GENERAL ASSEMBLY AND CONFERENCE

The general assembly of the Hungarian Ichthyological Society was held on 18th March 2011, in the course of which members of the Society approved the chairman's report on activities and finances in the previous year, as well as the working program and the budget for 2011.

The opening ceremony (Photo: Gábor Papp)

Election of officials was one of the items on the agenda of the assembly as the presidency had exhausted his 5 years mandate. During the election members of the Society voted their confidence in the former presidency which as far had carried out his task successfully.

Following the general assembly the IV. Hungarian Ichthyological Conference took place with considerable attendance. There were 16 lectures among others dealing with the protection of our endangered sturgeon species, the fish fauna of the rivers Tisza, Berettyó, Ipoly (Hungary) and Nida (Poland), the fisheries management of Lake Balaton, the role of omnivorous cyprinids in the phosphorus cycle, the chances of fish popula-tion rehabi-litation in the water-courses ruined by the red mud disaster in the vicinity of Ajka. In the entrance hall of the conference room 9 posters were dis-played.

One of the conference presentations (Photo: Gábor Papp)

BLACK BULLHEAD (*AMEIURUS MELAS*) IN RIVER IPEL (IPOLY)

The black bullhead was introduced to Hungary in the 1980s. Since then, this fish species has appeared in several ponds, lakes and rivers, but it was not detected in the River Ipel where the brown bullhead is common. Most of the researchers in Hungary and abroad point out that this non-native bullhead species has extended fast in the side-arms and tributaries of River Danube and it has even outcompeted the brown bullhead in some places.

Black bullhead from the Ipel River (Photo: A. Weiperth)

As associates of the Hungarian Danube Research Station, we searched the fish fauna of the Ipel by way of electrofishing in the vicinity of Ipolytölgyes (18 r.km) and Szob (2 r.km) from July to October 2009. We searched a 1-km-long section near Ipolytölgyes, where our fish surveys detected 27 fish species. The appearance of the non-native black bullhead was proved through 3 individuals identified there in October 2009. The standard lengths of the fish were 87, 149 and 179 mm. Every individual was caught in a section with slow water flow and sandy-muddy bottom. Dispersal of this invasive fish species can be expected in the side-arms and all over the Hungarian section of the Ipel, but, as the river habitats are not ideal for this fish species, which prefers still waters with thick vegetation, we do not have to count on a mass appearance of the black bullhead in River Ipel.

András Weiperth, Tibor Gaebele, Imre Potyó

Citation: Weiperth A., Gaebele T., Potyó I. (2011): Fekete törpeharcsa (*Ameiurus melas*) az Ipolyban. *Halászat* 104/1: 9.

YOUNG STREBERS (*ZINGEL STREBER*) UNDER THE SAJÓ BRIDGE IN MISKOLC

The streber (Photo: B. Szendőfi)

On the 1st of November 2009 as I was walking in the Felsőzsolca and Miskolc section of Sajó I noticed some young strebers (*Zingel streber*) in the strong streamline but shallow and clear water of the bed under the road-bridge. This fish species is strictly protected by law, the theoretical value of it is 100 thousand forints. Although there are many stones and rocks on the bottom of the river, the streber were not hiding, rather they lied in the mainstream in the open water. My wading feed in a neoprene boot did not frighten them; I could take a photo one of them with an objective lens of the camera under the water. I observed five specimens during a quarter-hour. Roughly they were at the same size, the body length were 5-6 centimetre and I did not meet with them anywhere else except the 10-15 metres long river bed section under the bridge.

Balázs Szendőfi

Citation: Szendőfi B. (2011): Fiatal német bucók (*Zingel streber*) a miskolci Sajó-híd alatt. *Halászat* 104/1: 10.

SCHNEIDER *(ALBURNOIDES BIPUNCTATUS)* IN THE RIVER HÁRMAS-KÖRÖS

In 2009, fish faunal research was made in the lower reach of the River Hármas-Körös, below the dam in Békésszentandrás, on behalf of the Körös-Maros National Park Directorate. The summer sampling date was on 25 August. The fishing was delivered from a boat with electric fishing gear powered by a high-capacity generator. One specimen of schneider *(Alburnoides bipunctatus)* was caught near the right bank of the river, at the 39th river kilometer, in the administrative area of Mesterszállás.

The specimen probably drifted from the upper reach of the river, together with 20-25 bleak *(Alburnus alburnus)* of similar size. The specimen was released after identification and taking photos. The species is not very frequent in the Körös Rivers, although it was found in

the rivers Fekete-, Fehér-, Sebes-Körös in the past years. In the River Hármas-Körös, it was not caught before and this is why it is registered as a new species for the river.

Zoltán Sallai

Citation: Sallai Z. (2011) Sujtásos küsz (*Alburnoides bipunctatus*) a Hármas-Körösből. *Halászat* 104/1: 10.

PRELIMINARY FISH FAUNAL-ECOLOGICAL SURVEY ON A SAMPLING SECTION OF THE CANAL DERECSKEI-KÁLLÓ.

The fish-fauna of a former sandy woodland creek collecting waters of temporary waterflows in the northern edge of the Southern Nyírség region was studied on August 22, 2010 along a 300-m long section near the town Derecske. On the day of the survey, the water of the canal was 5-6 m wide and 0.9-2.0 m deep, clean, its temperature was 14-15 C°. The soil of the bed mainly consisted of marl and clay, locally with muddy spots. There was sparse reed and rush vegetation on the bank, and dense aquatic plant growth in the water. We observed 12 species of fish; chiefly juvenile individuals (1-2 years old). *Alburnus alburnus* was present in mass, *Rutilus rutilus, Cobitis elongatoides* (protected), and *Proterorhinus semilunaris* were frequent. There were less *Scardinius erythrophthalmus, Carassius carassius* and *Misgurnus fossilis* (protected), and 1-3 individuals of *Tinca tinca, Carassius gibelio, Esox lucius, Lepomis gibbosus* and *Perca fluviatilis*. We consider this section an ideal reproduction place for fishes.

Zsolt Serestyén, Mihály Endes

Citation: Serestyén Zs., Endes M. (2011): Előzetes halfaunisztikai-ökológiai felmérés a Derecskei-Kálló egy mintaszakaszán. *Halászat* 104/1: 11.

THE ROLE OF THE RESERVOIR IN THE FISH FRY RECRUITMENT OF THE "LAKE TISZA" RESERVOIR

Fish fry samples were collected in the Tiszafüred section of the shoreline of Lake Tisza between May 2009 and August 2010. The shoreline was about 100 meter long. Nets with a mesh size of 6 mm were used for collection. 3813 young-of-the-year specimens of 25 fish species were caught during the 10 sampling events.

Catch of juvenile fish (Photo: Á. Harka)

Bleak (*Alburnus alburnus*), tubenose goby (*Proterorhinus marmoratus*), roach (*Rutilus rutilus*) and black bullhead (*Ameiurus melas*) turned out in force (10-22%). Some species turned out with 1-6% frequency. These were: bitterling (*Rhodeus sericeus*), spined loach (*Cobitis elongatoides*), perch (*Perca fluviatilis*), pikeperch (*Sander lucioperca*), asp (*Aspius aspius*), as well as monkey goby (*Neogobius fluviatilis*), white bream (*Blicca bjoerkna*) and roach (*Scardinius erythrophthalmus)*. Ide *(Leuciscus idus)*, bream *(Abramis brama)*, pumpkinseed *(Lepomis gibbosus)*, pike *(Esox lucius)*, Prussian carp *(Carassius gibelio)*, white-finned gudgeon *(Gobio albipinnatus)* and ruffe *(Gymnochephalus cernuus)* turned out with occurrence frequencies of 0.5-0.7%. Tench *(Tinca tinca)*, blue bream *(Abramis ballerus)*, crucian carp *(Carassius carassius)*, common carp *(Cyprinus carpio),* silver carp *(Hypophthalmichthys molitrix*) and amur sleeper *(Perccottus glenii)* were rare. These species' occurrence frequency was below 0.5%.

Based on the results, the propagation and growth of the phytophilic species were successful in the reservoir. These phytophilic species were dominant in the reservoir; hence, the reservoir is very important in the fish fry recruitment of Lake Tisza.

Krisztián Nyeste, Ákos Harka

Citation: Nyeste K., Harka Á., (2011): A tározó tér szerepe Tisza-tó ivadék- utánpótlásában. *Halászat* 104/1: 10.

MUDMINNOW (*UMBRA KRAMERI*), WEATHERFISH (*MISGURNUS FOSSILIS*) AND CHINESE SLEEPER (*PERCCOTTUS GLENII*) IN THE LOWER REACH OF THE ÖREG-TÚR.

The fish fauna of the Nagyar reach of Öreg-Túr was investigated in the frame of the National Biodiversity Monitoring Program on 23 October 2010. In accordance with the monitoring protocol, an electric sampling device was used from a boat to examine the fish fauna on this reach, which is rich in aquatic plants. We caught 8, 8 and 5 specimens of mud-minnow, weatherfish and Chinese sleeper, respectively.

Mudminnows, weatherfishes and Chinese sleepers (A. Sevcsik)

Field observations prove that the appearance of the Chinese sleeper could even result in the total extinction of the mudminnow population, therefore, the area deserves special attention.

András Sevcsik, Balázs Tóth

Citation: Sevcsik A., Tóth B. (2011): Lápi póc (*Umbra krameri*), réticsík (*Misgurnus fossilis*) és amurgéb (*Perccottus glenii*) az Öreg-Túr alsó szakaszán. *Halászat* 104/2: 46.

BURBOT (*LOTA LOTA*) ACTIVE IN SUMMER

The Sződi stream is a small flow of water in the left bank of the River Danube, it fall into the river at Sződliget. I fished with hand nets in an upper section about 100-150 metres from the delta on the 26th March 2010. Inn 2 minutes from my arrival I fished out a 25 centimetre long burbot (Lota lota). It was hidden between the yeast year bulrushes in the knee-deep water.

The burbot that lives in the bream zone, according to the literature, active in winter, mates in little degree Celsius temperature water and during warming they retire for „summer hibernation". This burbot, which I fished out in spring, is a direct contraindication, but rather contraindicated by the burbots fished in summer and autumn.

Sated burbot in the aquarium (Photo: B. Szendőfi)

According to my fishing diary on 28th August 2009 four 15-18 centimetres long specimens were found from the stones of the Törökszentmiklós section of River Tisza. I visited this place again a week later, on 4th September, at that time I fished out a 27 centimetres long burbot from a lonely rock of the

bed of the River Tisza and also two others from the stones of the river bank. I measured the water temperature, it was 23 degree Celsius.

On 12th September I fished out a 22 centimetres burbot from the roots of a bush dangling into the water in the Szentendre section of the River Danube, then on 20th September from the Tisza. Some metres from the delta of the Zagyva other 9 specimens turned up from the stones near the bank to my net, the longest was 18 centimetres.

Burbots were moving and changed their places. In the once boarded bank section a week later I found other specimens which shows that the ling changes its place and for movement it needs food. The abdomen most of the fished burbots had bossed, they ate enough (I attached a photo of a burbot fished out that ate itself fully before it was imprisoned). In the River Tisza in both places the offspring of the tubenosed gobies and monkey gobies, in the River Danube the round gobies and Kessler's gobies in every size. The burbots of the Tisza could eat of the smaller fresh-water crayfish I observed it in an aquarium.

Altogether 17 active burbots were fished out between 28th August and 20th September. Most of them were taken into a pound (they lived an active lifestyle also in winter), the other were taken into an aquarium and they had a huge appetite and were mobile in room-temperature.

Balázs Szendőfi

Citation: Szendőfi B. (2011): Nyáron is aktív menyhalak (*Lota lota*). *Halászat* 104/2: 46.

PRUSSIAN CARP (*CARASSIUS GIBELIO*) WITHOUT A MOUTH

József Lévai, warden of the Szeged Zoo, noticed a Prussian carp with a curious head shape in the fresh fish transport brought in for feeding the storks in autumn 2010. A closer examination revealed that the fish lacked a mouth. Although it was able to move its lower jaw in a way similar to gaping, no gap appeared between its non-existent lips, as the place of the mouth opening was covered by thin, elastic, membrane-like skin. "How could a fish without a mouth stay alive and reach a body weight of about 100 grams?" – József Lévai asked the Hungarian Ichthyological Society in his e-mail.

Prussian carp vithout a mout (Photo: Lajos Endrédi)

The case is curious, indeed, but it can be realistically explained on the basis of the attached photo. The fish, obviously, ingested the food through the opening visible in its right operculum. This was managed by contracting its breathing muscles and moving its lower jaw downward, which increased the volume of the oral cavity, thereby creating suction. The water entering the gap formed by the defective operculum brought the food to the right place. The viability of the small deformed creature is shown by the fact that it learned that, in contrast with the others, it had to approach its food not in a vertical position but "lying" on its side, and, in addition, it had to pass it so that, when suction was created, the gap used for ingesting food and breathing water alike was right above the targeted food item. It could not be found

out whether this "replacement mouth" was a result of a development disorder or an injury, or maybe it was formed by the "improper use" of the operculum in the course of years.

Ákos Harka

Citation: Harka Á. (2011): Száj nélküli ezüstkárász (*Carassius gibelio*). *Halászat* 104/2: 47.

VOLGA PIKEPERCH (*SANDER VOLGENSIS*) FROM TWO SMALL WATERCOURSES

The Volga pikeperch in Hungary inhabits larger rivers and lakes but rarely it can be found also in smaller water-courses. E.g. in 2005 we caught a specimen in the river Zagyva (at Bátonyterenye), in 2010 another specimen in the Tarna (at Zaránk), a tributary of the Zagyva. The Volga pikeperch is not a permanent member of the fish communities of these watercourses, the sporadic specimens probably originate from the reservoirs utilized for angling purposes.

Volga pikeperch from Tarna river (Photo: Zsolt Szepesi)

Zsolt Szepesi, Ákos Harka

Citation: Szepesi Zs., Harka Á. (2011): Kősüllő (*Sander volgensis*) a Tarnában. *Halászat* 104/3-4: 81.

BURBOT (*LOTA LOTA*) IN THE ÉR (IER) RIVER

A fishing demonstration was held for the participants of the META tour organized by the management of the Vácrátót Botanical Garden for botanicians of the Carpathian Basin on May 29, 2011 at the Romanian section of the Ér river near the Szalacs (Sălacea) bridge. During the fishing the following species were found: roach, chub, bleak, gudgeon, stone moroko, goldfish, pumpkinseed, tubenose goby and two 40-cm-long burbots (*Lota lota* L.). The burbot was not found in the Ér previously, it is unknown among local fishermen, and therefore, we can conclude that the fish fauna of the Ér river has been enriched by a new species.

Burbot from the Ér river (Photo: Ákos Sándor Wilhelm)

Sándor Wilhelm, Ákos Sándor Wilhelm

Citation: Wilhelm S., Wilhelm Á S. (2011): Menyhal (*Lota lota* l.) az Ér folyóban. *Halászat* 104/3-4: 82.

BURBOT (*LOTA LOTA*) IN THE TARNA RIVER

The Zagyva – Tarna river system is located in the north-eastern part of Hungary. The Tarna is the largest tributary of the Zagyva river, its length and catchment area are 106 km and 2116 km2, respectively. In the last decade significant efforts were made to reveal the fish fauna of the river system. Burbot *(Lota lota)* was not detected by these researches, however, we had indirect information of the sporadic and occasional presence of the species from anglers' records. According to the anglers' records, burbot was caught to Szentlőrinckáta in the Zagyva, and to Tarnaörs in the Tarna, and at Vámosgyörk from Gyöngyös stream.

Our recent investigations have managed to reinforce the anglers' records. Two young speciemens were collected at Tarnaörs (11 rkm) on 19th October 2010 (Sallai), then another specimen of about 210 mm was also collected at Aldebrő (42 rkm) on 3rd July 2011 (Sály and Szepesi).

Several reports of the last few years state more and more number of occurrences of the burbot all over Hungary. According to a certain assumption, this is owing to the distribution process of gobiid species (Gobiidae). This idea might be possible because the tubenose goby (*Proterorhinus semilunaris*) has already reached Aldebrő as well, and the monkey goby (*Neogobius fluviatilis*) has occurred at Kál (33 rkm).

Péter Sály, Zsolt Szepesi, Zoltán Sallai

Citation: Sály P., Szepesi Zs., Sallai Z. (2011): Menyhal (*Lota lota* l.) a Tarnában. *Halászat* 104/3-4: 82.

DACE *(LEUCISCUS LEUCISCUS)* IN THE ZAGYVA RIVER

On the 9th of September 2009 valuable fish species from the nature protection aspect were investigated in the Zagyva river. At Jászfényszaru, 300 meters above the bridge of the road to Zsámbok a young, slender, silvery fish was caught, that was identified as dace *(Leuciscus leuciscus)* according to the partly lower mouth, and the number of scales along the lateral line.

Dace caught from the Zagyva river (Photo: Z. Sallai)

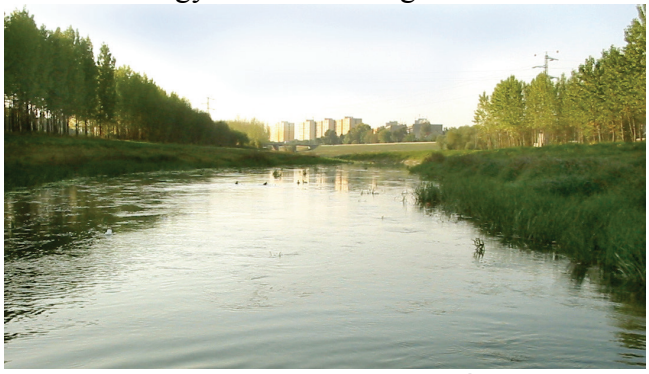
This species has not been caught before in the Zagyva, only in the Tarna river that was known as separated population that belongs to the nearby water system. Other specimen has not appeared neither from the upper nor the lower reach of the river so presumably this specimen was an occasionally occurrence from the Tarna river. The fish specimen was set free after the identification and taking photos. In the future its occurrence will have greater importance because it was on the protected species list before and it can not be angled or fished since 2009. Presumably its Hungarian populations will be protected in the future.

Zoltán Sallai, Tibor Juhász

Citation: Sallai Z., Juhász T. (2011): Nyúldomolykó (*Leuciscus leuciscus*) a Zagyvában. *Halászat* 104/3-4: 82-83.

RETURNING FISH SPECIES IN THE ZAGYVA RIVER

The small Zagyva river flowing to the Tisza at Szolnok boasted a diversified fish community in the first half of the 20th century but later on the sensitive species disappeared due to water-pollution. The situation has improved in the last few years: in 2005 a sterlet (*Acipenser ruthenus*) (at Zagyvarékás), at Jászberény in 2007 a zingel (*Zingel zingel*), at Szolnok in 2011 a barbel (*Barbus barbus*), a nase (*Chondrostoma nasus*) and another zingel specimen were caught in the river. Their appearance might be in connection with the improvement of the water quality and the oxygen content observed in the last decade.



The Zagyva river at Szolnok (Photo: Ákos Harka)

Ákos Harka, Zsolt Szepesi

Citation: Harka Á., Szepesi Zs. (2011): Kecsege (*Acipenser ruthenus*), márna (*Barbus barbus*), paduc (*Chondrostoma nasus*) és magyar bucó (*Zingel zingel*) a Zagyvából. *Halászat* 104/3-4: 83.

THE OCCURENT OF RIFFLE MINNOW *(ALBURNOIDES BIPUNCTATUS)* IN THE STREAMS OF BÜKK MOUNTAINS

In the first half of the XXth century there were riffle minnows in lots of the streams flowing south from the Bükk mountains, however in the second half of the century you could not find them at any sampling sites. This was probably caused by the decrease of water-volume of the streams, because of the increased human water-usage and the drier climate.

A change was brought by the opening of a surface lignite mine at Bükkábrány, where the water was pumped into the Sályi stream, the Kácsi stream and the Csincse stream. The effect of this was that in 2003 there was again a significant population of the species in the Kácsi stream at Bükkábrány. We had even caught one specimen washed down to the mouth of the Csincse stream. The occurent slowly started to spread in the Csincse stream, in 2011 some 5 kilometers distance upstream and downstream from the Kácsi stream 6 and 12 specimen were captured.

Zsolt Szepesi, Ákos Harka

Citation: Szepesi Zs., Harka Á. (2011): Bükkalján is terjed a sujtásos küsz (*Alburnoides bipunctatus*) . *Halászat* 104/3-4: 83-84.

SPREADING OF AMUR SLEEPER (*PERCCOTTUS GLENII*) IN THE CATCHMENT OF RIVER BERETTYÓ

The amur sleeper is one of the most rapidly spreading invasive species in the water system of the river Tisza. Its first occurrence in Hungary was recorded by Harka in Kisköre reservoir in 1997. In the last decade several researches have reported on its presence and spreading in the whole length of river Tisza and its tributaries. In 2008 it appeared in the catchment of lake Balaton, presumably by human intervention. National and international authors also agree that amur sleeper is an undesirable species in the Hungarian waterbodies, breeding rapidly it can cause serious damage to the native fish fauna in Hungary.

Amur sleeper from canal Kálló (Photo: László Antal)

We carried out a fish fauna survey with an electric sampling device in river Berettyó on 9th October 2010, it continued in the summer of 2011 in the whole national catchment of Berettyó, among many other several parts of canal Kálló. We detected four amur sleepers in the sampled 300 metres in the Darvas area of river Berettyó (N47°06'04,58", E21°18'53,97"), while there were also four specimens detected in a 150-metre section in Berettyóújfalu area of canal Kálló (N47°14'37,52", E21°30'05,69"). The data prove that spreading of the species has made considerable progress in the eastern catchment of Berettyó and it is only a question of time in the southern tributaries.

The species is likely to spread in the whole section of river Berettyó in Hungary, which is a serious danger to the native fish of the catchment, for instance to the specially protected European mud-minnows in the southern catchment.

László Antal, István Czeglédi, Attila Mozsár, Béla Halasi-Kovács

Citation: Antal L., Czeglédi I., Mozsár A., Halasi- Kovács B. (2011): Terjed az amurgéb (*Perccottus glenii*) a Berettyó vízgyűjtőjén. *Halászat* 104/3-4: 84.