

## The small scale fishery of Linosa (Pelagic Islands : Mediterranean Sea)

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### LA PÊCHE ARTISANALE DE LINOSA (ÎLES PÉLAGIQUES, MÉDITERRANÉE)

#### RÉSUMÉ

*Le milieu, les engins et les prises de cette île de 400 habitants sont brièvement décrits.*

With an extension of 5.3 km<sup>2</sup> and less than four hundred true inhabitants, Linosa, the volcanic Pelagian Island, can be considered the «archetype» of those «Small islands» whose development and resources management have recently received new attention by scientific community and public administrations.

Located in the middle of the Sicily Channel, surrounded by deep and clear waters, Linosa represents an oasis for demersal resources and a natural, extremely efficient, «fish aggregation device» for the pelagic ones.

Indeed, since its last colonization (middle XIX century), agriculture constituted the basic economic activity, fishery development having been limited by the lack of a suitable harbour and the impossibility of preserving and commercializing the catch.

As tourist activity developed during the last two decades, due to the subtropical climate and the attraction of the wonderful sea, more opportunities were offered to the local fishery.

However, in spite of the increased local and foreign demand, Linosian fishermen maintained the traditional small scale characteristics of their activity.

The fleet consists of about 20 wooden boats (no more than 2 tons each) powered with small engines (<25 hp), and bottom and trolling lines constitute the preferred gears.

Trawlers and purse-seiners are not welcomed around the island.

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*In : La Recherche Face à la Pêche Artisanale, Symp. Int. ORSTOM-IFREMER, Montpellier France, 3-7 juillet 1989, J.-R. Durand, J. Lemoalle et J. Weber (eds.). Paris, ORSTOM, 1991, t. I : 465-466.*

Bottom longlines (conzi) with an average of 500 hooks (Mustad 8-4, 10 m spaced and linked to the main by 1.5-2.5 m long snoods) are generally set at sunrise or noon and always hauled after 2-3 hours.

Target species are *Dentex dentex* (dentic) - *Sparus pagrus* (prao) beyond 100 m, and *Polyprion americanus* (cilenga) - *Merluccius merluccius* (merluzzu) between 400-700 m.

The hooks are commonly baited with *Trachurus trachurus* (suro) or *Boops boops* (uopa) previously caught by hand lines.

Trolling (hand) lines are used both unbaited (near-surface) mainly directed to *Coryphaena hippurus* (lampuga) and baited (middle water) toward *Seriola dumerilii* (aricciola) and Scomberoids.

During summer huge schools of *Scomber scomber* (sgumbru) are attracted by light and fished by hand lines.

Trap and trammel nets are practically unused; *Conger conger* (runcu) and *Muraena helena* (murina) are often the only species caught by trap, heavily damaging trammel nets when attracted by entangled fish.

The strong competition of these species for the hook and the damage caused by biting the other valuable species explain both the unusual setting time and the short duration of the bottom long lines fishery.

*Epinephelus quaza* (cernia), *Micropogonias undulatus* (addotto), *Diplodus vulgaris* (tista nivura) and *Sciaenops ocellatus* (corvu), have always been the preferential species for both local and tourist divers: the uncontrolled and often illegal (i.e. by scuba) intense exploitation have strongly depleted these resources once described to be «...enormously abundant...»

For its characteristics Linosa might represent an ideal natural laboratory for small scale fisheries biologists, even if one must be concerned about the increasing pressure of the human activities, this island being an extremely delicate ecosystem.

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