SIX NEW EASTERN SOUTH AMERICAN FISHES EXAMINED IN THE AMERICAN MUSEUM OF NATURAL HISTORY

BY T. L. MARINI, J. T. NICHOLS, AND F. R. LAMONTE

Two lots of South American fresh-water fishes, one from the Museo Nacional in Buenos Aires, Argentina, the other from Dr. R. von Ihering, Instituto Biologico, São Paulo, Brazil, were recently brought to The American Museum of Natural History by Dr. Tomás Marini of Buenos Aires while he was visiting the United States on a Guggenheim Traveling Fellowship.

Several of the species in this collection appear to be new and are herein described as follows.

**Pimelodus brevis**, new species

Figure 1

**DESCRIPTION OF TYPE.**—Number 12240, American Museum of Natural History (number 1054a, Museo Nacional, Buenos Aires); from Rio de la Plata, San Fernando, Argentina; 1932; collected by Dr. Tomás Marini.

![Fig. 1. Pimelodus brevis, new species.](image)

Length to base of caudal, 285 mm.; depth in this length, 3.5; head, 3.7. Eye in head, 6.4; snout, 2; interorbital, 3.1; width of mouth, 3; width of head, 1.4; width of body, 1.5; depth of peduncle, 2.6; its length from anal axil, 2.4; pectoral spine, 1.5; dorsal spine, 1.3; ventral, 1.5; height of anal, 2.4; upper caudal lobe the longer, 0.9; base of dorsal, 1.8; dorsal interspace the same; base of adipose, 1.3.

Dorsal, I, 6; anal rays, 10.
Head subconical, lower jaw included for the entire width of the broad upper lip which is about one-half the diameter of the eye or more than twice as broad as lower, and about equal in width to the bands of teeth in the jaws. Interorbital appreciably convex, the fontanel extending backward to over the hind margin of the eye. Head appreciably granular forward to the middle of the eye or beyond. Occipital process strongly convex, ⅔ as wide as long, in contact with dorsal plate. Humeral process triangular, pointed, its upper limb somewhat concave, extending back of the gill-opening a distance equal to ⅔ of the head. The slender tip of the maxillary barbel reaches past the tip of the depressed ventral and falls short of the anal origin. Dorsal spine slender, pectoral stronger, both slightly serrate behind and the latter slightly roughened in front. Vertical height of adipose about ⅔ of its base. Posterior margin of anal concave.

Specimen in its present condition is without markings, somewhat paler below than above and with fins dark gray. A slightly pale area is indicated along the upper sides differentiating a broad dark lateral shade most obvious posteriorly.

This is an unusually short-bodied species for the genus. In some respects it suggests *P. labrosus*, with which it has been compared, there being in the same collection a specimen of this 170 mm. long, from Rio Colastiné, Santa Fé, Argentina.

**Pygidium alterum**, new species

*Figure 2*

**DESCRIPTION OF TYPE.**—Number 12241, American Museum of Natural History (number 8549, Museo Nacional, Buenos Aires); from Rio de los Sauces, La Rioja, Argentina; 1932; collected by Dr. Marini.

![Fig. 2. *Pygidium alterum*, new species.](image)

**AM** 12241

Length to base of caudal, 28 mm., depth in this length, 5.8; head, 5.2. Snout in head, 2.5; interorbital, 3.3; peduncle from anal axil, 3.6; nasal barbel, 2; longest maxillary barbel, 1.2; width of head, 1; depth of peduncle, 2; pectoral with filament, 1.2; ventral, 1.6; height of dorsal, 1.5; anal, 1.6; length of caudal, 1.2. Eye in snout, 2.5.

Dorsal rays, 8; anal, 7. Teeth conical, enlarged outer row.

Head depressed; body compressed. Mouth distinctly inferior; 7 or 8 spines on the opercle, about 4 on the superopercle. Gill membranes narrowly joined to the isthmus in the center. First pectoral ray a little exerted for a distance less than
diameter of the eye. Ventrals just not reaching anal; their origin equidistant from base of caudal and posterior margin of eye. Anal origin about under center of dorsal base. Caudal slightly emarginate, with rounded lobes. Color in spirits pale, unmarked.

Three other specimens are from 26–29 mm. standard length.

With these specimens was another of 37 mm. standard length, clearly representing a different species and matching the description of larger material of *Pygidiurn iheringi* Eigenmann sufficiently well to be at least provisionally so identified. One of the principal differences is that the peduncle from base of last anal ray to that of the middle caudal ray is contained only 4.3 times in the length to base of caudal. The head is depressed, slightly longer than broad; the peduncle strongly compressed, its length about twice its breadth. Eye in interorbital, about 2. Nasal barbel to posterior border of eye; maxillary to middle of opercle on which there are numerous spines. The upper pectoral ray is not exserted; ventrals reach about 1/3 the distance to the anal, and first anal ray is situated about under last dorsal. The caudal is narrow, rounded or sub-acuminate. Head about 5 in length. Depth, 7 or 8. The specimen is too small for satisfactory examination of the teeth. Color uniform, unmarked.

**Plecostomus commersonoides**, new species

**Description of Type.**—Number 12243, American Museum of Natural History (number 1099a, Museo Nacional, Buenos Aires); from Dársena Norte, Buenos Aires, Argentina; 1932; collected by Dr. Marini.

- **Length** to base of caudal, 318 mm.; **depth** in this length, 4.5; **head**, 3.2. Eye in head, 11; **snout**, 1.7; interorbital, 3; **width** of head, 1.1; **its depth**, 1.7; **depth** of peduncle, 3.2; **its length** (to anal axil), 1.1; **pectoral spine**, 1; **ventral spine**, 1.2; **dorsal spine**, 1; **longest anal ray**, 3; **lower caudal lobe** the longer, 1; **base of dorsal**, 1.2; **dorsal interspace**, 1.9. Mandibular ramus in interorbital, 1.9. **Barbel** in eye, 1.

- **Dorsal rays**, I, 7; **anal**, I, 4; scutes, 30; 7 between dorsal and adipose, 14 between anal and caudal. Teeth on a mandibular ramus about 40.

- **Pectoral reaching** the first third of the ventral spine. Dorsal margin rounded, when depressed the tip of the spine reaches about to the middle of the last ray which falls short of the adipose by about the diameter of the eye. The length of the base of the fin projected backward reaches beyond the adipose. Caudal strongly, obliquely concave, corners projecting. Supraorbital ridges slightly raised. Supraoccipital with a blunt keel, but temporals unkeeled. Rows of scutes with quite evident continuous, though not strongly developed, keels. Supraoccipital bordered posteriorly by a large central and two smaller irregular plates at the sides. Lower surfaces completely scaled.

- **Color** in preservative dark slaty gray on body and fins. Obscure dark speckles on the head and larger irregular spots on the body. Lower surface of head and breast thickly covered with more clearly defined small spots. Slight indication of spotting on the dorsal and paired fins.
A larger specimen with the same data, 402 mm. standard length, is somewhat paler colored with the spotting everywhere more noticeable, but none evident on the caudal. It has the eye 14 in the head. Interorbital, 2.7, and mandibular ramus in interorbital, 2.2. Its supraoccipital is bordered posteriorly by about four irregular scutes, and in other respects it resembles the type rather closely.

**Plecostomus niger**, new species

**Description of Type.**—Number 12245, American Museum of Natural History, our only specimen, was sent by Dr. R. von Ihering, from southeastern Brazil.

Length to base of caudal about 245 mm.; depth in this length, 6; head (to margin of temporal plate), 3. Width of head in its length, 1.2; its height, 2; eye in head, 9.5; snout, 1.4; interorbital, 3; mandibular ramus, 5.8; depth of peduncle, 3; its length 1.4; pectoral spine, 1.4; ventral spine, 1.4; dorsal spine, 1.5; lower caudal lobe, 1; dorsal base, 1.6; dorsal interspace, 1.6; height of anal, 3. Length of mandibular ramus in interorbital, 1.9. Barbel in eye, 2.5.

Dorsal, I, 7; anal, I, 4; scutes in lateral series, 27. Teeth on mandibular ramus, about 26.

Adipose fin present, well developed. Opercle and interopercle not margined with bristles. Scutes practically keelless, except for the first three or four in the lateral series above the pectoral. Supraoccipital and temporal plates slightly raised centrally. Supraoccipital bordered by two plates or a single plate imperfectly divided in the middle. Snout somewhat more than twice as long as postorbital part of head. Orbital rim somewhat raised. Peduncle rounded below. Pectoral spine curved, enlarged and with hooked spinules at the end, reaching to middle of ventral base. Ventral reaching just past anal axil. Dorsal when depressed not nearly reaching adipose. Caudal obliquely lunate, the lower lobe much the longer. Lower surfaces well covered with small rough scales, a narrow scaleless area before the ventral bases. Tip of snout and upper lip scaleless.

Body and fins mostly blackish. Faint pale spots regularly arranged on the temporals and the front of the sides. Lower lip pale. Belly dusky with pale spots and streaks. Pectoral and ventral spines and lower caudal ray are pale. Dorsal and anal, and lower surfaces of pectoral and ventral with rather faint pale spots.

**Plecostomus meleagris**, new species

Adipose fin present, well developed. Opercle and interopercle not margined with bristles. Length of mandibular ramus, 1.4 to 1.6 in interorbital. Some of the scutes weakly carinate. Depth of body 5 to 6 in standard length. Eye, 6.5 to 7 in head at 200–250 mm. standard length. Lateral scutes 25–28. Dorsal large, the last ray reaching almost to adipose when the fin is depressed.

**Description of Type.**—Number 12246, American Museum of Natural History; from southeastern Brazil; sent by Dr. R. von Ihering.

Length to base of caudal, 240 mm.; depth in this length, 5.5; head, 3.2. Eye in head, 7; snout, 1.6; interorbital, 2.8; mandibular ramus, 3.8; width of head, 1.1; its height, 2.2; depth of peduncle, 3; its length (from anal axil), 1.1; pectoral spine, 0.9; ventral spine, 1.4; dorsal spine, 1.; height of anal, 2.7; lower caudal lobe, 1.1; base of dorsal, 1.4; dorsal interspace, 1.7. Barbel in eye, 1.2.
Dorsal, I, 7; anal, 4; scutes 25; teeth on mandibular ramus about 65.

Snout broad and rounded; orbital rim, center of supraoccipital and temporal plates slightly raised. Pectoral spine reaching to about the middle of ventral spine, which in turn reaches about to anal axil and the anal ¾ to caudal base. The free margin of the dorsal is somewhat rounded. When depressed, the spine reaches past the middle of the last ray which extends ¾ the distance to the adipose. Caudal obliquely lunate, the lower lobe somewhat the longer. Supraoccipital bordered posteriorly by a single scute, the one or two series of scutes along the dorsal and ventral lines weakly carinate. The lateral series anteriorly over the pectoral alone having a pronounced keel. Ventral surface of peduncle flat, not rounded, a small area at the tip of the snout and the upper lip without scales. Ventral surface mostly covered by small scales, but an area anteriorly in line with the gill openings and a broad area between and before the ventrals scaleless, except for very fine scales near the midline.

Color grayish black on back, sides, and fins, with numerous more or less pronounced pale rounded spots. These are smallest and most closely spaced on the head. Lower surfaces and ventral spines pale.

Measurements of additional specimens follow.

Measurements of Paratypes of *Plecostomus meleagris*

<table>
<thead>
<tr>
<th>Length Standard</th>
<th>Depth</th>
<th>Head</th>
<th>Snout</th>
<th>Eye</th>
<th>Interorbital</th>
<th>Mandibular Ramus in Interorbital</th>
<th>Scutes</th>
<th>Teeth About</th>
<th>Barbel in Eye</th>
<th>Remarks</th>
</tr>
</thead>
<tbody>
<tr>
<td>197</td>
<td>5.8</td>
<td>3.1</td>
<td>1.6</td>
<td>6.5</td>
<td>2.8</td>
<td>1.5</td>
<td>25</td>
<td>63</td>
<td>1.5</td>
<td>Last dorsal rays reach adipose</td>
</tr>
<tr>
<td>210</td>
<td>5.6</td>
<td>3.1</td>
<td>1.6</td>
<td>6.5</td>
<td>3</td>
<td>1.6</td>
<td>26</td>
<td>66</td>
<td>1.5</td>
<td></td>
</tr>
<tr>
<td>235</td>
<td>5.4</td>
<td>3.3</td>
<td>1.7</td>
<td>7</td>
<td>2.9</td>
<td>1.5</td>
<td>25</td>
<td>60</td>
<td>1.2</td>
<td></td>
</tr>
<tr>
<td>235</td>
<td>6.3</td>
<td>3.5</td>
<td>1.7</td>
<td>6.5</td>
<td>3</td>
<td>1.4</td>
<td>26</td>
<td>70</td>
<td>1.6</td>
<td></td>
</tr>
<tr>
<td>245</td>
<td>5.1</td>
<td>3</td>
<td>1.7</td>
<td>7</td>
<td>2.8</td>
<td>1.6</td>
<td>26</td>
<td>67</td>
<td>1.7</td>
<td>Spots large and conspicuous on body and fins</td>
</tr>
<tr>
<td>300</td>
<td>5.4</td>
<td>3.2</td>
<td>1.6</td>
<td>8</td>
<td>3</td>
<td>1.5</td>
<td>28</td>
<td>65</td>
<td>2.2</td>
<td>Spots on body and fins small and indistinct; ventral surface rather dusky with pale spots and streaks</td>
</tr>
</tbody>
</table>
Plecostomus meleagris is close to Plecostomus latirostris, except in color. With it we have received two specimens, 160 and 220 mm. standard length, also representing an allied form, but pale with dark spots and approximately 30–40 teeth on a mandibular ramus, which we identify with Plecostomus agna Ribiero (1911). Mr. J. R. Norman of the British Museum (Natural History) has kindly counted teeth for us in the types of Plecostomus latirostris as 38 to 49, and in the type of P. goyazensis Regan (1907) as 28. This latter has priority over agna, if the two prove indistinguishable.

**Notropocharax**, new genus


![Figure 3. Notropocharax difficilis, new genus and new species.](image)

**Notropocharax difficilis**, new species

*Description of Type.*—Number 12247, American Museum of Natural History; from Rio Mogy-guassú, southeastern Brazil; sent by Dr. R. von Ihering.

Length to base of caudal, 74 mm.; depth in this length, 4. Head, 4.3; eye in head, 4.3; snout, 4.3; interorbital, 3.4; maxillary, 2.5; width of body, 1.9; depth of peduncle, 2.3; its length, 1.8; longest dorsal ray, 1.4; longest anal ray, 2; pectoral, 1.3; ventral, 1.9; caudal lobe, 1.

Dorsal rays, 9; anal, 15; scales, 37; gill-rakers on lower limb of first arch, about 9.

Jaws of about equal length; the lower slightly projecting. Maxillary about straight, meeting the intermaxillary at an angle, a few small teeth on its upper portion, smaller than those on intermaxillaries and mandibles. Eye placed rather high, slightly superolateral, the interorbital moderately and evenly convex. Maxillary extending to under front of pupil. Dorsal origin equidistant from base of caudal and hind margin of eye. Anal origin appreciably behind dorsal axil. Pectoral reaching a little more than
$\frac{3}{8}$ the distance to ventral; ventral more than one-half the distance to anal. Fins, including the caudal, without scales. Lateral line on 11 or 12 anterior scales only.

Color in alcohol pale, opalescent, little darker above than below, a dark blotch above the fourth scale of the lateral line, and thence a black streak extending backward that widens to $\frac{3}{8}$ the diameter of eye and becomes more conspicuous posteriorly.

There are five paratypes of about the same size (52–72 mm. standard length).