

LUTJANIDAE

by Steven H. Kramer

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| Valid name | <i>Aprion virescens</i> Cuvier and Valenciennes 1830 (Fig. 60) |
| Synonymy | <i>Mesoprion microchir</i> Bleeker 1853 <i>Lutjanus macrochir</i> Bleeker 1863 <i>Sparopsis latifrons</i> Kner 1868 <i>Sparopsis elongatus</i> Kner 1868 <i>Chatopterus microchir</i> Bleeker 1869 <i>Aprion (Aprion) virescens</i> Bleeker (1872) 1873, revision <i>Lutjanus</i> , 1876-77 (from Weber and De Beaufort 1936) |
| Common and vernacular names | Blue-green snapper; jobfish; uku |

Distribution:

Caught only at Nihoa, Brooks Banks, St. Rogatien, and Midway in the NWHI. Maximum depth recorded for this species was 58 m.

Frequently inhabits midwater near reefs and drop-offs in depths of 6-28 m and never takes shelter in the coral (Talbot 1960). Feeds in the water column from surface to the bottom (Ommanney 1953; Wheeler 1953).

Distinguishing characteristics

D. X, 11; A. III, 8; P1. 17; LLps. 48-50; Gr. 7+14-15 (Masuda et al. 1975). Body elongate, more cylindrical than slender with large scales. Head with prominent groove on either side of snout in front of eyes; eyes relatively small, high on head. Pectoral fins short, rounded; single dorsal fin without a notch; dorsal and anal fins scaleless. Caudal fin deeply forked. Attains a length of 1 m.

Mouth oblique; lower jaw slightly projected; both jaws with two strong anterior canines. Smaller canines located laterally and between the strong canines. Villiform bands on both jaws with outer series enlarged. Vomerine teeth form a curved patch, palatines an elongated ovate patch.

In life, light gray-blue or gray-green laterally, with blue reflections dorsally, becoming much lighter ventrally. Violet blotches occur at base of soft membrane of spinous dorsal fin. Pectoral and ventral fins are yellowish (Fischer and Whitehead 1974).

Life history

Little is known about the life history of uku in Hawaiian waters. On the East African coast, fully ripe females were found in all months except June and August, suggesting a breeding season in the warmer months (Ommanney 1953; Wheeler 1953; Williams 1956; Talbot 1960). Partially ripe females were recorded in all months, but the species may actually have an irregular extended breeding season (Talbot 1960). Williams (1956) reported sexual maturity occurring at about 60-75 cm for both sexes, but Talbot (1960) found females fully ripe at 46.5 cm SL and males at 50.0 cm SL. This species can be solitary or occur in loose, well-spaced aggregation of two to five fish. In the main islands, they appear to congregate during their spawning period which generally occurs in June (see footnote 6).

The length-weight relationships are probably the same for both sexes; however, no definitive equation expressing the relationship between length and weight is available (Williams 1956).

Uku is a high-level predator in the food chain, preying on fish, crustaceans, cephalopods, and zooplankton. It also feeds on larger fish such as scombrids (Reintjes and King 1953).

Food items found in *A. virescens* stomachs from East Africa consisted of fish (49%), plankton (17%), cephalopods (14%), nonplanktonic crustaceans (12%), and others (8%) (Talbot 1960). Identifiable food items included *Siganus oramin*, *Caesio caeruleus*, *Sphyraena* sp., and *Sardinella* sp., members of the Families Callyodontidae, Ostraciontidae, and Bothidae; squids; portunids crabs, penaeid shrimps, and *Squilla* sp.; and planktonic organisms such as fish eggs, larval and postlarval fishes, stomatopod larvae, salps, and zoeae larvae (Ommanney 1953; Wheeler 1953; Williams 1956; Talbot 1960).

Uku has been reported to be ciguatera at Eniwetok and Bikini Atolls (Randall 1980). In Hawaii, this species has been implicated in three ciguatera attacks since 1900 (see footnote 11).

Gear and catch

Uku is caught primarily by handline and set lines, rarely by rod and reel and trolling gear. The uku is the only Hawaiian lutjanid regularly caught at or near the surface with lures. Considered an excellent food and game fish, the annual landings in 1961-79 varied between 19,192 and 40,730 kg, and averaged 28,909 kg, making it second in importance to the opakapaka among the snappers in the local fishery. Landings are seasonal the bulk of the catch is made from June to December (see footnote 6).

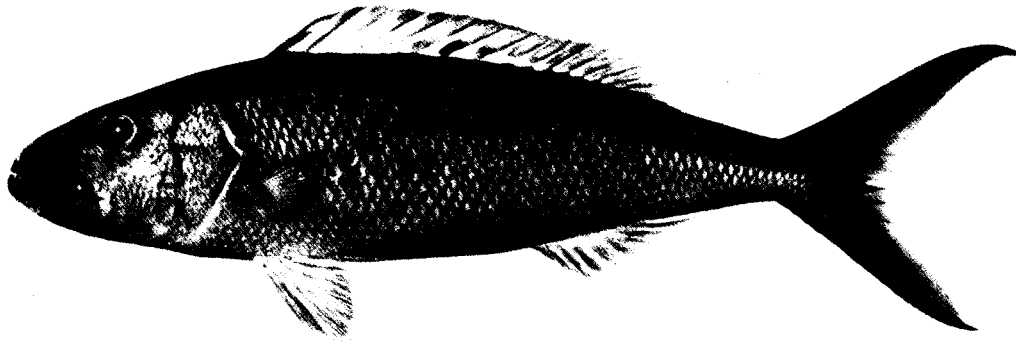


Figure 60.—*Aprion virescens*.