

AN ANNOTATED BIBLIOGRAPHY OF PARASITIC ISOPODA (CRUSTACEA) OF CHONDRICHTHYES

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SYNOPSIS

This annotated bibliography is an attempt to bring together all available published records on the parasitic isopods of Chondrichthian fishes as a basic reference source. An effort was made to synonymise old names according to the presently accepted scientific names.

INTRODUCTION

Data on the occurrence of parasitic isopods on Teleostean are quite abundant. However, references to their occurrence on Chondrichthian fishes are scattered and less numerous.

The purpose of the present work is to assemble published references on species of isopods parasitizing the Chondrichthian fishes, i. e., sharks, rays, sawfishes and allied forms. This paper, hopefully gathering all possible available information, aims to present a basic bibliography, to give a general view of the amount of published information on the subject, and to assess the number of species of both parasites and their Chondrichthian hosts.

The amount of information encountered in the published literature was

deceptive, and few remarks should be made regarding this. The majority of data was found in papers dealing with the taxonomy of isopod species. Papers concerning to the systematics or biology of Chondrichthyes fishes, unfortunately, mentioned neither the presence nor absence of parasitic isopods. The exceptions are very rare. On the other hand, old references to certain parasitic isopods and their hosts are commonly mentioned in many subsequent papers, thus not improving in any way, our knowledge on the matter. It is also a usual practice to mention the host fish by its common name, without assignement to a species. It is hoped that a future serious effort may change this. Good and complete information regarding the subject is badly in need.

The results of the present compilation are given according to the following plan:

1. A list of isopod crustaceans, arranged in phylogenetic order, parasitizing Chondrichthyes fishes;
2. A list of Chondrichthyes fishes, also arranged in phylogenetic order, parasitized by isopod crustaceans;
3. A list of parasitic isopods and their Chondrichthyes hosts;
4. A list of Chondrichthyes fishes and their parasitic isopods;
5. An annotated bibliography;
6. An author's index;
7. An index of scientific names of both parasites and hosts included in the bibliography.

The annotated references are arranged in alphabetical order of the author's surname. Each author's work is listed chronologically by the year of publication. Works by two or more authors are entered only under the senior author's name. Each citation includes the most pertinent information according to the aim of this paper. The scientific names of both parasites and their hosts were revised.

Regarding the species of *Praniza* the procedure employed by Monod (1926) was adopted. Known species of *Praniza* were named in accord with available

names from the literature rather than using the *Praniza* sp. 1, sp. 2 system. This former procedure currently allows reference to a specific parasite although it should be remembered that each so called *Praniza* may represent a species of *Gnathia*. Many of the described *Praniza* species are individually recognized as being different, but unfortunately these larvae have not yet been related to the correct adults.

Except in a very few cases, each citation annotated was personally examined by the authors. In spite of the hundreds of papers examined, this compilation is not yet complete. Some contributions, undoubtedly, were overlooked. Difficulties were encountered in the availability of old literature, or reviews of limited distribution. However, the authors believe that this compilation includes the most important literature, and so provides the basic information on the subject.

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LIST OF ISOPODA CRUSTACEANS, ARRANGED IN PHYLOGENETIC ORDER,
PARASITIZING CHONDRICHTHYES FISHES*

Class Malacostraca

Subclass Eumalacostraca

Superorder Peracarida

Order ISOPODA

Suborder Gnathiidea

Family Gnathiidae

Genus *Gnathia* Leach, 1814

Gnathia aureola Stebbing, 1902

Suborder Flabellifera

Family Cirolanidae

Genus *Cirolana* Leach, 1818

Cirolana concharum (Stimpson, 1853)

Cirolana borealis Lilljeborg, 1851

Cirolana hirtipes Edwards, 1840

Cirolana woodjonesi Hale, 1924

Cirolana corpulenta Hale, 1925

Genus *Conilera* Leach, 1818

Conilera cylindracea (Montagu, 1803)

NOTE: A number of *Praniza* spp. is mentioned many times in the present compilation, but because they are larval forms of unknown species of the genus *Gnathia*, they are not listed accordingly.

* The systematic arrangement follows that adopted by Richardson, H. 1905. A monograph on the isopods of North America. Bull. U.S. natn. Mus., 54:i-xxv, 1-727, and Hessler, R. R. 1969. Peracarida, p. R371-R387. In: Treatise on invertebrate paleontology, part R, Arthropoda 4, vol. 1. Ed.- Moore, R. C., Geol. Soc. Amer., Inc. & Univ. Kansas, USA.

Family Excorallanidae

Genus *Excorallana* Stebbing, 1904*Excorallana tricornis* (Hansen, 1890)

Family Aegidae

Genus *Aega* Leach, 1815*Aega psora* (Linnaeus, 1758)*Aega antillensis* Schiödte & Meinert, 1879*Aega crenulata* Lütken, 1858*Aega webbi* (Guérin-Méneville, 1836)*Aega arctica* Lütken, 1858*Aega monophthalma* Johnston, 1834*Aega stroemi* Lütken, 1858*Aega rosacea* (Risso, 1816)*Aega serripes* Edwards, 1840*Aega semicarinata* Miers, 1875*Aega magnifica* Dana, 1853*Aega angustata* Whitelegge, 1901Genus *Rocinela* Leach, 1818*Rocinela belliceps* (Stimpson, 1864)*Rocinela propodialis* Richardson, 1905*Rocinela angustata* Richardson, 1898*Rocinela signata* Schiödte & Meinert, 1879Genus *Barybrotes* Schiödte & Meinert, 1879*Barybrotes indus* Schiödte & Meinert, 1879Genus *Alitropus* Edwards, 1840*Alitropus typus* Edwards, 1840

Family Cymothoidae

Genus *Nerocila* Leach, 1818

- Nerocila acuminata* Schiödte & Meinert, 1881
- Nerocila californica* Schiödte & Meinert, 1881
- Nerocila armata* Dana, 1853
- Nerocila laticauda* Schiödte & Meinert, 1881
- Nerocila orbigny* (Guérin-Méneville, 1829)
- Nerocila maculata* Edwards, 1840
- Nerocila munda* Harger, 1873
- Nerocila fluviatilis* Schiödte & Meinert, 1881

Genus *Anilocra* Leach, 1818

- Anilocra physodes* (Linnaeus, 1767)

Genus *Meinertia* Stebbing, 1893

- Meinertia collaris* Schiödte & Meinert, 1883
- Meinertia oxyrrhynchaena* (Koelbel, 1878)
- Meinertia parallela* (Otto, 1828)
- Meinertia steindachneri* (Koelbel, 1878)

Genus *Lironeca* Leach, 1818

- Lironeca ovalis* (Say, 1818)
- Lironeca raynaudi* Edwards, 1840

LIST OF CHONDRICHTHYES FISHES, ARRANGED IN PHYLOGENETIC ORDER,
PARASITIZED BY ISOPODA CRUSTACEANS*

Class Chondrichthyes

Subclass Elasmobranchii

Cohort Euselachii

Superorder Squalomorphii

Order Hexanchiformes

Family Hexanchidae Gray, 1851

Genus *Hexanchus* Rafinesque, 1810

Hexanchus griseus (Bonnaterre, 1788)

Genus *Notorynchus* Ayres, 1855

Notorynchus cepedianus (Peron, 1807)

Order Squaliformes

Family Squalidae Bonaparte, 1834

Subfamily Squalinae Bonaparte, 1834

Genus *Centrophorus* Müller & Henle, 1837

Centrophorus squamosus (Bonnaterre, 1788)

Genus *Squalus* (Artedi) Linnaeus, 1758

Squalus acanthias Linnaeus, 1758

Subfamily Somniosinae Jordan, 1888

Genus *Somniosus* Lesueur, 1818

Somniosus microcephalus (Schneider, 1801)

* The systematic arrangement follows that adopted by Compagno, L. J. 1973. Interrelationships of living Elasmobranchs. Suppl. n° 1 to the Zoological Journal of the Linnean Society, 53:15-61.

Superorder Batoidea

Order Rajiformes

Suborder Rhinobatoidei

Family Rhinobatidae Müller & Henle, 1838

Genus *Rhinobatos* Link, 1790*Rhinobatos halavi* (Forsskal, 1775)

Suborder Rajoidei

Family Rajidae Bonaparte, 1831

Genus *Raja* (Artedi) Linnaeus, 1758*Raja alba* Lacépède, 1803*Raja asterias* de la Roche, 1809*Raja laevis* Mitchill, 1817*Raja polystigma* Regan, 1923*Raja binocolata* Girard, 1854*Raja miraletus* Linnaeus, 1758*Raja australis* Macleay, 1884*Raja (Dipturus) batis* Linnaeus, 1758*Raja (Amblyraja) radiata* Donovan, 1808*Raja (Raja) clavata* Linnaeus, 1758

Order Pristiformes

Family Pristidae Bonaparte, 1838

Genus *Pristis* Link, 1790*Pristis pectinatus* Latham, 1794*Pristis cuspidatus* Latham, 1794

Order Torpediniformes

Superfamily Torpedinoidea

Family Torpedinidae Bonaparte, 1838

Genus *Torpedo* Houttuyn, 1764*Torpedo marmorata* Risso, 1810

Order Myliobatiformes

Superfamily Dasyatoidea

Family Dasyatidae Jordan, 1888

Genus *Dasyatis* Rafinesque, 1810*Dasyatis pastinaca* (Linnaeus, 1758)*Dasyatis americana* Hildebrand & Schroeder, 1928

Superfamily Myliobatoidea

Family Myliobatidae Bonaparte, 1838

Genus *Aetobatus* Blainville, 1816*Aetobatus narinari* (Euphrasen, 1790)Genus *Myliobatis* Cuvier, 1817

Superfamily Mobuloidea

Family Mobulidae Gill, 1893

Genus *Mobula* Rafinesque, 1810*Mobula diabolus* (Shaw, 1804)

Superorder Squatinomorphii

Order Squatiniformes

Family Squatinidae Bonaparte, 1838

Genus *Squatina* Duméril, 1806*Squatina oculata* Bonaparte, 1840*Squatina squatina* (Linnaeus, 1758)*Squatina dumeril* (Lesueur, 1810)

Superorder Galeomorphii

Order Heterodontiformes

Family Heterodontidae Gray, 1851

Genus *Heterodontus* Blainville, 1816*Heterodontus philippi* (Schneider, 1801)

Order Orectolobiformes

Family Ginglymostomatidae Gill, 1862

Genus *Ginglymostoma* Müller & Henle, 1837*Ginglymostoma cirratum* (Bonnaterre, 1788)Genus *Nebrius* Rüppell, 1835*Nebrius concolor* Rüppell, 1835

Order Lamniformes

Family Odontaspidae Müller & Henle, 1839

Genus *Odontaspis* Agassiz, 1838

Family Cetorhinidae Gill, 1862

Genus *Cetorhinus* Blainville, 1816*Cetorhinus maximus* (Gunnerus, 1765)

Order Carcharhiniformes

Family Scyliorhinidae Gill, 1862

Genus *Poroderma* Smith, 1837*Poroderma africanum* (Gmelin, 1789)Genus *Scyliorhinus* Blainville, 1816*Scyliorhinus stellaris* (Linnaeus, 1758)*Scyliorhinus canicula* (Linnaeus, 1758)

Family Pseudotriakidae Gill, 1892

Genus *Pseudotriakis* Brito Capello, 1868*Pseudotriakis microdon* Brito Capello, 1868

Family Triakidae Gray, 1851

Tribe Triakini Gray, 1851

Genus *Mustelus* Link, 1890*Mustelus canis* (Mitchill, 1815)Genus *Triakis* Müller & Henle, 1838*Triakis semifasciata* Girard, 1854

Subclass Holocephali

Order Chimaeriformes

Family Chimaeridae

Genus *Chimaera* Linnaeus, 1758*Chimaera monstrosa* Linnaeus, 1758Genus *Hydrolagus* Gill, 1862*Hydrolagus collieri* (Lay & Bennett, 1839)

Family Callorhynchidae

Genus *Callorhynchus* Lacépède, 1798*Callorhynchus mili* Bory de St. Vincent, 1823

LIST OF PARASITIC ISOPODS AND THEIR CHONDRICHTHYES HOSTS

FAMILY GNATHIIDAE

- Gnathia aureola* Stebbing, 1902.
Aetobatus narinari. Barnard, 1925; Monod, 1926; Nobili, 1907; Stebbing, 1900.
Dasyatis pastinaca. Barnard, 1925.
- Praniza virido-nitens* Monod, 1926.
Aetobatus narinari. Monod, 1926.
- Praniza rhinobatis* Kossmann, 1880.
Rhinobatos halavi. Kossmann, 1880; Monod, 1926.
- Praniza torpedinis* Walter, 1885.
Torpedo sp. Monod, 1926; Walter, 1885.
- Praniza aldabrensis* Schoenichen, 1908.
 Sharks (species unknown). Monod, 1926; Schoenichen, 1908.
- Praniza javana* Koehler, 1884-1885.
Nebrius concolor. Monod, 1926.
- Praniza* sp.
Squatina dumeril. Hesse, 1864.
Chimaera monstrosa. Brian, 1909; Monod, 1926.
Torpedo sp. Brian, 1909.
 Shark (species unknown). Hesse, 1864.

FAMILY CIROLANIDAE

- Cirolana concharum* (Stimpson, 1853).
Pseudotriakis microdon. Richardson, 1905.
- Cirolana borealis* Lilljeborg, 1851.
Squalus acanthias. Walker, 1897.
Raja batis. Hansen, 1890, 1910; Meinert, 1877; Nierstrasz & Stekhoven, 1930.
Squalus sp. Nierstrasz & Stekhoven, 1930.

- Cirolana hirtipes* Edwards, 1840.
Raja batis. Thompson, 1847.
Odontaspis sp. Barnard, 1936.
- Cirolana woodjonesi* Hale, 1924.
Heterodontus philippi. Hale, 1924.
Notorynchus cepedianus. Hale, 1924.
Shark (species unknown). Hale, 1925.
- Cirolana corpulenta* Hale, 1925.
Heterodontus philippi. Hale, 1925.
- Conilera cylindracea* (Montagu, 1803).
Scyliorhinus stellaris. Bianco, 1888; Hansen, 1890.
Squalus acanthias. Day, 1884; Hansen, 1890.
Shark (probably *Squalus acanthias*). Richardson, 1905.
- Conilera* sp.
Raja asterias. Capapé & Pantoustier, 1976.

FAMILY EXCORALLANIDAE

- Excorallana tricornis* (Hansen, 1890).
Aetobatus narinari. Menzies & Glynn, 1968.
Dasyatis americana. Menzies & Glynn, 1968.

FAMILY AEGIDAE

- Aega psora* (Linnaeus, 1758).
Somniosus microcephalus. Beneden, 1861; Boone, 1920; Hansen, 1916; Holthuis, 1950; Lütken, 1858; Nierstrasz & Stekhoven, 1930; Richardson, 1905; Schiödte & Meinert, 1879; Stephensen, 1929, 1937.
- Raja batis*. Boone, 1920; Hansen, 1916.
Raja laevis. Wallace, 1919.
Raja radiata. Wallace, 1919.
Raja sp. Nierstrasz & Stekhoven, 1930; Holthuis, 1956.
Somniosus sp. Stephensen, 1948; Holthuis, 1956.
Shark (species unknown). Boone, 1920; Sars, 1896.
Skate (species unknown). Boone, 1920; Miner, 1950; Schultz, 1969.

- Aega antillensis* Schiödte & Meinert, 1879.
Cetorhinus maximus. Hale, 1925.
Shark (species unknown). Hale, 1940.
- Aega crenulata* Lütken, 1858.
Somniosus microcephalus. Boone, 1920; Hansen, 1916; Nierstrasz & Stekhoven, 1930; Richardson, 1905; Sars, 1896; Schiödte & Meinert, 1879; Schultz, 1969.
Somniosus sp. Stephensen, 1948.
- Aega webbi* (Guérin-Méneville, 1836).
Poroderma africanum. Vanhöffen, 1914.
- Aega arctica* Lütken, 1858.
Somniosus microcephalus. Boone, 1920; Hansen, 1916; Lütken, 1858; Richardson, 1905; Sars, 1896; Schiödte & Meinert, 1879; Schultz, 1969; Stephensen, 1937.
- Aega monophthalma* Johnston, 1834.
Somniosus microcephalus. Hansen, 1916; Nierstrasz & Stekhoven, 1930; Sars, 1896; Schiödte & Meinert, 1879; Stephensen, 1937.
Centrophorus squamosus. Hansen, 1916; Nierstrasz & Stekhoven, 1930.
- Aega stroemi* Lütken, 1858.
Hexanchus griseus. Monod, 1923; Nierstrasz & Stekhoven, 1930.
Squalus acanthias. Hansen, 1916; Nierstrasz & Stekhoven, 1930; Sars, 1896; Stephensen, 1937; Greci, 1975.
Centrophorus squamosus. Hansen, 1916; Nierstrasz & Stekhoven, 1930; Stephensen, 1937.
Squalus sp. Stephensen, 1948.
- Aega rosacea* (Risso, 1816).
Squatina squatina. Trilles & Raibaut, 1971; Greci, 1975.
Squatina oculata. Capapé & Pantoustier, 1976.
Squatina dumeril. Norman, 1907.
Scyliorhinus canicula. Monod, 1923; Trilles & Raibaut, 1971; Greci, 1975; Capapé & Pantoustier, 1976.
Raja asterias. Capapé & Pantoustier, 1976.
Raja clavata. Trilles, 1968; Trilles & Raibaut, 1971; Greci, 1975; Capapé & Pantoustier, 1976.

Aega serripes Edwards, 1840.

Skate (species unknown). Hale, 1925, 1940.

Aega semicarinata Miers, 1875.

Skate (species unknown). Menzies, 1962.

Aega magnifica Dana, 1853.

Skate (species unknown). Menzies, 1962.

Aega angustata Whitelegge, 1901.

Sawfish (species unknown). Hale, 1925.

Shark (species unknown). Hale, 1940.

Aega sp.

Mobula diabolus. Tortonese, 1956.

Rocinela belliceps (Stimpson, 1864).

Hydrolagus colliei. Hatch, 1947; Richardson, 1905.

Hydrolagus sp. George & Stromberg, 1968.

Chimaera sp. Boone, 1920.

Skate (species unknown). Hatch, 1947.

Rocinela propodialis Richardson, 1905.

Raja binoculata. Hatch, 1947; George & Stromberg, 1968.

Rocinela angustata Richardson, 1898.

Raja binoculata. Hatch, 1947; George & Stromberg, 1968.

Sawfish (species unknown). Hale, 1940.

Rocinela signata Schiödte & Meinert, 1879.

Ginglymostoma cirratum. Menzies & Glynn, 1968.

Dasyatis americana. Menzies & Glynn, 1968.

Chondrichthyes/Plagiostomata. Moreira, 1972.

Barybrotus indus Schiödte & Meinert, 1879.

Mobula diabolus. Pillai, 1954, 1967.

Alitropus typus Edwards, 1840.

Skate (species unknown). Barnard, 1936; Lanchester, 1902.

FAMILY CYMOTHOIDAE

Nerocila acuminata Schiödte & Meinert, 1881.

Pristis pectinatus. Schiödte & Meinert, 1881.

Shark (species unknown). Schultz, 1969.

Sawfish (species unknown). Menzies & Frankenberg, 1966; Richardson, 1905.

Nerocila californica Schiödte & Meinert, 1881.

Triakis semifasciata. Richardson, 1905; Schiödte & Meinert, 1881.

Triakis sp. Gurjanova, 1936.

Myliobatis sp. Gurjanova, 1936; Richardson, 1905; Schiödte & Meinert, 1881.

Nerocila fluviatilis Schiödte & Meinert, 1881.

Mustelus canis. Cordero, 1937; Moreira, 1973; Ringuelet, 1947; Trilles, 1975a.

Nerocila munda Harger, 1873.

Mustelus canis. Summer, Osburn & Cole, 1911; Trilles, 1975a.

Nerocila maculata Edwards, 1840.

Raja sp. Chevreux, 1883; Trilles, 1975a.

Nerocila armata Dana, 1853.

Shark (species unknown). Brian & Dartevelle, 1949.

Nerocila laticauda Schiödte & Meinert, 1881.

Raja australis. Hale, 1926; Trilles, 1975a.

Nerocila orbigny (Guérin-Méneville, 1829).

Callorhynchus mili. Hale, 1940.

Chimaera sp. Hale, 1926.

Anilocra physodes (Linnaeus, 1767).

Raja clavata. Capapé & Pantoustier, 1976.

Squatina squatina. Nierstrasz, 1918.

Meinertia collaris Schiödte & Meinert, 1883.

Raja miraletus. Trilles & Raibaut, 1973; Capapé & Pantoustier, 1976.

Torpedo marmorata. Capapé & Pantoustier, 1976.

Meinertia oxyrrynchaena (Koelbel, 1878).

Raja asterias. Capapé & Pantoustier, 1976.

Raja clavata. Capapé & Pantoustier, 1976.

Scyliorhinus stellaris. Capapé & Pantoustier, 1976.

Torpedo marmorata. Capapé & Pantoustier, 1976.

Meinertia steindachneri (Koelbel, 1878).

Raja asterias. Capapé & Pantoustier, 1976.

Raja polystigma. Capapé & Pantoustier, 1976.

Raja alba. Capapé & Pantoustier, 1976.

Meinertia parallela (Otto, 1828).

Raja asterias. Capapé & Pantoustier, 1976.

Raja clavata. Capapé & Pantoustier, 1976.

Lironeca ovalis (Say, 1818).

Pristis cuspidatus. Richardson, 1905.

Pristis sp. Alperin, 1966; Briggs, 1970; Summer, Osburn & Cole, 1911.

Sawfish (species unknown). Miner, 1950.

Lironeca raynaudi Edwards, 1840.

Mustelus sp. Hurley, 1961.

Shark (species unknown). Gurjanova, 1936.

Parasitic isopod (species unknown).

Aetobatus narinari. Gohar & Mazhaz, 1964.

LIST OF CHONDRICHTHYES FISHES AND THEIR PARASITIC ISOPODS

Hexanchus griseus (Bonnaterre, 1788).

Aega stroemi. Monod, 1923; Nierstrasz & Stekhoven, 1930.

Notorynchus cepedianus (Peron, 1807).

Cirolana woodjonesi. Hale, 1924.

Centrophorus squamosus (Bonnaterre, 1788).

Aega stroemi. Hansen, 1916; Nierstrasz & Stekhoven, 1930; Stephensen, 1937.

Aega monophtalma. Hansen, 1916; Nierstrasz & Stekhoven, 1930.

Squalus sp.

Aega stroemi. Stephensen, 1948.

Cirolana borealis. Nierstrasz & Stekhoven, 1930.

Squalus acanthias Linnaeus, 1758.

Cirolana borealis. Walker, 1897.

Conilera cylindracea. Day, 1884; Hansen, 1890.

Aega stroemi. Sars, 1896; Hansen, 1916; Nierstrasz & Stekhoven, 1930; Stephensen, 1937; Greci, 1975.

Somniosus sp.

Aega psora. Stephensen, 1948.

Aega crenulata. Stephensen, 1948.

Somniosus microcephalus (Schneider, 1801).

Aega psora. Beneden, 1861; Boone, 1920; Hansen, 1916; Holthuis, 1950, 1956; Lütken, 1858; Nierstrasz & Stekhoven, 1930; Richardson, 1905; Schiödte & Meinert, 1879; Stephensen, 1929, 1937.

Aega crenulata. Boone, 1920; Hansen, 1916; Nierstrasz & Stekhoven, 1930; Richardson, 1905; Sars, 1896; Schiödte & Meinert, 1879; Schultz, 1969.

Aega arctica. Boone, 1920; Hansen, 1916; Lütken, 1858; Richardson, 1905; Sars, 1896; Schiödte & Meinert, 1879; Schultz, 1969; Stephensen, 1937.

Aega monophtalma. Hansen, 1916; Nierstrasz & Stekhoven, 1930; Sars, 1896; Schiödte & Meinert, 1879; Stephensen, 1937.

Rhinobatos halavi (Forsskal, 1775).

Praniza rhinobatis. Kossmann, 1880; Monod, 1926.

Raja sp.

Aega psora. Nierstrasz & Stekhoven, 1930.

Nerocila maculata. Chevreux, 1883; Trilles, 1975.

Raja laevis Mitchill, 1817.

Cirolana borealis. Wallace, 1919.

Raja binocolata Girard, 1854.

Rocinela angustata. George & Stromberg, 1968; Hatch, 1947.

Rocinela propodialis. George & Stromerg, 1968; Hatch, 1947.

Rocinela propodialis. George & Stromberg, 1968; Hatch, 1947.

Raja miraletus

Meinertia collaris. Trilles & Raibaut, 1973; Capapé & Pantoustier, 1976.

Raja asterias de la Roche, 1809.

Meinertia oxyrrynchaena. Capapé & Pantoustier, 1976.

Meinertia steindachneri. Capapé & Pantoustier, 1976.

Meinertia parallela. Capapé & Pantoustier, 1976.

Aega rosacea. Capapé & Pantoustier, 1976.

Conilera sp. Capapé & Pantoustier, 1976.

Raja alba Lacépède, 1803.

Meinertia steindachneri. Capapé & Pantoustier, 1976.

Raja polystigma Regan, 1923.

Meinertia steindachneri. Capapé & Pantoustier, 1976.

Raja australis Macleay, 1884.

Nerocila laticauda. Hale, 1926.

Raja batis Linnaeus, 1758.

Cirolana borealis. Hansen, 1890; Hesse, 1910; Meinert, 1877; Nierstrasz & Stekhoven, 1930; Thompson, 1847.

Raja radiata Donavan, 1808.

Aega psora. Wallace, 1919.

Raja clavata Linnaeus, 1758.

Anilocra physodes. Capapé & Pantoustier, 1976.

Meinertia oxyrrynchaena. Capapé & Pantoustier, 1976.

Meinertia parallela. Capapé & Pantoustier, 1976.

Aega rosacea. Trilles, 1968; Trilles & Raibaut, 1971; Greci, 1975; Capapé & Pantoustier, 1976.

Skates (species unknown).

Cirolana borealis. Walker, 1897; Wallace, 1919.

Alitropus typus. Barnard, 1936; Boone, 1920; Lanchester, 1902.

Rocinela belliceps. Hatch, 1947.

Aega serripes. Hale, 1925, 1940.

Aega semicarinata. Menzies, 1962.

Aega magnifica. Menzies, 1962.

Pristis sp.

Lironeca ovalis. Alperin, 1966; Briggs, 1970; Summer, Osburn & Cole, 1911.

Pristis pectinatus Latham, 1794.

Nerocila acuminata. Pearse, 1947.

Pristis cuspidatus Latham, 1794.

Lironeca ovalis. Richardson, 1905.

Sawfishes (species unknown, but probably *Pristis* sp.).

Lironeca ovalis. Miner, 1950.

Aega angustata. Hale, 1925, 1940.

Nerocila acuminata. Menzies & Frankenberg, 1966; Richardson, 1905.

Torpedo sp.

Praniza torpedinis. Monod, 1926; Walter, 1885.

Praniza sp. Brian, 1909.

Torpedo marmorata Risso, 1810.

Meinertia oxyrrynchaena. Capapé & Pantoustier, 1976.

Meinertia collaris. Capapé & Pantoustier, 1976.

Dasyatis pastinaca (Linnaeus, 1758).

Gnathia aureola. Barnard, 1925.

- Dasyatis americana* Hildebrand & Schroeder, 1928.
Excorallana tricornis. Menzies & Glynn, 1968.
Rocinela signata. Menzies & Glynn, 1968.
- Aetobatus narinari* (Euphrasen, 1790).
Gnathia aureola. Barnard, 1925; Monod, 1926; Nobili, 1907; Stebbing, 1902.
Praniza virido-nitens. Monod, 1926.
Excorallana tricornis. Menzies & Glynn, 1968.
- Myliobatis* sp.
Nerocila californica. Gurjanova, 1936; Schiödte & Meinert, 1881.
- Mobula diabolus* (Shaw, 1804).
Barybrotus indus. Pillai, 1954, 1967.
- Ray (species unknown).
Gnathia aureola. Monod, 1926.
- Squatina squatina* (Linnaeus, 1758).
Aega rosacea. Trilles & Raibaut, 1971; Greci, 1975; Capapé & Pantoustier, 1976.
Anilocra physodes. Nierstrasz, 1918.
- Squatina dumeril* (Lesueur, 1810).
Praniza sp. Hesse, 1864.
Aega rosacea. Norman, 1907.
- Squatina oculata* Bonaparte, 1840.
Aega rosacea. Capapé & Pantoustier, 1976.
- Heterodontus philippi* (Schneider, 1801).
Cirolana woodjonesi. Hale, 1924.
Cirolana corpulenta. Hale, 1925.
- Ginglymostoma cirratum* (Bonnaterre, 1788).
Rocinela signata. Menzies & Glynn, 1968.
- Nebrius concolor* Rüppell, 1835.
Praniza javana. Monod, 1926.
- Odontaspis* sp.
Cirolana hirtipes. Barnard, 1936.

Cetorhinus maximus (Gunnerus, 1765).

Aega antillensis. Hale, 1925.

Poroderma africanum (Gmelin, 1789).

Aega webbi. Vanhöffen, 1914.

Scyliorhinus stellaris (Linnaeus, 1758).

Meinertia oxyrrynchaena. Capapé & Pantoustier, 1976.

Conilera cylindracea. Bianco, 1888; Hansen, 1890.

Scyliorhinus canicula (Linnaeus, 1758).

Aega rosacea. Monod, 1923; Trilles & Raibaut, 1971; Greci, 1975; Capapé & Pantoustier, 1976.

Pseudotriakis microdon Brito Capello, 1868.

Cirolana concharum. Richardson, 1905.

Mustelus sp.

Lironeca raynaudi. Hurley, 1961.

Mustelus canis (Mitchill, 1815).

Nerocila munda. Trilles, 1975.

Nerocila fluviatilis. Cordero, 1937; Moreira, 1973; Ringuelet, 1947; Trilles, 1975.

Triakis sp.

Nerocila californica. Gurjanova, 1936.

Triakis semifasciata Girard, 1854.

Nerocila californica. Richardson, 1905; Schiödte & Meinert, 1881.

Shark (probably *Squalus acanthias*).

Conilera cylindracea. Richardson, 1905.

Sharks (species unknown).

Praniza aldabrensis. Monod, 1926; Schoenichen, 1908.

Praniza sp. Hesse, 1864.

Cirolana woodjonesi. Hale, 1925.

Aega antillensis. Hale, 1940.

Aega psora. Boone, 1920; Sars, 1896.

Nerocila armata. Brian & Darteville, 1949.

Nerocila acuminata. Schultz, 1969.

Lironeca raynaudi. Gurjanova, 1936.

Chimaera sp.

Rocinela belliceps. Boone, 1920.

Nerocila orbigny. Hale, 1926.

Chimaera monstrosa Linnaeus, 1758.

Praniza sp. Brian, 1909; Monod, 1926.

Hydrolagus sp.

Rocinela belliceps. George & Stromberg, 1968.

Hydrolagus colliei (Lay & Bennett, 1839).

Rocinela belliceps. Hatch, 1947; Richardson, 1905.

Callorhynchus milii Bory de St. Vincent, 1823.

Nerocila orbigny. Hale, 1940.

ANNOTATED BIBLIOGRAPHY

ALPERIN, I. M. 1966. A new parasite of striped bass. N. Y. Fish Game J., 13(1):121-123.

Livoneca ovalis (as *Livoneca ovalis*). Reported (p. 122) on the sawfish *Pristis* sp., according to published data. Both host and parasite are mentioned in passing only.

BARNARD, K. H. 1925. Contributions to the crustacean fauna of South Africa. No 9. Further additions to the list of Isopoda. Ann. S. Afr. Mus., 20(5):381-412.

Gnathia aureola. Reported on the gills of both the spotted eagle ray *Aetobatus narinari* (as *Aetobatis narinari*) and the sawfish *Dasyatis pastinaca* (as *Dasybatus pastinaca*). It is pointed out (p. 385) the need of studies for a better knowledge of the relationship between this parasite and the species *Anceus rhinobatis* Kossmann, 1880, *Anceus torpedinis* Walter, 1885, and *Gnathia aldabrensis* Schoen, 1908. Monod (1926) considered *Gnathia aureola* as *Praniza aureola* because Stebbing (1902) named the species on a praniza larva. See Monod (1926).

1936. Isopods collected by the R.I.M.S. "Investigator". Rec. Indian Mus., 38(2):147-191.

Cirolana hirtipes. Three specimens reported (p. 151) from the mouth of the shark *Odontaspis* (as *Carcharias*). Synonymy and comments on the ectoparasite: p. 150-151. No additional information is given on the host.

Alitropus typus (as *Rocinela mundana*). Reported from the gills of a fresh water skate, quoting Lanchester (1903). It is discussed the validity (p. 159-160) of *Rocinela mundana* Lanchester, and *Rocinela simplex* Chilton, which are considered as synonyms of *Alitropus typus* Edwards, 1840. See Lanchester (1903) and Pillai (1967).

BENEDEN, P. J. van 1861. Recherches sur les crustacés du littoral de Belgique. Mém. Acad. r. Sci. Lett. Belg., 33(3):1-174, pls. 1-21.

Aega psora. Reported "in large number in the stomach" of *Somniosus microcephalus* (as *Scimnus glacialis*). See Holthuis (1950) for further informations. Paper not seen.

BIANCO, S. L. 1888. Notizie biologische riguardanti specialmente il periodo di maturità sessuale degli animali del golfo di Napoli. Mitt. zool. Stn Neapel, 8:385-440.

Conilera cylindracea. Reported (p. 408) as reducing a cat shark *Scyliorhinus stellaris* (as *Scyllium stellare*) of 50.0 cm length to skin and bones as "più abile preparatore non avrebbe potuto fare". See Hansen (1890). Paper not seen.

- BOONE, P. L. 1920. Crustacea. Part D: Isopoda. Rep. Can. arct. Exped.,:3D-40D.
- Aega psora*. Reported on shark (p. 11D), on skate (p. 12D), on the shark *Somniosus microcephalus* (p. 12D), and on the skate *Raja batis* (p. 12D). Synonymy and distribution of the parasite: p. 10D-12D. The hosts are mentioned in passing only.
- Aega crenulata*. Reported (p. 13D) on the Greenland shark *Somniosus microcephalus* (also as *Scymnus microcephalus*). Synonymy and distribution of the parasite: p. 12D-13D. The host is mentioned only incidentally.
- Aega arctica*. Reference is made (p. 13D) to its occurrence on the shark *Somniosus microcephalus* (as *Scymnus microcephalus*), quoting Lütken (1958). Synonymy and distribution of the parasite: p. 13D-14D. The host is mentioned in passing only.
- Rocinela belliceps*. Reported (p. 14D, 15D) on the chimeroid *Chimaera* sp. Synonymy and distribution of the parasite: p. 14D-15D. The host is mentioned in passing only.
- BRIAN, A. 1909. Nota di forme larvali di Anceidi (*Gnathia maxillaris* Sars) raccolte sui pesci. Riv. mens. Pesca Idrobiol., 11(4-6):101-113; 11(7-8):136-147, pl. 1.
- Praniza* sp. (as *Gnathia maxillaris*) and *Praniza torpedinis* (as *Gnathia torpedinis*). Reported, respectively, on the chimeroid *Chimaera monstrosa*, and from the electric ray *Torpedo* sp. Monod (1926, p. 596, 603), considered both species as *Praniza* sp., because the larva could not be referred with certainty to the adult, and because Brian lumped together many species of *Gnathia* and *Praniza* under the single species name *Gnathia maxillaris*. Brian, in letter (1922) to Monod, recognized this fact. See Monod (1926, p. 596) for additional comments.
- & DARTEVELLE, E. 1949. Contribution a l'étude des isopodes marins et fluviatiles du Congo. Annls Mus. r. Congo belge, C, Zool., ser. 3, 1:(2):77-204.
- Nerocila armata*. Collected on sharks (p. 140). Synonymy, description and distribution of the parasite: p. 136-140, figs 111-121. The species of host is unknown, and it is mentioned only incidentally.
- BRIGGS, P. T. 1970. Records of ectoparasitic isopods from Great South Bay, New York. N. Y. Fish Game J., 17(1):55-57.
- Lironeca ovalis*. Reference is made (p. 55) on the occurrence of this ectoparasite on the sawfish *Pristis* sp., according to literature. The host is mentioned in passing only.
- CAPAPÉ, C. & PANTOUSTIER, G. 1976. Liste commentée des isopodes parasites de sélaciens des côtes Tunisiennes. I. Côtes septentrionales: de Tabarka à Bizerte. Archs Inst. Pasteur Tunis, 53(3):197-209.

- Aega rosacea*. Found (p. 200-201) on *Scyliorhinus canicula*, *Raja asterias*, *R. clavata* and *Squatina oculata*. References are made on the occurrence of this parasite on *Scyliorhinus canicula* (as *Scyllium canicula*), *Raja clavata* and *Squatina squatina*, quoting, respectively, Monod (1923), Trilles (1968) and Trilles & Raibaut (1971). See references.
- Meinertia oxyrrhynchaena* (as *Meinertia oxyrrynchaena*). Found (p. 201-202) on *Raja asterias*, *R. clavata*, *Scyliorhinus stellaris* and *Torpedo marmorata*.
- Meinertia steindachneri*. Found (p. 202) on *Raja asterias*, *R. polystigma* and *R. alba*.
- Meinertia parallela*. Reported (p. 202) on *Raja asterias* and *R. clavata*.
- Meinertia collaris*. Found (p. 203) on *Torpedo marmorata*. Reference is made on the occurrence of this ectoparasite on *Raja miraletus* quoting Trilles & Raibaut (1973).
- Anilocra physodes*. Reported (p. 203) on *Raja clavata*.
- Conilera* sp. Found (p. 203) on *Raja asterias*. The incidence of infestation by the above mentioned parasitic isopods is discussed: p. 203-207.
- CHEVREUX, E. 1883. Crustacés amphipodes et isopodes des environs du Croisic. C. r. Ass. fr. Avanc. Sci., 12^e session, Rouen: 517-520.
- Nerocila maculata* (as *Nerocila affinis*). Reported "as parasite des poissons du genre *Raja*". See Trilles, 1975. Paper not seen.
- CORDERO, E. H. 1937. *Nerocila fluviatilis* y otros isópodos parásitos de las familias Cymothoidae y Bopyridae del Uruguay y del Brasil. An. Mus. Hist. nat. Montevideo, ser. 2, 4(12):1-11, figs 1-12.
- Nerocila armata* (as *Nerocila fluviatilis*). Found (p. 8) on shark *Mustelus canis*. Description and synonymy on the parasite: p. 4-8, figs 1-8. The host is mentioned only incidentally.
- DAY, F. 1884. Exhibition of, and remarks upon, a specimen of a dogfish (*Acanthias vulgaris*) internally devoured by parasites. Proc. zool. Soc. Lond.,:44.
- Conilera cylindracea*. This parasite is reported (p. 44) as preying upon the spiny dogfish *Squalus acanthias* (as *Acanthias vulgaris*). Day remarks on that 20 parasites made the "spiracles, vent and an orifice behind each pectoral fin appeared as if they had been enlarged or made by these parasites, which had devoured the whole of the soft parts of the fish... As these parasites devour fish in a few hours..." See Hansen (1890), Bianco (1888) and Richardson (1905).

- GEORGE, R. Y. & STRÖMBERG, J.-O. 1968. Some new species and new records of marine isopods from San Juan Archipelago, Washington, U.S.A. *Crustaceana*, 14(3):225-254.
- Rocinela bellicepts*. Reported (p. 252) as ectoparasite on the chimeroid *Hydrolagus* sp.
- Rocinela angustata*. Reported (p. 252) on the Pacific big skate *Raja binoculata*, according to published data.
- Rocinela propodialis*. Reported (p. 252) as ectoparasite on the skate *Raja binoculata*, according to literature data.
- GOHAR, H. & MAZHAR, F. 1964. The elasmobranchs of the North-Western Red Sea. *Publ. mar. biol. Stn Ghardaqa*, 13:3-144.
- A "great number of isopods" is reported (p. 122) on the gill-filaments of the spotted eagle ray *Aetobatus narinari*. The species of parasitic isopod is not mentioned.
- GRECI, F. L. 1975. Sulla presenza di *Aega strömi* Lütken, 1859, (Crustacea, Isopoda) nei fondali batiali della Sicilia Occidentale. *Mem. Biol. mar. Oceanogr.*, 5(6):155-166.
- Aega stroemi* (as *Aega strömi*). Reported (p. 162) on *Squalus acanthias*, quoting Sars (1897). Remarks on the parasitic isopod: p. 155-166, figs 1-5.
- Aega rosacea*. Mentioned (p. 165) on *Scylliorhinus canicula* (as *Scyllium canicula*), *Raja clavata* and *Squatina squatina*, quoting Monod (1923), Trilles (1968) and Trilles & Raibaut (1971). The hosts are mentioned only incidentally.
- GURJANOVA, E. F. 1936. Crustacées. Isopodes des Mers Orientales. *Fauna SSSR (USSR)*, n. Sér. (6), 7(3):i-xii+1-278.
- Nerocila californica*. Reported (p. 84) on both the smooth dogfish *Triakis* and the eagle ray *Myliobatis*, quoting Richardson (1905). Description of the parasite: p. 83-84, fig. 40. Both hosts are mentioned only incidentally.
- Livoneca raynaudi* (as *Livoneca raynaudii*). Reported on shark. Description of the ectoparasite: p. 88-89, fig. 43. The host species is unknown, and it is mentioned in passing only.
- Livoneca californica* (as *Livoneca californica*). Reported on shark, quoting Richardson (1905). However, the present Gurjanova's reported occurrence of this ectoparasite on shark seems incorrect, since Richardson (1905, p. 260) says as it occurring on "shiner" and not on shark. Description of the parasite: p. 93, fig. 48.
- HALE, H. M. 1924. The flora and fauna of Nuyts Archipelago and the Investigator Group. No 16. The Crustacea. *Trans. R. Soc. S. Aust.*, 48: 67-73, pl. 5.

Cirolana woodjonesi. Reported on the common Port Jackson shark *Heterodontus philippi*, as well from the seven-gilled shark *Notorynchus cepedianus* (as *Notidanus indicus*). Description of the parasite: p. 71-72, pl. 5 (figs 1-15). Both hosts are mentioned in passing only.

HALE, H. M. 1925. Review of Australian isopods of the Cymothoid group. Part I. Trans. R. Soc. S. Aust., 49:128-185.

Cirolana corpulenta. Recorded (p. 136) on shark *Heterodontus philippi*. Description of the parasite: p. 134-136, fig. 3. The host is mentioned only incidentally.

Cirolana woodjonesi. Reported (p. 139) on shark. Description of the parasite: p. 137-139, fig. 5. The host species is unknown, and it is mentioned in passing only.

Aega angustata. Reported (p. 171) from sawfish. Description of the parasite: p. 170-171, fig. 20. The host species is not given, but most probably it belongs to genus *Pristis*.

Aega serripes. Reported (p. 172) from a skate. Description of the parasite: p. 171-173, fig. 21. The name of the host is not given.

Aega antillensis. Reported (p. 178) from the basking shark *Cetorhinus maximus*. Description of the parasite: p. 176-178, fig. 24. The host is mentioned only incidentally.

1926. Review of Australian isopods of the Cymothoid group. Part II. Trans. R. Soc. S. Aust., 50:201-234, pls. 36-37.

Nerocila laticauda. Reported (p. 204) on the skate *Raja australis*. Description, synonymy and distribution of the ectoparasite: p. 203-206, figs 2-3. No comments are made on the host.

Nerocila orbigny (as *Nerocila macleayi*). Reported (p. 207) on the chimeroid *Chimaera*. Description, synonymy and distribution of the parasite: p. 206-208, figs 4-5. No comments are made on the host, which is mentioned only incidentally.

1940. Report on the Cymothoid Isopoda obtained by the F.I.S. "Endeavour" on the coasts of Queensland, New South Wales, Victoria, Tasmania, and South Australia. Trans. R. Soc. S. Aust., 64(2):288-304, pl. 18.

Aega antillensis (as *Aega deshaysiana*). Reported (p. 295) "from the cloaca of tiger shark". Synonymy and localities of collection: p. 295. The scientific name of the host species is not given.

A. antillensis is placed in synonymy of *A. deshaysiana*, without any comment. This species was also not figured. However, the *A. antillensis* illustrated by the author in previous paper (1925) seems to agree mostly with the original figure of the species (Schiödte & Meinert, 1879), rather than to *A. deshaysiana* (Edwards, 1840).

Aega serripes. Reported as gill-parasite of skate. Comments on, and localities of collection of, parasite: p. 295. The host species is unknown.

Aega angustata. Reported on shark. Comments on, and localities of collection of, parasite: p. 295. The host species is unknown.

Nerocila orbigny. Reported on the elephant shark, *Callorhynchus milii*. Synonymy and localities of collection of the parasite: p. 301. No comments are made on the host.

HANSEN, H. J. 1890. Cirolanidae et familiae nonnullae propinquae Musei Hauniensis. K. danske Vidensk. Selsk. Skr., 6 Raekke, naturv. og mathem. Afd., 5(3):239-426, pls. 1-10.

Cirolana borealis. Reported (p. 325) on the skate *Raja batis* (*Rajae Batis*) according to Meinert (1877). See this reference. Hansen (p. 325) incorrectly applies Thompson's remarks (1847, p. 246) on *Cirolana hirtipes* for this species. See Thompson (1847). Synonymy and description of the ectoparasite: p. 321-325, pl. 1 (figs 50-55).

Conilera cylindracea. Recorded (p. 360-361) on both the shark *Squalus acanthias* (as *Acanthias vulgaris*) and the cat shark *Scyliorhinus stellaris* (as *Scyllium stellare*), quoting, respectively, Day (1884) and Bianco (1888). See both references. Synonymy and description of the parasite: p. 358-361, pl. 4 (figs 5-5c), pl. 5 (figs 1-1d).

1910. Revideret Fortgnelse over Danmarks marine Arter af Isopoda, Tanaidacea, Cumacea, Mysidacea og Euphausiacea. Vidensk. Meddr. dansk naturh. Foren. for Aaret 1909:197-289, pls. 3-5.

Cirolana borealis. Found on the skate *Raja batis*. Comments on the parasite: p. 203-204. The host is mentioned only incidentally.

1916. Crustacea Malacostraca. III. Dan. Ingolf-Exped., 3(5):1-262, pls. 1-16.

Aega psora. Recorded on both the shark *Somniosus microcephalus* and the skate *Raja batis*, according, respectively, to Schiödte & Meinert (1879) and Richardson (1905). See both references. Synonymy and distribution of the parasite: p. 168-169. It should be noted that the scientific name of the skate was given by Hansen, since Richardson (1905, p. 169) only says: "...parasite of skate, cod..."

Aega stroemi (as *Aega stroemii*). Reported on both the shark *Squalus acanthias* (as *Acanthias vulgaris*), according to literature, and on shark *Centrophorus squamosus*. Synonymy and distribution of the parasite: p. 169-170. Both species of hosts are mentioned only incidentally.

Aega crenulata. Reported as occurring on shark *Somniosus microcephalus*, according to literature. Synonymy and distribution of the parasite: p. 170. The host is mentioned in passing only.

Aega monophthalma. Found on shark *Somniosus microcephalus*, according to published data, as well on shark *Centrophorus squamosus*. Synonymy and distribution of the parasite: p. 171.

- Aega arctica*. Reported on shark *Somniosus microcephalus*. Synonymy and distribution of the parasite: p. 171-172, pl. 14 (fig. 6a). According to Hansen (p. 171) "it has been taken several times on the host".
- HATCH, M. H. 1947. The Chelifera and Isopoda of Washington and adjacent regions. Univ. Was. Publ. Biol., 10(5):155-274, pls. 1-18.
- Rocinela belliceps*. Reported on the chimeroid *Hydrolagus colliei*, according to Richardson (1905), and on skate. Key characterization, habitat and distribution of the ectoparasite: p. 209-210, pl. 6 (figs 66-69). Both hosts are mentioned in passing only. The skate species is unknown.
- Rocinela propodialis*. Reported on the skate *Raja binoculata*. Key characterization, habitat and distribution of the ectoparasite: p. 210, pl. 6 (figs 70-73). The host is mentioned only incidentally.
- Rocinela angustata*. Reported on the skate *Raja binoculata*. Key characterization, habitat and distribution of the parasite: p. 210-211, pl. 6 (figs 74-77). The host is mentioned in passing only.
- HESSE, E. 1864. Mémoire sur les pranizes et les ancées et sur les moyens curieux à l'aide desquels certains crustacées parasites assurent la conservation de leur espèce. Mém. cour. Mém. Sav. étr. Acad. r. Sci. Belg., 18:231-302, pls 1-4.
- Praniza* sp. Reported (p. 257) on shark, and on the angel shark (p. 258) *Squatina dumeril* (as *Squatina angelus* and *Squatina squatina*). See Monod (1926) for this reference. Paper not seen.
- HOLTHUIS, L. B. 1950. Isopodes et tanaidacés marins de la Belgique. Remarques sur quelques espèces de la zone méridionale de la mer du Nord. Bull. Inst. r. Sci. nat. Belg., 26(53):1-19.
- Aega psora*. Reported (p. 5) in "large number in the stomach" of *Somniosus microcephalus* (as *Scimnus glacialis*), according to Beneden (1861). It is not too clear if Beneden regarded *Aega psora* as prey or parasite, since in his 1871 paper on parasites and commensals of fishes from the Belgian coast, the species was not mentioned.
1956. Isopoda en Tanaidacea (KV). Fauna Ned., 16: 1-280.
- Aega psora*. Reported (p. 46) on *Somniosus* and *Raja*.
- HURLEY, D. E. 1961. A checklist and key to the Crustacea Isopoda of New Zealand and the Subantarctic Islands. Trans. R. Soc. N. Z. Zool., 1(20):259-292.
- Lironeca raynaudi* (as *Livoneca raynaudii*). Reported from the stomachs of the smooth-hound *Mustelus*, according to previous informations. Main reference, occurrence and key for recognition of the species: p. 268, 284. No comments are made on the host.

KOSSMANN, R. 1880. Malacostraca. Ordo Isopoda. Subordo I: Anisopoda. Zool. Ergebn. Reise Küsteng. Rothen Meeres, 2(1):1-140, pls. 4-15.

Praniza rhinobatis (as *Anceus Rhinobatis*). Reported from the guitarfish *Rhinobatos halavi* (as *Rhinobates halavi*). Description of the parasite: p. 105-107, pl. 7 (figs 1-6). Because this species was described from a larva, and because it could not with certainty be related to the correspondent adult specimen, Monod (1926, p. 601) considered it as *Praniza* sp. See Monod (*op. cit.*) for synonymy and description of this parasite.

LANCHESTER, W. F. 1902. On the Crustacea collected during the "Skeat" Expedition to the Malay Peninsula. Proc. zool. Soc. Lond., 1:363-381, pls. 34-35.

Alitropus typus (as *Rocinela mundana*). Reported from the gills of a freshwater skate. Description of the parasite: p. 378-379, pl. 35 (figs 9-9a). The species of host is unknown. Pillai (1967, p. 282) says on this ectoparasite that it "is a very common species found in fresh water and also in slightly brackish water".

LÜTKEN, C. F. 1858. Nogle Bemaerkninger om de Nordiske Aega-arter samt om Aega-slaegtens rette Begraendning. Vidensk. Meddr. dansk naturh. Foren., (5-7):65-78, pl. 1A.

Aega psora. Reported (p. 68) on the shark *Somniosus microcephalus* (as *Scymnus microcephalus*). Synonymy and description of the parasite: p. 65-68.

Aega arctica. Found (p. 72) on shark *Somniosus microcephalus* (as *Scymnus microcephalus*). Description of the ectoparasite: p. 71-72, pl. 1A (figs 1-3). No comments are made on the host.

MEINERT, F. 1877. Crustacea Isopoda, Amphipoda et Decapoda Daniae: Fortegnelse over Danmarks isopode, amphipode og decapode Krebsdyr. Naturh. Tidsskr., ser. 3, 11:56-248.

Cirolana borealis. Recorded (p. 90) from the skate *Raja batis* (as *Rajae Batis*). Meinert (according to Hansen, 1890) found "many alive specimens in the body cavity and on the claspers of a large *Rajae Batis*, as well a single specimen in its stomach which it has perforated..." Paper not seen.

MENZIES, R. J. 1962. The zoogeography, ecology, and systematics of the Chilean marine isopods. Lunds Univ. Arsskr., N. F., Avd. 2, 57(11): 1-162.

Aega magnifica. Reported (p. 24) on skates. Description and synonymy of the ectoparasite: p. 117-118, fig. 38D-I. The species of host is not mentioned.

Aega semicarinata. Found on skates (p. 24). Description and synonymy of the ectoparasite: p. 118, fig. 38A-C. The species of host is unknown.

MENZIES, R. J. & FRANKENBERG, D. 1966. Handbook on the common marine isopod Crustacea of Georgia. Athens, Univ. Georgia Press, i-viii+93p, 27 figs, 4 pls.

Nerocila acuminata. Reported (p. 9) on sawfish. Both parasite and host are simply listed. The species of sawfish is unknown, but probably it belongs to the genus *Pristis*.

————— & GLYNN, P. W. 1968. The common marine isopod Crustacea of Puerto Rico. Stud. Fauna Curaçao, 27(104):1-133.

Excorallana tricornis. Found on the gills of both the spotted eagle ray *Aetobatus narinari*, and the sting ray *Dasyatis americana*. Description and distribution of the parasite: p. 42, fig. 7A-B. The hosts are mentioned in passing only. It seems worthy of mention the large number of parasites found on the hosts: on *A. narinari*, 97 specimens, and on *D. americana*, 18 specimens.

Rocinela signata. Reported (p. 45) on the gill slits of the sting ray *Dasyatis americana*, and on the gills of the nurse shark *Ginglymostoma cirratum*. Description of the ectoparasite: p. 45, fig. 20E-G. The hosts are mentioned only incidentally.

MINER, R. W. 1950. Field book of seashore life. New York, Putnam's Sons, i-xv+888p., pls. 1-251.

Aega psora. Parasitic (p. 442) on skates "attaching itself to their skin". Short description of the parasite: p. 440-441, pl. 143. The host species is not mentioned.

Lironeca ovalis (as *Livoneca ovalis*). Parasitic on sawfish. Short description of the ectoparasite: p. 442, pl. 143. Comments on the parasite: "as a rule, it attaches itself to the gills and roof of the mouth". The species of host is not mentioned, but probably it belongs to the genus *Pristis*.

MONOD, T. 1923. Notes carcinologiques (parasites and commensaux). Bull. Inst. océanogr. Monaco, (427):1-23.

Aega rosacea. Recorded (p. 15) on *Scyliorhinus canicula* (as *Scyllium canicula*) at the "dernière ouverture branchiale droite". Both the host and the parasite are mentioned only incidentally.

Aega stroemi (as *Aega stroemi*). Reported (p. 15) on shark ("squalé monge") *Hexanchus griseus*. The geographical distribution of the parasite is considerably extended to the Mediterranean Sea. The host is mentioned in passing only.

————— 1926. Les Gnathiidae. Essai monographique (morphologie, biologie, systématique). Mém. Soc. Sci. nat. phys. Maroc, (13):1-668.

- Gnathia aureola* (as *Praniza aureola*). Reported (p. 573, 574) on the gill and gill slits of the eagle ray *Aetobatus narinari*, as well as on other unknown species of rays. No additional comments are made on the hosts. The occurrence of the parasite on unknown species of rays (from Natal, South Africa), was communicated to Monod (p. 574) by K. H. Barnard. Synonymy and description of the parasite, as:
Praniza aureola: p. 255, 572-574, 576, 577, 578, 616, 617, 619, figs 259, 260, 262 (fig. A), and
Gnathia aureola: p. 35, 255, 572, 576, 610.
Monod considered (p. 572) *Gnathia aureola* described by Stebbing (1902) as *Praniza aureola* because it was named on a *Praniza* larva. *G. aureola* studied by Nobili (1907) is regarded by Monod (p. 572, 576), pro parte, as *Praniza aureola* Stebbing, and *Praniza viridonitens* Monod. See Stebbing (1902) and Nobili (1907).
- Praniza virido-nitens*. Reported (p. 576) on the eagle ray *Aetobatus narinari*. Synonymy and description of the parasite: p. 255, 576-578, 603, 616, figs 262B, 263. This parasite was named by Monod (p. 572, 576) on part of the material considered by Nobili (1907) as *Gnathia aureola*. See Nobili (1907). In relation to the occurrence of the parasite on *A. narinari*, Monod (p. 576) does not clearly mention the name of the host, but as he examined specimens from "Mangareva (cf. p. 573)", no doubt is left regarding the name of the host species.
- Praniza torpedinis* (as *Praniza* sp.). Reported (p. 604) on the electric ray *Torpedo*. No comments are made on the host, whose species is not mentioned. Description, synonymy and references on the parasite, as:
Anceus (Praniza) torpedinis: p. 34, 255, 603, 612;
Gnathia torpedinis: p. 603, and
Praniza torpedinis: p. 616.
The above synonymous are considered by Monod (p. 603) as *Praniza* sp., because the parasite was named on a larva that could not be referred with certainty to the correspondent adult specimen. This parasite, originally described by Walter (1885) under the name *Anceus (Praniza) torpedinis*, was later considered by Brian (1909) and Stephensen (1915) as *Gnathia torpedinis*.
- Praniza aldabrensis* (as *Praniza* sp.). Reported (p. 603) on the buccal cavity of sharks. No comments are made on the hosts, whose species are unknown. Synonymy, description and references on the parasite, as:
Gnathia aldabrensis: p. 36, 255, 602-603, 609, and
Praniza aldabrensis: p. 603, 616.
Monod (p. 602) regarded *Gnathia aldabrensis*, described by Schoenichen in 1908, as *Praniza* sp. by the reasons exposed in the *Praniza torpedinis* considerations.
- Praniza javana* (as *Praniza* sp.). Reported (p. 255, 605) on the shark *Nebrius concolor* (as *Ginglymostoma concolor*, and *Ginglymostoma Rippellii*). No comments are made on the host. References on the parasite: p. 255, 605, 612. This parasite, described by Koehler in 1884-1885 as *Praniza javana*, is considered by Monod (p. 605) as *Praniza* sp. by the same reasons already pointed out.

Praniza rhinobatis (as: *Praniza* sp.). Reported (p. 602) on the rostrils and gill slits of the guitarfish *Rhinobatos halavi*. Synonymy and description of the parasite, as:

Anceus Rhinobatis: p. 34, 225, 601-602, 612, 666;

Praniza (Anceus) Rhinobatis: p. 601, 666;

Praniza rhinobatis: p. 616, 620, and

Gnathia rhinobatis: p. 601, 666.

Monod (p. 601) synonymized all these names as *Praniza* sp. See Monod previous *Praniza* spp. considerations. The parasite was originally described as *Anceus Rhinobatis* by Kossmann (1880), and later on named *Praniza (Anceus) Rhinobatis* by Gerstaecker (1882-1883), and *Gnathia rhinobatis* by Brian (1909) and Stephensen (1915).

Praniza sp. Reported (p. 255, 596) on the chimeroid *Chimaera monstrosa*. No comments are made on the host species. Brian (1909) considered this parasite as *Gnathia maxillaris*, but later on, in letter (1922) to Monod (p. 596), he recognized that incorrectly lumped together many species of *Praniza* and *Anceus* under the single name *Gnathia maxillaris*. See Brian (1909).

MOREIRA, P. S. 1972. Species of marine Isopoda (Crustacea, Peracarida) from southern Brazil. Bolm Inst. oceanogr., S Paulo, 21:163-179.

Rocinela signata. Reference is made (p. 176) to the occurrence of this ectoparasite on species of Plagiostomata, according to literature data. Synonymy and description of the species: p. 174-176, fig. 5. The host is mentioned in passing only.

1973. Espécies de Isopoda (Crustacea, Peracarida). In: Relatório sobre a segunda pesquisa oceanográfica e pesqueira do Atlântico Sul entre Torres e Maldonado (Lat. 29°S - 35°S). Publicação esp. Inst. oceanogr., S Paulo, (3). Part I:213-229.

Nerocila fluviatilis (as *Nerocila armata*). Reported (p. 219) on shark cação-de-bico-doce, *Mustelus canis*, quoting Cordero (1937). See this reference. The occurrence of both host and parasite are mentioned in passing only.

1977. Occurrence and ecological notes on *Rocinela signata* (Isopoda, Flabellifera) off Brazil. Bolm Inst. oceanogr., S Paulo, 26:293-301.

Rocinela signata. Reference is made (p. 296) to its occurrence on Chondrichthyes fishes, according to literature data. This isopod is considered by the author as a facultative and not an obligate fish parasite.

NIERSTRASZ, H. F. 1918. Alte und neue Isopoden. Zool. Mededel. Leiden, 4(2):103-142, pls. 9-10.

Anilocra physodes. Found on the angel shark *Squatina squatina* (as *Squatina angelus*). Short description of the parasite: p. 115. No further information is given on the hosts.

- NIERSTRASZ, H. F. & STEKHOVEN Jr., J. H. 1930. Crustacea. 10. Isopoda Genuina. Tierwelt N-u. Ostsee, 10(e₂):57-133.
- Cirolana borealis*. Reported on the skate *Raja batis*, and on shark *Squalus* (as *Acanthias*). Description and distribution of the parasite: p. X.e 73-74, fig. 9. No comments are made on the host.
- Aega psora*. Reported on the Greenland shark *Somniosus microcephalus*, and on the skate *Raja*. Description and distribution of the parasite: p. X.e 74-75. The species of *Raja* is not given.
- Aega crenulata*. Recorded on the Greenland shark *Somniosus microcephalus*. Description and distribution of the parasite: p. X.e 76, fig. 12. No comments are made on the host.
- Aega stroemi* (as *Aega stroemi*). Reported on sharks *Centrophorus squamosus*, *Squalus acanthias* (as *Acanthias vulgaris*) and on *Hexanchus griseus*. Description and distribution of the parasite: p. X.e 76, fig. 13. The hosts are mentioned in passing only.
- Aega monophthalma*. Recorded on the shark *Centrophorus squamosus* and on the Greenland shark *Somniosus microcephalus*. Description of the parasite: p. X.e 77, fig. 14.
- NOBILI, G. 1907. Ricerche sui Crostacei della Polinesia. Decapodi, stomatopodi, anisopodi e isopodi. Mem. Accad. Sci. Torino, 57(2):351-430, pls. 1-3.
- Gnathia aureola*. Found (p. 419) on the gills and gill slits of the spotted eagle ray *Aetobatus narinari* (as *Aetobatis narinari*). No comments are made on the host. Description of the parasite: p. 419-420, pl. 2 (fig. 7), pl. 3 (fig. 7). Monod (1926) considered the specimens of *Gnathia aureola* named by Nobili, in part, as *Praniza aureola* (= *G. aureola* Stebbing), and in part, as *Praniza virido-nitens* Monod. See Monod (1926) for further details.
- NORMAN, A. M. 1907. Notes on the Crustacea of the Channel Islands. Ann. Mag. nat. Hist., ser. 7, 20(119):356-363.
- Aega rosacea*. Reported (p. 362) on the angel shark *Squatina dumeril* (as *Squatina angelus*). Both the host and the parasite are mentioned only incidentally.
- PEARSE, A. S. 1947. Observations on the occurrence of certain barnacles and isopods at Beaufort, N. C. J. Wash. Acad. Sci., 37(9):325-328.
- Nerocila acuminata*. Reported on the sawfish *Pristis pectinatus*, quoting Richardson (1905). However, Richardson (*op. cit.*, p. 220) mentions only sawfish, which according to Pearse should be the species *P. pectinatus*. See Richardson (1905).
- PILLAI, N. K. 1954. A preliminary note on the Tanaidacea and Isopoda of Travancore. Bull. cent. Res. Inst. Univ. Travancore, ser. C, 3(1):1-21.
- Barybrotos indus*. Recorded (p. 8) "from the gills and the spiracles" of the devil ray *Mobula diabolus* (as *Dicerobates regoodoo* = *D. eregoodoo*). Comments on the parasite: p. 8.

- PILLAI, N. K. 1967. Littoral and parasitic isopods from Kerala: Families Eurydicidae, Corallanidae and Aegidae. 2. J. Bombay nat. Hist. Soc., 64(1):267-283, pls. 1-2.
- Barybrotes indus*. Recorded (p. 268) "in large numbers from the gill slits and cloacal aperture of the devil ray, *Mobula diabolus*". Parasite description: p. 278-279, pl. 2 (fig. 2), fig. 6. *Rocinela mundana*, *R. orientalis* and *R. simplex* are considered (p. 280) synonymous of *Alitropus typus* Edwards, 1840.
- RICHARDSON, H. 1905. A monograph on the isopods of North America. Bull. U. S. natn. Mus., 54:i-xxv, 1-727, 740 figs.
- Cirolana concharum*. Reported on the false cat shark *Pseudotriakis microdon* (as *Pseudotriakis microdon*). Description of the parasite: p. 95-96, figs. 75-77. The host is mentioned only incidentally.
- Conilera cylindracea*. Reported (p. 117) on dog fish, quoting Day (1884). Description of, and comments on, the parasite: p. 116-119, figs 100-102. According to Day (*op. cit.*) the dog fish species is *Squalus acanthias* (as *Acanthias vulgaris*). See Day (1884).
- Aega crenulata*. Found on Greenland shark *Somniosus microcephalus*. Description of the parasite: p. 173-174, figs 154-155. The host is mentioned in passing only.
- Aega psora*. Reported on shark *Somniosus microcephalus*, and on skate. The species of skate is not mentioned, and no comments are made on both hosts. Description of the parasite: p. 168-170, fig. 148.
- Aega arctica*. Recorded on the shark *Somniosus microcephalus*. Description of the parasite: p. 182-183, figs 165-166. The host is mentioned only incidentally.
- Rocinela belliceps*. Reported on the chimeroid *Hydrolagus colliei*. Description of the parasite: p. 199-201, figs 187-192. The host is mentioned in passing only.
- Nerocila acuminata*. Found on sawfish. Parasite description: p. 220-221, figs 222, 223. The species of host is not mentioned, but according to Pearse (1947) it is *Pristis pectinatus*. See Pearse (1947).
- Nerocila californica*. Reported on both the smooth dog fish *Triakis semifasciata*, and the ray *Myliobatis* sp. Description of the parasite: p. 221-223, figs 224-226. The hosts are mentioned in passing only.
- Livoneca ovalis* (as *Livoneca ovalis*). Found on the sawfish *Pristis cuspidatus* (as *Pristis semisagittatus*). Description of the parasite: p. 263-265, figs 276-277. The host is mentioned only incidentally.
- RINGUELET, R. 1947. Anotaciones sobre copépodos e isópodos parásitos de peces. Notas Mus. La Plata, Zool., 12(98):93-107, pls. 1-2.

- Nerocila fluviatilis* (as *Nerocila orbigny*). Reported (p. 98) on *Mustelus canis* (as *Eugaleus canis*), quoting Cordero (1937). It should be remarked that the host species given by Cordero actually is *Mustelus canis* and not *Eugaleus canis*. According to Campagno (1973) the genus name *Eugaleus* Gill, 1864, is synonymous of *Galeorhinus* Blainville, 1816. Cordero's *Nerocila orbigny* seems to be *Nerocila fluviatilis*. See Cordero (1937) and Trilles, 1975.
- SARS, G. O. 1896. An account of the Crustacea of Norway, with short descriptions and figures of all the species. Bergen, Bergen Museum, v. 2: Isopoda, 270p., pls. 1-100.
- Aega psora*. Found on shark. Description of the parasite: p. 59, pl. 24. The host is not mentioned.
- Aega stroemi* (as *Aega stroemii*). Found on the common picked dog-fish *Squalus acanthias* (as *Acanthias*). Description and synonymy of the parasite: p. 60-61, pl. 25 (fig. 2). The host is mentioned in passing only.
- Aega crenulata*. Reported "from the skin of the great shark" *Somniosus microcephalus* (as *Scymnus microcephalus*). Description and synonymy of the parasite: p. 61-62, pl. 25 (fig. 3).
- Aega monophthalma*. Reported "from the skin of the great shark". Description of the parasite: p. 62-63, pl. 26 (fig. 1). The host species is not given, but certainly the so called "great shark" is *Somniosus microcephalus*.
- Aega arctica*. Recorded as "probably from the skin of the great shark", i.e., from *Somniosus microcephalus*. Description of the parasite: p. 63, pl. 26 (fig. 2).
- SCHIÖDTE, J. C. & MEINERT, F. 1879. Symbolae ad Monographiam Cymothoarum Crustaceorum Isopodum Familiae. Naturh. Tidsskr. Kjøbenhavn, 12(3):321-415, pls. 7-13.
- Aega crenulata*. Reported (p. 346) from the Greenland shark *Somniosus microcephalus* (as *Scymnum microcephalum*). Description and stages of development of the parasite: p. 343-347, pl. 7 (figs 6-9). The host is mentioned only incidentally.
- Aega psora*. Reported (p. 359) on the Greenland shark *Somniosus microcephalus* (as *Scymnum microcephalum* and *Scymno microcephalo*). Synonymy, description and distribution of the ectoparasite: p. 357-360, pl. 8 (figs 5-9). The host is mentioned many times, since it is recorded from a great number of finds.
- Aega monophthalma*. Recorded (p. 366) on Greenland shark *Somniosus microcephalus* (as *Scymnum microcephalum* and *Scymno microcephalo*). Synonymy, description and distribution of the parasite: p. 365-367. The host species is mentioned in passing only.
- Aega arctica*. Found (p. 375) on the Greenland shark *Somniosus microcephalus* (as *Scymnum microcephalum* and *Scymno microcephalo*). Synonymy, description and distribution of the parasite: p. 374-375. The host is mentioned only incidentally.

SCHIÖDTE, J. C. & MEINERT, F. 1881. Symbolae ad Monographiam Cymothoarum Crustaceorum Isopodum Familiae. II. Anilocridae. Naturh., Tidsskr. Kjøbenhavn, 13:1-167, pls. 1-10.

Nerocila californica. Reported on both the ray *Myliobatis* sp. and the smooth dog fish *Triakis semifasciata* (as *Triacis semifasciatae*). Description of the parasite: p. 72-76, pl. 5 (figs 12-15), pl. 6 (figs 1-2). The following comments are made on the parasite: "many specimens of ovigerous or virgin females were attached on the dorsal or caudal fins, or at the caudal peduncle, of several species of fishes as... *Triakis semifasciata*; a single time, both an ovigerous and a virgin female were found attached to the same fin".

SCHOENICHEN, W. 1908. *Gnathia aldabrensis* n. sp. ein neuer Isopoda aus dem Indischen Ozean. Reise in Ostafrika in den Jahren 1903-1905 mit Mitteln der Hermann und Elise geb. Heckmann Wentzel-Stiftung ausgeführt von Dr. A. Voeltzkow. Wiss. Ergebn. Reise Ostaf., 2(3):191-196, figs 1-7.

Praniza aldabrensis (as *Gnathia aldabrensis*). Reported on the buccal cavity of sharks. The species of host seems unknown. Monod (1926, p. 602) considered this species as *Praniza* sp. See Monod (*op. cit.*) for details. Paper not seen.

SCHULTZ, G. A. 1969. How to know the marine isopod crustaceans. Dubuque, Iowa, W. M. Brown, i-viii+359p, 572 figs.

Nerocila acuminata. Reported on dog fish, according to published data. Key identification of the parasite: p. 152, fig. 225. The species of host is not mentioned.

Aega psora. Found on skates, according to literature. Key identification of the parasite: p. 190, fig. 297. The host species is unknown.

Aega arctica. Recorded on the Greenland shark *Somniosus microcephalus*, according to literature. Key identification of the parasite: p. 193, fig. 301. No comments are made on the host.

Aega crenulata. Reported on the Greenland shark *Somniosus microcephalus*, according to published data. Key identification of the parasite: p. 195, fig. 306. The host is mentioned in passing only.

STEBBING, T. R. R. 1900. On Crustacea brought by Dr. Willey from the South Seas. In: Zoological results based on material from New Britain, New Guinea, Loyalty Islands and elsewhere collected during the years 1895, 1896 and 1897. Part 5: 605-690, pls. 64-74. Cambridge.

Gnathia aureola. Many specimens of this parasite were found on the "gills of the white ocellated 4-spined sting-ray, *Aetobatus narinari* (as *Aetiobatis narinari*), attached both to the gills and to the walls of the gill-chambers". Description of the parasite: p. 627-628, pls. 66A, 74E. Monod (1926, p. 572) considered this species as *Praniza* sp. See Monod (*op. cit.*) for details.

STEPHENSEN, K. 1929. Marine Crustacea Isopoda and Tanaidacea. Zoology Faroes, 24:1-23.

Aega psora. Reported on the Greenland shark *Somniosus microcephalus*. Distribution of the parasite: p. 4. Both the host and the parasite are mentioned in passing only.

_____ 1937. Marine Isopoda and Tanaidacea. Zoology Iceland, 3(27):1-26.

Aega psora. Found on Greenland shark, *Somniosus microcephalus*. Distribution of the parasite: p. 6.

Aega stroemi (as *Aega stroemi*). Reported on both the sharks *Squalus acanthias* and *Centrophorus squamosus*. Distribution of the parasite: p. 6-7.

Aega monophthalma. Recorded on the Greenland shark *Somniosus microcephalus*. Distribution of the parasite: p. 7. Both host and parasite are simply mentioned.

Aega arctica. Found on the Greenland shark *Somniosus microcephalus*. Distribution of the parasite: p. 7-8. Both the host and the parasite are mentioned in passing only.

_____ 1948. Storkrebs. 4. Ringkrebs. 3. Tanglus (Mariner Isopoder) og Tanaider. Danm. Fauna, 53:1-187.

Aega psora. Recorded on both the shark *Somniosus* sp., and the skate *Raja* sp. Short description of the parasite: p. 38, fig. 7(1-7). No comments are made on the host.

Aega crenulata. Found on shark *Somniosus* sp. Short description of the parasite: p. 39, fig. 13-14. The host is mentioned only incidentally.

Aega stroemi (as *Aega stroemi*). Reported on shark *Squalus* sp. (as *Acanthias* sp.). Short characterization of the parasite: p. 39-40, fig. 7(15). No comments are made on the host.

SUMMER, F. B.; OSBURN, R. C. & COLE, L. J. 1911. A catalogue of the marine fauna of Woods Hole and vicinity. Bull. U. S. Bur. Fish., sec. 3, 31(2):549-794.

Lironeca ovalis. Reported on the sawfish *Pristis* sp. Paper not seen.

THOMPSON, W. 1847. Additions to the fauna of Ireland. Ann. Mag. nat. Hist., 20:169-250.

Cirolana borealis. Several specimens "found adhering to the skate *Raja batis* taken in Belfast bay..." Comments on the parasite: p. 246. See Hansen (1890) for additional information.

TORTONESE, E. 1956. Leptocardia, Cyclostomata, Selachii. Fauna Ital., 2:1-334.

Aega sp. Reported (p. 294) on devil ray *Mobula diabolus*. The ectoparasite is mentioned only incidentally.

- TRILLES, J. P. 1968. Recherches sur les isopodes Cymothoidae des côtes françaises. Vol. I: Bionomie et parasitisme. Vol. II. Biologie générale et sexualité. Ph. D. Thesis, Montpellier, France: 1-793, pls. 1-34.
- Aega rosacea*. Reported on the skate *Raja clavata*. See Trilles & Raibaut (1971) for further information. Paper not seen.
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- 1975a. Les Cymothoidae (Isopoda, Flabellifera) des collection du Muséum national d'Histoire naturelle de Paris. II. Les Anilocridae Schiödte et Meinert, 1881. Genres *Anilocra* Leach, 1818, et *Nerocila* Leach, 1818. Bull. Mus. natn. Hist. nat., Paris, 3^e sér., (290), Zool. 200:303-346.
- Nerocila laticauda*. Recorded (p. 320) on *Raja australis*, quoting Hale (1926). See this reference.
- Nerocila fluviatilis*. Recorded (p. 332) on *Mustelus canis*, quoting Cordero (1937). See this reference.
- Nerocila munda*. Reported (p. 333) "sur la nageoire dorsale de *Mustelus canis*", quoting Summer, Osburn & Cole (1911).
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- 1975b. Les Cymothoidae (Isopoda, Flabellifera) des côtes françaises. II. Les Anilocridae Schiödte et Meinert, 1881. Genres *Anilocra* Leach, 1818, et *Nerocila* Leach, 1818. Bull. Mus. natn. Hist. nat., Paris, 3^e sér., (290), Zool. 200:347-378.
- Anilocra physodes*. Reported (p. 349) on *Squatina squatina* (as *Squatina angelus*), quoting Nierstrasz (1918). See this reference.
- Nerocila maculata*. Reported (p. 368) on *Raja* sp., quoting Chevreux (1883).
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- & RAIBAUT, A. 1971. Aegidae et Cymothoidae parasites de poissons de Mer Tunisiens: premiers resultats. Bull. Inst. Océanogr. Pêche, Salammbô, 2(1):71-86, pls. 1-3.
- Aega rosacea*. Reported (p. 73) on angel shark *Squatina squatina* "sur la peau, et au niveau du cloaque". Recorded, also, on "*Scyliorhinus canicula*) dans le dernière ouverture branchiale droite", and on the skate *Raja clavata*, according to, respectively, Monod (1923) and Trilles (1968). See these references.
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1973. Sur les Cymothoidae (Isopoda, Flabellifera) parasites de poissons marins de Tunisie (2^e note). Bull. Mus. natn. Hist. nat., Paris, 3^e sér., (114), Zool. 88:273-281.
- Meinertia collaris*. Recorded on *Raja miraletus*. Paper not seen. See Capapé & Pantousier, 1976.
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- VANHÖFFEN, E. 1914. Die Isopoden der Deutschen Südpolar-Expedition 1901-1903. Dt. Südpol. Exped., 15, Zool., 7(4):449-598.
- Aega webbi*. Reported on the shark *Poroderma africanum* (as *Scyllium africanum*). Short characterization of the parasite: p. 507.

- WALKER, A. O. 1897. Malacostraca from the West coast of Ireland. Trans. Liverpool Biol. Soc., :159-172.
- Cirolana borealis*. Recorded (p. 165) on picked dog-fish and "from the stomach of skate". It is given the distribution of the ectoparasite on the West coast of Ireland. The species of shark is not given, but certainly the picked dog-fish is *Squalus acanthias*.
- WALLACE, N. A. 1919. The Isopoda of the Bay of Fundy. Univ. Toronto Stud. biol. Ser., (18):1-42.
- Aega psora*. Recorded from both the skates *Raja radiata* (as *Raia radiata*) and *Raja laevis* (as *Raia stabuliformis*). Distribution of the parasite: p. 22. Both hosts are mentioned only incidentally.
- WALTER, A. 1885. *Anceus (Praniza) Torpedinis* n. sp. aus Ceylon. Jena. Z. Naturw., 18 N. F., 11(3):445-451, pl. 15.
- Praniza torpedinis* (as *Anceus (Praniza) Torpedinis*). Reported on the electric ray *Torpedo* sp. Monod (1926, p. 603) considered this species as *Praniza* sp. See Monod (1926) for details. Paper not seen.

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