

FAO SPECIES IDENTIFICATION SHEETS

FISHING AREA 51
(W. Indian Ocean)

HAEMULIDAE*

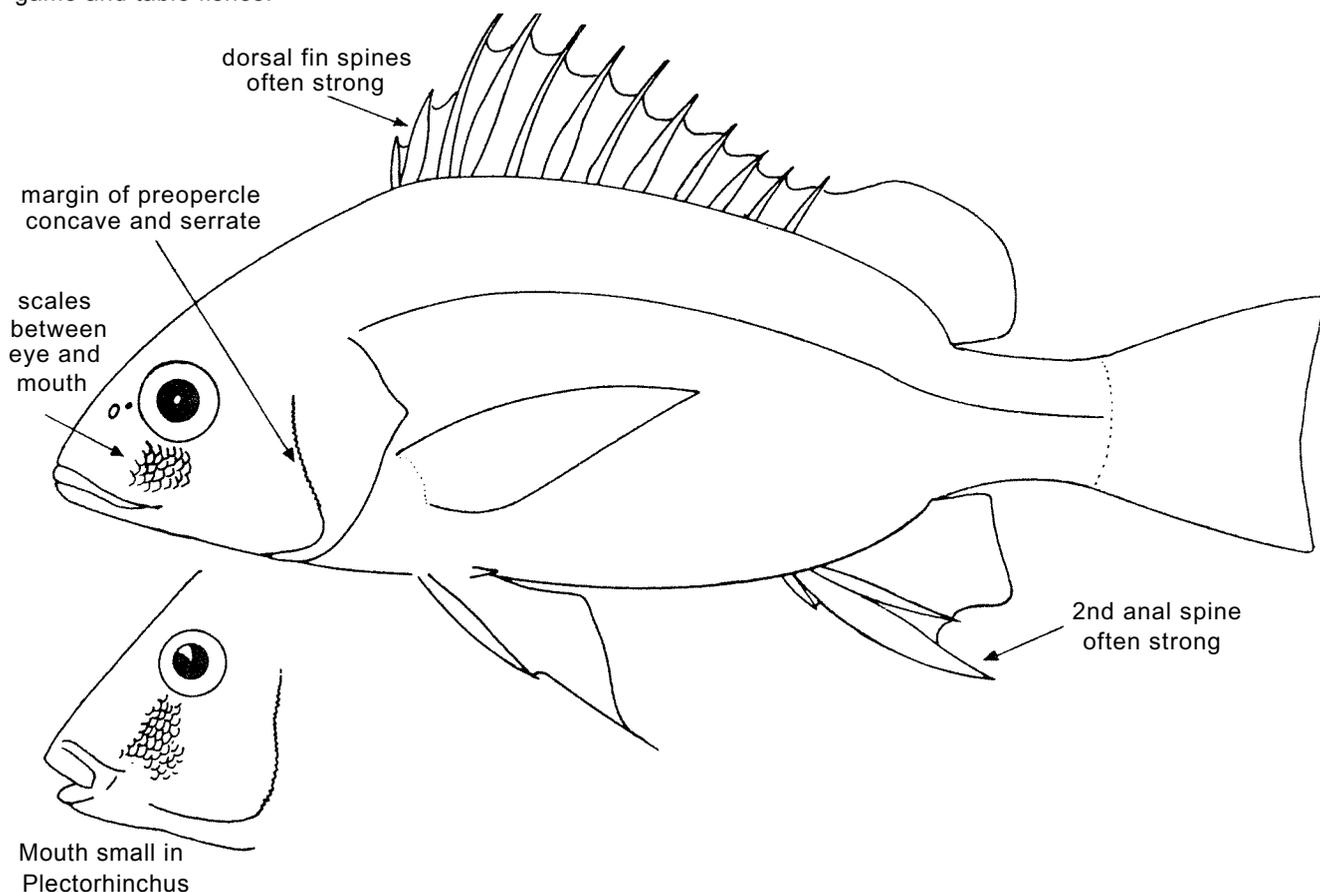
Grunts, sweetlips, rubberlips, hotlips

(Some authors place Plectorhinchus in a separate family, the Plectorhinchidae)

Oblong, compressed, perch-like fishes. Head profile strongly convex; scales present on entire head (except front of snout, lips and chin). Mouth small or moderate, lips thick, tip of upper jaw hidden when mouth closed; chin with 2 pores anteriorly and a median pit, or 6 pores and no pit in Plectorhinchus; teeth conical, in a narrow band in each jaw, the outer series enlarged, but no canines; palate toothless; hind margin of suborbital not exposed. Preopercle with a slightly concave and serrated posterior margin; opercle with 1 indistinct spine. Dorsal fin single, with 9 to 15 strong spines and 12 to 26 soft rays; pectoral fins long, 1st ray sometimes forming a short filament; pelvic fins below base of pectoral fins, with 1 spine and 5 soft rays; anal fin with 3 spines, the second often very strong, and 7 to 9 soft rays; caudal fin truncate or emarginate (rounded in juveniles). Scales ctenoid (rough to touch), small or moderate.

Colour: highly variable, ranging from uniformly coloured to banded, blotched and spotted.

Small to medium-sized fishes of shallow coastal waters in tropical and subtropical regions of the world. The reported catch of grunts from Fishing Area 51 totalled about 5 000 tons in 1977. The larger species are excellent game and table fishes.



Mouth small in
Plectorhinchus

*This family was until recently named Pomadasysidae

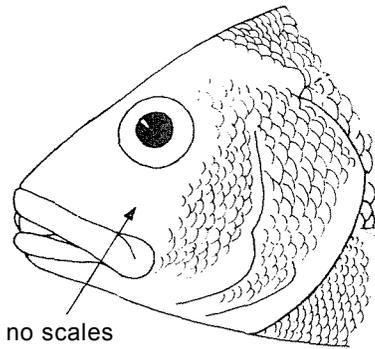
SIMILAR FAMILIES OCCURRING IN THE AREA:

Lutjanidae: hind tip of upper jaw still exposed when mouth closed, teeth usually present on palate, no scales between eye and mouth, and spines of dorsal and anal fins weaker.

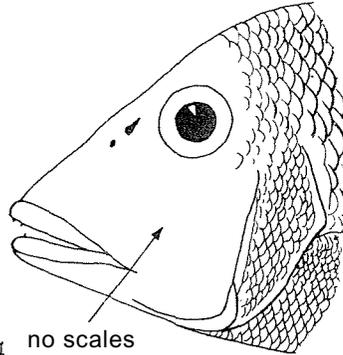
Lethrinidae: no scales on preopercle, and its hind edge not serrated; also, only 8 or 4 soft dorsal fin rays (12 to 26 in Haemulidae).

Nemipteridae: no pores on chin and hind margin of suborbital exposed; also, 8 to 11 soft dorsal fin rays.

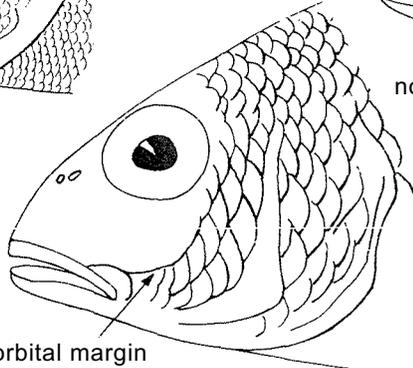
Sparidae: edge of preopercle nat serrated; suborbital space scaleless; molar teeth sometimes present.



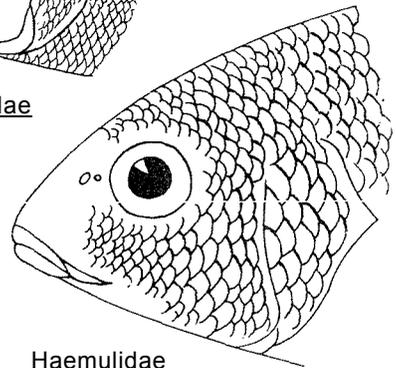
Lutjanidae



Lethrinidae



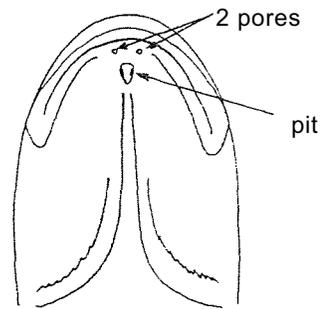
Nemipteridae



Haemulidae

KEY TO GENERA AND SPECIES OCCURRING IN THE AREA*:

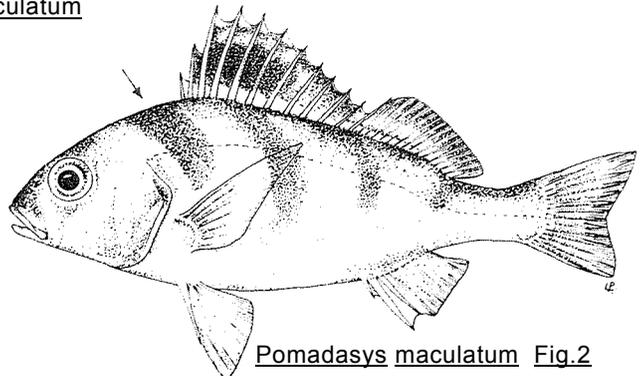
1a. Chin with 2 pores followed by a pit containing a pore on each side (Fig.1); fin spines strong, 2nd anal fin spine often enlarged Pomadasys



Pomadasys

2a. A vertical black band about 8 scales wide, over nape, terminating about 3 scales below lateral line; about 6 black blotches posterior to the vertical band; spinous part of dorsal fin with a large black blotch (Fig.2).....Pomadasys maculatum

2b. Colour not as above



Pomadasys maculatum Fig.2

* In many species (especially of the genus Plectorhinchus) the coloration of juvenile, adolescent and adult fish may differ considerably, thus making identification difficult. This key is based on juvenile and adult coloration, dorsal fin counts and gillraker counts.

3a. Anal fin rays 11 to 13; a dark blotch edged with yellow anteriorly at upper corner of gill cover (Fig.3) P. olivaceum

3b. Anal fin rays 10 or less

4a. A row of interradiial scales behind dorsal and anal fin rays, above the basal sheath; above 6 dark stripes on back and flanks (Fig.4) P. furcatus

4b. No row or rows of fine scales behind the dorsal or anal fin rays

5a. Body with conspicuous dark or beige spots, lines or stripes

6a. Body with distinct longitudinal stripes, one from behind eye or opercle to middle of caudal fin and 3, less distinct ones, above it; dorsal fin uniform; no spots or lines of spots on body

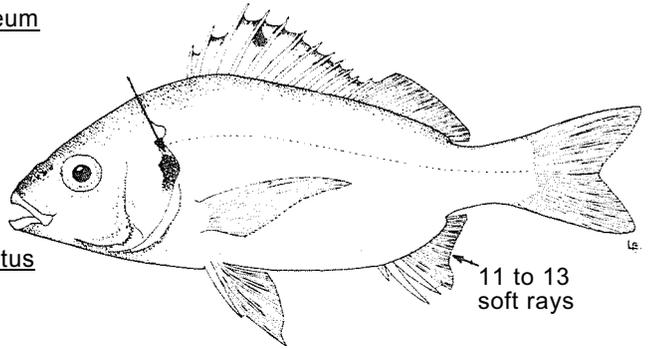
7a. Lateral line scales 56 to 61; anal fin rays 8½ to 10½ (mostly 9½) (Fig.5) P. stridens

7b. Lateral line scales 50 to 54; anal fin rays 7½ to 8½ P. striatus

6b. Body without distinct longitudinal stripes

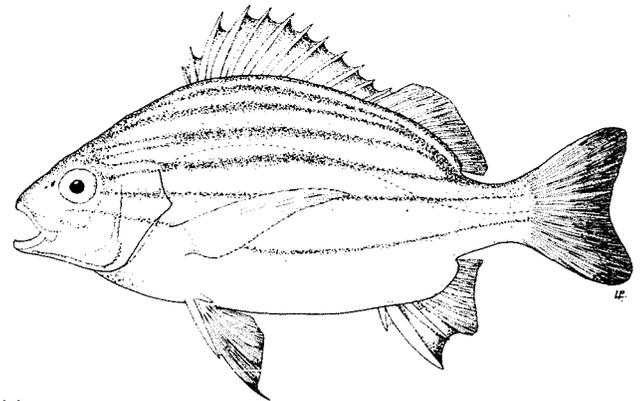
8a. Body with pairs of spots or dull blotches arranged into vertical interrupted bars; dorsal fin spotted or with black blotches; older specimens may be uniform silvery or golden; dorsal fin with 12 spines and 13 to 15 soft rays, second spine long and strong (Fig.6) P. kaakan

8b. Body with conspicuous rounded spots, scattered on body or forming lines or rows of spots on back



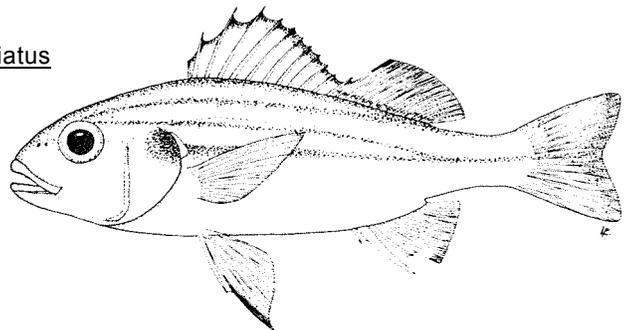
Pomadasys olivaceum

Fig.3



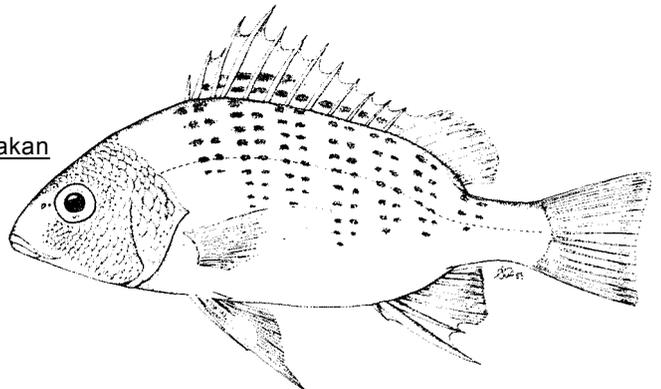
Pomadasys furcatus

Fig.4



Pomadasys stridens

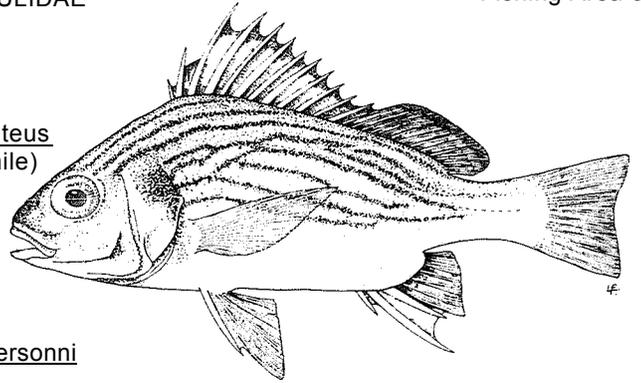
Fig.5



Pomadasys kaakan

Fig.6

9a. Spots on body arranged in more or less thin, longitudinal irregular wavy lines (Fig.7) P. argenteus (juvenile)

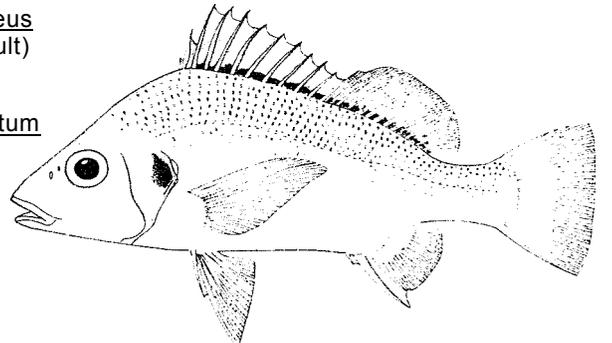


Pomadasys argenteus Fig.7 (juvenile)

9b. body and fins with scattered round spots not forming regular wavy lines

10a. Spots only on body, absent on head and snout; anal fin rays 8 to 10 (Fig.8).. P. commersoni

10b. Spots only on body, absent on head and snout; anal fin rays 7½ (rarely 8) (Fig.9) P. argenteus (adult)



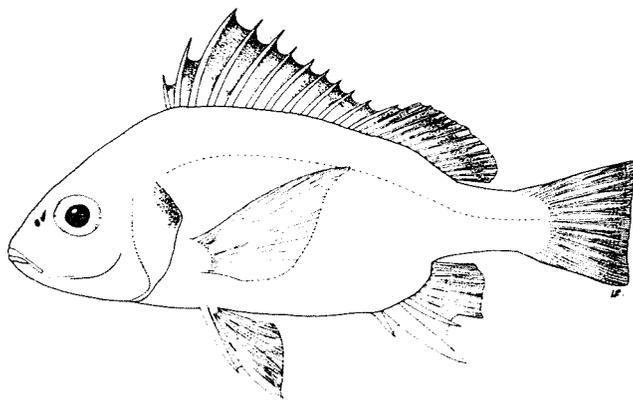
Pomadasys commersoni Fig.8

10c. Spots also present on head and snout (Fig.10) P. multimaculatum

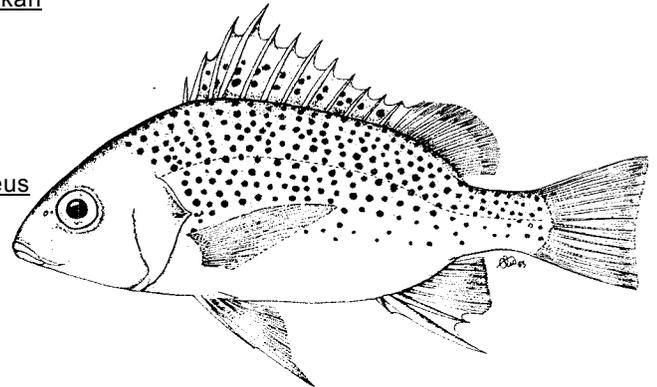
5b. Body uniform silver, bronze or darker, no spots or lines; a dark spot may be present on opercle

11a. Dorsal fin rays 14 (rarely 13); 7 transverse scales between lateral line and first dorsal fin spine; spinous part of dorsal fin often spotted (Fig.6) P. kaakan

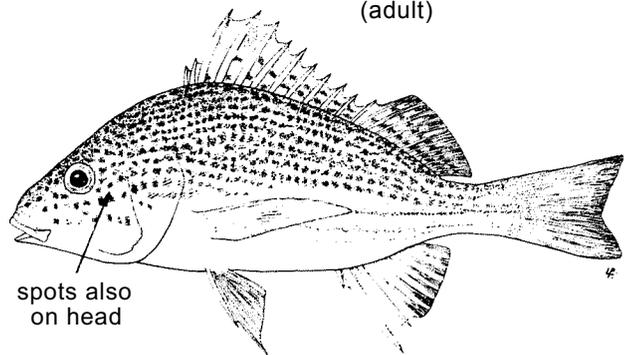
11b. Dorsal fin rays 13; 6 transverse scales between lateral line and 1st dorsal fin spine; spinous part of dorsal fin never spotted (Fig.11) P. argyreus



Pomadasys argyreus Fig.11



Pomadasys argenteus Fig.9 (adult)



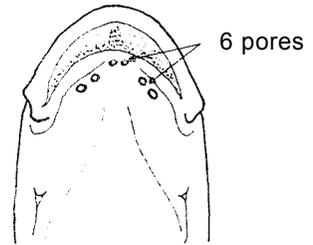
Pomadasys multimaculatum Fig.10

spots also on head

1b. Chin with 6 pores and no median pit containing a pore on each side (Fig. 12); fin spines often weak

12a. Dorsal fin with 9 or 10 spines and 21 to 26 soft rays; 20 to 25 scales between lateral line and dorsal fin origin (Fig.13)..... Diagramma pictum

12b. Dorsal fin with 11 to 14 spines and 14 to 23 soft rays; 10 to 17 scales between lateral line and dorsal fin origin Plectorhinchus



13a. Dorsal fin with 11 spines; body and head uniform dusky-grey sometimes with small white or pale spots along body, lips pale to pinkish (Fig.14) P. chubbi

13b. Dorsal fin with 12 to 14 spines

14a. Body uniform grey, brownish or olive, with or without a paler caudal fin or dark tips to fins

15a. Gillrakers on lower limb of first arch 21 to 23; usually 11 dorsal fin spines P. chubbi

15b. Gillrakers on lower limb of first arch 20 or less; usually 12 or more dorsal fin spines

16a. Dorsal fin with 14 spines (sometimes 12 or 13 in P. plagiodesmus and P. nigrus)

17a. Dorsal fin rays 19 (Fig.15) P. ceylonensis

17b. Dorsal fin rays 15 or 16

Plectorhinchus Diagramma Fig.12

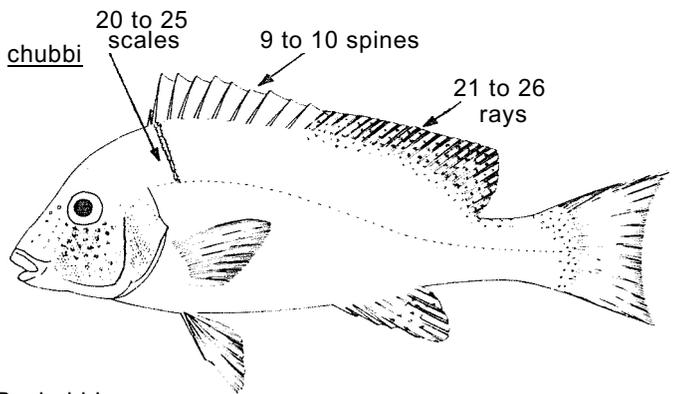
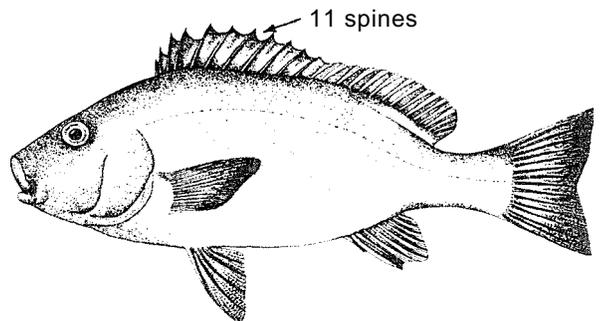
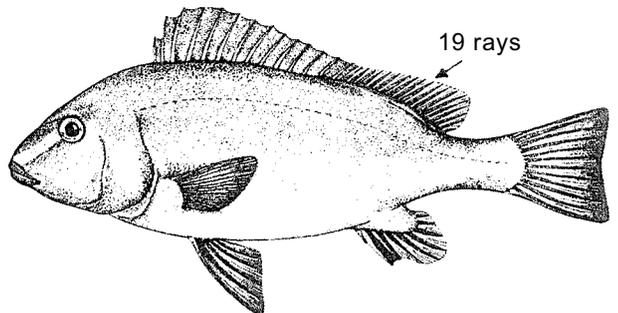


Diagramma pictum Fig.13

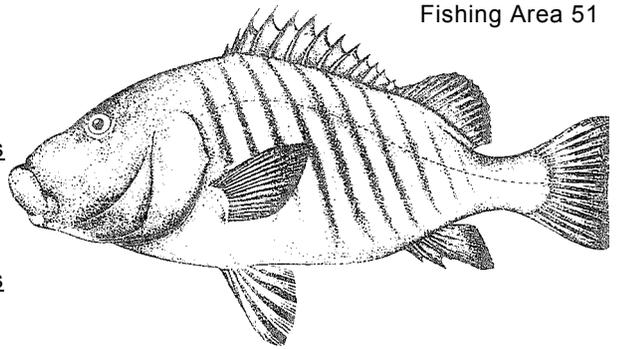


Plectorhinchus chubbi Fig.14



Plectorhinchus ceylonensis Fig.15

18a. Dark bars present on body (when fresh); scales between lateral line and dorsal fin, origin 11 to 18 (Fig.16) P. *plagiodesmus*

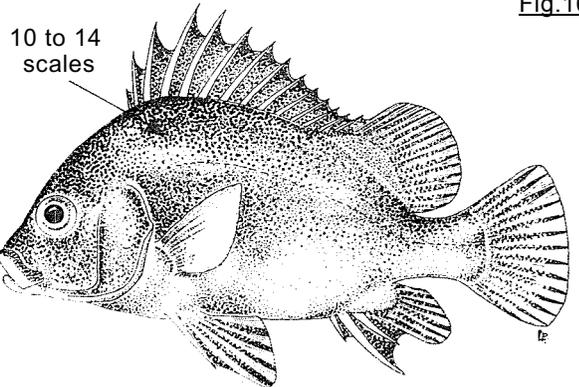


Plectorhinchus *plagiodesmus*
Fig.16

18b. No dark bars on body; scales between lateral line and dorsal fin origin 10 to 14 (Fig.17) P. *gibbosus*

16b. Dorsal fin with 12 or 13 spines

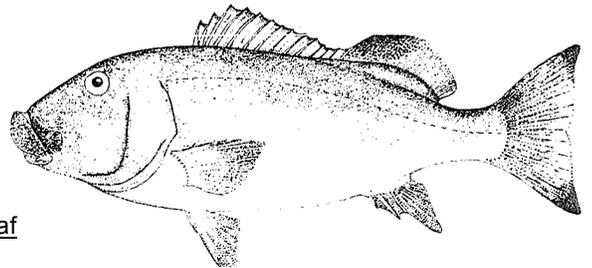
19a. Gillrakers on lower limb of first arch 19 or 20; a dark or black blotch on caudal fin lobes and anteriorly on soft dorsal fin (Fig.18) P. *obscurus*



Plectorhinchus *gibbosus* Fig.17

19b. Gillrakers on lower limb of first arch 14 to 17

20a. Pectoral fin length shorter than distance from snout tip to posterior eye margin; 21 to 23 dorsal fin rays (Fig.19) P. *griseus*

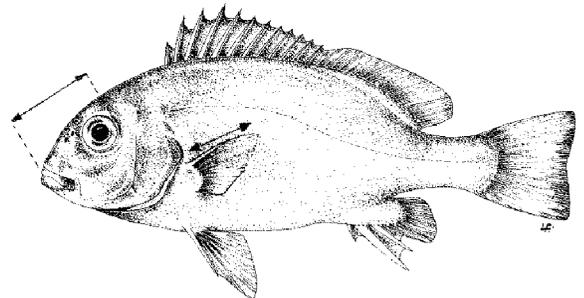


Plectorhinchus *obscurus* Fig.18

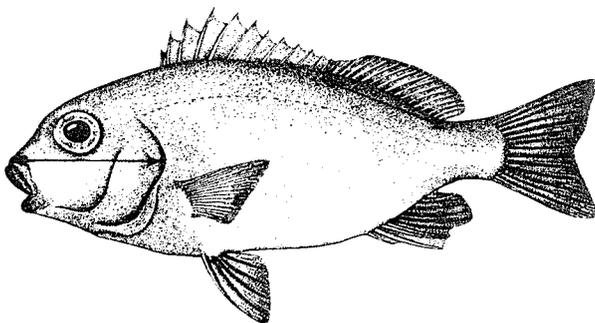
20b. Pectoral fin length longer than distance from snout tip to posterior eye margin

21a. Base of soft dorsal fin distinctly longer than head; dorsal fin rays 18 to 20, usually 19 or 20 (Fig.20) P. *schotaf*

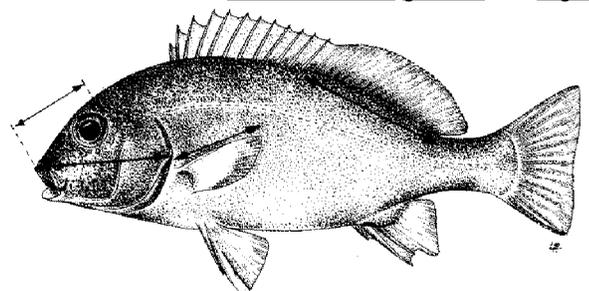
21b. Base of soft dorsal fin about equal to head length; dorsal fin rays 17 or 18 (Fig.21) .. P. *sordidus*



Plectorhinchus *griseus* Fig.19



Plectorhinchus *sordidus* Fig.21



Plectorhinchus *schotaf* Fig.20