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STRUCTURE AND GENERIC DIVERSITY OF RECENT SCLERACTINIA OF INDIA

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ABSTRACT

An updated check-list indicates that the Recent Scleractinian fauna of India, including Lakshadweep, Gulf of Kutch, Southeast coast of India and the Andaman and Nicobar Islands, has a total of 199 species divided among 71 genera. Out of these, 50 genera and 155 species are hermatypes and the rest 44 species of 21 genera is ahermatypes. Lakshadweep is known to have a total of 31 genera with 78 species. A comprehensive list of coral from Gulf of Kutch is provided for the first time in this paper which includes 24 genera and 37 species. A total of 94 species divided among 37 genera is hitherto known from the southeast coast including Palk Bay and Gulf of Mannar. The scleractinians of Andaman and Nicobar Islands include 59 genera and 135 species of which 47 genera with 100 species are hermatypes and the rest ahermatypes. The occurrence of the various species in the four major coral growing areas are indicated in the check-list. None of the genus is endemic. The Andaman and Nicobar Islands fauna is perhaps the richest both in number and diversity of elements, and includes a few genera and species which are less common in the Indo-Pacific, but recorded from the eastern Indian Ocean. The regional variations of the coral fauna of India is briefly discussed.

INTRODUCTION

EARLY records of the Recent scleractinia of the seas around India are seen in various volumes of the *Catalogue of the Madreporarian corals in the British Museum* by Brook (1893), Bernad (1897, 1905) and Matthai (1928) which are mainly based on collections of Foote (1890) and Thurston (1895) from Rameswaram Island. The deep sea corals collected by the "Investigator" from the Laccadive Sea (Lakshadweep Sea) and the Bay of Bengal were also reported by Alcock (1893, 1902). The first major attempt to document the corals of India is that of Stanley Gardiner, at the close of the last century, during his expedition to Maldives and Laccadives. Part of his collection, mainly faviidae and fungiidae, is reported in the second volume of the *Fauna and Geography of the Maldive and Laccadive Archipelagoes* (Gardiner, 1904, 1905). Matthai (1914) reconsidered some of Gardiner material from Minicoy in his classical revision of the Astraeidae. However, the taxonomically difficult genera such as *Acropora* and *Porites* that form the major reef builders remained unknown. Sewell (1922) during a survey season noticed the presence of *Pocillopora, Acropora, Montipora, Fungia, Porites* and *Turbinaria* on reefs of Nicobar Islands, though no species was determined. Since then, Matthai (1924) reported on a collection of corals mostly of fungiina and faviina kept in the Indian Museum Calcutta some of which were also from Andaman and Nicobar Islands. Subsequently, Gravely (1927) listed the corals of Krusadi Island in the Gulf of Mannar which were mostly determined by Late Professor Matthai. Gideon *et al.* (1957) reported on the occurrence of *Astrea, Sidastrea* (=*Siderastrea*, bracket is of the present author), *Meandrina* and *Porites* in the Gulf of Kutch. Among these four genera, except *Porites*, others are ambiguous to the present nomenclature. In spite of these works, the recent scleractinians of our waters especially the dominant hermatypes such as *Pocillopora Acropora, Montipora* and *Porites* along with many other common genera remained largely unknown till early seventies. The difficulties one has to face in the collection of corals and their identification could have been the major

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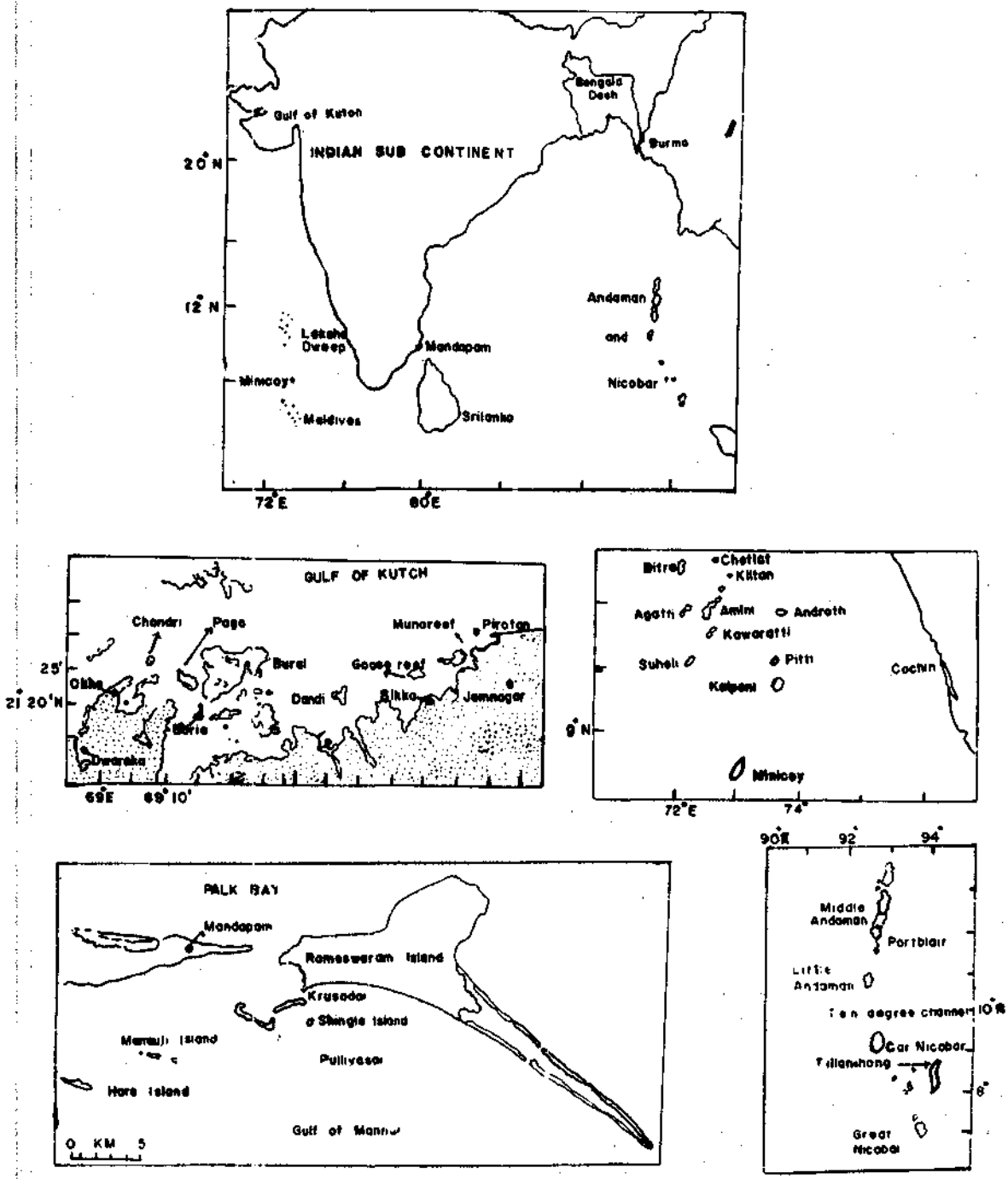

Fig. 1. The coral growing areas of India.

reason for a comparative neglect of this most dominant marine benthic community of our waters by the naturalists. The present author took up a study of the corals and coral reefs of India in 1964 under the guidance of Dr. S. Jones and in the last 20 years many problems on the taxonomy of corals and ecology and resources of our reefs were elucidated, especially of the southeast coast of India (Pillai, 1971 a, b, 1972, 1975, 1977, 1986), Lakshadweep (Pillai, 1971, 1971 a, 1983 a, 1986 a), Gulf of Kutch (Pillai *et al.*, 1979, Pillai and Patel, un pub.) and Andaman and Nicobar Islands (Scheer and Pillai, 1974; Pillai, 1983). The reef corals of the Gulf of Kutch which remained largely unknown till recently, was also studied by Patel from many localities and were listed (Patel, 1976, 1978).

These early and recent works on Indian corals have resulted in the publication of check-lists of corals for the four major coral forming areas (Fig. 1) namely Lakshadweep (Pillai, 1971, 1986a), the Gulf of Kutch (Patel, 1976, Pillai and Patel *(un pub)* southeast coast of India (Pillai, 1986) and Andaman and Nicobar Islands (Pillai, 1983). Preparation of a check-list of coral species for any area is bound to confront many difficulties. "The corals constitute a chaotic collection of individuals and the uncertainity as to what may be considered a species is the first problem that must confront any one who happens to study corals."— an opinion expressed by Wood Jones (1907) still remains valid. There is wide disagreement among taxonomists on the status of several "species" which makes precise species definition a hopeless task. A modern trend is to consider many of the species described earlier as "ecomorphs" that too without sound basis. Many of the species also recorded from our waters were also subjected to these types of useful or futile taxonomic exercises in the last decade by many authors. The present author has also examined additional material from different areas recently and some of the early determination of species warranted nomenclatural changes. While a more or less clear picture of the coral fauna of many areas of the Indo-Pacific emerged as a result of recent works elsewhere, we had no comprehensive list of the coral fauna of the Indian waters. Hence an attempt is made in this paper on this line. The present check-list is prepared after giving due consideration to recent nomenclatural changes. In addition to the faunal list, an attempt is also made to discuss in some detail, the structure and affinities of the coral fauna in the various regions considered. The check-list also indicates the local distribution of species in different regions in our waters.

The Scleractinian Fauna of India

A total of 199 species divided among 71 genera are hitherto recorded from India, including Lakshadweep, the Gulf of Kutch, Palk Bay and the Gulf of Mannar and Andaman and Nicobar Islands. Out of these 155 species belonging to 50 genera are hermatypes and 44 species divided among 21 genera are ahermatypes. The Indian Ocean as a whole is known to harbour 88 genera of hermatypes (Scheer, 1984) which means 56.8 percent of the total known hermatypic genera of the Indian Ocean, is present in our waters. A comprehensive list of species from the Indian Ocean is not yet available. Based on the present check-list, the following numercal list of genera and species is drawn up.

Area	Genera	Species
Lakshadweep		
Hermatypes	27	69
Ahermatypes	4	9
Total	31	78

Area	Genera	Species
Gulf of Kutch		
Hermatypes	20	34
Ahermatypes	4	3
Total	24	37
Southeast coast of India		
Hermatypes	28	84
Ahermatypes	9	10
Total	37	94
Andaman and Nicobar Islands		
Hermatypes	47	100
Ahermatypes	12	35
Total	59	135
The whole of India		
Hermatypes	50	155
Ahermatypes	21	44
Total	71	199

The hermatypes constitute 77.8% of the coral fauna and the ahermatypes form 22.2%. Among the hermatypes *Acropora* alone forms 20% and *Montipora* 13% the two numerically rich genera. The members of the suborder astrocoeniina constitute 34.7%, fungiina forms 25.7%, faviina forms 22.6%, caryophylliina forms 8% and dendrophylliina constitute 9% of the coral fauna of India. (hermatypes and ahermatypes included). No genus is endemic to India. The coral reefs of southeast India, Andaman and Nicobar Islands and Lakshadweep harbour an *Acropora* community, faviid community and *Porites* community (Pillai, 1971 a, 1986). The coral growths of Gulf of Kutch are mostly found scatterred and is in a juvenile stage.

Regional Variation in Indian Coral Fauna

As indicated above the coral fauna hitherto recorded from the four areas considered, manifest diversity at generic and species levels both in composition and number. These diversities may be due to the following three reasons: (1) difference in the extent of the areas covered (2) intensity of collection and (3) a real absence of genera and species. In general both in southeast India and Andaman and Nicobar Islands coral collections were made in the past from relatively wider areas than Gulf of Kutch and Lakshadweep.

Lakshadweep

Only Minicoy at the extreme south and Kiltan at the north of the archipelago are so far investigated for the coral fauna. The rest of islands and banks in Lakshadweep needs study. A total of 31 genera and 78 species is known from Lakshadweep. This is a relatively poor representation of the fauna when we compare with a total of 75 genera and 241 species known from the adjacent Maldives (Pillai and Scheer, 1976). Information so far gathered on the reefs of Minicoy and Kiltan atolls, indicates a paucity of certain common genera like *Montipora* (only a single species known), *Seriatopora, Cyphastrea* and *Echinopora* (Pillai, 1971 a). Some of the lesser common genera like *Alveopora, Pachyseris, Oulophyllia, Trachyphyllia, Pectinia, Mycedium, Oxypora, Plerogyra* and *Physogyra* which are known from Maldives might occur on the reefs of Lakshadweep. Investigations on the surface reefs and deep waters should certainly increase our knowledge of the coral fauna of Lakshadweep in future. When we take into cognizance the rich fauna of Maldives, one should normally expect about 40 to 45 genera of hermatypes in Lakshadweep. In the absence of any information on the fauna of several islands, it is premature to discuss further the faunal affinity and generic diversity of Lakshadweep.

The Gulf of Kutch

Almost a thorough search for the corals of Gulf of Kutch was made in the last few years by Patel (1976, 1978) and Pillai *et al.* (1979). As listed herein a total of 22 genera and 37 species is so far recorded and this reflects a clear picture of the coral fauna since collecting

was very intensive. The most conspicuous feature of the fauna is the total absence of any living ramose species. *Acropora* thrived here in the recent past as is evident from the dead and semifossilised branches found (some, well preserved to facilitate determination upto species level) at some sites. Though *Montipora* constitutes a dominant element of the fauna, all the species recorded are encrusting or submassive. *Pocillopora*, perhaps the most wide spread Indo-Pacific genus was not found. A single species of branching *Porites (P. compressa)* was found in Pirotan Island, but the colonies displayed stunted nodular branches. This curious absence of branching corals in the Gulf of Kutch can be possibly due to a positive response to prolonged and often total exposure due to wide tidal fluctuation. Encrusting and submassive colonies can thrive in very shallow waters often washed by waves. *Acropora* though form the richest genus on many reefs is the most sensitive coral to unfavourable environmental parameters. Their recent death at Kutch waters is probably due to excessive siltation. Fungiids and agariciids are also not known from this area. The real absence of astrocoeniinids accounts for the relatively lower number of genera and species for this area and this low number is real rather than due to improper collecting.

The Palk Bay and the Gulf of Mannar in southeast India

The scleractinians of southeast coast of India is found to include 94 species divided among 37 genera. Many of the wide spread Indo-Pacific genera such as *Seriatopora, Stylophora, Alveopora, Fungia, Herpolitha, Podabacia, Pectinia, Diploastrea Lobophyllia* and *Euphyllia* are not known from the shallow reefs of southeast India. This is one of the Indo-Pacific areas where unrestricted quarrying of corals for industrial purposes has effected irrepairable damage to reef ecosystems (Pillai, 1975). The structure and affinity of the coral fauna of this area have been already discussed in two earlier communications (Pillai, 1971 a, 1977) which need no repetition.

Andaman and Nicobar Islands

An earlier list of corals from Andaman and Nicobar Islands (Pillai, 1983) included 135 species divided among 59 genera. *Herpitoglossa simplex* listed there, is omitted in the present list being treated as a synonym of *Fungia echinata* (Scheer and Pillai, 1983). However, *Gardineroseris planulata* (= *G. ponderosa*) recorded by Scheer and Pillai (1974) from Nicobar Islands was inadvertendly left out in the 1983 list and is accounted in the present list. Thus the total number of genera and species for the area remains the same with 59 genera and 135 species. This is the area with the largest number of genera and species recorded from India The Nicobar Islands alone has 110 species divided among 45 genera (Scheer and Pillai, 1974). Genera such as *Alveopora, Coeloseris, Seriatopora, Plerogyra, Physogyra* and *Oulastrea* are recorded only from Andaman and Nicobar Islands in the Indian fauna. The two genera *Coeloseris* and *Oulastrea* have a restricted distribution at the eastern sector of the Indian Ocean extending westward to Andaman and Nicobar Islands.

Explanation to Some Species Names in the Check-list

Since the publication of the list of corals from Lakshadweep (Pillai, 1971), Andaman and Nicobar Islands (Pillai, 1983) and Southeast coast of India (Pillai, 1986)* various workers have solved many problems of synonymy in many species listed. These are indicated in the followlng list.

* Pillai (1972) listed a total of 117 species of corals from Southeast India. Pillai (1986) may be consulted for the status of some of the species.

Psammocora exesa Dana = *P. digitata*
Stylophora mordax (Dana) = *S. pistillata*
Acropora pharaonis Pillai 1971 (non Milne Edwards) from Minicoy is *A. teres* Verrill.
Acropora aspera is a new record to Lakshadweep.
Acropora haimei is deleted from the list for Lakshadweep since the species is not identified beyond doubt.
Acropora plantagenea (Lamarck) Pillai, 1986 is reverted to *A. humilis*
Acropora variabilis (Klunzinger) may be the same as *A. valida* (Dana)
Acropora sp. Pillai, 1971 = *A. nasuta* (Dana)
Cycloseris somervilli = *Fungia somervilli*
Herpitoglossa simplex = *Fungia echinata* = *Ctenactis echinata*
Gardineroseris ponderosa Scheer and Pillai, 1974 = *G. planulata*
Porites palmata is deleted from the list of Lakshadweep as this early identification of Gardiner (1904) is doubtful.
Porites somaliensis Gravier = *P. lutea*
Goniastrea hombroni = *Favia stelligera*
Platygyra lamellina = *P. daedalea* (after Scheer and Pillai, 1983) and *P. sinensis* is recognized as valid.
Galaxea hexagonalis = *G. fascicularis*
Symphyllia recta = *S. nobilis*
Turbinaria mesenterina is a new record for Kiltan Atoll.

The inclusion of *Madracis* sp. and *Platygyra sinensis* in the list totalled to 94 species from southeast India instead 92 mentioned by Pillai (1986).

CHECK-LIST OF SCLERACTINIAN CORALS FROM THE SEAS AROUND INDIA. THE CLASSIFICATION FOLLOWS WELLS (1956)

List of species	Laksha-dweep	Gulf of Kutch	Gulf of Mannar and Palk Bay	Andamans and Nicobars
1	2	3	4	5
ORDER SCLERACTINIA				
SUBORDER ASTROCOENIINA				
FAMILY: THAMNASTERIIDAE				
Genus *Psammocora* Dana				
P. contigua (Esper)	X	—	X	X
P. digitata Milne Edwards and Haime	X	X	—	—
P. haimeana Milne Edwards and Haime	X	—	—	—
P. profundacella Gardiner	X	—	—	X
FAMILY: POCILLOPORIDAE				
Genus *Stylophora* Schweigger				
S. pistillata (Esper)	X	—	—	X
Genus *Seriatopora* Lamarck				
S. crassa Quelch	—	—	—	X
S. hystrix Dana	—	—	—	X
S. stellata Quelch	—	—	—	X
Genus *Pocillopora* Lamarck				
P. brevicornis Lamarck	—	—	—	X
P. damicornis (Linn.)	X	—	X	X
P. ankeli Scheer and Pillai	—	—	—	X
P. ligulata Dana	X	—	—	—
P. meandrina var. *nobilis* Verrill	—	—	—	X

1	2	3	4	5
P. verrucosa (Ellis and Solander)	X	—	X	X
P. eydouxi Milne Edwards and Haime	X	—	X	X
Genus *Madracis* Milne Edwards and Haime				
Madracis sp.	—	—	X	X
FAMILY: ACROPORIDAE				
Genus *Acropora* Oken				
A. intermedia (Brook)	X	—	—	—
A. formosa (Dana)	X	—	X	X
A. valenciennesi Milne Edwards and Haime	—	—	X	—
A. abrotanoides (Lamarck)	X	—	—	—
A. gravida (Dana)	—	—	—	X
A. efflorescens (Dana)	X	—	—	X
A. conigera (Dana)	X	—	—	X
A. obscura (Brook)	—	—	X	—
A. teres Verrill	X	—	—	—
A. nasuta (Dana)	X	—	—	—
A. secale (Studer)	—	—	—	X
A. corymbosa (Lamarck)	X	—	X	—
A. hyacinthus (Dana)	X	—	X	X
A. indica (Brook)	X	—	X	—
A. millepora (Ehrenberg)	—	—	X	X
A. pinguis Wells	—	—	—	X
A. brevicollis (Brook)	—	—	X	—
A. palifera (Lamarck)	X	—	—	X
A. nobillis (Dana)	—	—	X	X
A. humilis (Dana)	X	X	X	X
A. diversa (Brook)	—	—	X	X
A. hebes (Dana) = *A. aspera*	X	—	—	—
A. variabilis (Klunzinger) = *A. vlida*	—	—	X	X
A. squarrosa (Ehrenberg)	X	X	—	—
A. hemprichi (Ehrenberg)	X	—	—	—
A. forskali (Ehrenberg)	X	—	—	—
A. ramblert (B. Smith)	X	—	—	X
A. granulosa Milne Edwards and Haime	X	—	—	—
A. dumosa (Brook)	—	—	—	X
A. echinata (Dana)	X	—	—	—
A. multi-acuta Nemenzo	—	—	—	X
Genus *Astreopora* de Blainville				
A. myriophthalma (Lamarck)	X	—	X	—
A. listeri Bernard	—	—	—	X
Genus *Montipora* de Blainville				
M. subtilis Bernard	—	—	X	—
M. granulosa Bernard	—	—	X	—
M. explanata Brueggeman	—	X	X	—
M. exserta Quelch	—	—	X	—
M. digitata (Dana)	—	—	X	X
M. divaricata Brueggeman	—	—	X	X
M. cocosensis Vaughan	—	—	—	X
M. turgescens Bernard	—	X	X	X
M. manaulensis Pillai	—	—	X	—

1	2	3	4	5
M. monasteriata (Forskål)	—	X	X	—
M. venosa (Ehrenberg)	—	X	X	—
M. spumosa (Lamarck)	—	—	X	—
M. tuberculosa (Lamarck)	X	—	X	—
M. jonesi Pillai	—	—	X	—
M. verrucosa (Lamarck)	—	—	X	—
M. peltiformis Bernard	—	—	—	X
M. verrilli Vaughan	—	—	X	—
M. hispida (Dana)	—	X	X	—
M. foliosa (Pallas)	—	X	X	X
M. composita Crossland	—	—	—	X
SUBORDER FUNGIINA				
SUPER FAMILY: AGARICIICAE				
FAMILY: AGARICIIDAE				
Genus *Pavona* Lamarck				
P. explanulata (Lamarck)	—	—	—	X
P. xarifae Scheer and Pillai	—	—	—	X
P. varians (Verrill)	X	—	X	X
P. decussata (Dana)	—	—	X	X
P. praetorta (Dana)	—	—	X	—
P. clavus (Dana)	—	—	—	X
P. maldivensis Gardiner	X	—	—	—
P. duerdeni Vaughan	X	—	X	X
P. divaricata (Lamarck)	—	—	X	—
Genus *Pachyseris* Milne Edwards and Haime				
P. rugosa (Lamarck)	—	—	X	X
P. speciosa (Dana)	—	—	—	X
Genus *Leptoseris* Milne Edwards and Haime				
L. papyracea (Dana)	—	—	—	X
L. fragilis Milne Edwards and Haime	—	—	—	X
Genus *Gardineroseris* Scheer and Pillai				
G. planulata (Dana)	X	—	—	X
Genus *Coeloseris* Vaughan				
C. mayeri Vaughan	—	—	—	X
FAMILY: SIDERASTREIDAE				
Genus *Siderastrea* de Blainville				
S. savignyana Milne Edwards and Haime	—	X	X	—
Genus *Pseudosiderastrea* Yabe and Sugiyama				
P. tayami Yabe and Sugiyama	—	X	X	X
Genus *Coscinaraea* Milne Edwards and Haime				
C. monile (Forskål)	—	X	X	—
SUPER FAMILY: FUNGIICAE				
FAMILY: FUNGIIDAE				
Genus *Cycloseris* Milne Edwards and Haime				
C. cyclolites (Lamarck)	—	—	X	—
C. sinensis Milne Edwards and Haime	—	—	—	X
C. distorta (Michelin)	—	—	—	X
C. hexagonalis Milne Edwards and Haime	—	—	—	X
C. costulata (Ortmann)	—	—	—	X

1	2	3	4	5
Genus *Fungia* Lamarck				
F. scutaria Lamarck	X	—	—	X
F. paumotensis Stutchberry	—	—	—	X
F. somervilli Gardiner	X	—	—	X
F. echinata (Pallas)	—	—	—	X
F. repanda Dana	—	—	—	X
F. danai Milne Edwards and Haime	X	—	—	X
F. horrida Dana	—	—	—	X
F. fungites (Linn.)	X	—	—	X
Genus *Fungiacyathus* Sars				
F. symmetrica (Pourtales)	—	—	—	X
Genus *Herpolitha* Eschscholtz				
H. limax (Esper)	—	—	—	X
Genus *Polyphyllia* Quoy and Gaimard				
P. talpina (Lamarck)	—	—	—	X
Genus *Podabacia* Milne Edwards and Haime				
P. crustacea (Pallas)	X	—	—	—
SUPER FAMILY: PORITICAE				
FAMILY: PROTIDAE				
Genus *Goniopora* de Blainville				
G. stokesi Milne Edwards and Haime	X	—	X	X
G. tenuidens (Quelch)	—	—	—	X
G. nigra Pillai	—	X	X	—
G. minor Crossland	X	X	—	—
G. planulata (Ehrenberg)	—	X	X	X
Genus *Porites* Link				
P. solida (Forskål)	X	—	X	X
P. lobata Milne Edwards and Haime	—	—	—	X
P. minicoiensis Pillai	X	—	—	—
P. lutea Milne Edwards and Haime	X	X	X	X
P. lichen Dana	X	X	X	—
P. exserta Pillai	—	—	X	—
P. andrewsi Vaughan	X	—	—	—
P. eridani Umbgrove (= *P. cylindrica*)	—	—	—	X
P. compressa Dana	—	X	X	—
P. mannarensis Pillai	—	—	X	—
Genus *Alveopora* de Blainville				
A. daedalea (Forskal)	—	—	—	X
SUBORDER FAVINA				
FAMILY: FAVIIDAE				
SUB FAMILY: FAVIINAE				
Genus *Plesiastrea* Milne Edwards and Haime				
P. versipora (Lamarck)	X	X	—	X
Genus *Favia* Oken.....				
F. stelligera (Dana)	X	X	X	X
F. pallida (Dana)	X	—	X	X
F. speciosa (Dana)	X	X	X	X
F. favus (Forskal)	X	X	X	X

1	2	3	4	5
F. rotumana (Gardiner)	—	—	—	X
F. valenciennesi Milne Edwards and Haime	—	—	X	X
Genus *Favites* Link				
F. abdita (Ellis and Solander)	X	—	X	X
F. halicora (Ehrenberg)	X	—	X	X
F. complanta (Ehrenberg)	X	X	X	X
F. flexuosa (Dana)	—	—	—	X
F. pentagona (Esper)	X	—	X	—
F. melicerum (Ehrenberg)	X	X	X	—
Genus *Goniastrea* Milne Edwards and Haime				
G. retiformis (Lamarck)	X	—	X	X
G. pectinata (Ehrenberg)	X	X	X	X
Genus *Platygyra* Ehrenberg				
P. daedalea (Ellis and Solander)	X	—	X	X
P. sinensis (Milne Edwards and Haime)	X	X	X	X
Genus *Leptoria* Milne Edwards and Haime				
L. phrygia (Ellis and Solander)	X	—	X	X
Genus *Oulophyllia* Milne Edwards and Haime				
O. crispa (Lamarck)	—	—	—	X
Genus *Hydnophora* Fischer de Waldheim				
H. microconos (Lamarck)	X	—	X	X
H. exesa (Pallas)	—	X	X	X
H. laxa (Dana)	—	—	—	X
SUB FAMILY: MONIASTREINAE				
Genus *Diploastrea* Mattai				
D. heliopoa (Lamarck)	X	—	—	X
Genus *Oulastrea* Milne Edwards and Haime				
O. crispata (Lamarck)	—	—	—	X
Genus *Leptastrea* Milne Edwards and Haime				
L. bottae (Milne Edwards and Haime)	X	—	—	—
L. purpurea (Dana)	X	X	X	X
L. tarnsversa Klunzinger	X	—	X	—
Genus *Cyphastrea* Milne Edwards and Haime				
C. microphthalma (Lamarck)	—	—	X	X
C. serailia (Forskal)	—	X	X	—
Genus *Echinopora* Lamarck				
E. lamellosa (Esper)	—	—	X	X
E. horrida Dana	—	—	—	X
FAMILY: TRACHYPHYLLIIDAE				
Genus *Trachyphyllia* Milne Edwards and Haime				
T. geoffroyi (Audouin)	—	—	—	X
FAMILY: RHIZANGIIDAE				
Genus *Culicia* Dana				
C. rubeola (Quoy and Gaimard)	—	—	X	X
Genus *Cladangia* Milne Edwards and Haime				
C. exusta Luetken	West coast of Kerala			
FAMILY: OCULINIDAE				
Genus *Galaxea* Oken				
G. fascicularis (Linn.)	X	—	X	X
G. clavus (Dana)	—	—	X	X

1	2	3	4	5
FAMILY: MERULINIDAE				
Genus *Merulina* Ehrenberg				
M. ampliata (Ellis and Solander)	X	—	—	X
Genus *Scacophyllia* Milne Edwards and Haime				
S. cylindrica Milne Edwards and Haime	—	—	—	X
FAMILY: MUSSIDAE				
Genus *Lobophyllia* de Blainville				
L. corymbosa (Forskål)	X	—	—	X
Genus *Acanthastrea* Milne Edwards and Haime				
A. simplex Crossland	—	X	—	—
A. echinata (Dana)	X	—	—	—
Genus *Symphyllia* Milne Edwards and Haime				
S. nobilis (Dana)	X	—	X	X
S. radians Milne Edwards and Haime	X	X	X	X
FAMILY: PECTINUDAE				
Genus *Mycedium* Oken				
M. elephantotus (Pallas)	—	X	X	X
Genus *Pectinia* Oken				
P. lactuca (Pallas)	—	—	—	X
SUBORDER CARYOPHYLLIINA				
FAMILY: CARYOPHYLLIIDAE				
Genus *Caryophyllia* Lamarck				
C. clavus Scacchi	X	—	—	X
C. arcuata Milne Edwards and Haime	X	—	—	X
C. Acanthocyathus grayi Milne Edwards and Haime	—	—	—	X
Genus *Deltocyathus* Milne Edwards and Haime				
D. andamanensis Alcock	—	—	—	X
Genus *Paracyathus* Milne Edwards and Haime				
P. indicus Duncan	—	—	—	X
P. profundus Duncan	—	—	X	—
P. stokesi Milne Edwards and Haime	—	X	—	—
Genus *Polycyathus* Duncan				
P. verrilli Duncan	—	X	X	X
P. andamanenis Alcock	—	—	—	X
Genus *Heterocyathus* Milne Edwards and Haime				
H. aequicostatus Milne Edwards and Haime	—	—	X	X
Genus *Stephanocyathus* Seguenza				
S. nobilis (Moseley)	X	—	—	—
Genus *Euphyllia* Dana				
E. glabrescens (Chamisso and Eysenhardt)	X	—	—	X
Genus *Plerogyra* Milne Edwards and Haime				
P. sinuosa (Dana)	—	—	—	X
Genus *Physogyra* Quelch				
P. lichtensteini Milne Edwards and Haime	—	—	—	X
FAMILY: FLABELLIDAE				
Genus *Flabellum* Lesson				
F. pavonium Alcock	X	—	—	—
Genus *Placotrochus* Milne Edwards and Haime				
P. laevis Milne Edwards and Haime	—	—	—	X

1	2	3	4	5
SUBORDER DENDROPHYLLIINA				
FAMILY: DENDROPHYLLIIDAE				
Genus *Balanophyllia* S. Wood				
B. imperialis Kent	—	—	—	X
B. scabra Alcock	—	—	—	X
B. affinis (Semper)	—	—	X	—
Genus *Endopsammia* Milne Edwards and Haime				
E. philippinensis Milne Edwards and Haime	—	—	X	—
Genus *Heterpsammia* Milne Edwards and Haime				
H. michelini Milne Edwards and Haime	—	—	X	X
Genus *Tubastrea* Lesson				
T. aurea (Quoy and Gaimard)	—	X	X	X
Genus *Dendrophyllia* de Blainville				
D. coarctata Duncan	—	—	X	—
D. arbuscula V. der Horst	—	—	—	X
D. minuscula Bourne	—	X	—	X
D. micranthus (Ehrenberg)	—	—	—	X
D. indica Pillai	—	—	X	—
Genus *Enallopsammia* Micheloti				
E. amphelioides (Alcock)	—	—	—	X
E. marenzelleri Zibrowius	—	—	—	X
Genus *Turbinaria* Oken				
T. crater (Pallas)	—	X	X	X
T. undata Bernard	—	—	X	—
T. peltata (Esper)	—	X	X	X
T. mesenterina (Lamarck)	X	—	—	—
T. veluta Bernard	—	—	—	X

X = recorded. — Not yet recorded.

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