susurluk in Marmara Basin, Lake Bafa and perhaps elsewhere in southern Türkiye. Also in marine and brackish water.

***Kosswigichthys asquamatus* Sözer, 1942 - [EN]**

**Common names.** Hazer killifish / Hazar dişlisazancığı

**Distribution.** Endemic. Lake Hazar (Elazığ).

***Paraphanius alexandri* (Akşiray, 1948) - [LC]**

**Common names.** İskenderun killifish / İskenderun dişlisazancığı

**Distribution.** Endemic. Middle and upper Ceyhan drainage, Erzin drainage (Antakya), and small coastal streams in Hatay south to Arsuz. Introduced in warm springs in upper Tohma drainage (Euphrates).

***Paraphanius boulengeri* Aksiray, 1948 - [EN]**

**Common names.** Gölbaşı killifish / Gölbaşı dişlisazancığı

**Distribution.** Endemic. Lake Gölbaşı and Azaplı (Adıyaman).

***Paraphanius mentoides* Akşiray, 1948 - [EN]**

**Common names.** Antalya killifish / Antalya dişlisazancığı

**Distribution.** Endemic. Yamansaz Marsh, Düden spring in Antalya, Kırkgöz Spring, and outflowing Stream Yediarıklar. It was also introduced in Lake Nemrut in Bitlis.

***Paraphanius orontis* Akşiray, 1948 - [VU]**

**Common names.** Asi killifish / Asi dişlisazancığı

**Distribution.** Lake Titreyengöl in Manavgat-Antalya, and Orontes River drainages.

**Note.** Only recorded from Türkiye until now but expected to be also found in adjacent Syria. However, we treated this species Endemic to Türkiye until its occurrence will be confirmed in Syria.

***Paraphanius similis* Akşiray, 1948 - [LC]**

**Common names.** Adana killifish / Adana dişlisazancığı

**Distribution.** Endemic. Lower Tarsus, Seyhan, and Ceyhan rivers. Also, in springs in Ereğli marshes.

**FAMILY POECILIIDAE BONAPARTE, 1831**

***Gambusia holbrooki* Girard, 1859 - [Non-native]**

**Common names.** Eastern mosquitofish / Sivrisinek balığı

**Distribution.** *Gambusia holbrooki* is not a native species. It was first introduced into Lake Amik (Antakya) for controlling mosquitos, later widely distributed in Türkiye. Freshwater and brackish water species.

***Poecilia reticulata* Peters, 1859 - [Non-native]**

**Common names.** Guppy / Lepistes

**Distribution.** Introduced to the warm springs in upper Tohma drainage (Euphrates), middle Sakarya in Eskişehir and Ilıca in İzmir. Also in brackish water.

***Xiphophorus hellerii* Heckel, 1848 - [Non-native]**

**Common names.** Green swordtail / Kılıçkuyruk

**Distribution.** Introduced to the warm springs in the upper Tohma drainage (Euphrates). Also in brackish water.

***Xiphophorus maculatus* (Günther, 1866) - [Non-native]**

**Common names.** Platy / Plati

**Distribution.** Introduced to the warm springs in the upper Sakarya drainage.

**FAMILY BLENNIIDAE RAFINESQUE, 1810**

***Salariopsis burcuae* Yoğurtçuoğlu, Kaya, Atalay, Ekmekçi & Freyhof, 2023 - [LC]**

**Common names.** Eastern freshwater blenny / Akdeniz horozbinası

**Distribution.** Known from Antalya Bay to the Seyhan River in Türkiye.

***Salariopsis fluviatilis* (Asso, 1801)** - **[LC]**

**Common names.** Freshwater blenny / Horozbina

**Distribution.** Marmara, Aegean, and Western Mediterranean coasts of Türkiye. Also in Black Sea basin (Kızılırmak). A resident population of *Salariopsis fluviatilis* was identified in the upper basins of the Kızılırmak River, with the highest altitude being 753 m. (Güçlü et al., 2025c).

***Salariopsis renatorum* Yoğurtçuoğlu, Kaya, Atalay, Ekmekçi & Freyhof, 2023** - **[LC]**

**Common names.** Ceyhan blenny / Ceyhan horozbinası

**Distribution.** Ceyhan and Arsuz drainages.

**FAMILY CICHLIDAE BONAPARTE, 1835**

***Amatitlania nigrofasciata* (Günther, 1867)** - **[Non-native]**

**Common names.** Convict cichlid / Zebra Ciklet

**Distribution.** Introduced to the hot springs in the upper Sakarya River drainage.

***Coptodon zillii* (Gervais, 1848)** - **[Non-native]**

**Common names.** Redbelly tilapia / Tilapya

**Distribution.** Introduced to Orontes, Köyceğiz, lower Dalaman, and Burdur (Pınarbaşı Spring) basins in Türkiye.

***Oreochromis aureus* (Steindachner, 1864)** - **[Non-native]**

**Common names.** Blue tilapia / Mavi tilapya

**Distribution.** Introduced to Orontes, Ceyhan, and Sakarya rivers in Türkiye. Also in brackish water.

**FAMILY MUGILIDAE JAROCKI, 1822**

***Chelon auratus* (Risso, 1810)** - **[NT]**

**Common names.** Golden mullet / Sarı kulak; Altınbaş kefal

**Distribution.** All lagoon and estuarine areas in Turkish sea coasts. Also in marine and brackish water.

***Chelon labrosus* (Risso, 1827)** - **[NT]**

**Common names.** Thick grey mullet / Mavri; Mavraki

**Distribution.** All lagoon and estuarine areas along the Turkish sea coasts. Also in marine and brackish water.

***Chelon ramada* (Risso, 1827)** - **[NT]**

**Common names.** Thinlip mullet / Pulatarina; Ceran

**Distribution.** All lagoon and estuarine areas along the Turkish sea coasts. Also in marine and brackish water.

***Chelon saliens* (Risso, 1810)** - **[NT]**

**Common names.** Sharpnose mullet / Kastros; Sivriburun kefal

**Distribution.** All lagoon and estuarine areas along the Turkish sea coasts. Also in marine and brackish water.

***Mugil cephalus* Linnaeus, 1758** - **[LC]**

**Common names.** Striped mullet / Has kefal

**Distribution.** All lagoon and estuarine areas along the Turkish sea coasts. Also in marine and brackish water.

***Planiliza abu* (Heckel, 1843)** - **[LC]**

**Common names.** Abu mullet / Mezopotamya kefali

**Distribution.** Tigris, Euphrates, and Qweiq. Introduced to the Orontes and Ceyhan River drainages. Also in brackish water.

***Planiliza haematocheilus* (Temminck & Schlegel, 1845)** - **[Non-native]**

**Common names.** Soiuy mullet / Rus kefali

**Distribution.** Introduced in the Sea of Azov in the late 1960s, it reached to Black, Marmara, and Aegean Sea coasts of Türkiye. Also in marine and brackish water.

**FAMILY PLEURONECTIDAE RAFINESQUE, 1815**

***Platichthys flesus* (Linnaeus, 1758)** - **[LC]**

**Common names.** Flounder / Derepisisi

**Distribution.** Marmara and Black Sea coasts of Türkiye. Also in marine and brackish water.

**FAMILY MASTACEMBELIDAE SWAINSON, 1839**

***Mastacembelus simack* (Walbaum, 1792)** - **[LC]**

**Common names.** Mesopotamian spiny eel / Dikenli yılan balığı

**Distribution.** Tigris, Euphrates, and Qweiq River drainages.

**FAMILY PERCIDAE RAFINESQUE, 1815**

***Gymnocephalus cernua* (Linnaeus, 1758)** - **[LC]**

**Common names.** Ruffe / Trakya levreği

**Distribution.** Meriç drainage northwest of Türkiye. Also in brackish water.

***Perca fluviatilis* Linnaeus, 1758** - **[LC] [Translocated]**

**Common names.** Perch / Tatlısu levreği

**Distribution.** Native to Black Sea coast of Türkiye. Introduced to the Akarçay Basin and Aegean Sea Basin (Büyük Menderes and Küçük Menderes). Recently introduced into the Keban Dam (Euphrates); however, further data is needed to assess its establishment status. Also in brackish water.

***Sander lucioperca* (Linnaeus, 1758)** - **[LC]**

**Common names.** Pikeperch / Sudak

**Distribution.** Native to the Anatolian Black Sea watersheds. Introduced into Central Anatolia (Lakes Beyşehir and Eğirdir, and Demirköprü, Hirfanlı and Seyhan reservoirs). Also in brackish water.

**FAMILY GASTEROSTEIDAE BONAPARTE, 1831**

***Gasterosteus aculeatus* Linnaeus, 1758** - **[LC]**

**Common names.** Threespined stickleback / Dikence balığı

**Distribution.** Locally known from some Black, Marmara and Mediterranean Sea drainages. İznik Lake, Azmak Stream (Muğla), Lake Gölhisar and and Gökpınar Spring upper Dalaman River (Güçlü et al., 2021), also in coastal streams in Samsun, southern Black Sea drainages.

**FAMILY CENTRARCHIDAE BLEEKER, 1859**

***Lepomis gibbosus* (Linnaeus, 1758)** - **[Non-native]**

**Common names.** Pumpkinseed / Güneş balığı

**Distribution.** Introduced populations of the species known from Gediz, Büyük and Küçük Menderes River drainages in Aegean Sea basin, Sakarya and lower Kızılırmak River drainages in Black Sea basin, Susurluk and Lake İznik drainages in Marmara Sea basin, and the upper Dalaman River in Mediterranean Sea basin. Also widespread in the Thrace Region.

**FAMILY MORONIDAE JORDAN & EVERMANN, 1896**

***Dicentrarchus labrax* (Linnaeus, 1758)** - **[NT]**

**Common names.** Seabass / Deniz levreği

**Distribution.** All Turkish sea coasts. Also in marine and brackish water.

## Discussion

### Overall Species Richness and Endemism

This study aimed to provide a reliable national baseline for the freshwater fishes of Türkiye, linking taxonomy with distribution and geography. Previous lists either predated the recent wave of taxonomic research or lacked consistent species selection criteria and a transparent spatial framework. Our synthesis brings these aspects together for the first time, establishing a nationwide expert consensus on which species occur in Türkiye and how they are taxonomically arranged.

Our checklist confirms that Türkiye holds a very rich and highly endemic freshwater fish fauna. The 370 native species we recognise, over half of which are endemic, place the country among the most distinctive freshwater regions in the Mediterranean. This level of endemism reflects the complex biogeographic history of Anatolia, which has acted both as a refugium during Pleistocene glaciations and as a centre of in situ diversification in isolated lake basins and mountain drainages (Oikonomou et al., 2014; Smith & Darwall, 2006). The dominance of the families Leuciscidae, Nemacheilidae and Cyprinidae, together accounting for most native species, mirrors broader Mediterranean and temperate Eurasian patterns while also highlighting regional evolutionary radiations (Crivelli, 1996; Geiger et al., 2014; Freyhof et al., 2025a; Šlechtová et al., 2025). This taxonomic concentration has important implications: the evolutionary and ecological diversity of Türkiye's freshwater fish fauna is disproportionately represented by a few lineages, making the fauna highly sensitive to declines within these groups. A disease outbreak, new invader or major habitat loss affecting one such clade could rapidly erode a large share of national diversity and ecosystem function. At the same time, this concentration means that well-designed, lineage-focused work on taxonomy, systematics and habitat protection for these key groups can deliver unusually high returns for biodiversity documentation and management at the national scale.

### Checklist Assessment

The number of freshwater fish species in Türkiye has been reported to be over 400 in previous studies (409 by Çiçek et al., 2018; 427 by Çiçek et al., 2023) due to the classification of several incorrect or doubtful species under Turkish freshwater fish species. The recording of twenty extra species in the Kura and Aras drainages of Türkiye alone reveals the number of these erroneously recorded species (Kaya et al., 2020a). Table 1 lists 47 fish species that are listed among the Turkish freshwater fish species, although they are not found in Türkiye, or are no longer valid species, or although they are not freshwater fish species, or whose status has changed according to recent studies.

Freshwater fishes of Türkiye, with its 389 species, stands out among countries located in the biogeographic transition zone between Europe and Asia. Of these, 366 are native and 23 are alien species (5 of these have not established populations in nature). The very high level of endemism (199, or 53.5%) highlights Türkiye's value to the global freshwater biodiversity. The dominance by families like Leuciscidae, Cyprinidae, and Nemacheilidae in the fauna illustrates the evolutionary value of riverine assemblages to species richness determination. A significant group in this context is *Oxynoemacheilus*, the richest genus with 47 species, which is an excellent example of the high endemism in Türkiye due to geographic structure and isolation mechanisms. These results imply that endemic and sparsely distributed species should be the main targets of conservation initiatives in freshwater ecosystems of Türkiye.

One of the main discrepancies between our list and the recent checklist of Çiçek et al., (2023) relates to the number and range of freshwater fish species in Türkiye. Our list relies on current taxonomic revisions, confirmed distributional records, and verifiable reports, while Çiçek et al., (2023) appear to shave given an inflated number of species, with some being of questionable occurrence or relevance to the freshwater ichthyofauna of the country. This inflation appears to originate primarily from three groups of undesired inclusions:

*(i)* Marine or euryhaline species that rarely attempt to brackish or freshwater, e.g., *Sprattus sprattus*, *Sardina pilchardus*, and *Pomatoschistus anatoliae*. These taxa, although occasionally observed in estuarine zones, are not considered part of Türkiye's established inland freshwater fish fauna.

*(i)* Species with erroneous or outdated distribution records, taxa that have either never been confirmed from Türkiye, were reported based on misidentifications or speculative assumptions in older literature or were once recorded but later studies have clearly shown that they do not occur within the country. Examples include *Oxynoemacheilus bureschi*, *Oxynoemacheilus chomanicu*s, and *Salmo caspius*, whose occurrence is not based on recent distributional records and contradicts more recent biogeographic studies.

**Table 1.** Species removed from freshwater fishes of Türkiye based on updated taxonomic studies

| No | Species | Reason | Reference |
|---|---|---|---|
| 1 | *Alburnus attalus* | Synonym of *A. derjugini* | Sarıahmetoğlu (2024) |
| 2 | *Alburnus battalgilae* | Synonym of *A. derjugini* | Bayçelebi *et al.* (2021)<br>Sarıahmetoğlu (2024) |
| 3 | *Alburnus carinatus* | Synonym of *A. derjugini* | Sarıahmetoğlu (2024) |
| 4 | *Alburnus istanbulensis* | Synonym of *A. derjugini* | Sarıahmetoğlu (2024) |
| 5 | *Alburnus nasreddini* | Synonym of *A. escherichii* | Bayçelebi *et al.* (2020) |
| 6 | *Alburnus nicaeensis* | Synonym of *A. derjugini* | Sarıahmetoğlu (2024) |
| 7 | *Alburnus schischkovi* | Synonym of *A. derjugini* | Sarıahmetoğlu (2024) |
| 8 | *Anatolichthys chantrei* | Synonym of *A. danfordii* | Freyhof *et al.*, (2025a) |
| 9 | *Benthophilus nudus* | Recorded by previous checklists (Çiçek et al., 2015, 2020, 2023), however, no evidence provided for the occurrence in Türkiye | Freyhof (2024) |
| 10 | *Capoeta umbla* | Synonym of *Capoeta damascina* | (Kaya *et al.,* 2019, Freyhof *et al.*, 2025a). |
| 11 | *Chondrostoma angorense* | Synonym of *C. colchicum* | Küçük *et al.*, (2023) |
| 12 | *Chondrostoma smyrnae* | Synonym of *C. turnai* | Freyhof *et al.,* (2025a) |
| 13 | *Coptodon rendalli* | There is not any record with evidence in Türkiye | |
| 14 | *Ladigesocypris mermere* | Synonym of *Petroleuciscus smyrnaeus* | Freyhof *et al.*, (2025a) |
| 15 | *Luciobarbus barbulus* | Synonym of *L. schecjh* | Freyhof *et al.*, (2025b) |
| 16 | *Luciobarbus kersin* | Synonym of *L. schecjh* | Freyhof *et al.*, (2025b) |
| 17 | *Luciobarbus kottelati* | Synonym of *L. graecus* | Freyhof & Yoğurtçuoğlu (2024) |
| 18 | *Luciobarbus lorteti* | Synonym of *L. pectoralis* | Freyhof *et al.*, (2025a) |
| 19 | *Luciobarbus lydianus* | Synonym of *L. graecus* | Freyhof & Yoğurtçuoğlu (2024) |
| 20 | *Luciobarbus xanthopterus* | Synonym of *L. schecjh* | Freyhof *et al.*, (2025b) |
| 21 | *Oedalechilus labeo* | Marine species had never been recorded in freshwaters by evidence | |
| 22 | *Oxynoemacheilus bergi* | Unresolved taxonomic status; described from the Kura in Azerbaijan, but identity remains unclear and unconfirmed from type locality. Recent fieldwork failed to rediscover it. Needs revision | Freyhof *et al.*, (2021)<br>Freyhof *et al.*, (2025a) |
| 23 | *Oxynoemacheilus bureschi* | Restricted in Europe | Ford (2024) |
| 24 | *Oxynoemacheilus chomanicus* | Recorded in Türkiye in 2016, but later these populations were described as *O. kentritensis* | Kaya *et al.*, (2016)<br>Freyhof *et al.*, (2017) |
| 25 | *Oxynoemacheilus insignis* | It was incorrectly recorded in Türkiye, in fact it never occurred within the borders of the country | Freyhof *et al.*, (2025a) |
| 26 | *Oxynoemacheilus kurdistanicus* | Recorded in Türkiye in 2016, but later these populations were moved to the *O. marunensis* | Kaya *et al.*, (2016)<br>Freyhof *et al.*, (2025a) |
| 27 | *Oxynoemacheilus melenicus* | Synonym of *O. bergianus* | Freyhof *et al.*, (2025a) |
| 28 | *Oxynoemacheilus sakaryaensis* | Synonym of *O. bergianus* | Freyhof *et al.*, (2025a) |
| 29 | *Oxynoemacheilus samanticus* | Synonym of *O. bergianus* | Freyhof *et al.*, (2022) |
| 30 | *Pomatoschistus anatoliae* | An estuarine species, had never recorded in freshwaters | |
| 31 | *Ponticola eurycephalus* | Not a freshwater species in Turkish coasts | Freyhof *et al.*, (2025a) |
| 32 | *Ponticola ratan* | Not a freshwater species in Turkish coasts | Freyhof *et al.*, (2025a) |
| 33 | *Ponticola turani* | Synonym of *P. rizensis* | Freyhof *et al.*, (2025a) |
| 34 | *Pseudophoxinus caralis* | Synonym of *P. anatolicus* | Freyhof *et al.*, (2025a) |
| 35 | *Pseudophoxinus kervillei* | Synonym of *P. libani* | Bariche & Freyhof, (2016) |
| 36 | *Salmo caspius* | Turkish populations were described as three new species. Therefore, *S. caspius* remains in the lower Kura-Aras drainages | Turan *et al.*, (2022b) |
| 37 | *Salmo ciscaucasicus* | Had never been recorded in Türkiye by evidence | Turan *et al.*, (2022b) |
| 38 | *Salmo coruhensis* | Synonym of *S. labrax* | Freyhof *et al.*, (2025a) |
| 39 | *Sardina pilchardus* | Marine species had never been recorded in freshwaters by evidence | |
| 40 | *Sardinella aurita* | Marine species had never been recorded in freshwaters by evidence | |
| 41 | *Sprattus sprattus* | Marine species had never been recorded in freshwaters by evidence | |
| 42 | *Squalius adanaensis* | Synonym of *S. cappadocicus* | Freyhof *et al.*, (2025a) |
| 43 | *Squalius cephaloides* | Synonym of *S. cii* | Bayçelebi *et al.*, (2022) |
| 44 | *Squalius irideus* | Synonym of *Ladigesocypris ghigii* | Freyhof *et al.*, (2025a) |
| 45 | *Squalius recurvirostris* | Synonym of *S. cappadocicus* | Freyhof *et al.*, (2025a) |
| 46 | *Squalius seyhanensis* | Synonym of *S. cappadocicus* | Freyhof *et al.*, (2025a) |
| 47 | *Squalius semae* | Synonym of *S. berak* | Freyhof *et al.*, (2025a) |

*(iii)* Taxa that have been invalidated or synonymized after the publication of Çiçek et al., (2023), including *Luciobarbus kottelati*, *Squalius seyhanensis*, and *Alburnus attalus*, among others. The presence of these taxa subtracts from the validity of their checklist based on current taxonomic consensus.

These discrepancies highlight the necessity for continued revision and critical evaluation of faunistic catalogs, especially in regions like Türkiye where ongoing research frequently clarifies species identities and ranges. By including taxa whose presence is doubtful or no longer of taxonomic interest, Çiçek et al., (2023) risk building an erroneous picture of freshwater fish biodiversity. Over-coverage has even conservation implications and could well divert attention and resources away from species and habitats of demonstrated ecological value. We advocate a more conservative and evidence-based national checklist policy that respects written records and excludes temporary, sea-associated, or taxonomically outdated taxa unless strongly evidenced to occur in non-marine freshwater habitats.

## Ethical Statement

Not required.

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## Author Contribution

The first and seniour authors contributed equally to the conceptualization, resources, methodology, investigation, data curation, and writing of both the original draft and the review & editing stages of the manuscript. All remaining authors contributed to data curation, validation, and writing – review & editing.

## Conflict of Interest

The authors declare that they have no known competing financial or non-financial, professional, or personal conflicts that could have appeared to influence the work reported in this paper.

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