

Hydrocynus forskahlii (Cuvier, 1819)



Lake Turkana, Kenya. © Andrew Nightingale/Reel Africa Safaris.

Synonyms

Hydrocyon forskalli Cuvier, 1819

FAO names

Elongate tigerfish

Local names

Adangme: Akao (Ghana), Akawo (Ghana)

Alur: Ngasia (Uganda)

Bambara (Somono): Baala (Senegal)

El Molo: Koris (Kenya)

English: Elongate tigerfish (official FAO name, Kenya), Tiger fish (Ghana), Tigerfish (Zimbabwe)

Ewa: Asentiwoe-vuwo (Ghana)

Fulfulde, Pulaar (Pulaar): Seendu (Senegal)

Ga: Akao (Ghana)

Gungu: Ngassa (Uganda)

Guro: Zubè (Cote d'Ivoire)

Hausa: Danriri zawai (Nigeria), Tsage (Nigeria), Tsege (Nigeria), Zawai (Nigeria)

Igbo: Owulueze (Nigeria)

Ijo: Kabi (Nigeria)

Jula: Wulujigε (Burkina Faso)

Kanuri: Kiri shelia (Nigeria)

Kim: Hidi (Chad), Hidi Gurlua (Chad), Hiding Azolo (Chad), Hiring (Chad)

Krio: Ka-gbith (Sierra Leone), Magborgboi (Sierra Leone), Sumuneh (Sierra Leone)

Limba, west-central: Kywanka (Sierra Leone)

Mende: Magborgboi (Sierra Leone)

Mòoré: Basoaka (Burkina Faso)

Nupe: Ebma tsagi (Nigeria)

Nyoro: Ngassa (Uganda)

Soninké: Anjoobe (Senegal), Anjoobin-sance (Senegal), Sance (Senegal)

Themne: Ka-gbith (Sierra Leone)

Turkana: Lokel (Kenya)

Wolof: Guer (Senegal)

Yoruba: Ijakere (Nigeria)

Geographical distribution

Cross, Wouri and Sanaga basins in the Lower Guinea ichthyofaunal province (Paugy & Schaefer 2007). Also in the Chad, Niger, Ogun, Ouémé, Mono, Volta, Comoé, Bandama, Sassandra, Nipoué, St. Paul, Mano, Little Scarcies, Gambia and Senegal basins in West Africa (Paugy 1990, 2003; Paugy & Schaefer 2007), the Nile River, including Lake Albert (Greenwood 1966; Paugy 1984), Lake Turkana and the Omo River (Paugy 1984, 1990; Paugy & Schaefer 2007), and the Congo River basin (Paugy 1990; Paugy & Schaefer 2007).

Habitat and Biology

Forms shoals; an open water predator often found near the water surface; feeds on fishes, preferring long bodied fish as they are easier to swallow and also takes insects, grass and snails; cannibalistic; preyed upon by fish eagle *Haliaeetus vocifer* (Bell-Cross & Minshull 1988). IUCN red list status least concern (Akinyi et al 2020).

Key features

Two scale rows between lateral line and scaly process at pelvic-fin bases; eye <70% of interorbital space (Paugy 1990, 2003). Dorsal-fin uniformly greyish and its origin in front of pelvic fins; adipose fin greyish; caudal fin without black edge (Paugy 2003; Paugy & Schaefer 2007).

Interest to fisheries

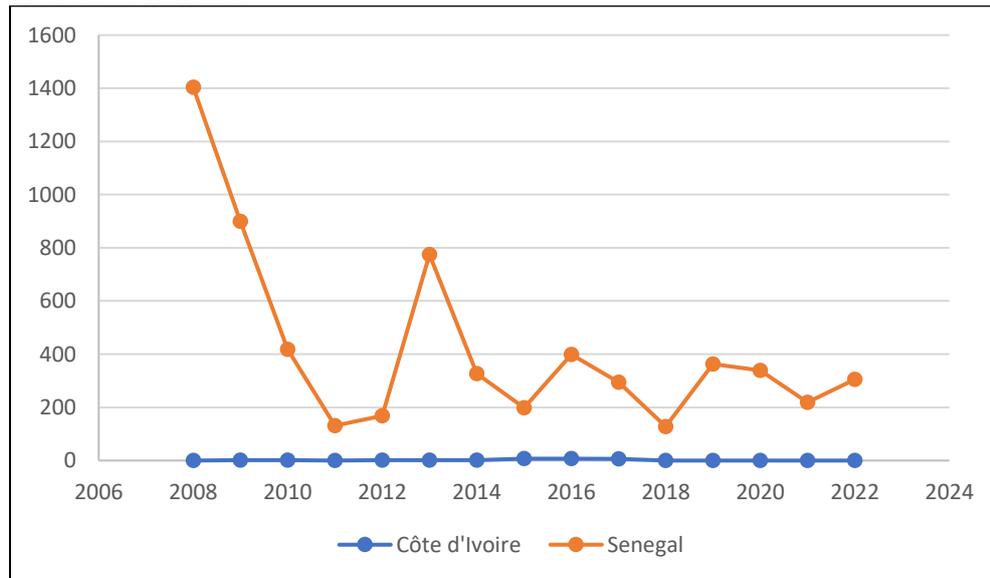


Figure 1: Catches (in tonnes) of *Hydrocynus forskahlii* as available from FAO (April 2024).

Despite its large distribution in West Africa, the Congo basin and part of the Nile, FAO (2024) holds catch data for only two countries. Data from Ivory Coast are (near) zero. Data from Senegal show a remarkably regular fluctuation with an overall decreasing trend (Figure 1).

Hydrocynus forskahlii is a highly priced commercial species (Taabu-Munyaho et al 2012; Boundja 2016; Nakiyende et al 2020) that is often common in the catches but rarely abundant. It was one of the species particularly abundant in captures using gillnets at the start and end of the flood in the Ogun River in Nigeria (Adebisi 1988). The species is commercially important in the upper Volta basin in Burkina Faso (Coulbaly 2003) and in the Ethiopian Gambella region (Tesfaye & Wolff 2014) and the Alwero reservoir (Anteneh et al 2023). *Hydrocynus forskahlii* was reported to be dominant, common and abundant in the Ethiopian lakes Abaya and Chamo, but was absent from any of the other seven lakes sampled (Vijverberg et al 2012). For most lakes, catch and effort data were not available (Vijverberg et al 2012), and no data were available for *H. forskahlii*. Although reported as

one of the commercial species of Lake Turkana (Kenya), only 48 kg were reportedly caught in 2019 (Kenya Fisheries Service, 2019).

Various reports indicate that the species may be vulnerable to fishing pressure or show already declining catches. Ita (1982) reported that the species in Lake Kainji is susceptible to capture in small mesh nets in its first and second year of life, prior to attaining sexual maturity, which may contribute to the apparent scarcity of the species. In the remote Manantali reservoir (Mali) where fishing effort is low, Kantoussan (2007) found *H. forskahlii* to make up 10% of the annual catch (in weight), being present in over 60% of the landings. However, in the intensely fished Sélingué reservoir it made up only 1.89% of the catch and was present in almost 20% of the landings (Kantoussan 2007). A decline in landings in both reservoirs was observed over a 12-month period, and although *H. forskahlii* was still very abundant in the catches from Manantali, fishermen shifted to the use of smaller mesh nets in Sélingué with the reduced abundance of larger species (Kantoussan et al 2014). Olowosegun & Omorinkoba (2007) reported an apparent decline of *H. forskahlii* in Lake Kainji. A study on the feeding habits and growth parameters of the species in the Benue River at Makurdi (Niger basin, Nigeria), based on samples collected from local fishermen, showed that almost 60% of the specimens were below length at first maturity as reported in FishBase (Ogbe et al 2008). Although an important and common species in the Yobe River (Nigeria), a decline of *H. forskahlii* in the catches of artisanal fishermen was observed (Ashley-Dejo et al 2022).

Boundja (2016), in a study in some species of economic value in the Sangha River, found that the majority of *H. forskahlii* specimens were small (less than 30 cm and 200g) and at least 70% were only a few months old and under their probable length at first maturity (estimated at around 37 cm SL and 2 years). However, *H. forskahlii* specimens over 1 m SL, weighing more than 15 kg were still occasionally caught by fishers. The species is one of the top marketed fish in the Sangha Trinational conservation area. Especially large fishes, usually caught late in the second half the main rainy season, are highly favoured either fresh or dry-smoked, the latter sold pricier than fresh fish (Boundja 2016).

Hydrocynus forskahlii historically formed one of the most important commercial species in Lake Albert until the early 2000s. Catch assessment surveys in 2007-2013 revealed a strong decline in their contribution to the commercial catch, from 72.7% in 1971 to less than 6% in 2013 (Nakiyende et al 2013), and further to 5.2% in 2019 (Nakiyende et al 2020). The Catch Per Unit Effort registered a two-fold decline between 1971 and 2007, from 36.1 kg per boat per day to 18.1 kg per boat per day and decreased further to only 6.3 by 2013 (Figure 2), while the average weight strongly decreased from 0.8 kg in 1980 to 0.190 in 2013 (Nakiyende et al 2013). The species is targeted by over 50% of illegal gillnets, below the legal minimum limit of four inches (101.6 mm) (Nakiyende et al 2013).

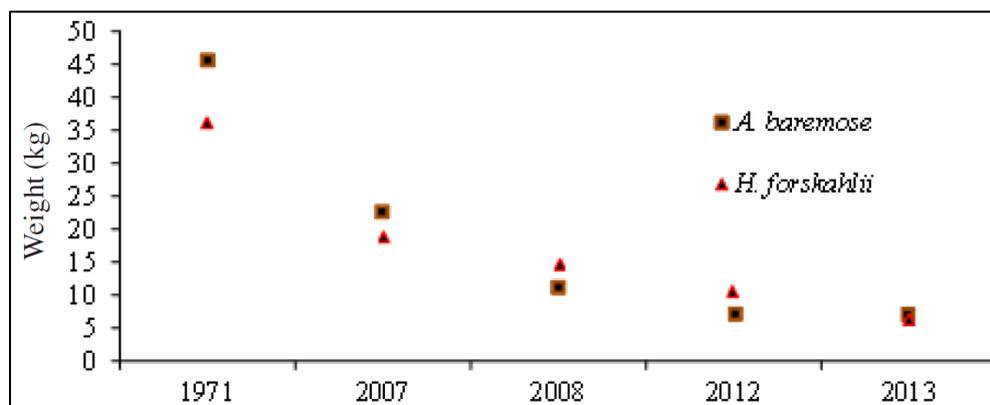


Figure 2: Trend of catch rates of *Alestes baremose* and *Hydrocynus forskahlii* in the commercial catches on Lake Albert expressed as Catch Per Unit Effort (kg/boat/day) (from Nakiyende et al 2013).

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