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sponges

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Kingdom Animalia, phylum Porifera (sponges)

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Summary

The total known marine sponge species diversity for the Aotearoa New Zealand region is 1456 taxa, 1361 of which are extant (with 14 endemic genera and 403 endemic species), and 95 of which are fossil (Table 4.1). The New Zealand extant sponge fauna represents about 15% of the global diversity, but as will be seen below, this region is a hotspot for several taxa (Fig. 4.1). We know of 717 undescribed extant species, and there are many more, mainly cryptic species yet to be discovered. Our knowledge of sponge diversity in New Zealand has nearly doubled since Kelly *et al.* (2009) provided the first comprehensive review of the extant and fossil fauna. One hundred and twenty-six extant and 10 fossil species have been deleted from the New Zealand record, as they are no longer considered valid for the region (Table 4.2). Two hundred and seventy-five extant species (Table 4.3), and 22 fossil species (Table 4.4), have had their nomenclature or systematics revised and updated. Five species that were not cited in Kelly *et al.* (2009) because they were in synonymy with other taxa at the time are now considered to be valid for the New Zealand record (Table 4.5). Many of the New Zealand records listed in Dawson (1993) and subsequently in Kelly *et al.* (2009) have led to potentially inaccurate distribution records in the World Porifera Database (WPD) (<https://www.marinespecies.org/porifera/>), resulting in the retention of non-indigenous names in the species record. Of the nearly 250 species that are found in New Zealand's ports and harbours, we consider 73 to be native species, 20 to be non-indigenous species (NI in Table 4.6), 21 to be cryptogenic 1 species (C1 in Table 4.6), and 136 to be cryptogenic 2 species (C2). Checklists of extant and fossil New Zealand Porifera are provided.

Introduction

Porifera (sponges) are among the most common larger benthic epifaunal invertebrates in New Zealand coastal and deep-water environments (Jones *et al.* 2018); with ascidians and bryozoans, sponges represent a major component of biogenic habitats that support fisheries and other vertebrate populations (Morrison *et al.* 2014). New Zealand waters continue to reveal surprising sponge discoveries, many of them 'firsts' for the South Pacific region, and indeed, the globe (e.g., Kelly & Cárdenas 2016). Two New Zealand sponges, the extant *Chondrocladia (Meliiderma) turbiformis* Vacelet, Kelly & Schlacher-Hoenlinger, 2009, and the fossil *Latrunculia (Latrunculia) tutu* Kelly & Sim-Smith, 2022, were voted amongst the Top Ten World Register of Marine Species (WoRMS) New Marine Species of 2009, and 2022, respectively (Anon. 2023).

Since Kelly *et al.* (2009) provided the first comprehensive review of extant and fossil fauna, several key events have transformed our ability to progress sponge research: firstly, the establishment of the World Porifera Database (WPD) (<https://www.marinespecies.org/porifera/>) (De Voogd *et al.* 2023), the global database of all described extant sponges linked to WoRMS (<https://www.marinespecies.org/>); secondly, the publication of the two-volume *Systema Porifera* (Hooper & Van Soest 2002), a comprehensive classification of all sponge taxa above species level; and thirdly, a major rearrangement of the classification of Porifera, proposed by Morrow and Cárdenas (2015), based largely on molecular phylogenetic studies. The

WPD was established to provide a contemporary and user-friendly platform for sponge systematics, building upon the extensive research presented in the two-volume work *Systema Porifera* (Hooper & Van Soest 2002).

The subsequent classification revision of Morrow and Cárdenas (2015) has been generally accepted and is now the classification system used by the WPD (De Voogd *et al.* 2023). All recent and future amendments to sponge classification are incorporated into the WPD, and the WPD sponge classification system is used in the National Institute of Water and Atmospheric Research (NIWA) Invertebrate Collection (NIC), a Nationally Significant Collection and Database of preserved marine invertebrates from around New Zealand, Antarctica, and the wider Southwest Pacific.

This chapter updates the inventory of extant and fossil New Zealand sponges and provides updated checklists of the New Zealand marine sponge fauna.

Status of New Zealand extant Porifera

The total number of described and undescribed extant sponge species, from the New Zealand region, is 644 and 717 taxa, respectively (Table 4.1), of which, 1150 are demosponges (Class Demospongiae), the most diverse and abundant of the sponges; 137 are glass sponges (Class Hexactinellida), typically deep-sea species with a multinucleate (syncytial) cellular structure; 69 are calcareous sponges (Class Calcarea) with spicules of calcium carbonate in various arrangements; and 5

Table 4.1. Summary of marine Porifera diversity in the Aotearoa New Zealand region, expressed as total numbers and percentage change. Data for 2009 are derived from Kelly *et al.* (2009: p. 28). OTU = Operational Taxonomic Unit.

	Demospongiae		Hexactinellida		Calcarea		Homoscleromorpha		Total		% change
	2009	2023	2009	2023	2009	2023	2009	2023	2009	2023	
Total species diversity	655	1226	87	153	56	70	2	7	800	1456	82
Described extant species	412	494	21	93	39	54	0	3	472	644	36
Undescribed extant species (OTU)	187	656	55	44	15	15	0	2	257	717	179
Described & undescribed fossil species	56	76	11	16	2	1	2	2	-74	95	28
Described endemic extant genera	3	8	0	4	0	2	0	0	3	14	367
Described endemic extant species	304	327	20	56	12	20	0	0	336	403	20

are homoscleromorphid sponges (Class Homoscleromorpha), with simple spiculation and very little skeletal architecture. The New Zealand described species totals are 15%, 19%, 9%, and 4% of global totals for marine extant Demospongiae, Hexactinellida, Calcarea, and Homoscleromorpha, respectively.

Since Kelly *et al.* (2009), 174 new extant sponge species have been described. Many known species have also been re-described, based on new material and new perspectives. Several species cited in Kelly *et al.* (2009) are no longer considered to be valid for the New Zealand region, because they were either added in error (as a historical mistake) or because their global taxonomic distribution or status has been updated. These are hereby expunged from the New Zealand record (Table 4.2). Similarly, 275 species cited in Kelly *et al.* (2009) have been revised taxonomically, had spelling updates, or nomenclatural changes (Table 4.3). Five species are now considered to be valid that were previously synonymised with other species (Table 4.5). Several species cited in Kelly *et al.* (2009) have not been recorded since first being described.

The discovery rate, rate of description, and thus, the increase in our knowledge of poriferan diversity in New Zealand waters, to date, has nearly doubled since the review of Kelly *et al.* (2009), with Kelly ranked 2nd (135 species described) and Sim-Smith ranked 11th (72 described), of authors who have described the most sponge species globally, during the last decade (De Voogd *et al.* 2023).

Status of New Zealand fossil Porifera

The total number of described fossil sponge species from the New Zealand region, is 95 taxa (Table 4.1); 76 are Demospongiae, 16 are Hexactinellida, two are Homoscleromorpha, and one is Calcarea. The majority of fossils are represented by microfossil spicules and simple frameworks (Hinde & Holmes 1892; Kelly & Buckeridge 2005), and a few body fossils (Kelly *et al.* 2003; Buckeridge *et al.* 2013).

Several hexactinellid species cited in Kelly *et al.* (2009) are no longer considered to be valid for the New Zealand region, because they were added without the expertise of a hexactinellid specialist, and one *Chancelloria* species is deleted as it currently placed in the order Coeloscleritophora, which is not within Porifera (see Table 4.2). Similarly, 22 fossil species cited

in Kelly *et al.* (2009) have been revised taxonomically, had spelling updates, or had nomenclatural changes (Table 4.4).

Major gains in knowledge of New Zealand extant Porifera

Our knowledge of the glass sponges (Class Hexactinellida) grew considerably with the completion of two major monographs: one on the hexasterophoran glass sponges (Reiswig & Kelly 2011) and one on the lyssacinosidan family Euplectellidae (Reiswig & Kelly 2018), prior to the sad loss of Henry Reiswig on 4 July 2020. New species, *Saccocalyx tetractus* Reiswig & Kelly, 2018, and the new genus *Trychella* and type species *T. kermadecensis* Reiswig & Kelly, 2018, are shown in Figs. 4.1E and F, respectively. Specimens from these two major studies considerably extended the scope of the Dohrmann *et al.* (2017) study that integrated molecular and morphological data in a new, systematic framework to reconstruct the evolution of molecular phylogeny of the Hexactinellida. Our initial work on family Rossellidae in the New Zealand region has doubled our known extant rossellid diversity, from nine species in five genera, to 17 species in eight genera (Reiswig *et al.* 2021). Dohrmann *et al.* (2023) recently provided informal descriptions of 15 new species and one new genus of Hexactinellida.

Our knowledge of the tetractinellid demosponges (Order Tetractinellida, class Demospongiae) expanded considerably with the completion of five major monographs and studies: polyphyletic 'lithistid' tetractinellid demosponges (Kelly 2007); family Ancorinidae (Kelly & Sim-Smith 2012); family Geodiidae (Sim-Smith & Kelly 2015); ancorinid genus *Penares* (Sim-Smith & Kelly 2019) (Fig. 4.1C); and vulcanellid genus *Lamellomorpha* (Kelly *et al.* 2019). Perhaps the most outstanding of discoveries made over the last two decades was the collection of a single specimen from the Colville Seamount, named *Stupenda singularis* by Kelly and Cárdenas (2016) (Fig. 4.1D), that changed the way we think about the order Tetractinellida, becoming the type taxon for a new suborder (see Schuster *et al.* 2021).

The poecilosclerid (Order Poecilosclerida, class Demospongiae) family Podospongiidae was, until recently, considered to be part of family Latrunculiidae. The review of Indo-Pacific and Western Indian Ocean

Table 4.2. Extant and fossil Porifera species deleted from the New Zealand record. Species cited in Kelly *et al.* (2009) that are no longer considered to be valid for the New Zealand region, because they were added in error (as a historical mistake), because their global taxonomic distribution has been updated, or they require renaming. All these species are henceforth deleted from the New Zealand record.

Taxon name as cited in Kelly <i>et al.</i> (2009)	Comment & reference
<i>Acanthascus (Rhabdocalyptus)</i> spp. indet. Kelly & Buckeridge, 2005	Records cannot be matched to NIWA accession numbers and are no longer traceable.
<i>Acanthella</i> sp. Lawson <i>et al.</i> , 1984	Secondary metabolite study: no description, unlikely any voucher specimen remains for full identification
<i>Adocia conica</i> (Thiele, 1905)	Not in NZ EEZ: Southern Chile, Antarctica & Macquarie Island (Australian EEZ).
<i>Amphimedon</i> n. sp. 1–2 K&W in Cryer <i>et al.</i> 2000	Records cannot be matched to NIWA accession numbers and are no longer traceable.
<i>Anicornia osculifera</i> Dendy, 1924	Synonymised with <i>Ecionemria alata</i> (Dendy, 1924).
<i>Anomochone</i> spp. Kelly & Buckeridge (2005)	Kelly & Buckeridge (2005) described fossils from the Tutuiri Greensand that they thought resembled extant species such as <i>Eurypleura auriculare</i> Schulze, 1886, <i>Chonetesma lamella</i> Schulze, 1886, and <i>Psilocalyx wilsoni</i> Ijima, 1927, and added other Hexactinida species names that had not been recorded in the NZ region: <i>Heterorete</i> sp., <i>Anomochone</i> sp., <i>Psilocalyx wilsoni</i> Ijima, 1927, and <i>Sclerothamnopsis compressa</i> Wilson, 1904, order Fieldingida. Reiswig & Kelly (2011) stated that these names could not be securely added to the NZ fauna because no loose spicules were available for examination and the record had not been vetted by a hexactinellid specialist, rendering the identifications given to the fossils putative.
<i>Aphoceras ensata</i> (Bowerbank, 1858)	Record in Dawson (1993) considered inaccurate by the editors of WPD because species was originally described from Celtic Seas and currently accepted distribution is the Northeastern Atlantic.
<i>Aphroceras</i> sp. (Kenny & Hayson, 1962)	Not in NZ EEZ: Macquarie Island (Australian EEZ).
<i>Aplysinella</i> n. sp. Bergquist <i>et al.</i> , 1991	Secondary metabolite study: no description, unlikely any voucher specimen remains for full identification
<i>Asbestopluma bilamellata</i> Lévi, 1993	Not in NZ EEZ: New Caledonia.
<i>Asbestopluma</i> n. sp. 1–3 Kelly unpubl., 2003	Assigned to one of nine OTUs in checklist under <i>Asbestopluma</i> .
<i>Asbestopluma symmetrica</i> (Ridley & Dendy, 1886)	Not in NZ EEZ: Prince Edward Islands.
<i>Ascandra</i> sp. Bergquist <i>et al.</i> , 1986	Secondary metabolite study: no description, unlikely any voucher specimen remains for full identification.
<i>Astrophorina</i> gen. et spp. indet.	Not certain of the provenance of this name.
<i>Auloplax</i> cf. <i>auricularis</i> Schulze, 1904	Reiswig & Kelly (2011) stated that, "Several species records in this work have not been confirmed here: the record of <i>Auloplax auricularis</i> (Schulze, 1904) is probably now better regarded as <i>Auloplax breviscopulata</i> Reiswig & Kelly, 2011."
<i>Aulosaccus</i> sp. Reiswig MS	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Axinella</i> n. sp. 1–9 K&W in Cryer <i>et al.</i> , 2000	Accessioned in NIC; early collection, not fully reconciled with current species or specimens.
<i>Axinella</i> n. sp. NIWA Stn Z9033 Alvarez	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Biemna</i> n. sp. K&W in Cryer <i>et al.</i> , 2000	Accessioned in NIC; early collection, not fully reconciled with current species or specimens.
<i>Boroevia cerebrum</i> (Haeckel, 1872) (as <i>Leucosolenia cerebrum</i> (Haeckel, 1872) in Kelly <i>et al.</i> (2009))	New Zealand records of <i>Leucosolenia cerebrum</i> were listed in Dawson (1993) under <i>Clathrina coriacea</i> (Montagu, 1814). <i>Leucosolenia cerebrum</i> is currently accepted in WPD as <i>Boroevia cerebrum</i> , and no NZ records are cited. New Zealand records of <i>Clathrina coriacea</i> are considered to be inaccurate in WPD because the species was originally described from Celtic Seas and the currently accepted distribution is the Northeastern Atlantic and Mediterranean. <i>Leucosolenia cerebrum</i> is currently accepted in WPD as <i>Clathrina clathrus</i> (Schmidt, 1864).
<i>Bubaris antarctica</i> Koltun, 1964	Not in NZ EEZ: Antarctic species now accepted in WPD as <i>Axinella antarctica</i> (Koltun, 1964).
<i>Bubaris</i> n. sp. K&W in Cryer <i>et al.</i> , 2000	Accessioned in NIC; early collection, not fully reconciled with current species or specimens.
<i>Bubaris vermiculata</i> (Bowerbank, 1866)	New Zealand records are now considered to be inaccurate in WPD because the species was originally described from the North Sea. The currently accepted distribution is Northern Atlantic to Arctic Ocean.
<i>Callyspongia (Callyspongia) dendyi</i> Burton, 1929	Currently accepted in WPD as <i>Callyspongia (Callyspongia) dendyi</i> but listed in Kelly <i>et al.</i> (2009) as <i>Callyspongia (Cladochalina) dendyi</i> . Currently accepted distribution Antarctica (Ross Sea).
<i>Callyspongia</i> n. sp. 1–4 K&W in Cryer <i>et al.</i> , 2000	Accessioned in NIC; early collection, not fully reconciled with current species or specimens.
<i>Callyspongia</i> n. sp. Bergquist, 1961	This is most likely to be a known species, either one of the several described species or OTUs included here; the species was not synonymised with any species in Bergquist & Warne (1980).
<i>Callyspongiidae</i> gen. nov. et sp. K&W in Cryer <i>et al.</i> , 2000	Accessioned in NIC; early collection, not fully reconciled with current species or specimens.
<i>Chancelloria</i> spp. indet. Benson, 1956	This species is within class Coeloscleritophora, which is not within phylum Porifera
<i>Characella</i> n. spp. (2) Kelly	Assigned to one of six OTUs in checklist under <i>Characella</i> .
<i>Chondropsis</i> n. sp. 2 K&W in Cryer <i>et al.</i> , 2000	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Chondropsis</i> n. sp. 3 K&W in Cryer <i>et al.</i> , 2000	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Chonetesma</i> cf. <i>choanoides</i> Schulze & Kirkpatrick, 1910	Reiswig & Kelly (2011) stated that, "Several species records in this work have not been confirmed here: the record of <i>Chonetesma</i> cf. <i>choanoides</i> Schulze & Kirkpatrick, 1910 is probably now better regarded as <i>Chonetesma australis</i> Reiswig & Kelly, 2011."
<i>Chonetesma lamella</i> Schulze, 1886 in Kelly & Buckeridge (2005)	As per <i>Anomochone</i> spp. comments.
<i>Cinachyra</i> n. sp. Bergquist & Bedford, 1978	Antibacterial activity study: no description, unlikely any voucher specimen remains for full identification.
<i>Clathria (Isocella)</i> n. sp. Bergquist & Sinclair, 1973	Reproductive and seasonality study: no description, unlikely any voucher specimen remains for full identification.
<i>Clathria (Microciona) basispinosa</i> (Burton, 1934)	Not in NZ EEZ: Antarctica and Macquarie Island (Australian EEZ) distribution. Now accepted as <i>Clathria (Microciona) basispinosa</i> (Burton, 1934).
<i>Clathria (Thalysias) cactiformis</i> (Lamarck, 1814) (as <i>Clathria (Thalysias) anchoratum</i> (Carter, 1881) in Kelly <i>et al.</i> 2009)	<i>Clathria (Thalysias) anchoratum</i> was noted in Bergquist & Fromont (1988) (as <i>Raphidophorus anchoratum</i>), as being more-or-less unrecognisable due to the brevity of the original description and the probable loss of the type specimen. The species is currently accepted in WPD as <i>Clathria (Thalysias) cactiformis</i> (Lamarck, 1814), first described in Western Australia with the currently accepted distribution being circum Australia and Madagascar.
<i>Clathria (Thalysias) lendenfeldi</i> Ridley & Dendy, 1886 (as <i>Clathria (Microciona) lendenfeldi</i> (Ridley & Dendy, 1886) in Kelly <i>et al.</i> 2009)	The name as presented in Kelly <i>et al.</i> (2009) is incorrect and does not appear in Bergquist and Fromont (1988); the species is currently accepted in WPD as <i>Clathria (Thalysias) lendenfeldi</i> Ridley & Dendy, 1886; the currently accepted distribution for this species is circum Australia and Indian Ocean.
<i>Clathrina clathrus</i> (Schmidt, 1864) (as <i>Leucosolenia clathrus</i> (Schmidt, 1864) in Kelly <i>et al.</i> 2009)	New Zealand records of <i>Leucosolenia clathrus</i> were listed in Dawson (1993) under <i>Clathrina coriacea</i> (Montagu, 1814), the currently accepted name for this species. New Zealand records of <i>Clathrina clathrus</i> are considered to be inaccurate in WPD because the species was originally described from the Adriatic Sea and the currently accepted distribution is the Northeastern Atlantic and Mediterranean. <i>Leucosolenia clathrus</i> is currently accepted in WPD as <i>Clathrina clathrus</i> (Schmidt, 1864).
<i>Clathrina coriacea</i> (Montagu, 1814)	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from Celtic Seas and the currently accepted distribution is the Northeastern Atlantic and Mediterranean.
<i>Clathrina</i> sp. Bergquist <i>et al.</i> , 1986	Secondary metabolite study: no description, unlikely any voucher specimen remains for full identification
<i>Clathrina</i> sp. Green & Bergquist, 1980	Histological study: no description, unlikely any voucher specimen remains for full identification.
<i>Conorete</i> cf. <i>erectum</i> (Schulze, 1899)	Kelly & Buckeridge (2005) listed collections of extant hexactinellids from Chatham Rise in their report on fossil sponges from the Tutuiri Greensand, Chatham Island. Reiswig & Kelly (2011) stated that since the identifications were not vetted by a hexactinellid specialist, the listed species names cannot be confidently added to the NZ fauna.
<i>Craniellopsis zetlandica</i> (Carter, 1872)	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from the North Sea and the currently accepted distribution is the North Sea and Arctic region. Currently accepted in WPD as <i>Craniella zetlandica</i> (Carter, 1872).
<i>Dactylella</i> n. sp. NIWA Stn Z9033 Alvarez	Records cannot be matched to a NIWA accession number and are no longer traceable.
<i>Dactylia</i> n. sp. 1 to 3 K&W in Cryer <i>et al.</i> , 2000	Records cannot be matched to NIWA accession numbers and are no longer traceable.
<i>Dysidea elegans</i> (Nardo, 1847)	McCormack <i>et al.</i> (2020: Table 1) considered the specimens Brøndsted (1927) described as <i>Spongelia elegans</i> Nardo, 1847, to be unrecognisable, being simply "fragments of a lobose or lump-shaped sponge." <i>Spongelia elegans</i> sensu stricto is now synonymised with <i>Dysidea tupa</i> (Pallas, 1766) and is restricted in distribution to the Mediterranean Sea.

(continued overleaf)

Table 4.2. (continued)

Taxon name as cited in Kelly <i>et al.</i> (2009)	Comment & reference
<i>Dysidea fragilis</i> (Montagu, 1814)	Battershill <i>et al.</i> (2010) considered the application of the name <i>Dysidea fragilis</i> to NZ material to be doubtful, as the species was first described from the Celtic Sea and is currently restricted to the Northeastern Atlantic and Mediterranean regions, all other global records now being considered inaccurate. Unfortunately, the name <i>fragilis</i> has been applied widely to <i>Dysidea</i> specimens from various environments around NZ (see Dawson 1993), yet none of these publications provide descriptions. Redescription of the original Bergquist (1961c) specimens from Mernoo Bank, Chatham Rise, and examination of subsequent specimens, is probably impossible due to loss of voucher specimens (Mc Cormack <i>et al.</i> 2020).
<i>Dysidea</i> n. sp. 9 K&W in Cryer <i>et al.</i> , 2000	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Echinostylinos reticulatus</i> Topsent, 1927	Misapplication: Record renamed as <i>Echinostylinos patriciae</i> Carvalho, Lopes, Cosme & Hajdu, 2016 by Carvalho <i>et al.</i> (2016).
<i>Ephydatia fluviatilis</i> (Linnaeus, 1759)	Freshwater species.
<i>Ephydatia ramsayi</i> (Haswell, 1883)	Freshwater species; was incorrectly cited as (Haswell 1882) in Kelly <i>et al.</i> (2009).
<i>Eunapius fragilis</i> (Leidy, 1851)	Freshwater species.
<i>Eurete simplicissimum</i> Semper, 1868	Kelly & Buckeridge (2005) listed collections of extant hexactinellids from Chatham Rise, in their report on fossil sponges from the Tutuuri Greensand, Chatham Island. Reiswig & Kelly (2011) stated that since the identifications were not vetted by a hexactinellid specialist, the listed species names cannot be confidently added to the NZ fauna.
<i>Eurete simplicissimum</i> Semper, 1868 in Kelly & Buckeridge (2005)	As per <i>Anomochone</i> spp. comments.
<i>Euryplegma auriculare</i> Schulze, 1886 in Kelly & Buckeridge (2005)	As per <i>Anomochone</i> spp. comments.
<i>Eurypon</i> n. sp. K&W in Cryer <i>et al.</i> , 2000	Accessioned in NIC; early collection, not fully reconciled with current species or specimens.
<i>Eurypon</i> sp. A (Kaikoura) Barrow <i>et al.</i> , 1988	Marine chemistry study: no description, unlikely any voucher specimen remains for full identification.
<i>Eurypon</i> sp. B (Mercury Is) Barrow <i>et al.</i> , 1988	Marine chemistry study: no description, unlikely any voucher specimen remains for full identification.
<i>Farrea</i> sp. Reiswig MS	Assigned to one of several new species of <i>Farrea</i> in Reiswig & Kelly (2011).
<i>Fasciospongia</i> sp. Bergquist, 1978	General interest text: no description, unlikely any voucher specimen remains for full identification, possibly <i>Fasciospongia turgida</i> (Lamarck, 1814).
<i>Fieldingia</i> sp. in Kelly & Buckeridge (2005)	As per <i>Anomochone</i> spp. comments.
<i>Geodia</i> n. spp. (6) Kelly	Assigned to one of several new species in Sim-Smith & Kelly (2015).
<i>Guitarra fimbriata</i> Carter, 1874	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from the Celtic Seas. The currently accepted distribution is the United Kingdom. New Zealand species of <i>Guitarra</i> include <i>G. bipocillifera</i> Brondsted, 1924 and <i>G. novazealandiae</i> Dendy, 1924.
<i>Haliclona</i> (Gellius) n. sp. K&W in Cryer <i>et al.</i> , 2000	Accessioned in NIC; early collection, not fully reconciled with current species or specimens.
<i>Haliclona heterofibrosa</i> (Lundbeck, 1902)	Now accepted as <i>Haliclona</i> (<i>Rhizoniera</i>) <i>rosea</i> (Bowerbank, 1866). The NZ records of Bergquist (1961a) and Bergquist & Warne (1980) are considered to be inaccurate as the type locality is Celtic Seas and the currently accepted distribution is the Northeastern Atlantic.
<i>Haliclona laxa</i> (Lundbeck, 1902)	Accessioned in NIC; early collection, not fully reconciled with current species or specimens.
<i>Haliclona</i> n. sp. 1, 3 to 8 K&W in Cryer <i>et al.</i> , 2000	Not in NZ EEZ: Macquarie Island (Australian EEZ).
<i>Haliclona thielei</i> Van Soest & Hooper, 2020 (as <i>Haliclona foraminosa</i> (Thiele, 1905) in Kelly <i>et al.</i> , 2009)	Assigned to one of eight OTUs in checklist under <i>Hyalonema</i> .
<i>Heteroretete</i> sp. indet. in Kelly & Buckeridge (2005)	Assigned to one of two OTUs in checklist under <i>Hymedesmia</i> .
<i>Heterorotula kakahuensis</i> (Traxler, 1896)	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Higginsia</i> n. sp. K&W in Cryer <i>et al.</i> , 2000	Kelly <i>et al.</i> (2009) attributed this species, first described from the Weddell Sea, Antarctica, to the NZ region, based on Henry Reiswig's first, unpublished, preliminary, survey of the NZ fauna in 1998. The species was not recovered in Reiswig & Kelly (2018), but two new species of <i>Holascus</i> were described in that publication: <i>H. tasmanensis</i> Reiswig & Kelly, 2018 and <i>H. pannosus</i> Reiswig & Kelly, 2018.
<i>Holascus</i> cf. <i>obesus</i> Schulze, 1904	Assigned to one of two OTUs in checklist under <i>Hymedesmia</i> .
<i>Hyalonema</i> sp. 1–13 Reiswig MS	Assigned to one of two OTUs in checklist under <i>Hymedesmia</i> .
<i>Hymedesmia</i> sp. indet. Kelly & Buckeridge, 2005	Assigned to one of two OTUs in checklist under <i>Hymedesmia</i> .
<i>Iophon</i> n. sp. K&W in Cryer <i>et al.</i> , 2000	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Isodictya microchela</i> (Topsent, 1915)	Not in NZ EEZ: Macquarie Island (Australian EEZ).
<i>Leucetta</i> n. sp. 2 K&W in Cryer <i>et al.</i> , 2000	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Leucetta</i> sp. Pritchard, 1984	Incorrect entry as no <i>Leucetta</i> sp. mentioned in Pritchard <i>et al.</i> (1984), only <i>Leucettusa lancifer</i> Dendy, 1924 and <i>Clathrina</i> sp.
<i>Leuconia armata</i> Urban, 1908	Considered to be inaccurate in WPD because the species was originally described from South Africa and the currently accepted distribution includes Brazil. Currently accepted in WPD as <i>Leucandra armata</i> (Urban, 1908).
<i>Leucosolenia botryoides</i> (Ellis & Solander, 1786)	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from the North Sea. The currently accepted distribution is the North Atlantic.
<i>Leucosolenia</i> sp. Miller & Batt, 1973	Beach life popular book: no description or voucher specimen retained to facilitate full identification.
<i>Lissodendoryx</i> sp. indet. Kelly & Buckeridge, 2005	Kelly & Buckeridge (2005, table 2) listed <i>Lissodendoryx</i> sp. indet. from the Chatham Rise. Since 2005, several species have since been identified from Chatham Rise. This record is no longer traceable.
<i>Oceanapia</i> sp. 2, 4–6 K&W in Cryer <i>et al.</i> , 2000	Records cannot be matched to NIWA accession numbers and are no longer traceable.
<i>Ophilitaspongia papilla</i> Bowerbank, 1866 (as <i>Ophilitaspongia seriata</i> (<i>sensu</i> Johnston, 1842) in Kelly <i>et al.</i> , 2009)	New Zealand records listed in Dawson (1993) (as <i>Ophilitaspongia seriata</i> (Grant, 1826)) are now considered to be inaccurate in WPD because the species was originally described from the Celtic Sea. The currently accepted distribution is the Northeast Atlantic and United Kingdom. Currently accepted in WPD as <i>Ophilitaspongia papilla</i> Bowerbank, 1866. The name in Kelly <i>et al.</i> (2009) was incorrectly cited as <i>Ophilitaspongia seriata</i> (Grant, 1826).
<i>Orina</i> n. sp. K&W in Cryer <i>et al.</i> , 2000	Record cannot be matched to a NIWA accession numbers and are no longer traceable.
<i>Oscarella lobularis</i> (Schmidt, 1862)	New Zealand records listed in Dawson (1993) are considered to be inaccurate by the editors of the WPD because the species was originally described from the Adriatic Sea and the currently accepted distribution is the Northeastern Atlantic.
<i>Pachastrella</i> n. spp. (2) Kelly	Assigned to one of three OTUs in checklist under <i>Pachastrella</i> .
<i>Pararete farreopsis</i> Carter, 1877	Kelly & Buckeridge (2005) listed collections of extant hexactinellids from Chatham Rise, in their report on fossil sponges from the Tutuuri Greensand, Chatham Island. Reiswig & Kelly (2011) stated that since the identifications were not vetted by a hexactinellid specialist, the listed species names cannot be confidently added to the NZ fauna.
<i>Pararete farreopsis</i> Carter, 1877 in Kelly & Buckeridge (2005)	As per <i>Anomochone</i> spp. comments.
<i>Penares</i> n. sp. Kelly	Assigned to one of several new species in Sim-Smith & Kelly (2015).
<i>Phakellia</i> n. sp. K&W in Cryer <i>et al.</i> , 2000	Accessioned in NIC; early collection, not fully reconciled with current species or specimens.
<i>Phakellia</i> n. sp. NIWA Stn I685 Alvarez	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Phakellia</i> n. sp. NIWA Stn Q340 Alvarez	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Pheronematidae</i> gen. et sp. 2 Reiswig MS	Record cannot be matched to a NIWA accession numbers and is no longer traceable.
<i>Pione vastifica</i> (Hancock, 1849) (as <i>Cliona vastifica</i> Hancock, 1849 in Kelly <i>et al.</i> , 2009)	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from the North Sea and is a geographically well-defined species from the mid- to Northeastern Atlantic. Currently accepted in WPD as <i>Pione vastifica</i> (Hancock, 1849).
<i>Podospongia</i> n. sp. Kelly & Bergquist MS	Re-identified as <i>Podospongia virga</i> Sim-Smith & Kelly, 2011.
<i>Polymastia</i> corticata Ridley & Dendy, 1886	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from the South Atlantic. The currently accepted distribution is the Atlantic Ocean.
<i>Polymastia</i> sp. Bergquist <i>et al.</i> , 1986	Marine chemistry study: no description, unlikely any voucher specimen remains for full identification.
<i>Psammoclema</i> sp. (Bergquist, 1968)	Unconfirmed record and misspelling: Bergquist (1968) is on Tetractinellida, not Poecilosclerida; <i>Psammoclema</i> is a pocilosclerid sponge.

(continued overleaf)

Table 4.2. (continued)

Taxon name as cited in Kelly <i>et al.</i> (2009)	Comment & reference
<i>Pseudoceratina</i> sp. Bergquist <i>et al.</i> , 1991	Marine chemistry study: no description. Specimen was collected from Darwin, Australia.
<i>Radiospongilla sceptroides</i> (Haswell, 1883)	Freshwater species; incorrectly cited as (Haswell, 1882) in Kelly <i>et al.</i> (2009).
<i>Receptaculites australis</i> Salter, 1859	Thought to be a type of algae (Nitecki 1972).
<i>Regadrella</i> sp. 1 Reiswig MS	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Reniochalina</i> n. sp. NIWA Stn Z9036 Alvarez	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Ridelia oviformis</i> Dendy, 1888	Considered to be inaccurate in WPD because the species was originally described from the Celtic Sea. The currently accepted distribution is the Atlantic Ocean. The NZ specimens are now known under an OTU until described (<i>Rhizaxinella</i> sp. 01 (NIWA 53091, Chatham Is.).
<i>Rossella</i> sp. 1 (Reiswig MS)	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Rossella</i> sp. 2 (Reiswig MS)	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Rossellidae</i> gen. nov. et n. sp. Reiswig MS	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Sclerothamnopis compressa</i> Wilson, 1904	Kelly & Buckeridge (2005) described fossils from the Tutuiri Greensand, Chatham Island, that they thought closely resembled extant species <i>Sclerothamnopis compressa</i> Wilson, 1904. Reiswig & Kelly (2011) stated that the species could not be securely added to the known NZ fauna because no spicules were available for examination and the record had not been vetted by a hexactinellid specialist.
<i>Sclerothamnopis compressa</i> Wilson, 1904 in Kelly & Buckeridge (2005)	As per <i>Anomochone</i> spp. comments.
<i>Semperella</i> n. sp. Reiswig MS	Assigned to one of three operational species names in checklist under <i>Semperella</i> from the Chatham Rise.
<i>Sigmadocia flagellifera</i> (Ridley & Dendy, 1886)	Now accepted as <i>Haliclona (Flagellia) flagellifera</i> (Ridley & Dendy, 1886). The NZ record of Bergquist & Warne (1980) is considered to be inaccurate as the type locality is Celtic Seas and the currently accepted distribution is the Northeastern Atlantic.
<i>Spongia (Heterofibria) biformis</i> Kelly, 2009	Kelly <i>et al.</i> (2009) mistakenly listed this species in the checklist of NZ species. As there is no description or type material, the name is a <i>nomen nudum</i> in the sense of the ICBN and thus unavailable.
<i>Spongia irregularis</i> (Lendenfeld, 1889)	Now accepted as <i>Spongia (Spongia) hispida</i> Lamarck, 1814. The NZ record of Bergquist & Warne (1980) is considered to be inaccurate as the type locality is the Western Pacific and the currently accepted distribution is Southeast Asia and the Indo-Pacific.
<i>Stellella</i> n. spp. (6) Kelly	Assigned to one of 18 OTUs in checklist under <i>Stellella</i> .
<i>Stylissa</i> n. sp. NIWA Stn Z9034, of Alvarez	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Suberites carnosus</i> (Johnston, 1842)	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from the Celtic Sea. The currently accepted distribution is the Northeast Atlantic and United Kingdom, and all other records considered inaccurate. Bergquist (1968) synonymised Dendy (1924)'s <i>Suberites carnosus</i> var. <i>novaezelandiae</i> , from the isolated North Cape – Three Kings region, which is currently accepted in WPD and almost certainly represents a valid species.
<i>Suberites ficus</i> (Johnston, 1842)	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from the North Sea. The currently accepted distribution is the Northeast Atlantic and United Kingdom.
<i>Sycetta</i> sp. indet. Kelly & Buckeridge, 2005	Kelly & Buckeridge (2005, table 2) listed <i>Sycetta</i> sp. indet. from the Chatham Rise. This record has subsequently been identified as <i>Amphoriscus cyathiscus</i> Haeckel, 1872.
<i>Sycon ciliatum</i> (Fabricius, 1780) (as <i>Sycon ciliata</i> in Kelly <i>et al.</i> 2009)	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from the East Greenland Shelf. The currently accepted distribution is the North Atlantic, Mediterranean and Arctic Ocean.
<i>Sycon lunulatum</i> (Haeckel, 1872) (as <i>Sycon lunulata</i> in Kelly <i>et al.</i> 2009)	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from, and the currently accepted distribution is, Cape Town, South Africa.
<i>Sycon</i> sp. 1 Bergquist <i>et al.</i> , 1986	Marine chemistry study: no description, unlikely any voucher specimen remains for full identification.
<i>Sycon</i> sp. 2 Bergquist <i>et al.</i> , 1986	Marine chemistry study: no description, unlikely any voucher specimen remains for full identification.
<i>Sycon</i> sp. Grace & Grace, 1976	Marine chemistry study: no description, unlikely any voucher specimen remains for full identification.
<i>Sycon</i> sp. Lawson <i>et al.</i> , 1984	Marine chemistry study: no description, unlikely any voucher specimen remains for full identification.
<i>Tentorium semisuberites</i> (Schmidt, 1870)	Considered to be inaccurate in WPD because the species was originally described from the West Greenland shelf and the currently accepted distribution is the Northern Atlantic and Southern Ocean. The New Zealand specimens are now known under an OTU, until described, as <i>Tentorium</i> sp. 04 (NIWA 53783, cf. <i>semisuberites</i> , Chatham Rise).
<i>Tethya diploderma</i> Schmidt, 1870	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from the Caribbean Sea. The currently accepted distribution is the Tropical West Atlantic Ocean.
<i>Tethya ingalli</i> Bowerbank, 1858	<i>Tethya ingalli</i> was the name given to the very common deep rose-pink sponges found around the coasts of NZ. These were redescribed as <i>Tethya australis</i> by Bergquist & Kelly-Borges (1991) and renamed <i>T. bergquistae</i> Hooper & Wiedenmayer, 1994 as the name was preoccupied by <i>Donatia lyncurium australis</i> Kirk, 1911. However, as the latter is very probably a junior synonym of <i>T. deformis</i> Thiele, 1898, <i>T. australis</i> may be revived in the future (WPD).
<i>Tethya japonica</i> Sollas, 1888	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from the Eastern Philippines. The currently accepted distribution is Southeast Asia.
<i>Tethya robusta</i> (Bowerbank, 1873)	Bergquist (1968) noted that this species was recorded from an unspecified NZ locality by Burton (1924). The species is considered to be an Indo-Pacific species, including the western and Eastern coastline of Australia, with no valid records for NZ in WPD. Listed incorrectly in Kelly <i>et al.</i> (2009) as <i>Tethya robusta</i> Bowerbank, 1858.
<i>Trachycaulus</i> cf. <i>gurlitti</i> Schultze, 1886	Kelly <i>et al.</i> (2009) attributed this species, known only to the mid-South Pacific Ocean, to the NZ region, based on Henry Reiswig's first, unpublished, preliminary survey of the NZ fauna in 1998. The species was not recovered in Reiswig & Kelly (2018).
<i>Trichasterina</i> sp. Reiswig MS	Record cannot be matched to a NIWA accession number and is no longer traceable.
<i>Ulosa</i> n. sp. Bergquist & Green, 1977	Settlement and larval metamorphosis study: no description, unlikely any voucher specimen remains for full identification.
<i>Xestospongia</i> sp. Lawson <i>et al.</i> , 1984	Secondary metabolite study: no description, unlikely any voucher specimen remains for full identification.

species by Kelly-Borges and Vacelet (1995) resulted in the formal reinstatement of family Podospongiidae by Kelly and Samaai (2002). Sim-Smith and Kelly (2011) went on to establish two new genera for New Zealand: *Neopodospongia* and *Diplopodospongia*, with four and three species, respectively. Considerable effort was then applied to the family Latrunculiidae, as the South Pacific region is considered to be a hot-spot for species (Kelly *et al.* 2016). Sim-Smith *et al.* (2022) have just completed a major study that: establishes two new genera, *Latrunpagoda* and *Aciculatrunculia*; describes 14 new extant species and one new fossil species; and redescribes known latrunculids from around New

Zealand and Antarctica. Family Latrunculiidae has received significant research attention due to two main factors: 1) their abundance in this region; 2) the abundance of microfossil anisodiscorbards in the Late Eocene Oamaru Diatomite of New Zealand (Hinde & Holmes 1892; Kelly *et al.* 2016) and the similarity of these microfossils to those of recently described new genera, subgenera, and species from the North Pacific (Kelly *et al.* 2016); and, 3) the great interest in their potential as marine-derived drugs (Li *et al.* 2021).

No formal species descriptions in the order Dictyoceratida have been carried out since 2001, when Cook and Bergquist (2001) revised family Spongidae,

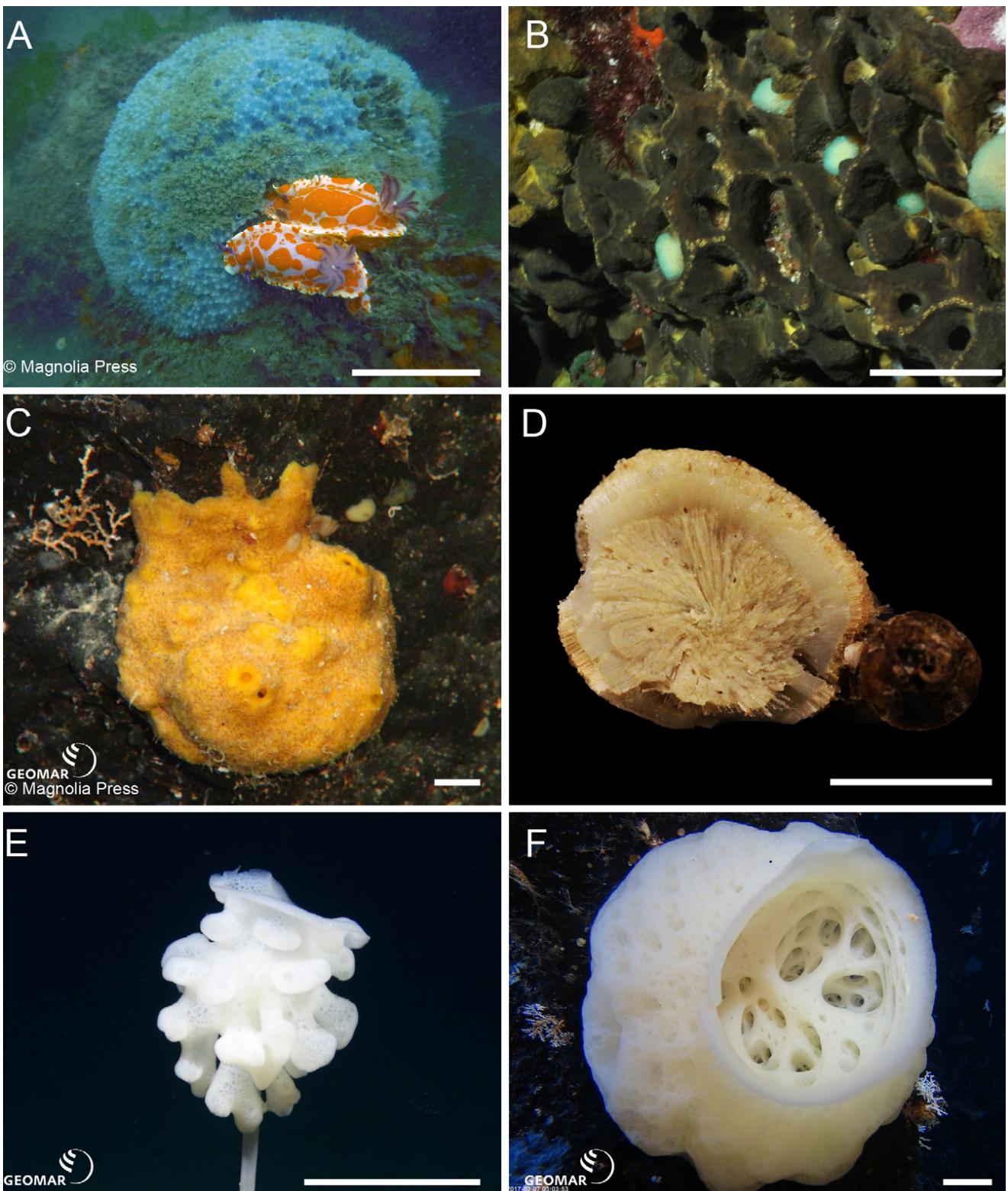


Figure 4.1. Recent sponge discoveries from the New Zealand region: **A.** *Dysidea teawanui* Kelly, Mc Cormack & Battershill, 2020, reproduced from Mc Cormack *et al.* (2020: Figure 6B), scale = 50 mm; **B.** *Suberea meandrina* Kelly, 2015, reproduced from Kelly *et al.* (2015a: Figure 1), scale = 50 mm; **C.** *Penares turmericicolor* Sim-Smith & Kelly, 2019, reproduced from Sim-Smith & Kelly (2019: Figure 20B), scale = 10 mm; **D.** *Stupenda singularis* Kelly & Cárdenas 2016, scale = 10 mm; **E.** *Saccocalyx tetractinus* Reiswig & Kelly, 2018, reproduced from Reiswig & Kelly (2018: seafloor image Figure 88), scale = 100 mm; **F.** *Trychella kermadecensis* Reiswig & Kelly, 2018, reproduced from Reiswig & Kelly (2018: Figure 54B), scale = 100 mm. All images are reproduced with permission from the copyright holders Zootaxa (Figs 4.1A, C) and the *Bulletin of the Auckland Museum* (Fig. 4.1B). Images in Fig 4.1C, E, F were captured by GEOMAR ROV Kiel 6000 onboard RV Sonne (ICBM voyage SO254), courtesy of Project PoriBacNewZ, GEOMAR, and ICBM; permission has been given by GEOMAR and the NIWA Biodiversity Memoir series to reproduce Figs 4.1E, F.

although Van Soest & Hooper (2020) renamed one of the species, *Spongia (Heterofibria) cristata* Cook & Bergquist, 2001 to *Spongia (Heterofibria) decooki*

Van Soest & Hooper, 2020. In 2020, Mc Cormack *et al.* (2020), described two new species from Tauranga Moana: *Dysidea tuapokere* Kelly, Mc Cormack &

Table 4.3. Revised extant Porifera species in the New Zealand record. Species cited in Kelly *et al.* (2009) that have been revised taxonomically, had their spelling updated, or had nomenclatural changes and updates. Updates follow the World Porifera Database (<https://www.marinespecies.org/porifera/>).

Taxon name as cited in Kelly <i>et al.</i> (2009)	Revised name in checklist	Comment & reference for name change
<i>Aaptos confertus</i> Kelly-Borges & Bergquist, 1994	<i>Aaptos conferta</i> Kelly-Borges & Bergquist, 1994	Species name updated to genus name gender
<i>Aaptos globosum</i> Kelly-Borges & Bergquist, 1994	<i>Aaptos globosa</i> Kelly-Borges & Bergquist, 1994	Species name updated to genus name gender
<i>Aaptos</i> n. sp. K&W in Cryer <i>et al.</i> , 2000	<i>Aaptos</i> sp. 01 (NIWA 51568, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Aaptos tentum</i> Kelly-Borges & Bergquist, 1994	<i>Aaptos tenta</i> Kelly-Borges & Bergquist, 1994	Species name updated to genus name gender
<i>Acanthella cristagalli</i> (Dendy, 1924)	<i>Tedania</i> (<i>Tedaniopsis</i>) <i>cristagalli</i> Dendy, 1924	Unaccepted genus, subgenus assignment
<i>Acanthoclada</i> n. sp. K&W in Cryer <i>et al.</i> , 2000	<i>Acanthoclada prostrata</i> Bergquist, 1970	Re-identified & updated
<i>Acanthuscus</i> (<i>Rhabdochalyptus</i>) spp. indet. Kelly & Buckeridge 2005	<i>Acanthascus</i> sp. 01 (NIWA 40928, Macquarie Ridge)	Accessioned in NIC under OTU for further work
<i>Adocia caminata</i> Bergquist & Warne, 1980	<i>Haliclona</i> (<i>Halichoclona</i>) <i>caminata</i>	Unaccepted genus, subgenus assignment
Bergquist & Warne, 1980		
<i>Adocia parietaloides</i> Bergquist, 1961	<i>Haliclona parietaloides</i> (Bergquist, 1961)	Alternate representation (unaccepted genus)
<i>Adocia pulcherrima</i> (Brondsted, 1924)	<i>Haliclona pulcherrima</i> (Brondsted, 1924)	Alternate representation
<i>Adocia venustina</i> Bergquist, 1961	<i>Haliclona venustina</i> (Bergquist, 1961)	Alternate representation
<i>Alectona</i> sp. indet. Kelly & Buckeridge, 2005	<i>Alectona</i> sp. 01 (NIWA 76239, Chatham Rise)	Accessioned in NIC under OTU for further work
<i>Amphiastralla kirkpatricki</i> (Dendy, 1924)	<i>Amphiastralla kirkpatricki</i> Dendy, 1924	Alternate representation
<i>Ancorina alata</i> Dendy, 1924	<i>Ecionemria alata</i> (Dendy, 1924)	Kelly & Sim-Smith (2012)
<i>Ancorina novaezelandiae</i> Dendy, 1924	<i>Ecionemria novaezelandiae</i> (Dendy, 1924)	Kelly & Sim-Smith (2012)
<i>Ancorina osculifera</i> Dendy, 1924	<i>Ecionemria alata</i> (Dendy, 1924)	Synonymised with <i>Ecionemria alata</i> (Dendy, 1924)
<i>Antho</i> (<i>Acarnia</i>) <i>novizelanicum</i> (Ridley, 1881)	<i>Antho</i> (<i>Plocamia</i>) <i>novizelanica</i> (Ridley & Duncan, 1881)	Not found in WPD; this is the closest record
<i>Antho brondstedi</i> Bergquist & Fromont, 1988	<i>Antho</i> (<i>Antho</i>) <i>brondstedi</i> Bergquist & Fromont, 1988	Alternate representation
<i>Aphrocallistes</i> cf. <i>beatrix</i> Gray, 1858	<i>Aphrocallistes</i> (<i>beatrix</i>) <i>beatrix</i> Gray, 1858	Reiswig & Kelly (2011)
<i>Aplysinopsis</i> n. sp. K&W in Cryer <i>et al.</i> , 2000	<i>Aplysinopsis</i> sp. 01 (NIWA 51608, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Asbestopluma biserialis</i> (Ridley & Dendy, 1886)	<i>Asbestopluma</i> (<i>A.</i>) <i>biserialis</i> (Ridley & Dendy, 1886)	Alternate representation
<i>Asbestopluma hadalis</i> Lévi, 1964	<i>Lycopodina hadalis</i> (Lévi, 1964)	Alternate representation
<i>Asbestopluma wolffi</i> Lévi, 1964	<i>Asbestopluma</i> (<i>Asbestopluma</i>) <i>wolffi</i> Lévi, 1964	Alternate representation
<i>Asterops</i> cf. <i>simplex</i> (Carter, 1879)	<i>Stryphnus</i> <i>ariena</i> Kelly & Sim-Smith, 2012	Re-identified in Kelly & Sim-Smith (2012)
<i>Aulochrome cylindrica</i> Schulze, 1886	<i>Crateromorpha</i> (<i>Aulochrome</i>) <i>cylindrica</i> Schulze, 1886	Alternate representation
<i>Bubaris elegans</i> Dendy, 1924	<i>Axinella elegans</i> (Dendy, 1924)	Alternate representation
<i>Bubaris ornata</i> Dendy, 1924	<i>Plocamiona ornata</i> (Dendy, 1924)	Alternate representation
<i>Cacospongia</i> n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Cacospongia</i> sp. 01 (NIWA 101498, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Callipelta punctata</i> Lévi & Lévi, 1983	<i>Sollasipelta</i> <i>punctata</i> (Lévi & Lévi, 1983)	Van Soest <i>et al.</i> (2020)
<i>Callyspongia conica</i> (Brondsted, 1924)	<i>Callyspongia</i> <i>brondstedi</i> Van Soest & Hooper, 2020	Junior homonym
<i>Callyspongia minor</i> (Dendy, 1916)	<i>Haliclona pacifica</i> Hooper in Hooper & Wiedenmayer, 1994	This species was originally recorded for NZ as <i>Siphonochalina minor</i> var. <i>regalis</i> Dendy, 1924. The currently accepted species has a disparate Southeast Asian distribution so is considered inaccurate.
<i>Callyspongia ramosa</i> (Gray, 1843)	<i>Callyspongia</i> (<i>Callyspongia</i>) <i>nuda</i> (Ridley, 1884)	Type material located in the Canterbury Museum, Christchurch, currently being redescribed
<i>Calthropella novaezelandiae</i> (Bergquist, 1961) (Bergquist, 1961)	<i>Calthropella</i> (<i>Corticellopsis</i>) <i>novaezelandiae</i>	Alternate representation
<i>Caulophacus</i> sp. Reiswig MS (NMNZ POR.484, Kermadecs)	<i>Caulophacus</i> (<i>Caulodiscus</i>) sp. 01	Accessioned in NIC under OTU for further work
<i>Ceratopision cuneiformis</i> Bergquist, 1970	<i>Ceratopision</i> <i>cuneiforme</i> Bergquist, 1970	Species name updated to genus name gender
<i>Chalaronema</i> sp. Reiswig MS	<i>Chalaronema</i> <i>sibogae</i> Iijima, 1927	Re-identified
<i>Chondrocladia asigmata</i> Lévi, 1964	<i>Chondrocladia</i> (<i>Chondrocladia</i>) <i>asigmata</i> Lévi, 1964	Alternate representation
<i>Chondrocladia clavata</i> Ridley & Dendy, 1886	<i>Chondrocladia</i> (<i>C.</i>) <i>clavata</i> Ridley & Dendy, 1886	Alternate representation
<i>Chondrocladia</i> n. sp. 1 Kelly unpubl. 2003	<i>Chondrocladia</i> (<i>C.</i>) sp. (NIWA 25826, Chatham Rise)	Accessioned in NIC under OTU for further work
<i>Chondropsis kirki</i> (Bowerbank, 1841)	<i>Chondropsis</i> <i>kirkii</i> (Bowerbank, 1841)	Misspelling of species name
<i>Chondropsis</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Chondropsis</i> sp. 05 (NIWA 139355, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Cinachrya novaezelandiae</i> Brondsted, 1924	<i>Cinachryella</i> (<i>novaezelandiae</i>) (Brondsted, 1924)	Alternate representation
<i>Cinachrya uteoides</i> Dendy, 1924	<i>Cinachryella</i> <i>uteoides</i> (Dendy, 1924)	Alternate representation
<i>Cinachryella</i> n. sp. 1 and 2 K&W in Cryer <i>et al.</i> 2000	<i>Cinachryella</i> sp. 01 (NIWA 101507, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Ciocalypta</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Ciocalypta</i> sp. 01 (NIWA 52415, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Ciocalypta</i> n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Ciocalypta</i> sp. 05 (NIWA 51264, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Ciocalypta</i> n. sp. 3 K&W in Cryer <i>et al.</i> 2000	<i>Ciocalypta</i> sp. 06 (NIWA 51146, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Ciocalypta</i> n. sp. 4 K&W in Cryer <i>et al.</i> 2000	<i>Ciocalypta</i> sp. 07 (NIWA 51150, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Ciocalypta</i> n. sp. 5 K&W in Cryer <i>et al.</i> 2000	<i>Ciocalypta</i> sp. 08 (NIWA 51284, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Ciocalypta</i> n. sp. 6 K&W in Cryer <i>et al.</i> 2000	<i>Ciocalypta</i> sp. 09 (NIWA 51164, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Ciocalypta</i> n. sp. 7 K&W in Cryer <i>et al.</i> 2000	<i>Ciocalypta</i> sp. 03 (NIWA 101961, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Cladorhiza linearis</i> Ridley & Dendy, 1887	<i>Nullarboria linearis</i> (Ridley & Dendy, 1887)	Alternate representation (Ekins <i>et al.</i> 2020)
<i>Clathria</i> (<i>Axosuberites</i>) <i>toxitenuis</i> Bergquist & Fromont, 1988	<i>Clathria</i> (<i>Axosuberites</i>) <i>fromontae</i> Hooper, 1996	Alternate representation; synonymised
<i>Clathria</i> (<i>Clathria</i>) <i>atoxa</i> (Bergquist & Fromont, 1988)	<i>Clathria</i> (<i>Clathria</i>) <i>bergquistae</i> Van Soest & Hooper, 2020	Renamed
<i>Clathria</i> (<i>Clathria</i>) n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Clathria</i> (<i>Axosuberites</i>) <i>macrotoxa</i> (Bergquist & Fromont, 1988)	Re-identified
<i>Clathria</i> (<i>Microciona</i>) <i>pyramidalis</i> (Brondsted, 1924)	<i>Clathria</i> (<i>Clathria</i>) <i>pyramidalis</i> (Brondsted, 1924)	Alternate representation
<i>Clathria</i> (<i>Microciona</i>) <i>rubens</i> (Bergquist, 1961)	<i>Clathria</i> (<i>Microciona</i>) <i>leighensis</i> Hooper, 1996	Alternate representation
<i>Clathria</i> <i>intermedia</i> Kirk, 1911	<i>Clathria</i> (<i>Clathria</i>) <i>intermedia</i> Kirk, 1911	Alternate representation
<i>Clathria</i> <i>lisso sclera</i> Bergquist & Fromont, 1988	<i>Clathria</i> (<i>Clathria</i>) <i>lisso sclera</i> Bergquist & Fromont, 1988	Alternate representation
<i>Clathria</i> <i>macropora</i> Lendenfeld, 1888	<i>Clathria</i> (<i>Iosciella</i>) <i>macropora</i> Lendenfeld, 1888	Alternate representation
<i>Clathria</i> <i>mortensenii</i> Brondsted, 1924	<i>Clathria</i> (<i>Clathria</i>) <i>mortensenii</i> Brondsted, 1924	Alternate representation
<i>Clathria</i> n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Clathria</i> (<i>Microciona</i>) <i>scotti</i> Dendy, 1924	Re-identified
<i>Clathria</i> <i>scotti</i> Dendy, 1924	<i>Clathria</i> (<i>Microciona</i>) <i>scotti</i> Dendy, 1924	Also, in Kelly <i>et al.</i> (2009) as <i>Pseudanchinoe scotti</i> (Dendy, 1924)
<i>Clathria</i> <i>terraenovae</i> Dendy, 1924	<i>Clathria</i> (<i>Clathria</i>) <i>terraenovae</i> Dendy, 1924	Alternate representation
<i>Cliona</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Cliona</i> sp. 01 (NIWA 51129, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Cliona</i> n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Cliona</i> sp. 02 (NIWA 51205, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Cliona</i> n. sp. 3 K&W in Cryer <i>et al.</i> 2000	<i>Cliona</i> sp. 03 (NIWA 51619, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Coelosphaera calcifera</i> (Burton, 1934)	<i>Coelosphaera</i> (<i>Coelosphaera</i>) <i>calcifera</i> (Burton, 1934)	Alternate representation
<i>Coelosphaera globosa</i> Bergquist, 1961	<i>Coelosphaera</i> (<i>Coelosphaera</i>) <i>globosa</i> Bergquist, 1961	Alternate representation
<i>Coelosphaera</i> sp.	<i>Coelosphaera</i> (<i>C.</i>) <i>globosa</i> Bergquist, 1961	Fully identified
<i>Coelosphaera</i> sp. indet. Kelly & Buckeridge, 2005	<i>Coelosphaera</i> (<i>C.</i>) <i>globosa</i> Bergquist, 1961	Re-identified

(continued overleaf)

Table 4.3. (continued)

Taxon name as cited in Kelly <i>et al.</i> (2009)	Revised name in checklist	Comment & reference for name change
<i>Coelosphaera transiens</i> Bergquist & Fromont, 1988	<i>Coelosphaera (C.) transiens</i> Bergquist & Fromont, 1988	Alternate representation
<i>Cornulum strepsichela</i> Dendy, 1922	<i>Paracornulum strepsichela</i> (Dendy, 1922)	Alternate representation
<i>Crambe</i> n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Crambe</i> sp. 01 (NIWA 51235, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Craniella</i> n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Craniella</i> sp. 05 (NIWA 51312, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Crella affinis</i> (Brøndsted, 1924)	<i>Crella (Pytheas) affinis</i> (Brøndsted, 1924)	Alternate representation
<i>Crella fristedti</i> (Dendy, 1924)	<i>Crella (Pytheas) fristedti</i> (Dendy, 1924)	Alternate representation
<i>Crella</i> n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Crella</i> sp. 01 (NIWA 52391, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Cymbastella concentrica</i> (Lendenfeld, 1887)	<i>Cymbastella concentrica</i> (Lendenfeld, 1887)	Misspelled genus name
<i>Cymbastella tricalyciformis</i> (Bergquist, 1970)	<i>Cymbastella lamellata</i> (Bergquist, 1970)	Misspelled genus name, junior synonym
<i>Dactylia palmata</i> Carter, 1885	<i>Dactylia varia</i> (Gray, 1843)	Type material located in the Canterbury Museum, Christchurch, currently being redescribed in the context of recent material.
<i>Dendya poterium</i> (Haeckel, 1872)	<i>Ascalitis poterium</i> (Haeckel, 1872)	Currently accepted in WPD as <i>Ascalitis poterium</i> (Haeckel, 1872).
<i>Dictyodendrilla</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Dictyodendrilla</i> sp. 03 (NIWA 51521, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Dictyodendrilla</i> n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Dictyodendrilla</i> sp. 01 (NIWA 51188, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Dotonella mirabilis</i> Dendy, 1924	<i>Rhaphidistia mirabilis</i> (Dendy, 1924)	Alternate representation
<i>Dragmacidon</i> n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Dragmacidon</i> sp. 02 (NIWA 52443, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Dysidea</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Dysidea</i> sp. 01 (NIWA 51207, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Dysidea</i> n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Dysidea</i> sp. nov. Battershill <i>et al.</i> , 2010	Accessioned in NIC under OTU for further work
<i>Dysidea</i> n. sp. 3 K&W in Cryer <i>et al.</i> 2000	<i>Dysidea</i> sp. 02 (NIWA 51083, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Dysidea</i> n. sp. 4 K&W in Cryer <i>et al.</i> 2000	<i>Dysidea</i> sp. 03 (NIWA 51139, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Dysidea</i> n. sp. 5 K&W in Cryer <i>et al.</i> 2000	<i>Dysidea</i> sp. 04 (NIWA 51591, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Dysidea</i> n. sp. 6 & 8 K&W in Cryer <i>et al.</i> 2000	<i>Dysidea spiculivora</i> (Dendy, 1924)	Accessioned in NIC under OTU for further work
<i>Dysidea</i> n. sp. 7 K&W in Cryer <i>et al.</i> 2000	<i>Dysidea hirciniformis</i> (Carter, 1885) <i>sensu</i> Dendy (1924)	Accessioned in NIC under OTU for further work
<i>Dysidea</i> sp. a (Brøndsted, 1923)	<i>Dysidea</i> sp. a Brøndsted, 1924	Only partially characterised by Brøndsted (1924a) [as <i>Spongelia</i> sp. a]; considered to be valid for Auckland Islands only (Mc Cormack <i>et al.</i> 2020: Table 1). The year was listed incorrectly as 1923 in Kelly <i>et al.</i> (2009).
<i>Dysidea</i> sp. b (Brøndsted, 1923)	<i>Dysidea</i> sp. b Brøndsted, 1924	Only partially characterised by Brøndsted (1924a) [as <i>Spongelia</i> sp. b]; considered to be valid for Auckland Islands only (Mc Cormack <i>et al.</i> 2020: Table 1). The year was listed incorrectly as 1923 in Kelly <i>et al.</i> (2009).
<i>Dysidea</i> sp. A Cook & Bergquist	<i>Dysidea</i> sp. nov. Battershill <i>et al.</i> , 2010	Battershill <i>et al.</i> (2010) partially characterised a species first recognised in Cook (2000) from the Firth of Thames, and later in sheltered areas and offshore islands in the Hauraki Gulf (Battershill <i>et al.</i> 2010). The species is comparable morphologically to <i>D. cristagalli</i> Bergquist, 1961 (see Mc Cormack <i>et al.</i> 2020), but seems to be distinctive, being pale pink, yellow or blue (Battershill <i>et al.</i> , 2010). The species is probably valid for northeastern NZ (Mc Cormack <i>et al.</i> 2020: Table 1) but awaits new collections and full description.
<i>Echinostylinos reticulatus</i> Topsent, 1927	<i>Echinostylinos patriciae</i> Carvalho <i>et al.</i> , 2016	Misapplication: Record renamed by Carvalho <i>et al.</i> (2016)
<i>Ectyodoryx crenelloides</i> (Brøndsted, 1924)	<i>Lissodendoryx (Ectyodoryx) crenelloides</i> (Brøndsted, 1924)	Alternate representation
<i>Ectyodoryx</i> sp. K&W in Cryer <i>et al.</i> 2000	<i>Lissodendoryx (Ectyodoryx)</i> sp. 07 (NIWA 51644, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Ectyomyxilla kerguelensis</i> Hentschel, 1914	<i>Myxilla (Ectyomyxilla) kerguelensis</i> (Hentschel, 1914)	Alternate representation
<i>Ectyomyxilla ramosa</i> Bergquist & Fromont, 1988	<i>Myxilla (Ectyomyxilla) janeae</i> Van Soest & Hooper, 2020	Alternate representation
<i>Epipolasis novaezealandiae</i> (Dendy, 1924)	<i>Topsis novazealandiae</i> (Dendy, 1924)	Alternate representation
<i>Esperiopsis edwardii</i> (Bowerbank, 1866)	<i>Amphilectus fucorum</i> (Esper, 1794)	Alternate representation: synonymy
<i>Esperiopsis glaber</i> Brøndsted, 1924	<i>Amphilectus glaber</i> (Brøndsted, 1924)	Alternate representation
<i>Esperiopsis normani</i> (Bowerbank, 1866)	<i>Amphilectus fucorum</i> (Esper, 1794)	Alternate representation: synonymy
<i>Euplectella</i> sp. Reiswig MS	<i>Euplectella semisimplex</i> Reiswig & Kelly, 2018	Reiswig & Kelly (2018)
<i>Euplectellidae</i> gen. nov. et n. sp. Reiswig MS	<i>Plumicoma solidia</i> Reiswig & Kelly, 2018	Reiswig & Kelly (2018)
<i>Euretidae</i> gen. et spp. indet. Reiswig MS	<i>Homoieurete macquariense</i> Reiswig & Kelly, 2011	Reiswig & Kelly (2011)
<i>Eurypon hispida</i> Bergquist, 1970	<i>Eurypon hispidum</i> Bergquist, 1970	Species name updated to genus name gender
<i>Forcepia</i> n. sp. Kelly unpubl. 2003	<i>Forcepia</i> (Forcepia) sp. 01 (NIWA 111053, Foveaux Strait)	Accessioned in NIC under OTU for further work
<i>Geodinella vestigifera</i> Dendy, 1924	<i>Geodia vestigifera</i> (Dendy, 1924)	Kelly & Sim-Smith (2012)
<i>Grantessa poculum</i> (Poléjaeff, 1883)	<i>Sycettusa poculum</i> (Poléjaeff, 1883)	Alternate representation
<i>Halichondria intermedia</i> Brøndsted, 1924	<i>Halichondria (Halichondria) intermedia</i> Brøndsted, 1924	Alternate representation: subgenus assignment
<i>Halichondria knowltoni</i> Bergquist, 1961	<i>Halichondria (Halichondria) knowltoni</i> Bergquist, 1961	Alternate representation: subgenus assignment
<i>Halichondria moorei</i> Bergquist, 1961	<i>Halichondria (Halichondria) moorei</i> Bergquist, 1961	Alternate representation: subgenus assignment
<i>Halichondria</i> n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Halichondria</i> sp. 08 (NIWA 51581, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Halichondria punctata</i> Bergquist, 1970	<i>Halichondria (Halichondria) punctata</i> Bergquist, 1970	Alternate representation: subgenus assignment
<i>Halicina brondstedi</i> Bergquist & Warne, 1980	<i>Halicina (Rhizonica) brondstedi</i> Bergquist & Warne, 1980	Alternate representation
<i>Halicina fragilis</i> Bergquist & Warne, 1980	<i>Halicina</i> sp. 02 (NIWAKD 766, Spirits Bay)	Junior homonym
<i>Halicina</i> n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Hamacantha</i> (Vomerula) sp. 01 (NIWA 51786, Cavalli Smt)	Accessioned in NIC under OTU for further work
<i>Hamacantha</i> (Vomerula) n. sp. 1 Kelly unpubl. 2003	<i>Chonelasma hamatum</i> Schulze, 1886	Accessioned in NIC under OTU for further work
<i>Heterochone hamata</i> (Schulze, 1886)	<i>Histodermella</i> sp. 01 (NIWA 51058, Spirits Bay)	Reiswig & Kelly (2011)
<i>Histodermella</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Histodermella</i> sp. 02 (NIWA 51334, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Histodermella</i> n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Holoxea</i> sp. 01 (NIWA 101646, Mernoo Bank)	Accessioned in NIC under OTU for further work
<i>Holoxea</i> n. sp. Kelly (Mernoo Bank)	<i>Hyalonema</i> (<i>Oonema</i>) <i>bipinnulum</i> Lévi, 1964	Unconfirmed record
<i>Hyalonema</i> (<i>Oonema</i>) <i>bipinnulum</i> Lévi, 1964	<i>Hymedesmia</i> (<i>H.</i>) <i>anisostrongyloxea</i> Bergquist & Fromont, 1988	Alternate representation
<i>Hymedesmia</i> <i>anisostrongyloxea</i> Bergquist & Fromont, 1988	<i>Hymedesmia</i> (<i>H.</i>) <i>lundbecki</i> Dendy, 1924	Alternate representation
<i>Hymedesmia</i> <i>lundbecki</i> Dendy, 1924	<i>Hymedesmia</i> (<i>H.</i>) <i>microstrongyla</i> Bergquist & Fromont, 1988	Alternate representation
<i>Hymeniacidon</i> <i>haurakii</i> Brøndsted, 1924	<i>Styliissa</i> <i>haurakii</i> (Brøndsted, 1924)	Alternate representation
<i>Hymeniacidon</i> <i>indistincta</i> Brøndsted, 1924	<i>Hymeniacidon agminata</i> Ridley, 1884	Alternate representation
<i>Hymeniacidon</i> n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Hymeniacidon</i> sp. 03 (0CDN6761-1, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Hymeniacidon</i> <i>perleve</i> (Montagu, 1818)	<i>Hymeniacidon</i> cf. <i>perlevis</i> (Montagu, 1814) <i>sensu</i> Bergquist (1970)	Species name updated to genus name gender
<i>Inflatella sphaerica</i> Dendy, 1924	<i>Pylodermra</i> <i>sphaerica</i> (Dendy, 1924)	Alternate representation
<i>Lamellomorpha</i> n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Lamellomorpha strongylata</i> Bergquist, 1968	Kelly <i>et al.</i> (2019)

(continued overleaf)

Table 4.3. (continued)

Taxon name as cited in Kelly <i>et al.</i> (2009)	Revised name in checklist	Comment & reference for name change
<i>Latrunculia brevis</i> Ridley & Dendy, 1886	<i>Latrunculia (Latrunculia) brevis</i> Ridley & Dendy, 1886	Alternate representation: subgenus assignment
<i>Latrunculia duckworthii</i> Alvarez <i>et al.</i> , 2002	<i>Latrunculia (Bianululata) duckworthii</i> Alvarez <i>et al.</i> , 2002	Alternate representation: subgenus assignment
<i>Latrunculia fiordensis</i> Alvarez <i>et al.</i> , 2002	<i>Latrunculia (L.) fiordensis</i> Alvarez <i>et al.</i> , 2002	Alternate representation: subgenus assignment
<i>Latrunculia kaakaariki</i> Alvarez <i>et al.</i> , 2002	<i>Latrunculia (B.) kaakaariki</i> Alvarez <i>et al.</i> , 2002	Alternate representation: subgenus assignment
<i>Latrunculia kaikoura</i> Alvarez <i>et al.</i> , 2002	<i>Latrunculia (B.) kaikoura</i> Alvarez <i>et al.</i> , 2002	Alternate representation: subgenus assignment
<i>Latrunculia millerae</i> Alvarez <i>et al.</i> , 2002	<i>Latrunculia (B.) millerae</i> Alvarez <i>et al.</i> , 2002	Alternate representation: subgenus assignment
<i>Latrunculia oxydiscorhabda</i> Alvarez <i>et al.</i> , 2002	<i>Latrunculia (L.) oxydiscorhabda</i> Alvarez <i>et al.</i> , 2002	Alternate representation: subgenus assignment
<i>Latrunculia procumbens</i> Alvarez <i>et al.</i> , 2002	<i>Latrunculia (B.) procumbens</i> Alvarez <i>et al.</i> , 2002	Alternate representation: subgenus assignment
<i>Latrunculia spinispirafera</i> Bröndsted, 1924	<i>Latrunculia (B.) spinispirafera</i> Bröndsted, 1924	Alternate representation: subgenus assignment
<i>Latrunculia triverticillata</i> Alvarez <i>et al.</i> , 2002	<i>Latrunculia (L.) triverticillata</i> Alvarez <i>et al.</i> , 2002	Alternate representation: subgenus assignment
<i>Latrunculia wellingtonensis</i> Alvarez <i>et al.</i> , 2002	<i>Latrunculia (B.) wellingtonensis</i> Alvarez <i>et al.</i> , 2002	Alternate representation: subgenus assignment
<i>Leucandra schauinslandi</i> (Preiswisch, 1904)	<i>Leucilla schauinslandi</i> (Preiswisch, 1904)	Alternate representation
<i>Leucandra</i> sp. indet. Kelly & Buckeridge, 2005	<i>Leucandra</i> sp. 01 (NIWA 51864, Chatham Rise)	Accessioned in NIC under OTU for further work
<i>Leucetta</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Leucettusa</i> sp. 02 (NIWA 51303, Spirits Bay)	Accession details updated
<i>Leucosolenia asconoides</i> (Carter, 1886)	<i>Asciote asconoides</i> (Carter, 1886)	Alternate representation
<i>Leucosolenia cf. hispida</i> Bröndsted, 1931	<i>Soleneiscus hispidus</i> (Bröndsted, 1931)	Alternate representation
<i>Leucosolenia challengerii</i> Poléjaeff, 1883	<i>Dendya clathrata</i> (Carter, 1883)	Alternate representation
<i>Leucosolenia intermedia</i> Kirk, 1896	<i>Dendya clathrata</i> (Carter, 1883)	Alternate representation
<i>Leucosolenia laxa</i> Kirk, 1896	<i>Ernsta laxa</i> (Kirk, 1896)	Alternate representation
<i>Leucosolenia protogenes</i> (Haeckel, 1872)	<i>Leucascus protogenes</i> (Haeckel, 1872 <i>sensu</i> Dendy, 1891)	Alternate representation
<i>Leucosolenia proxima</i> Dendy, 1891	<i>Clathrina loculosa</i> (Haeckel, 1870)	Alternate representation
<i>Lissodendoryx bifacialis</i> Lévi & Lévi, 1983	<i>Lissodendoryx (Ectyodoryx) bifacialis</i> Lévi & Lévi, 1983	Alternate representation: subgenus assignment
<i>Lissodendoryx isodictyalis</i> (Carter, 1882)	<i>Lissodendoryx (Lissodendoryx) isodictyalis</i> (Carter, 1882)	Alternate representation: subgenus assignment
<i>Lophocalyx</i> sp. Reiswig MS	<i>Lophocalyx</i> sp. nov. (NIWA 126005, in Dohrmann <i>et al.</i> , 2023: p. 17, fig. 6A–C)	Accessioned in NIC under OTU for further work
<i>Malacosaccus</i> sp. Reiswig MS	<i>Malacosaccus microglobus</i> Reiswig & Kelly, 2018	Reiswig & Kelly (2018)
<i>Mycale (Carmia)</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Mycale (Carmia)</i> sp. 02 (NIWA 51036, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Mycale (Carmia)</i> n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Mycale (Carmia)</i> sp. 03 (NIWA 51251, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Mycale (Mycale) murrayi</i> (Ridley & Dendy, 1886)	<i>Mycale (Carmia) murrayi</i> (Ridley & Dendy, 1886)	Alternate representation: subgenus assignment
<i>Mycale (Mycale) rara</i> (Dendy, 1896)	<i>Mycale (Arenochalina) rara</i> (Dendy, 1896)	Alternate representation: subgenus assignment
<i>Mycale incurvata</i> Lévi, 1993	<i>Mycale (Mycale) incurvata</i> Lévi, 1993	Alternate representation: subgenus assignment
<i>Myxilla columnata</i> Bergquist & Fromont, 1988	<i>Myxilla (Myxilla) columnata</i> Bergquist & Fromont, 1988	Alternate representation: subgenus assignment
<i>Myxilla novaezealandiae</i> Dendy, 1924	<i>Myxilla (Myxilla) novaezealandiae</i> Dendy, 1924	Alternate representation: subgenus assignment
<i>Naniupi novaezealandiae</i> Bergquist & Fromont, 1988	<i>Crella (Pytheas) novaezealandiae</i> (Bergquist & Fromont, 1988)	Alternate representation: subgenus assignment
<i>Neofibularia</i> n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Neofibularia</i> sp. 01 (NIWA KD 51585, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Oceanapia</i> sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Calyx</i> sp. 04 (NIWA 52360, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Oceanapia</i> sp. 3 K&W in Cryer <i>et al.</i> 2000	<i>Oceanapia</i> sp. 03 (NIWA 52429, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Ophilitaspompa oxeata</i> Bergquist & Fromont, 1988	<i>Echinocladaria oxeata</i> (Bergquist & Fromont, 1988)	Alternate representation
<i>Ophilitaspompa reticulata</i> Bergquist & Fromont, 1988	<i>Echinocladaria reticulata</i> (Bergquist & Fromont, 1988)	Alternate representation
<i>Orina petrocalyx</i> (Dendy, 1924)	<i>Haliclona (Gellius) petrocalyx</i> (Dendy, 1924)	Alternate representation
<i>Orina regius</i> (Bröndsted, 1924)	<i>Haliclona (Gellius) regia</i> (Bröndsted, 1924)	Alternate representation
<i>Pachataxa enigmatica</i> Lévi & Lévi, 1983	<i>Calthropella (Pachataxa) enigmatica</i> (Lévi & Lévi, 1983)	Alternate representation
<i>Pachypellina</i> sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Pachypellina</i> sp. 01 (NIWA 51421, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Pachypellina</i> sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Pachypellina</i> sp. 02 (NIWA 51422, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Paracornulum</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Paracornulum</i> sp. 01 (NIWA 51093, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Paracornulum</i> n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Paracornulum</i> sp. 02 (NIWA 51425, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Pararaphoxya</i> n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Pararaphoxya</i> sp. 01 (NIWA 101335, Three Kings)	Accessioned in NIC under OTU for further work
<i>Pararaphoxya</i> n. sp. Pritchard, 1984	<i>Pararaphoxya sinclairi</i> (Gray, 1843)	Unconfirmed
<i>Petrosia australis</i> Bergquist & Warne, 1980	<i>Petrosia (Petrosia) australis</i> Bergquist & Warne, 1980	Alternate representation: subgenus assignment
<i>Petrosia hebes</i> Lendenfeld, 1888	<i>Petrosia (Petrosia) hebes</i> Lendenfeld, 1888	Alternate representation: subgenus assignment
<i>Petrosia pluricrustata</i> Lévi & Lévi, 1983	<i>Petrosia (Petrosia) pluricrustata</i> Lévi & Lévi, 1983	Alternate representation: subgenus assignment
<i>Phelloderma bruuni</i> (Lévi, 1964)	<i>Abyssocladia bruuni</i> Lévi, 1964	Reverted genus transfer
<i>Pheronema</i> sp. 1 Reiswig MS	<i>Pheronema</i> sp. nov. (NIWA 126138, in Dohrmann <i>et al.</i> , 2023: p. 11, fig. 2D–F)	Accessioned in NIC under OTU for further work
<i>Pheronema</i> sp. 2 Reiswig MS	<i>Pheronema</i> sp. 01 (NIWA 76481, off Hawke Bay)	Accessioned in NIC under OTU for further work
<i>Pheronematidae</i> gen. et sp. 1 Reiswig MS	<i>Poliopogon</i> sp. nov. (NIWA 126337, in Dohrmann <i>et al.</i> , 2023: p. 11, fig. 2G, H)	Accessioned in NIC under OTU for further work
<i>Phloeodictyidae</i> gen. nov. et n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Phloeodictyidae</i> gen. et sp. nov. 01 (NIWA 51353, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Phorbas areolata</i> Bergquist & Fromont, 1988	<i>Phorbas bergmontae</i> Hajdu & Teixeira, 2011	Renamed
<i>Phorbas intermedia</i> Bergquist, 1961	<i>Phorbas intermedium</i> Bergquist, 1961	Species name updated to genus name gender
<i>Podospongia</i> n. sp. Kelly & Bergquist MS	<i>Podospongia virga</i> Sim-Smith & Kelly, 2011	Re-identified
<i>Poecillastra schulzii</i> (Sollas, 1888)	<i>Poecillastra schulzei</i> (Sollas, 1886)	Misspelling of species name
<i>Polymastia aurantium</i> Kelly-Borges & Bergquist, 1997	<i>Polymastia aurantia</i> Kelly-Borges & Bergquist, 1997	Species name corrected to match the gender of the genus name
<i>Polymastia</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Polymastia</i> sp. 07 (NIWA 51158, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Polymastia</i> n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Polymastia</i> sp. 08 (NIWA 51065, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Polymastia</i> n. sp. 3 K&W in Cryer <i>et al.</i> 2000	<i>Polymastia</i> sp. 09 (NIWA 51652, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Polymastiidae</i> gen. nov. et n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Polymastiidae</i> gen. et sp. nov. 1 (NIWA 51125, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Polymastiidae</i> gen. nov. et n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Polymastiidae</i> gen. et sp. nov. 2 (NIWA 51138, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Pronax anchorata</i> Bergquist & Fromont, 1988	<i>Myxilla (Styloptilon) fromontae</i> Van Soest & Hooper, 2020	Removal of homonymy
<i>Pronax fulva</i> Bergquist & Fromont, 1988	<i>Phorbas fulvus</i> (Bergquist & Fromont, 1988)	Species name updated to genus name gender
<i>Pronax</i> n. sp. K&W in Cryer <i>et al.</i> 2000	<i>Phorbas</i> sp. 08 (NIWA 51537, Spirits Bay)	<i>Pronax</i> sensu Gray, 1867: 536 currently accepted as <i>Phorbas</i> Duchassaing & Michelotti, 1864. Re-identified as <i>Phorbas</i> sp. 08 (NIWA 51537, Spirits Bay)
<i>Psammoclema</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Psammoclema</i> sp. 13 (NIWA 51257, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Psammoclema</i> n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Psammoclema</i> sp. 14 (NIWA 51007, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Psammoclema</i> n. sp. 3 K&W in Cryer <i>et al.</i> 2000	<i>Psammoclema</i> sp. 15 (NIWA 51301, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Psammoclema</i> n. sp. 4 K&W in Cryer <i>et al.</i> 2000	<i>Psammoclema</i> sp. 16 (NIWA 51486, fibrous, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Psammoclema</i> n. sp. 5 K&W in Cryer <i>et al.</i> 2000	<i>Psammoclema</i> sp. 17 (NIWA 51542, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Psammoclema</i> sp. a (Bröndsted 1926)	<i>Psammoclema</i> sp. a (Bröndsted, 1927)	Incorrect spelling and year in Kelly <i>et al.</i> (2009)
<i>Psammoclema</i> sp. b (Bröndsted 1926)	<i>Psammoclema</i> sp. b (Bröndsted, 1927)	Incorrect spelling and year in Kelly <i>et al.</i> (2009)

(continued overleaf)

Table 4.3. (continued)

Taxon name as cited in Kelly <i>et al.</i> (2009)	Revised name in checklist	Comment & reference for name change
<i>Pseudosuberites</i> sp. indet. Kelly & Buckeridge, 2005	<i>Protosuberites</i> sp. 01 (NIWA 28554, Chatham Rise)	Kelly & Buckeridge (2005, table 2) listed <i>Pseudosuberites</i> sp. indet. from the Chatham Rise. This record has been given the OTU <i>Protosuberites</i> sp. 01 (NIWA 28554, Chatham Rise). Alternate representation: new subgenus
<i>Raspailia (Raspailia) compressa</i> Bergquist, 1970	<i>Raspailia (Raspaxilla) compressa</i> Bergquist, 1970	Alternate representation: new subgenus
<i>Raspailia (Raspailia) flaccida</i> Bergquist, 1970	<i>Raspailia (Raspaxilla) flaccida</i> Bergquist, 1970	Alternate representation: new subgenus
<i>Raspailia (Raspailia) inaequalis</i> Dendy, 1924	<i>Raspailia (Raspaxilla) inaequalis</i> Dendy, 1924	Alternate representation: new subgenus
<i>(Raspailia) topsenti</i> Dendy, 1924	<i>Raspailia (Raspaxilla) topsenti</i> Dendy, 1924	Alternate representation: new subgenus
<i>Raspailia agminata</i> Hallmann, 1914	<i>Raspailia (Clathriodendron) arbuscula</i> (Lendenfeld, 1888)	Junior synonym
<i>Raspailia</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Raspailia</i> sp. 01 (NIWA 51004, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Raspailia</i> n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Raspailia</i> sp. 02 (NIWA 52367, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Raspailia</i> n. sp. 3 K&W in Cryer <i>et al.</i> 2000	<i>Raspailia</i> sp. 03 (NIWA 101440, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Regadrella</i> sp. 2 Reiswig MS	<i>Regadrella australis</i> Reiswig & Kelly, 2018	Reiswig & Kelly (2018)
<i>Regadrella</i> sp. 3 Reiswig MS	<i>Regadrella hispida</i> Reiswig & Kelly, 2018	Reiswig & Kelly (2018)
<i>Regadrella</i> sp. 4 Reiswig MS	<i>Regadrella pedunculata</i> Reiswig & Kelly, 2018	Reiswig & Kelly (2018)
<i>Rhabdastrella</i> n. spp. (2) Kelly	<i>Rhabdastrella</i> sp. 01 (NIWA 102222, Snares Platform)	Accessioned in NIC under OTU for further work
<i>Ridleia oviformis</i> Dendy, 1888	<i>Rhizaxinella</i> sp. 01 (NIWA 53091, Chatham Is)	Considered to be inaccurate in WPD because the species was originally described from the Celtic Sea. The currently accepted distribution is the Atlantic Ocean. New Zealand specimens are now known under an operational name until described.
<i>Rossella cf. antarctica</i> Carter, 1872	<i>Rossella antarctica</i> Carter, 1872	Confirmed by H.M. Reiswig
<i>Rossellidae</i> gen. nov. et sp. 1 indet. Reiswig	<i>Rossellinae</i> gen. 1 sp. 01 (NIWA 76915, Antipodes Islands)	Reiswig <i>et al.</i> (in prep)
<i>Rossellidae</i> gen. nov. et sp. 2 indet. Reiswig	<i>Rossellinae</i> gen. 2 sp. 01 (QM G316480, North Norfolk Ridge)	Reiswig <i>et al.</i> (in prep)
<i>Rossellidae</i> gen. nov. et sp. 3 indet. Reiswig	<i>Nubes tubulata</i> Reiswig, Dohrmann & Kelly, 2021	Reiswig <i>et al.</i> (2021)
<i>Rossellidae</i> gen. nov. et sp. 4 indet. Reiswig	<i>Nubes poculiformis</i> Reiswig, Dohrmann & Kelly, 2021	Reiswig <i>et al.</i> (2021)
<i>Rossellidae</i> gen. nov. et sp. 5 indet. Reiswig	<i>Rossellinae</i> gen. et sp. indet. (NIWA 126275, Wairarapa Slope)	Reiswig <i>et al.</i> (in prep)
<i>Sigmadocia flagellifera</i> (Ridley & Dendy, 1886)	<i>Haliclona (Flagellia) flagellifera</i> (Ridley & Dendy, 1886)	Alternate representation
<i>Sigmadocia fragilis</i> Bergquist & Warne, 1980	<i>Haliclona (Gellius) patbergquistae</i> Van Soest & Hooper, 2020	Removal of homonymy
<i>Sigmadocia glacialis</i> (Ridley & Dendy, 1886)	<i>Haliclona (Gellius) cf. glacialis</i> (Ridley & Dendy, 1886)	Alternate representation
<i>Sigmadocia intermedia</i> (Brøndsted, 1924)	<i>Haliclona (Gellius) intermedia</i> (Brøndsted, 1924)	Alternate representation
<i>Sigmadocia irregularis</i> (Brøndsted, 1924)	<i>Haliclona (Gellius) holgerbrondstedi</i> Van Soest & Hooper, 2020	Alternate representation
<i>Sigmadocia tubuloramosus</i> (Dendy, 1924)	<i>Haliclona (Gellius) tubuloramosa</i> (Dendy, 1924)	Alternate representation
<i>Sigmasceptrella</i> n. sp. Kelly & Bergquist MS	<i>Diplopodospongia rara</i> Sim-Smith & Kelly, 2011	Re-identified
<i>Sphinctrella orthotriaena</i> Lévi & Lévi, 1983	<i>Vulcanella orthotriaena</i> (Lévi & Lévi, 1983)	Alternate representation
<i>Spinularia</i> n. sp. Kelly & Buckeridge, 2005	<i>Spinularia</i> sp. 01 (NIWA 53230, Chatham Rise)	Accessioned in NIC under OTU for further work
<i>Spirastrella spinispirulifera</i> (Carter, 1879)	<i>Trachycladus spinispirulifer</i> (Carter, 1879)	Alternate representation
<i>Spongia (Heterofibria) cristata</i> Cook & Bergquist, 2000	<i>Spongia (Heterofibria) decooki</i> Van Soest & Hooper, 2020	Removal of homonymy
<i>Stelletta</i> cf. <i>phialomorpha</i> Lévi & Lévi, 1994	<i>Stelletta phialomorpha</i> Lévi, 1993	Incorrect taxonomic authority; confirmed ID
<i>Strongylacidon conulosa</i> Bergquist & Fromont, 1988	<i>Strongylacidon conulosum</i> Bergquist & Fromont, 1988	Species name updated to genus name gender
<i>Strongylacidon inaequalis</i> (Hentschel, 1911)	<i>Strongylacidon inaequale</i> (Hentschel, 1911)	Species name updated to genus name gender
<i>Stylopus australis</i> Bergquist & Fromont, 1988	<i>Hymedesmia (Stylopus) australis</i> (Bergquist & Fromont, 1988)	Alternate representation
<i>Stylopus lissostyla</i> Bergquist & Fromont, 1988	<i>Hymedesmia (Stylopus) lissostyla</i> (Bergquist & Fromont, 1988)	Alternate representation
<i>Suberites</i> <i>incrustans</i> Brøndsted, 1924	<i>Pseudosuberites</i> <i>sulcatus</i> (Thiele, 1905)	Synonymised
<i>Suberites</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Suberites</i> sp. 05 (NIWA 51064, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Suberites</i> n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Suberites</i> sp. 06 (NIWA 51393, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Suberites</i> n. sp. 3 K&W in Cryer <i>et al.</i> 2000	<i>Suberites</i> sp. 07 (NIWA 51489, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Sycettusa bathybia</i> (Haeckel, 1872)	<i>Leucandra bathybia</i> (Haeckel, 1869)	Alternate representation
<i>Sycettusa glomerosa</i> (Bowerbank, 1873)	<i>Heteroplia glomerosa</i> (Bowerbank, 1873)	Alternate representation
<i>Sycon dendyi</i> Kirk, 1895	<i>Sycute dendyi</i> (Kirk, 1895)	Alternate representation
<i>Tedania battershilli</i> Bergquist & Fromont, 1988	<i>Tedania (Tedania) battershilli</i> Bergquist & Fromont, 1988	Alternate representation: subgenus assignment
<i>Tedania connectens</i> (Brøndsted, 1924)	<i>Tedania (Tedania) connectens</i> (Brøndsted, 1924)	Alternate representation: subgenus assignment
<i>Tedania diversirhaphidiophora</i> Brøndsted, 1924	<i>Tedania (Tedania) diversirhaphidiophora</i> Brøndsted, 1924	Alternate representation: subgenus assignment
<i>Tedania purpurescens</i> Bergquist & Fromont, 1988	<i>Tedania (Tedania) purpurescens</i> Bergquist & Fromont, 1988	Alternate representation: subgenus assignment
<i>Tedania spinostylota</i> Bergquist & Fromont, 1988	<i>Tedania (Tedania) spinostylota</i> Bergquist & Fromont, 1988	Alternate representation: subgenus assignment
<i>Tedaniopsis turbinata</i> Dendy, 1924	<i>Tedania (Tedaniopsis) turbinata</i> Dendy, 1924	Alternate representation: subgenus assignment
<i>Tentorium</i> n. sp. 1 Kelly unpubl. 2003	<i>Tentorium</i> sp. 01 (NIWA 32034, Hikurangi Plateau)	Accessioned in NIC under OTU for further work
<i>Tentorium semisuberites</i> (Schmidt, 1870)	<i>Tentorium</i> sp. 04 (NIWA 53783, Chatham Rise)	Considered inaccurate in WPD because the species was originally described from the West Greenland shelf and the currently accepted distribution is the Northern Atlantic and Southern Ocean. New Zealand specimens are now known under an operational name until described.
<i>Tetilla australis</i> Bergquist, 1968	<i>Tetilla australis</i> Bergquist, 1968	Species name updated to genus name gender
<i>Tetilla leptoderma</i> Sollas, 1886	<i>Antarctotetilla leptoderma</i> (Sollas, 1886)	Carella <i>et al.</i> (2016)
<i>Thrinacophora</i> n. sp. 1 K&W in Cryer <i>et al.</i> 2000	<i>Raspailia (Thrinacophora)</i> sp. 01 (NIWA 51470, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Thrinacophora</i> n. sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Raspailia (Thrinacophora)</i> sp. 02 (NIWA 52372, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Thrombus</i> cf. <i>abyssi</i> (Carter, 1873)	<i>Thrombus</i> sp. 01 (NIWA 43407, West Cavalli Smt)	Accessioned in NIC under OTU for further work
<i>Thymosia</i> n. sp. Bergquist & Kelly MS	<i>Thymosia</i> sp. 01 (NIWA 101677, Kaikoura)	Accessioned in NIC under OTU for further work
<i>Toxadocia toxophorus</i> (Hentschel, 1912)	<i>Haliclona (Gellius) toxophora</i> (Hentschel, 1912)	Alternate representation
<i>Trichostemma irregularis</i> Ridley & Dendy, 1886	<i>Radiella irregularis</i> (Ridley & Dendy, 1886)	Alternate representation
<i>Tylexocladius villosus</i> Kelly-Borges & Bergquist, 1997	<i>Atergia villosa</i> (Kelly-Borges & Bergquist, 1997)	Alternate representation
<i>Xestospongia</i> 1 K&W in Cryer <i>et al.</i> 2000	<i>Petrosia hebe</i> Lendenfeld, 1888 <i>sensu</i> Bergquist & Warne (1980)	Accessioned in NIC under OTU for further work
<i>Xestospongia</i> sp. 2 K&W in Cryer <i>et al.</i> 2000	<i>Xestospongia</i> sp. 10 (NIWA 51448, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Xestospongia</i> sp. 3 K&W in Cryer <i>et al.</i> 2000	<i>Xestospongia</i> sp. 11 (NIWA 51456, Spirits Bay)	Accessioned in NIC under OTU for further work
<i>Zyzyza massalis</i> (Dendy, 1922)	<i>Zyzyza fuliginosa</i> (Carter, 1879)	Alternate representation: synonymy

Table 4.4. Fossil Porifera species cited in Kelly *et al.* (2009) that have been revised taxonomically, had their spelling updated, or had nomenclatural changes and updates.

Taxon name as cited in Kelly <i>et al.</i> (2009)	Revised name in checklist	Comment & reference for name change
<i>Callipelta punctata</i> Lévi & Lévi, 1983	<i>Sollasipelta cf. punctata</i> (Lévi & Lévi, 1983) <i>in Kelly & Buckeridge (2005)</i>	(1) Genus name change, and (2) Application of an extant species name to a fossil species represented by solitary spicules only, <i>in Kelly & Buckeridge (2005)</i>
<i>Costifer wilsoni</i> Lévi, 1994	<i>Costifer cf. wilsoni</i> Lévi, 1993 <i>in Kelly & Buckeridge (2005)</i>	Taxonomic authority cited incorrectly as Lévi (1994)
<i>Discodermia</i> sp. indet. [as <i>D. sinuosa</i> Carter] Hinde & Holmes, 1892	<i>Discodermia</i> sp. 'sinuosa' Carter, 1881 <i>in Hinde & Holmes (1892)</i>	We agree with Kelly <i>et al.</i> (2009) that the species is not comparable to a species from South India and Sri Lanka; citation change.
<i>Farrea occa</i> Bowerbank, 1862	<i>Farrea cf. occa</i> Bowerbank, 1862 <i>in Kelly & Buckeridge (2005)</i>	Application of an extant species name to a fossil species represented by solitary spicules only, <i>in Kelly & Buckeridge (2005)</i>
Gen. et sp. indet.	Calcarea gen. et sp. indet.	Updated representation (included class name)
Gen. et sp. indet.	Geodiidae gen. et sp. indet.	Reference updated to Rich (1958), was 1952 <i>in Kelly et al. (2009)</i> , updated representation (included family name)
Gen. et sp. indet.	Phymatellidae gen. et sp. indet.	Updated representation (included family name)
Gen. et sp. indet.	Scleritodermidae gen. et sp. indet.	Updated representation (included family name)
Gen. et spp. indet.	Geodiidae gen. et spp. indet.	Updated representation (included family name)
<i>Hamacantha</i> sp. indet. (as <i>H. johnsoni</i> Bowerbank, 1882)	<i>Hamacantha</i> sp. indet. <i>of Hinde & Holmes (1892)</i>	<i>Hamacantha</i> (<i>H.</i>) <i>johnsoni</i> (Bowerbank, 1864) is a North Atlantic-Mediterranean species. Year was incorrect as 1882 in Kelly <i>et al.</i> (2009).
<i>Homophymia stipitata</i> Kelly, 2000	<i>Homophymia cf. stipitata</i> Kelly, 2000 <i>in Kelly & Buckeridge (2005)</i>	Application of an extant species name to a fossil species represented by solitary spicules only, <i>in Kelly & Buckeridge (2005)</i>
<i>Latrunculia oamaruensis</i> Hinde & Holmes, 1892	<i>Latrunpagoda oamaruensis</i> (Hinde & Holmes, 1892)	Transferred to the new genus <i>Latrunpagoda</i> Kelly & Sim-Smith, 2022
<i>Macandrewia spinifoliata</i> Lévi & Lévi, 1983	<i>Macandrewia cf. spinifoliata</i> Lévi & Lévi, 1983 <i>in Kelly & Buckeridge (2005)</i>	Application of an extant species name to a fossil species represented by solitary spicules only, <i>in Kelly & Buckeridge (2005)</i>
<i>Penares micraster</i> Lévi, 1994	<i>Penares cf. micraster</i> Lévi, 1993 <i>in Kelly & Buckeridge (2005)</i>	Taxonomic authority cited incorrectly as Lévi (1994)
<i>Penares</i> n. sp. cf. <i>P. palmatooclada</i> Lévi, 1994	<i>Penares</i> sp. nov. cf. <i>palmatooclada</i> Lévi, 1993 <i>in Kelly & Buckeridge (2005)</i>	Taxonomic authority cited incorrectly as Lévi (1994)
<i>Penares palmatooclada</i> Lévi, 1994	<i>Penares cf. palmatooclada</i> Lévi, 1993 <i>in Kelly & Buckeridge (2005)</i>	Taxonomic authority cited incorrectly as Lévi (1994)
<i>Plakina australis</i> Hinde & Holmes, 1892	<i>Plakina</i> sp. 'australis' <i>of Hinde & Holmes (1892)</i>	
<i>Pleroma aotea</i> Kelly, 2003 <i>in Kelly & Buckeridge (2005)</i>	<i>Pleroma aotea</i> Kelly, 2003 <i>in Kelly & Buckeridge (2005)</i>	Application of an extant species name to a fossil species represented by solitary spicules only, <i>in Kelly & Buckeridge (2005)</i>
<i>Psilocalyx wilsoni</i> Ijima, 1927 <i>in Kelly & Buckeridge (2005)</i>	<i>Psilocalyx cf. wilsoni</i> Ijima, 1927 <i>in Kelly & Buckeridge (2005)</i>	Application of an extant species name to a fossil species represented by solitary spicules only, <i>in Kelly & Buckeridge (2005)</i>
<i>Thoosa hancocki</i> Hinde & Holmes, 1892	<i>Thoosa</i> sp. 'hancocki' <i>of Hinde & Holmes (1892)</i>	<i>Thoosa hancocki</i> and <i>Thoosa</i> (= <i>Cliothosa</i>) <i>hancocki</i> (Topsent, 1888), from the Mediterranean, are different nominal taxa and secondary homonyms; there are no differences in nomenclatural issues between extant and fossil taxa (ICZN art. 1.2.1), and the junior is invalid (ICZN 57.3) and needs to be renamed.
' <i>Vetulina</i> ' <i>oamaruensis</i> Hinde & Holmes, 1892	<i>Crambe oamaruensis</i> (Hinde & Holmes, 1892)	The similarity of the spicule illustrated in Hinde & Holmes (1892) to those in genus <i>Crambe</i> was first noted by Kelly <i>et al.</i> (2003: 137), then formally transferred by Esteves <i>et al.</i> (2007).
<i>Walteria leuckarti</i> Ijima, 1896	<i>Walteria cf. leuckarti</i> Ijima, 1896 <i>in Kelly & Buckeridge (2005)</i>	Application of an extant species name to a fossil species represented by solitary spicules only, <i>in Kelly & Buckeridge (2005)</i>

Battershill, 2020 and *D. teawanui* Kelly, Mc Cormack & Battershill, 2020 (Fig. 4.1A). This work strongly emphasised the use of *in situ* colour, morphology, and skeletal histology to differentiate these commonly recorded species.

Another group that has received considerable attention in the last two decades, due to the abundance of genera and species around the New Zealand region, is the carnivorous sponges (Family Cladorhizidae), many of which display an unexpected diversity, surprisingly odd spicules, and disjunct distributions. Vacelet *et al.* (2009) described two new species of *Chondrocladia* from the New Zealand and Tasman Sea region and established subgenus *Meliiderma* for the possession of trochirhabd spicules. These unique spicules are similar to spicules known from fossil strata of the Early Jurassic, suggesting that Cladorhizidae were already present in

the Mesozoic. In 2011, *Cercicladia* was established for the species *australis*, known only from the Macquarie Ridge to the south of New Zealand and from the southwest Argentine margin of Patagonia. This species possesses a unique and unprecedented spicule form, the cercicela, which resembles a shuttle (Ríos *et al.* 2011). Kelly and Vacelet (2011) went on to describe three new carnivorous sponges, each remarkable for the 'exceptions to the rule' (possessing forms of spicules considered to be highly unusual and unexpected) that they represented (*Abyssocladia carcharias* Kelly & Vacelet, 2011; *Asbestopluma* (*Asbestopluma*) *anisoplacochela* Kelly & Vacelet, 2011; and *Asbestopluma* (*Asbestopluma*) *desmophora* Kelly & Vacelet, 2011). Two new genera (*Australocladia* and *Patriciacladia*) closely related to genus *Abyssocladia* were established in 2023, with the description of seven new species (Kelly *et al.*

Table 4.5. Extant Porifera species that were not cited in Kelly *et al.* (2009), because they were in synonymy with other taxa at the time but are now considered valid for the New Zealand record.

Previously synonymised in Kelly <i>et al.</i> (2009)	Taxon name now in checklist	Comment & reference
<i>Guitarra fimbriata</i> Carter, 1874	<i>Guitarra bipocillifera</i> Brøndsted, 1924	<i>Guitarra fimbriata</i> is here deleted from the NZ record (Table 4.2) and <i>G. bipocillifera</i> is considered to be a valid species by WPD editors.
<i>Haliclona heterofibrosa</i> (Lundbeck, 1902)	<i>Haliclona glabra</i> Bergquist, 1961 <i>Haliclona isodictyalis</i> Bergquist, 1961	Bergquist & Warne (1980) considered <i>Haliclona glabra</i> and <i>H. isodictyalis</i> synonymous with <i>Haliclona heterofibrosa</i> (Lundbeck, 1902), a species described originally from Iceland, and currently restricted to the Northeastern Atlantic and Arctic Oceans. WPD does not accept this synonymy. Future collections and redescription may clarify the integrity of these two species (Kelly & Rowden 2019).
<i>Iophon proximum</i> (Ridley, 1881)	<i>Iophon semispinosum</i> Bergquist, 1961	<i>Iophon semispinosus</i> Bergquist, 1961 was synonymised with <i>Iophon proximum</i> in Bergquist and Fromont (1988). It is considered to be a valid species in WPD.
<i>Myxilla (Ectomyxilla) kerguelensis</i> (Hentschel, 1914)	<i>Myxilla (Ectomyxilla) tornotata</i> Brøndsted, 1924	<i>Myxilla (Ectomyxilla) tornotata</i> Brøndsted, 1924 was synonymised with <i>Myxilla (Ectomyxilla) kerguelensis</i> (Hentschel, 1914) in Bergquist & Fromont (1988). It is now considered to be a valid species in WPD.
<i>Hymeniacidon novaezealandiae</i> Brøndsted, 1924	<i>Reniochalina novaezealandiae</i> (Brøndsted, 1924)	Bergquist (1970) considered Brøndsted's (1924b) specimens of <i>Hymeniacidon novaezealandiae</i> to be the same as <i>Ciocalyptra penicillatus</i> Bowerbank, 1862. <i>Hymeniacidon novaezealandiae</i> is now accepted as <i>Reniochalina novaezealandiae</i> (Brøndsted, 1924), which is only present in NZ.

2023). New Zealand carnivorous sponges were featured in two important global reviews of the Cladorhizidae, the first on the global diversity of sponges (Van Soest *et al.* 2012), and the second on the molecular phylogeny of the group (Hestetun *et al.* 2016).

Numerous genus records have been added to the New Zealand fauna since Kelly *et al.* (2009), including *Phlyctaenopora* (*P. spina* Kelly, 2021) and *Suberea* (*S. meandrina* Kelly, 2015) (Fig. 4.1B), both with their closest relatives around Australia and New Caledonia, and *Janulum* (*J. imago* Kelly & Van Soest, 2015; *J. princeps* Kelly & Van Soest, 2015) and the hexactinellid genus *Atlantisella* (*A. lorraineae* Reiswig & Kelly, 2017), hitherto known only from the Atlantic Ocean. Reiswig & Kelly (2011, 2018) monographs account for over 10 (hexactinellid) genus records for New Zealand.

Endemism. Kelly *et al.* (2009) cited only three sponge genera as endemic: *Lamellomorpha*, *Lepidothenea*, and *Acanthoclada*. Since the year 2000, one endemic family has been established (Stupendiidae), and 11 more endemic genera have been added (five genera within class Demospongiae (*Awhiowhio*, *Australocladia*, *Patriciacladia*, *Diplopodospongia*, *Stupenda*), four genera within class Hexactinellida (*Amphoreus*, *Plumicoma*, *Trychella*, *Nubes*) and two genera within class Calcarea (*Lamontia*, *Sycute*).

Non-indigenous species. Kelly *et al.* (2009) considered the majority of New Zealand sponge species to be endemic and stated that about 10 non-indigenous species had been identified along with many more cryptogenic species. Over the last 20 years, several Ministry for Primary Industry initiatives have supported the collection and monitoring of marine biota, specifically from vessels and artificial surfaces in New Zealand's ports and harbours, to gain a better understanding of the status of non-indigenous species in our waters. Of the nearly 250 species that are found in New Zealand's ports and harbours, we consider 73 to be native species, 20 to be non-indigenous species (NI in Table 4.6), 21 to be species previously recorded from New Zealand whose identity as either native or non-indigenous is ambiguous (cryptogenic 1 species; C1 in

Table 4.6), and 136 to be species that have been recently discovered for which there is insufficient systematic or biogeographic information to determine whether New Zealand lies within their native range (cryptogenic 2 species; C2).

Many of the 41 species currently considered to be non-indigenous (22 NI species in Table 4.6) and cryptogenic species (19 C1 species in Table 4.6), are from South Australia, but some are more widely distributed around Japan, the Mediterranean, and the Atlantic Ocean. The purported South Australia-New Zealand distributions may represent either historical introductions from the 1800s, or native species shared by both countries—unambiguous evidence for sponge species found in either of these origins is not yet fully established. Many of these species are difficult to differentiate from their conspecifics due to a lack of diagnostic characters (Kelly *et al.* 2009; Kelly & Rowden 2019); thus molecular comparison of New Zealand and Australian material, and assessments of their relationships to type specimens are required to answer these important questions. Until all specimen records are validated by morphological or molecular studies, these species records remain uncertain for the New Zealand EEZ.

There are, however, 20 species that are clearly non-indigenous (NI in Table 4.6) because they occur elsewhere, or they are single species records for the genus, or are only found in a few New Zealand ports. Some of the more well-known examples are the demosponges *Halisastra dujardini* Johnston, 1842; *Chondropsis kirkii* Carter, 1881; *Cliona celata* Grant, 1826; and *Chelonaplysilla violacea* (Lendenfeld, 1883). Many of the Calcarea listed in Kelly *et al.* (2009), and retained in the checklist, are historical records and need revision. This represents a difficult challenge that will require special attention.

Ecological importance & biological associations. Kelly *et al.* (2009) highlighted the importance of sponges as components of marine faunal assemblages. The last two decades have seen a considerable advancement in our understanding of just how dominant sponges

Table 4.6. Uncertain extant Porifera species in the New Zealand record. Many New Zealand records listed in Dawson (1993) and subsequently in Kelly *et al.* (2009) have led to potentially inaccurate distribution records in the WPD. Definitions for the biosecurity status of non-indigenous biota are derived from Seaward *et al.* (2015: Table 1), which is based on the criteria established by Chapman and Carlton (1994): E = endemic species; N = native species; NI = non-indigenous species; C1 = cryptogenic 1 species.

Taxon name as cited in Kelly <i>et al.</i> (2009)	Revised name in checklist	Type locality	Status	Currently accepted distribution (WPD) and comments
<i>Adocia scyphanooides</i> (Lamarck, 1816)	<i>Haliclona scyphanooides</i> (<i>sensu</i> Ridley, 1884) <i>sensu</i> Brøndsted (1924)	Torres Strait, Australia	C1	Brøndsted (1924b) identified a specimen from New Plymouth as “ <i>Reniera scyphanooides</i> Lamarck”. This publication was the source of the further misspelling of Ridley (1884’s first misspelling of Lamarck (1814 [1813])’s <i>Spongia siphonoides</i> [Ridley (1884) misspelled his Torres Strait species as <i>Reniera scyphanooides</i>]. Brøndsted (1924b) further misspelled his New Plymouth, NZ, specimen as <i>R. scyphanooides</i> . Bergquist and Warne (1980) transferred <i>Reniera scyphanooides</i> to <i>Adocia</i> , based on Brøndsted’s “clear reference to a dermal skeleton” in the specimen. Dawson (1993) and Kelly <i>et al.</i> (2009) promulgated the misspelling of the species name, and indeed, the date of 1816. It is highly unlikely that the NZ record in WPD is accurate, as Chalinidae are notoriously difficult to identify without examination of the specimen. Brøndsted (1924b)’s New Plymouth specimen potentially represents a valid species and awaits further morphological and molecular studies to confirm conspecificity or otherwise. The name in Kelly <i>et al.</i> (2009) is incorrect. The revised name in the checklist recognises and reflects this uncertainty.
<i>Amphilectus fucorum</i> per, 1794	<i>Amphilectus fucorum</i> (Esper, 1794) <i>sensu</i> Bergquist & Fromont (1988) and Dendy (1924)	European waters	NI	Bergquist & Fromont (1988) noted the similarity of microscleres in specimens from NZ (Es- and Plymouth, England, and indeed they are very similar. The species is not common in NZ and was first recorded by Dendy (1924) from the Three Kings Islands, growing in the same manner (in smallish fragments on kelp and on algae) to Northern Hemisphere specimens.
<i>Callyspongia diffusa</i> (Ridley, 1884)	<i>Callyspongia diffusa</i> (Ridley, 1884) <i>sensu</i> Bergquist & Warne (1980)	Singapore	C1	The type species was recorded from Singapore, and it is a relatively well-known Indo-Pacific species. Bergquist & Warne (1980) applied this species name because of certain characters that are exemplified in both species; however, this is regarded as coincidental as many <i>Callyspongia</i> share similar characters. New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the currently accepted distribution is the Northern Atlantic and Western Indian Ocean. Bergquist & Warne (1980’s specimens from Northland beaches, Kaikoura, and Portobello potentially represent a valid species and await further morphological and molecular studies to confirm conspecificity or otherwise.
<i>Callyspongia robusta</i> (Ridley, 1884)	<i>Callyspongia robusta</i> (Ridley, 1884) <i>sensu</i> Bergquist & Warne (1980)	Port Jackson, Australia	C1	Ridley (1884) first described this sponge from Port Jackson, Australia. The unusual characteristic of this species is that the toxas are embedded in the spongin at the interstices and as Bergquist noted, it is the same in the NZ specimens. All NZ specimens require a close comparison with the Australian type specimen.
<i>Chelonaplysilla cf. violacea</i> (Lendenfeld, 1883)	<i>Chelonaplysilla cf. violacea</i> (Lendenfeld, 1883) <i>sensu</i> Bergquist (1996)	Port Phillip Heads, South Australia	NI	This species is found throughout NZ and is very similar to tropical counterparts, except that the latter develop erect fronds and lamellae (Bergquist 1996). Diterpenoid chemistry is remarkably similar. Since this is the only species of <i>Chelonaplysilla</i> recorded from NZ, this species is likely to be adventive.
<i>Chondropsis kirkii</i> Carter, 1881	<i>Chondropsis kirkii</i> Carter, 1881 <i>sensu</i> Bergquist & Fromont (1988)	Port Phillip Heads, South Australia	NI	The holotype was not examined by Bergquist & Fromont (1988) and the authors relied upon the Dendy (1924) paper that identified this sponge with the Indian Ocean holotype. Recent description (Buckeridge per. comm.) of South Australian specimens indicate that they are very similar morphologically with their glassy surface and white-rimmed oscules.
<i>Chondropsis topsenti</i> Dendy, 1895	<i>Chondropsis topsenti</i> Dendy, 1895 <i>sensu</i> Bergquist & Fromont, 1988	Port Jackson, Australia	NI	Bergquist & Fromont (1988) considered the NZ specimens to be conspecific with the species from Port Phillip, Victoria. Species of <i>Chondropsis</i> are notoriously difficult to differentiate unless there are key field characters (see <i>C. kirkii</i>), or the absence of a spicule type (in this case, the sigmas).
<i>Ciocalypta penicillus</i> Bowerbank, 1864	<i>Ciocalypta cf. penicillus</i> Bowerbank, 1864 <i>sensu</i> Bergquist (1970)	Hastings, South of England	NI	Bergquist (1970) considered Brøndsted’s (1924b) specimens (of <i>Axinella colvilli</i> and <i>Hymeniacidon novaezealandiae</i>) and Hauraki Gulf sponges to be the same as the Australian and Northern Hemisphere sponges, and indeed, they are very similar. Although species of <i>Ciocalypta</i> (and most halichondrid genera) have few diagnostic characters that can be used to differentiate species, there are very few other halichondrid species in the NZ region, suggesting that they may indeed be historical introductions. <i>Axinella colvilli</i> is now accepted as <i>Ciocalypta tyleri</i> Bowerbank, 1873, which is a widespread species. However, <i>H. novaezelandiae</i> is now accepted as <i>Reniochalina novaezealandiae</i> (Brøndsted, 1924), which is only present in NZ.
<i>Ciocalypta polymastia</i> (Lendenfeld, 1888)	<i>Ciocalypta cf. polymastia</i> (Lendenfeld, 1888) <i>sensu</i> Bergquist (1970)	Port Phillip Heads, South Australia	NI	Bergquist (1970) considered the material originally described by Lendenfeld (1888) and subsequently by Hallman (1914) from the eastern coast of Australia to be very similar in all details.
<i>Clathrina cf. procumbens</i> (Lendenfeld, 1885)	<i>Clathrina cf. procumbens</i> (Lendenfeld, 1885)	Port Phillip Bay, South Australia	NI	A specimen was identified from the Viaduct, Waitematā Harbour, in May 2021, as <i>Clathrina cf. procumbens</i> , in routine surveillance for adventive species.
<i>Cliona celata</i> Grant, 1926	<i>Cliona cf. celata</i> Grant, 1826 <i>sensu</i> Bergquist (1968)	North Atlantic	NI	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD; however, the NZ specimens are very similar to this predominantly Atlantic species (Bergquist 1968); further morphological and molecular studies are required to confirm conspecificity. Authority year was incorrectly listed as 1926 in Kelly <i>et al.</i> (2009).
<i>Cliona euryphylla</i> Topsent, 1887	<i>Cliona cf. euryphylla</i> Topsent, 1888 <i>sensu</i> Bergquist (1961)	Gulf of Mexico	C1	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species’ currently accepted distribution is the Gulf of Mexico. However, Bergquist (1968’s) specimens potentially represent a valid species and await further morphological and molecular studies to confirm conspecificity or otherwise. Authority year was incorrectly listed as 1887 in Kelly <i>et al.</i> (2009).
<i>Cliona muscoidea</i> Hancock, 1849	<i>Pione cf. muscoidea</i> (Hancock, 1849) <i>sensu</i> Bergquist (1961)	Unknown	C1	Bergquist (1961a’s) specimen from Spirit Bay, Northland, potentially represents a valid species and awaits further morphological and molecular studies to confirm conspecificity or otherwise.
<i>Crella incrassata</i> (Carter, 1885)	<i>Crella incrassata</i> (Carter, 1885)	East coast of Australia	NI	This species is extremely common in NZ waters. This sponge was originally described as <i>Anchinia novaezelandiae</i> Dendy, 1924, from North Cape, 26–55 m water depth. Hallman (1914) transferred this to the “cosmopolitan species” <i>Crella incrassata</i> (Carter, 1885), first described from Port Phillip Heads in South Australia. Although Bergquist & Fromont (1988) concurred with Hallman’s move, it is difficult to imagine that Dendy would have not recognised their conspecificity if the North Cape specimens were the same as the south Australian species; Dendy was highly reputable and would have had access to literature and type specimens from the BMNH for comparison with the NZ material. However, the abundance and widespread nature of this sponge in NZ does suggest that it might be adventive, and an analysis of Carter’s original 1885 description indicates that the NZ specimens are indeed very similar (morphologically and in terms of spicule complement and measurements) to the type description from Port Phillip. Furthermore, that this might be a historical introduction from South Australia is not unprecedented.
<i>Darwinella cf. gardineri</i> (Topsent, 1905)	<i>Darwinella cf. gardineri</i> (Topsent, 1905) <i>sensu</i> Bergquist (1996) (rust red with spongin triacts)	Maldives	C1	This species is common from shallow water to 20 m water depth on rocky coasts of NZ, from North Cape to Stewart Island, and was well re-described by Bergquist (1996). The type location of the species is the Maldives in the Western Indian Ocean. We consider the disjunct distribution to be doubtful, and that the NZ specimens probably represent an endemic species.
<i>Dendya clathrata</i> Carter, 1883	<i>Dendya clathrata</i> Carter, 1883	Port Phillip Heads, South Australia	NI	This species has highly diagnostic spicules (beautiful plump tripods) that are easy to recognise.

(continued opposite)

Table 4.6. (continued)

Taxon name as cited in Kelly et al. (2009)	Revised name in checklist	Type locality	Status	Currently accepted distribution (WPD) and comments
<i>Grantessa intusarticulata</i> (Carter, 1886)	<i>Grantessa intusarticulata</i> (Carter, 1886)	Port Phillip Heads, South Australia	NI	First described from Port Phillip Heads, Victoria. The sponge is quite distinctive and has been recorded in Stewart Island and Lyall Bay.
<i>Halichondria panicea</i> (Pallas, 1776)	<i>Halichondria panicea</i> (Pallas, 1766) <i>sensu</i> Bergquist (1970)	English coast	NI	Bergquist (1970) identified this common intertidal species as <i>Halichondria panicea</i> (Pallas, 1766), a species common along the coasts of the UK, Europe, and North America. Species of <i>Halichondria</i> have few diagnostic characters that can be used to differentiate species, and there are very few other halichondrid species in the NZ region. However, where they do occur, they are quite common, suggesting that they may indeed be historical introductions. Although the non-indigenous nature of this sponge is questionable, it is currently accepted as a non-indigenous species until direct comparison of NZ material with holotypes and specimens from different countries can be completed.
<i>Haliclona cinerea</i> (Grant, 1826)	<i>Haliclona (Reniera) cinerea</i> (Grant, 1826) <i>sensu</i> Brøndsted (1924) & Bergquist & Warne (1980)	Celtic Seas	C1	New Zealand records listed in Dawson (1993) are inaccurate in WPD because the species was first described from the Celtic Sea and the currently accepted distribution is the Northeastern Atlantic. Brøndsted (1924a)'s specimens from isolated Auckland Island (Subantarctic NZ) and Stewart Island, potentially represent a valid species. Future collections may assist the redescription and potential renaming of this species (Kelly & Rowden 2019: Table 2).
<i>Haliclona clathrata</i> (Dendy, 1895)	<i>Haliclona (Reniera) clathrata</i> (Dendy, 1895) <i>sensu</i> Brøndsted (1924) & Bergquist & Warne (1980)	Port Phillip Heads, South Australia	C1	Kelly & Rowden (2019: Table 2) suggested that, because of the huge latitudinal range of this species (South Australia, Subantarctic NZ), and the wide variation in spicule dimensions, the species is either an adventive from South Australia, or more likely, a "mix of species that might be resolved by examination of the original and fresh material in comparison with the South Australian holotype."
<i>Haliclona implexa</i> (Schmidt, 1868)	<i>Haliclona (Soestella) implexa</i> (Schmidt, 1868) <i>sensu</i> Bergquist & Warne (1980)	Adriatic Sea	C1	Kelly & Rowden (2019: Table 2) noted that Brøndsted (1924a) "used the species name <i>implexa</i> (named as <i>Reniera implexa</i>) for convenience, in anticipation of a review of the genus <i>Reniera</i> ." <i>Reniera implexa</i> is now accepted as <i>Haliclona (Soestella) implexa</i> and is reserved for Northern Atlantic and Mediterranean sponges according to WPD. Future collections may assist the redescription and potential renaming of the NZ specimens (Kelly & Rowden 2019).
<i>Halisarca dujardini</i> Johnston, 1842	<i>Halisarca dujardini</i> Johnston, 1842 <i>sensu</i> Bergquist (1996)	North Sea	NI	Bergquist (1996) considered <i>Halisarca dujardini</i> to be truly cosmopolitan and confirms the identity of this species of sponge in NZ by sophisticated histological techniques.
<i>Hymeniacidon perleve</i> (Montagu)	<i>Hymeniacidon cf. perlevis</i> (Montagu, 1814) <i>sensu</i> Bergquist (1970)	European waters	NI	Bergquist (1970) stated that this is a common intertidal sponge in northern NZ, found in sheltered or moderately exposed habitats. Like other halichondrid genera, species of <i>Hymeniacidon</i> have few diagnostic characters that can be used to differentiate species, and there are very few other halichondrid species in the NZ region. However, where they do occur, they are quite common, suggesting that they may indeed be historical introductions. Although the adventive nature of this sponge is questionable, it is currently accepted as a non-indigenous species until a direct comparison of NZ material with holotypes and specimens from different countries can be completed.
<i>Leucandra compacta</i> (Carter, 1886)	<i>Leucandra compacta</i> (Carter, 1886)	Port Phillip Heads, South Australia	NI	First described from Port Phillip Heads, South Australia. The sponge is quite distinctive as it is a small solid globe that is usually attached to algae or other living structures. The spiculation is close enough to the NZ material to accept that this may be a non-indigenous species.
<i>Leucosolenia proxima</i> Dendy, 1891	<i>Clathrina loculosa</i> (Haeckel, 1870) [= <i>L. proxima</i> <i>sensu</i> Kirk, (1896)]	Port Phillip Heads, South Australia	NI	First described from Port Phillip Heads, South Australia by Dendy (1891). Recently collected in Auckland's Viaduct Harbour. The specimens are remarkably similar morphologically. Kirk (1896) identified some Cook Strait sponges as <i>Leucosolenia proxima</i> Dendy, 1891, but Kirk's species has been synonymised with <i>Clathrina osculum</i> Carter, 1886) from Port Phillip Heads.
<i>Mycale (Carmia) macilenta</i> (Bowerbank, 1866)	<i>Mycale (Carmia) macilenta</i> (Bowerbank, 1866) <i>sensu</i> Bergquist & Fromont (1988)	Port Phillip Heads, South Australia	C1	New Zealand records listed in Dawson (1993) are potentially inaccurate in WPD because the species currently accepted distribution is the Northern Atlantic and Western Indian Ocean. Bergquist & Fromont (1988)'s specimens from both sides of the Auckland isthmus potentially represent a valid species and await further morphological and molecular studies to confirm conspecificity or otherwise.
<i>Mycale (Oxymycale) stecarmia</i> (de Laubenfels, 1954)	<i>Mycale (Oxymycale) stecarmia</i> (de Laubenfels, 1954)	Port Phillip Heads, South Australia	NI	Several specimens of this very unusual species were discovered on oyster shells in Northland's Port Whangarei. The subgenus had not been recorded in NZ prior to this discovery, and globally, there are only four species known, from the Arctic, South Korea, Jamaica, and Micronesia. Despite minor spicule differences, this is a recent introduction, with poor establishment.
<i>Paraheteroplia ijimai</i> (Hōzawa, 1916)	<i>Paraheteroplia ijimai</i> (Hōzawa, 1916)	Doketsba, Sagami Sea	NI	The two, wrinkled, leech-shaped sponges (slim, flask-shaped body with a thinner and slightly flaring lip) are remarkably like the sponge first described from Japan; nothing remotely similar has ever been recorded from NZ waters. Despite minor spicule differences, this is a recent introduction, with poor establishment.
<i>Plakina monolopha</i> Schulze, 1880	<i>Plakina monolopha</i> Schulze, 1880 <i>sensu</i> Bergquist (1968)	Atlantic coast of France	CI	<i>Plakina monolopha</i> is distributed widely throughout the Western Mediterranean. Homosclerophoridae are rare in NZ and are currently under review; NZ specimens are likely to be a new species.
<i>Plakina trilopha</i>	<i>Plakina trilopha</i> Schulze, 1880 <i>sensu</i> Bergquist (1968)	Mediterranean	CI	<i>Plakina trilopha</i> is distributed widely throughout the Western Mediterranean. NZ records are considered to be inaccurate in WPD. Homosclerophorid sponges are rare in NZ and currently under review; NZ specimens are likely to be a new species.
<i>Polymastia conigera</i> Bowerbank, 1874	<i>Polymastia conigera</i> Bowerbank, 1874 <i>sensu</i> Bergquist (1968)	Sydney, Australia	CI	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the currently accepted distribution is the Northern Atlantic. Bergquist's (1968) specimens from the Three Kings Islands potentially represent a valid species and await further morphological and molecular studies to confirm conspecificity or otherwise.
<i>Psammoclema crassum</i> (Carter, 1885)	<i>Holopsamma</i> cf. <i>crassa</i> (Carter, 1885) <i>sensu</i> Bergquist & Fromont, 1988	Wollongong, NSW, Australia	CI	A very difficult identification because the sponge only contains sand grains. There were about 6 species of this genus identified from Port Phillip Heads by Carter (1885) and there have been no species of <i>Psammoclema</i> described from NZ to this day. The genus is Southern Ocean in distribution, so could very well be another adventive.
<i>Pseudosuberites sulcatus</i> (Thiele, 1905)	<i>Pseudosuberites sulcatus</i> (Thiele, 1905) <i>sensu</i> Bergquist (1968)	Cabo de Espíritu Santo, Patagonian Shelf, South Atlantic	NI	Widespread in ports around both the North and South Islands. Kelly & Rowden (2019) found that there are no obvious differences between the specimens first described from waters off Cabo de Espíritu Santo on the Patagonian Shelf in the South Atlantic Ocean. The sponges were found to be abundant in the Viaduct Harbour.
<i>Raspailia agminata</i> Hallman 1914	<i>Raspailia (Clathriodendron) arbuscula</i> (Lendenfeld, 1888) <i>sensu</i> Bergquist (1970)	Port Phillip Heads, South Australia	C1	Known from Doubtful Sound, Stewart Island, and the Three Kings Islands to the north. The original Bergquist (1970) records are quite disparate: from the Chatham Rise in about 400 m and the shallow subtidal of the Hauraki Gulf. It is possible that the disparate northern and southern records are closely related species.
<i>Sigmadocia flagellifera</i> (Ridley & Dendy, 1886)	<i>Haliclona (Flagellia) flagellifera</i> Prince (Ridley & Dendy, 1886) Edward <i>sensu</i> Bergquist & Warne (1980) Island	South Africa	CI	Bergquist & Warne (1980)'s specimens from The Three Kings Islands potentially represent a valid species and await further morphological and molecular studies to confirm conspecificity or otherwise.
<i>Sigmadocia glacialis</i> (Ridley & Dendy, 1886)	<i>Haliclona (Gellius) cf. glacialis</i> Agulhas Bank, (Ridley & Dendy, 1886) <i>sensu</i> Bergquist & Warne (1980)	South Africa	CI	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from the Agulhas Bank and the currently accepted distribution is the Southern Oceans and Antarctica. Bergquist & Warne (1980)'s specimens from the Three Kings Islands potentially represent a valid species and await further morphological and molecular studies to confirm conspecificity or otherwise.
<i>Styliotella agminata</i> Ridley sensu Hallman (1914) by Brøndsted (1924)	<i>Hymeniacidon agminata</i> (sensu Hallman (1914) by Brøndsted (1924))	Port Jackson, South Australia	C1	This species is distinctive with a very unusual skeletal architecture and identical spicules to those described by Brøndsted (1924).

(continued overleaf)

Table 4.6. (continued)

Taxon name as cited in Kelly <i>et al.</i> (2009)	Revised name in checklist	Type locality	Status	Currently accepted distribution (WPD) and comments
<i>Tethya bergquistae</i> Hooper in Hooper & Wiedenmayer, 1994	<i>Tethya bergquistae</i> Hooper in Hooper & Wiedenmayer, 1994	Coromandel, New Zealand	C1	The common NZ pink golf-ball sponge, previously known by the South Australian species name, <i>Tethya ingalli</i> (Bowerbank, 1858), was incorrectly renamed <i>Tethya australis</i> , by Bergquist & Kelly-Borges (1991). Hooper (in Hooper & Wiedenmayer 1994) renamed <i>T. australis</i> , <i>T. bergquistae</i> , because ' <i>australis</i> ' was a junior secondary homonym of <i>Donatia lyncurium</i> var. <i>australis</i> (Kirk, 1911).
<i>Tethya multistella</i> Lendenfeld, 1888	<i>Tethya multistella</i> Lendenfeld, 1888 <i>sensu</i> Bergquist (1961)	Port Phillip Heads, South Australia	C1	Very similar to Bergquist's 1961 specimens and similar to the Australian descriptions.
<i>Toxadocia toxophorus</i> (Hentschel, 1912)	<i>Haliclona (Gellius) toxophora</i> (Hentschel, 1912) <i>sensu</i> Bergquist & Warne (1980)	Arafura Sea, Indonesia	C1	New Zealand records listed in Dawson (1993) are now considered to be inaccurate in WPD because the species was originally described from the Maluku Province, Indonesia and the currently accepted distribution is Indonesia and NZ. Bergquist & Warne (1980)'s specimens from Rangitoto Island potentially represent a valid species and await further morphological and molecular studies to confirm conspecificity or otherwise.
<i>Vosmaeropsis cf. macera</i> (Carter, 1886) <i>sensu</i> Barraclough Fell (1950)	<i>Vosmaeropsis cf. macera</i> (Carter, 1886) <i>sensu</i> Barraclough Fell (1950)	Port Phillip Heads, South	C1	Calcareous sponges are commonly found on ship hulls and are notorious invaders of quiet dark places, as they have active swimming larvae. Kirk recorded (unpublished but noted by Barraclough Fell) this species from Lyall Bay, Wellington, but the sponge was first described from Port Phillip Heads, Australia. The morphology and oxea size are characteristic of the species.

are in continental shelf, seamount, and abyssal faunas (Reiswig & Kelly 2011; Sim-Smith & Kelly 2015; Schupp *et al.* 2017; Reiswig & Kelly 2018) and hydrothermal vent faunas (Kelly & Rowden 2019), as well as their importance in the formation of biogenic habitats that support fisheries and other invertebrate populations (Morrison *et al.* 2014). A major review of the sponge fauna of the Kermadec Islands (Kelly *et al.* 2015a) provided 66 species records (~70% known, ~30% new to science) and provided insight into the relatively strong faunistic link to the broader Indo-Pacific.

Major gains in knowledge of New Zealand fossil Porifera

Edwards in Kelly *et al.* (2009) provided a comprehensive summary of the status of our knowledge of the fossil sponge fauna of New Zealand, covering the Paleozoic, Mesozoic, and Cenozoic time periods. At that time, most sponge fossils known were represented by microfossil spicules, the best known of which is the species-rich assemblage of the Late Eocene of Oamaru, North Otago (Hinde & Holmes 1892).

The first New Zealand Cenozoic sponge body fossils were described by Kelly *et al.* (2003) from Kakanui Point, North Otago, followed by Kelly and Buckeridge (2005) who described a series of exquisitely detailed glass sponge and lithistid frameworks from the Tutuiri Greensand of Chatham Island. Several of the species identified are deleted from the fossil record (Table 4.2) due to them having not been vetted by a hexactinellid specialist, rendering the identifications given to several fossils putative (Reiswig & Kelly 2011). Consoli *et al.* (2009) followed this with descriptions of five fully or partially identified glass sponge fossils from the Cretaceous-Paleogene Takatika Grit of the Chatham Islands. Some years later, in their revision of the farreid genus *Aspidoscopulina*, Tabachnick *et al.* (2011) stated that one of the (unidentified) fossils illustrated in the presentation of Buckeridge and Kelly (2006), during the 7th International Sponge Symposium in Búzios (Rio de Janeiro, Brazil), on late Paleocene-early Eocene deposits of the Chatham Island, was an “undoubted fossil representative of *Aspidoscopulina*”. Unfortunately,

we are none the wiser as to which fossil it was in the presentation.

In 2013, two new hexactinellid body fossils and an unidentified Corallistidae body fossil were described from the Red Bluff Tuff on Chatham Island (Buckeridge *et al.* 2013), and in 2014, Lee *et al.* (2014) identified sponges, purportedly of the genus *Cliona* (as represented by shell borings), and occasional siliceous spicules, in a “rich fauna” of mainly foraminifera infilling gastropods.

Perhaps the most significant progress has been made in the recognition of microfossil spicules illustrated by Hinde and Holmes (1892) from the Oamaru Diatomite. Kelly *et al.* (2016) and Sim-Smith *et al.* (2022) established eight new species within subgenus *Latrunculia (Uniannullata)* and transferred *Latrunculia oamaruensis* Hinde & Holmes, 1892 to the newly established latrunculid genus *Latrunpagoda*. Similarly, in their revision of genus *Janulum*, Kelly & Van Soest in Kelly *et al.* (2015b) named and described the highly unusual diagnostic spicule illustrated by Hinde & Holmes (1892: as *Plocamia?* sp., p. 186, pl. 7, fig. 51), as *Janulum princeps*, for the first record of the genus in New Zealand.

Kelly *et al.* (2003) and others listed in Esteves *et al.* (2007) considered the body spicules illustrated in Hinde & Holmes (1892: p. 240, pl. 13, figs 31–33) and identified by these authors as belonging to *Vetulina oamaruensis* Hinde & Holmes, 1892 to be rather, sphaeroclones of the genus *Crambe*, thus providing the oldest record of the genus globally. The species has been updated here in the checklist and Table 4.4.

Two older works on New Zealand fossil discoveries have been added to the record since Edward's review in Kelly *et al.* (2009), via illustrations of spicules that certainly represent fossil species of: 1) *Latrunculia* [*Latrunculia* sp. indet. Locker & Martini (1986: pl. 13, fig. 4), in Sim-Smith *et al.* (2022)] and *Diplopodospongia* sp. indet. in Locker & Martini (1986: pl. 13, fig. 5); 2) *Dactylocalyx cf. callodiscus* (Carter, 1871), illustrated in de Laubenfels (1953: p. 112, text fig. 6) from “Western Australia and New Zealand” and considered to be comparable to *Dactylocalyx callodiscus* (Carter, 1871: pl. IX, fig. 40) from the Northern Hemisphere.

Knowledge gaps, research progress and future priorities

While we have made excellent progress in the collection and identification of sponges in New Zealand waters, 53% of known species are not described and they are represented by Operational Taxonomic Unit (OTU) names only; one of our greatest needs is the acceptance of a methodology for rapid, concise, descriptions. We have made progress in the description of specific species, genera, and families in class Demospongiae (poecilosclerid families Latrunculiidae, Podospongidae, Cladorhizidae; tetractinellid families Ancorinidae, lithistids tetractinellids; orders Polymastiida and Tethyida). However, reviews of major orders well represented in New Zealand waters are yet to be carried out (Axinellida, Haplosclerida, Suberitida, and large parts of Tetractinellida and Poecilosclerida). Most of the latter have not been reviewed formally since they were first recognised in the 20th century, and many species have not been recollected. However, recent shallow-water coastal collections initiated by Fisheries New Zealand (FNZ) and carried out by NIWA fisheries staff, have begun to remedy this with the collection of several species easily recognisable as the same species that were described in the 1900s (e.g., Dendy 1924) and 1980s (e.g., Bergquist 1980).

We have also made considerable progress in the description of specific species, genera, and families in class Hexactinellida (Sceptrulophora, Lychniscosida, Lyssacinosida (Aulocalycidae, Euplectellidae, Rossellidae), but this work has been drastically reduced with the recent passing of Dr Henry Reiswig, our productive Canadian collaborator. Reiswig & Kelly's initial work on Rossellidae in the New Zealand region doubled our known extant rossellid diversity (Reiswig *et al.* 2021), and in addition to phylogenetic and chemodiversity work, Dohrmann *et al.* (2023) continued on to informally describe a species of *Lophocalyx*, and a new lanuginellinae genus and species. In addition to Rossellidae, Dohrmann *et al.* (2023) informally described species of *Hyalonema*, *Pheronema*, *Poliopogon* (Order Amphidiscosida), two species each of *Eurete* and *Farrea* (Order Sceptrulophora) and new subspecies of *Farrea occa*, new species of *Trychella* and *Corbitella* (Order Lyssacinosida, family Euplectellidae), *Aulocalyx* and *Rhabdodictyum* (Family Aulocalycidae), and *Chaunoplectella* and *Leucopsacus* (Family Leucopsacidae). It is anticipated that these taxa will be formally described in the next few years. Kelly & Reiswig have informally identified at least 11 rossellid species, four new amphidiscosidan species that remain undescribed, 14 rossellid species, and 11 amphidiscosidan species that need to be redescribed, which will provide new records for the New Zealand region.

While progress in the identification of calcareous species (Class Calcarea) has been good due to our work in collecting and monitoring New Zealand ports and

harbours, no new calcareous sponge taxon has been described due to a general lack of expertise in the group in New Zealand.

Regional studies. There is increasing interest from a diversity of stakeholders (e.g., iwi, Department of Conservation, Regional Councils) to understand more about the marine biota of specific regions of New Zealand. This interest is driven by the need to be able to better document existing biota, to monitor change, to report on status, and to facilitate stewardship of biodiversity. While there is currently no lack of regionally- and environmentally specific ecological studies in which sponges are identified with operational names, it is the taxonomic description of the sponge faunas that remains a challenge due to lack of time, funding, and expertise; for example, while a review of the sponge fauna of the Kermadec Islands resulted in a discovery of 20 new taxa, only one has been described.

Considering that New Zealand has only a single, professional sponge taxonomist (Kelly), and her assistant taxonomist (Sim-Smith), both working part-time on taxonomic projects, we consider that the current state of our knowledge of the Porifera of New Zealand is exceptionally good. We have spent the last 20 years compiling regional inventories from ecological and fisheries trawl surveys, carried our species identifications from vulnerable marine ecosystems such as seamounts, trenches, and abyssal plains, and described a new family, new genera, and many new species from all over New Zealand. The rate of discovery of new species is slowing despite continuing exploration. Furthermore, the outlook for future sponge taxonomic research in the New Zealand region is not good, as only a few students are currently interested in taxonomy, and the few additional trained taxonomists are employed overseas. The primary impediments for knowledge expansion are lack of training courses, and lack of funding for the training of additional taxonomists, particularly those with expertise in molecular research.

New opportunities, initiatives, and approaches to facilitate future research include prioritised involvement with international voyages to make use of expanded collection opportunities and seafloor imaging technology such as used on Remotely Operated Vehicles (ROV) and submersibles. There is also a critical need to provide the capability for accurate identifications of sponge biota based on images alone; the production of informal guides to species using simple deck and seafloor images, such as those found in the NIWA *Biodiversity Memoir* series (<https://niwa.co.nz/coasts-and-oceans/niwa-biodiversity-memoirs>) and the NIWA *Marvellous Marine Biota* e-guide series (<https://niwa.co.nz/coasts-and-oceans/marine-identification-guides-and-fact-sheets>) are examples of how this can be done (see Kelly 2022 as an example).

To enhance our research efforts in the coming decade, we have identified two key priorities: first, conducting more regional studies, and second, developing a new

methodology that utilises an ‘expert opinion’ model. This model will help us rapidly inventory and concisely describe the regional faunas that are of interest to both NIWA and external stakeholders.

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Checklist of extant Porifera known from the New Zealand EEZ

The checklist is arranged according to the currently accepted systematics and classificatory scheme employed by the World Porifera Database (<https://www.marinespecies.org/porifera/>). Endemic taxa are indicated by 'E' for those found within the New Zealand EEZ, or 'E2' for taxa endemic to the wider New Zealand region encompassing the New Zealand EEZ and surrounding international waters, as defined by Roberts *et al.* (2015). Non-indigenous species are indicated by 'NI'. All other taxa are considered indigenous by default, i.e., naturally occurring around New Zealand and elsewhere. More than two taxonomic authorities have been abbreviated to 'first author *et al.*' in the checklist. All OTU taxa were determined by M. Kelly, NIWA.

Phylum PORIFERA	Class DEMOSPONGIAE	<i>Thrinacophora dubia</i> Brøndsted, 1924 E
Class CALCAREA	Subclass HETEROSCLEROMORPHA	Family STELLIGERIDAE
Subclass CALCARONEA	Order AGELASIDA	<i>Acanthoclada prostrata</i> Bergquist, 1970 E
Order BAERIDA	Family HYMERHABDIIDAE	<i>Higginsia</i> sp. 01 (NIWA 101586, Fiordland) E
Family BAERIIDAE	<i>Hymerhabdia oxecata</i> (Dendy, 1924) E	<i>Higginsia</i> sp. 02 (NIWA 101574, Three Kings) E
<i>Eilhardia schulzei</i> Poljéaaff, 1883	<i>Hymerhabdia</i> sp. 01 (NIWA 52501, Mahina Knoll) E	<i>Higginsia</i> sp. 04 (NIWA 74785, Otago Shelf) E
<i>Laumontia zona</i> Kirk, 1895 E		Stelligera sp. 01 (NIWA 100794, Ngunguru Bay, Tutukaka) E
Order LEUCOSOLENIDA	Order AXINELLIDA	Order BIEMNIDA
Family AMPHORISCIDAE	Family AXINELLIDAE	Family BIEMNIDAE
<i>Amphoriscus cyathiscus</i> Haeckel, 1872	<i>Axinella australiensis</i> Bergquist, 1970 E	<i>Bienna</i> <i>flabellata</i> Bergquist, 1970 E
<i>Leucilla schaunslandi</i> (Preiswisch, 1904) E	<i>Axinella brondstedi</i> Bergquist, 1970 E	<i>Bienna novaezealandiae</i> Dendy, 1924 E
Family GRANTIIDAE	<i>Axinella elegans</i> (Dendy, 1924) E	<i>Bienna rhabderemoides</i> Bergquist, 1961 E
<i>Grantia primitiva</i> Brøndsted, 1927 E	<i>Axinella globula</i> Brøndsted, 1924 E	<i>Bienna rufescens</i> Bergquist & Fromont, 1988 E
<i>Grantia ramulosa</i> Dendy, 1924 E	<i>Axinella richardsoni</i> Bergquist, 1970 E	<i>Bienna</i> sp. Dendy, 1924 E
<i>Leucandra australiensis</i> (Carter, 1886)	<i>Axinella torquata</i> Brøndsted, 1924 E	<i>Bienna</i> sp. 01 (NIWA 28566, Chatham Rise) E
<i>Leucandra barbata</i> (Duchassaing & Michelotti, 1864)	<i>Axinella</i> sp. 01 (NIWA 101461, Cape Reinga) E	<i>Bienna</i> sp. 02 (NIWA 89723, Bounty Plateau) E
<i>Leucandra bathybia</i> (Haeckel, 1869)	<i>Axinella</i> sp. 02 (NIWA 101457, Cape Reinga) E	<i>Bienna</i> sp. 03 (NIWA 92902, Campbell Island) E
<i>Leucandra compacta</i> (Carter, 1886) NI	<i>Axinella</i> sp. 03 (NIWA 101001, North Cape) E	<i>Sigmaxinella stylotata</i> Brøndsted, 1924 E
<i>Leucandra connectens</i> Brøndsted, 1927 E	<i>Axinella</i> sp. 04 (NIWA 62132, Chatham Rise) E	<i>Sigmaxinella</i> sp. Bergquist & Fromont, 1988 E
<i>Leucandra hauraki</i> Brøndsted, 1927 E	<i>Axinella</i> sp. 05 (NIWA 101923, Fiordland) E	<i>Sigmaxinella</i> sp. 01 (NIWA 51804, Cavalli Seamount) E
<i>Leucandra regina</i> Brøndsted, 1927 E	<i>Axinella</i> sp. 06 (NIWA 101497, Spirits Bay) E	<i>Sigmaxinella</i> sp. 02 (NIWA 86008, Kermadec Ridge) E
<i>Leucandra regina</i> var. <i>regularis</i> Brøndsted, 1927 E	<i>Axinella</i> sp. 07 (NIWA 101504, Spirits Bay) E	<i>Sigmaxinella</i> sp. 03 (NIWA 86365, Kermadec Ridge) E
<i>Leucandra secutor</i> Brøndsted, 1927 E	<i>Axinella</i> sp. 08 (NIWA 62189, Bay of Islands) E	<i>Sigmaxinella</i> sp. 04 (NIWA 73250, Middlesex Bank) E
<i>Leucandra vesicularis</i> Brøndsted, 1927 E	<i>Axinella</i> sp. 09 (NIWA 73798, Taranaki) E	Family RHABDEREMIIDAE
<i>Leucandra</i> sp. 01 (NIWA 51864, Chatham Rise) E	<i>Axinella</i> sp. 10 (NIWA 62417, Taranaki) E	<i>Rhabderemia coralloides</i> Dendy, 1924 E
<i>Leucandra</i> sp. 02 (NIWA 51788, Cavalli Seamount) E	<i>Axinella</i> sp. 11 (NIWA 75325, Ranfurly Banks) E	<i>Rhabderemia</i> <i>stellata</i> Bergquist, 1961 E
<i>Sycite dendyi</i> (Kirk, 1895) E	<i>Axinella</i> sp. 12 (NIWA 73211, Middlesex Bank) E	
<i>Ute syconoides</i> (Carter, 1886)	<i>Axinella</i> sp. 13 (NIWA 73163, Middlesex Bank) E	Order BUBARIDA
Family HETEROPIIIDAE	<i>Axinella</i> sp. 14 (NIWA 73180, Middlesex Bank) E	Family DESMANTHIDAE
<i>Grantessa intusarticulata</i> (Carter, 1886) NI	<i>Axinella</i> sp. 15 (NIWA 73658, North Is, West Coast) E	<i>Petromica</i> sp. 01 (NIWA 22450, Chaladesma of Ayling 1984) E
<i>Grantessa preiwischii</i> Dendy & Row, 1913 E	<i>Cymbastela concentrica</i> (Lendenfeld, 1887)	Family DICTYONELLIDAE
<i>Heteropia glomerosa</i> (Bowerbank, 1873) NI	<i>Cymbastela lamellata</i> (Bergquist, 1970)	<i>Acanthella dendyi</i> (Bergquist, 1970) E
<i>Paraheteropia ijimai</i> (Hozawa, 1916) NI	<i>Dragmacidion australe</i> (Bergquist, 1970)	<i>Acanthella</i> sp. 01 (NIWA 28640, Challenger Plateau) E
<i>Sycettus poculum</i> (Poljéaaff, 1883)	<i>Dragmacidion</i> sp. 01 (NIWA 101269, Mokohinau) E	<i>Acanthella</i> sp. 02 (NIWA 75326, Ranfurly Banks) E
<i>Vosmaeropsis</i> cf. <i>macera</i> (Carter, 1886)	<i>Dragmacidion</i> sp. 02 (NIWA 52443, Spirits Bay) E	<i>Acanthella</i> sp. 03 (NIWA 52490, Bay of Plenty) E
Family JENKINIDAE	<i>Pararaphoxya pulchra</i> (Brøndsted, 1924)	<i>Acanthella</i> sp. 04 (NIWA 90738, Bounty Plateau) E
<i>Uteopsis</i> cf. <i>argentea</i> (Poljéaaff, 1883) NI	<i>Pararaphoxya sinclairi</i> (Gray, 1843) E	<i>Acanthella</i> sp. 05 (NIWA 99632, West Norfolk Ridge) E
Family LEUCOSOLENIIDAE	<i>Pararaphoxya</i> sp. 01 (NIWA 101335, Three Kings) E	<i>Phakettia</i> sp. 01 (NIWA 73248, Middlesex Bank) E
<i>Ascute ascoinoides</i> (Carter, 1886)	<i>Pararaphoxya</i> sp. 02 (NIWA 101407, Three Kings) E	
<i>Leucosolenia discoveryi</i> Jenkins, 1908	<i>Phakellia</i> sp. 01 (NIWA 75857, Macquarie Ridge) E	Order CLIONAIDA
<i>Leucosolenia echinata</i> Kirk, 1894 E	<i>Phakellia</i> sp. 02 (NIWA 73246, Middlesex Bank) E	Family CLIONAIDAE
<i>Leucosolenia lucasi</i> Dendy, 1891	<i>Pipestela</i> sp. MITS 01 (NIWA 100877, Fiordland PHS) E	<i>Cliona</i> cf. <i>celata</i> Grant, 1826 <i>sensu</i> Bergquist (1968) NI
<i>Leucosolenia rosea</i> Kirk, 1896 E	<i>Pipestela</i> sp. MITS 02 (NIWAKD 5871, Kaikoura PHS) E	<i>Cliona</i> cf. <i>euryphylle</i> Topsent, 1888 <i>sensu</i> Bergquist (1968)
<i>Leucosolenia</i> sp. 01 (NIWA 84230, Stewart Island) E	<i>Reniochalina novaezealandiae</i> (Brøndsted, 1924) E	<i>Cliona</i> sp. 01 (NIWA 51129, Spirits Bay) E
<i>Leucosolenia</i> sp. 02 (NIWA 86734, Bounty Plateau) E		<i>Cliona</i> sp. 02 (NIWA 51205, Spirits Bay) E
Family SYCONIDAE	Family HETEROXYIDAE	<i>Cliona</i> sp. 03 (NIWA 51619, Spirits Bay) E
<i>Sycetta antarctica</i> Brøndsted, 1931	<i>Heteroxya</i> sp. 01 (NIWA 94272, Louisville Seamount) E2	<i>Cliona</i> sp. 04 (NIWA 80611, Kermadecs) E
<i>Sycota inconspicuum</i> (Lendenfeld, 1885) E	<i>Heteroxya</i> sp. 02 (NIWA 94264, Louisville Seamount) E2	<i>Cliona</i> sp. 05 (NIWA 80615, Kermadecs) E
<i>Sycon ornatum</i> Kirk, 1898	<i>Parahigginsiella phakelloides</i> Dendy, 1924	<i>Cliona</i> sp. MITS 06 (NIWAKD 4622, Wellington PHS) E
<i>Sycon pedicellatum</i> Kirk, 1898 E		<i>Pione</i> cf. <i>muscoidea</i> (Hancock, 1849) <i>sensu</i> Bergquist (1961) E
<i>Sycon ramsayi</i> (Lendenfeld, 1885)	Family RASPAILLIIDAE	Family SPIRASTRELLIDAE
	Subfamily PLOCAMIONINAE	<i>Spirastrella</i> sp. 01 (0CDN6683-X, Three Kings) E
Subclass CALCINEA	<i>Janulum</i> <i>imago</i> Kelly & van Soest, 2015 E2	
Order CLATHRINIDA	<i>Lithoplocamia</i> sp. 01 (NIWA 101395, North Cape) E	Order DESMACELLIDA
Family CLATHRINIDAE	<i>Plocamione</i> <i>ornata</i> (Dendy, 1924) E	Family DESMACELLIDAE
<i>Clathrina loculosa</i> (Haeckel, 1870) NI	<i>Plocamione</i> sp. 01 (NIWA 94215, Louisville Seamount) E2	<i>Desmacella</i> ambigua Bergquist & Fromont, 1988 E
<i>Clathrina</i> cf. <i>osculum</i> Carter, 1886	<i>Subfamily RASPAILLIINAE</i>	<i>Desmacella</i> dendyi de Laubefels, 1936 E
<i>Clathrina</i> cf. <i>procumbens</i> Lendenfeld, 1885 NI	<i>Aulospongia</i> sp. 01 (NIWA 31142, Bay of Plenty) E	<i>Desmacella</i> sp. 01 (NIWA 39781, Macquarie Ridge) E
<i>Clathrina</i> sp. UFRJPOR6839 Klautau <i>et al.</i> , 2013 E	<i>Aulospongia</i> sp. 02 (NIWA 83133, South Kermadec Ridge) E	<i>Desmacella</i> sp. 02 (NIWA 53592, Chatham Rise) E
<i>Clathrina</i> sp. UFRJPOR6843 Klautau <i>et al.</i> , 2013 E	<i>Eurypon</i> <i>hispidum</i> Bergquist, 1970 E	<i>Desmacella</i> sp. 03 (NIWA 66034, Challenger Plateau) E
<i>Clathrina</i> sp. Pritchard <i>et al.</i> , 1984 E	<i>Eurypon</i> sp. 01 (NIWA 52515, Chatham Rise) E	<i>Microstylostylifer</i> anomalis Dendy, 1924
<i>Clathrina</i> sp. MITS 01 (NIWAKD 6001, Chatham Is PHS) E	<i>Eurypon</i> sp. 02 (NIWA 75604, Ranfurly Bank) E	<i>Microstylostylifer</i> sp. 01 (NIWA 62035, Macquarie Ridge) E
<i>Ernestia laxa</i> (Kirk, 1896)	<i>Eurypon</i> sp. 03 (NIWA 86127, Colville Ridge) E	<i>Microstylostylifer</i> sp. 02 (NIWA 39661, Macquarie Ridge) E
Family DENDYIDAE	<i>Eurypon</i> sp. 04 (NIWA 52936, Bay of Plenty) E	<i>Microstylostylifer</i> sp. 05 (NIWA 27003, Kaikoura Canyon) E
<i>Dendya clathrata</i> (Carter, 1883) NI	<i>Eurypon</i> sp. 05 (NIWA 94587, Louisville Seamount) E2	<i>Microstylostylifer</i> sp. 06 (NIWA 53801, Chatham Rise) E
<i>Dendya</i> sp. MITS 01 (NIWAKD 5976, Chatham Is PHS) E	<i>Raspailia</i> (<i>Clathridendron</i>) <i>arbuscula</i> (Lendenfeld, 1888)	<i>Microstylostylifer</i> sp. 07 (NIWA 64144, Hikurangi Margin) E
<i>Soleniscus hispidus</i> (Brøndsted, 1931)	<i>Raspailia</i> (<i>Clathridendron</i>) <i>rubrum</i> (Kirk, 1911) E	<i>Microstylostylifer</i> sp. 08 (NIWA 64659, Kermadec Is) E
<i>Soleniscus stolonifer</i> (Dendy, 1891)	<i>Raspailia</i> (<i>Raspailia</i>) sp. 01 (NIWA 51988, Bay of Plenty) E	<i>Microstylostylifer</i> sp. 09 (NIWA 72080, Kermadec Is) E
Family LEUCALTIIDAE	<i>Raspailia</i> (<i>Raspailia</i>) sp. 02 (NIWA 75714, Snares) E	<i>Neofibularia</i> sp. 01 (NIWAKD 51585, Spirits Bay) E
<i>Leucettusa corticata</i> (Haeckel, 1872)	<i>Raspailia</i> (<i>Raspailia</i>) sp. 03 (NIWA 82995, South Kermaidec Ridge) E	<i>Neofibularia</i> sp. MITS 02 (NIWAKD 3825a, Milford Sound PHS) E
<i>Leucettusa imperfecta</i> (Poljéaaff, 1883)	<i>Raspailia</i> (<i>Raspailia</i>) sp. 04 (NIWA 52834, Bay of Plenty) E	
<i>Leucettusa lancifer</i> Dendy, 1924	<i>Raspailia</i> (<i>Raspaxilla</i>) <i>compressa</i> Bergquist, 1970	Order HAPLOSCLERIDA
<i>Leucettusa mariae</i> Brøndsted, 1927 E	<i>Raspailia</i> (<i>Raspaxilla</i>) <i>flaccida</i> Bergquist, 1970 E	Family CALLYSPONGIIDAE
<i>Leucettusa pyriformis</i> Brøndsted, 1927 E	<i>Raspailia</i> (<i>Raspaxilla</i>) <i>inequalis</i> Dendy, 1924 E	<i>Arenosclera</i> sp. 01 (NIWA 101006, Stewart Is) E
<i>Leucettusa sambucus</i> (Preiswisch, 1904) E	<i>Raspailia</i> (<i>Raspaxilla</i>) <i>topsentii</i> Dendy, 1924 E	<i>Arenosclera</i> sp. 02 (NIWA 42076, Chatham Rise) E
<i>Leucettusa tubulosa</i> Dendy, 1924 E	<i>Raspailia</i> (<i>Raspaxilla</i>) sp. 01 (NIWA 101195, Great Barrier Island) E	<i>Arenosclera</i> sp. 03 (NIWA 73692, North Taranaki Bight) E
<i>Leucettusa</i> sp. 0CDN6676-Q Klautau <i>et al.</i> , 2013 E	<i>Raspailia</i> (<i>Thrinacophora</i>) sp. 01 (NIWA 51470, Spirits Bay) E	<i>Callyspongia</i> (<i>Siphonochalina</i>) sp. 01 (NIWA 16854, Northland) E
<i>Leucettusa</i> sp. 01 (NIWA 100997, Three Kings) E	<i>Raspailia</i> (<i>Thrinacophora</i>) sp. 02 (NIWA 52372, Spirits Bay) E	<i>Callyspongia</i> (<i>Siphonochalina</i>) sp. MITS 02 (NIWAKD 2889, Bluff PHS) E
<i>Leucettusa</i> sp. 02 (NIWA 51303, Spirits Bay) E	<i>Raspailia</i> sp. 03 (NIWA 101440, Spirits Bay) E	<i>Callyspongia</i> (<i>Toxochalina</i>) oliveri (Kirk, 1911) E
Family LEUCASCIDAE	<i>Raspailia</i> sp. 04 (NIWA 62418, Taranaki) E	<i>Callyspongia</i> (<i>Toxochalina</i>) robusta (Ridley, 1884) E
<i>Ascalitis poterium</i> (Haeckel, 1872)	<i>Subfamily THIRINACOPHORINAE</i>	<i>Callyspongia</i> (<i>annulata</i> (Ridley & Dendy, 1886)
<i>Leucascus protogenes</i> (Haeckel, 1872) <i>sensu</i> Dendy (1891)	<i>Axechinia</i> sp. 01 (NIWA 52626, Macquarie Ridge) E	
<i>Leucascus simplex</i> Dendy, 1893	<i>Ceratopisp</i> <i>cuneiforme</i> Bergquist, 1970	
<i>Leucascus</i> cf. <i>clavatus</i> Dendy, 1893		
Family LEUCETTIDAE		
<i>Leucetta</i> sp. 01 (NIWA 100965, Three Kings) E		
<i>Leucetta</i> sp. 02 (NIWA 101692, Kaikoura) E		
<i>Leucetta</i> sp. 03 (NIWA 113966, Campbell Plateau) E		

- Callyspongia bathami* Bergquist & Warne, 1980 E
Callyspongia brondstedi Van Soest & Hooper, 2020
Callyspongia diffusa (Ridley, 1884) *sensu* Bergquist & Warne (1980)
Callyspongia fistulosa (Kirk, 1911) E
Callyspongia irregularis Bergquist & Warne, 1980 E
Callyspongia latifuba (Dendy, 1924) E
Callyspongia nuda (Ridley, 1884)
Callyspongia stellata Bergquist & Warne, 1980 E
Callyspongia sp. 01 (NIWA 101301, Three Kings) E
Callyspongia sp. 02 (NIWA 42084, East Coast South Is) E
Callyspongia sp. 03 (NIWA 52141, Kermadecs) E
Callyspongia sp. 04 (NIWAKD 3097, Bream Bay) E
Callyspongia sp. 05 (NIWAKD 3170, Marlborough Sounds) E
Callyspongia sp. MITS 06 (NIWAKD 1587, Timaru PHS) E
Callyspongia sp. MITS 07 (NIWAKD 2618, Whangarei PHS) E
Callyspongia sp. 08 (NIWA 52284, Marlborough Sounds) E
Callyspongia sp. 09 (NIWA 51003, Spirits Bay) E
Callyspongia sp. 10 (NIWA 61992, Marlborough Sounds) E
Callyspongia sp. 11 (NIWA 52191, West Coast, South Island) E
Callyspongia sp. 12 (NIWA 52190, Marlborough Sounds) E
Callyspongia sp. 13 (NIWA 101679, Kaikoura) E
Callyspongia sp. 14 (NIWA 143412, Fiordland) E
Callyspongia sp. 15 (NIWA 28531, Chatham Rise) E
Callyspongia sp. 16 (NIWA 52447, Spirits Bay) E
Callyspongia sp. 17 (NIWA 52408, Spirits Bay) E
Callyspongia sp. 18 (NIWA 52890, Bay of Plenty) E
Callyspongia sp. 19 (NIWA 139362, Cape Maria van Diemen) E
Callyspongia sp. 20 (NIWA 74092, Canterbury) E
Callyspongia sp. MITS 21 (NIWAKD, 2621, Whangarei PHS) E
Callyspongia sp. MITS 22 (NIWAKD 2694, Dunedin PHS) E
Callyspongia sp. MITS 23 (NIWAKD 2788, Bluff PHS) E
Callyspongia sp. MITS 24 (NIWAKD 2855, Bluff PHS) E
Callyspongia sp. MITS 25 (NIWAKD 6597, Stewart Is PHS) E
Callyspongia sp. MITS 26 (NIWAKD 5939, Chatham Is PHS) E
Callyspongia sp. MITS 27 (NIWAKD 5894, Kaikoura PHS) E
Chalinopsilla sp. MITS 01 (NIWAKD 1585, Timaru PHS) E
Dactylia australis (Lendenfeld, 1888)
Dactylia varia (Gray, 1843)
Dactylia sp. 01 (NIWA 48943, West Coast South Island) E
Dactylia sp. 02 (NIWA 102224, Southern Ocean) E
Dactylia sp. 03 (NIWA 80631, Bounty Plateau) E
Family CHALINIDAE
Chalinula densa (Brondsted, 1924) E
Chalinula sp. 01 (NIWA 89741, Bounty Plateau) E
Chalinula sp. 02 (Akl Mus 10, Stewart Is) E
Chalinula sp. 03 (NIWA 158422, E of L'Esperance Rock, Kermadecs) E
Chalinula sp. MITS 03 (NIWAKD 1146, Wellington PHS) E
Chalinula sp. MITS 04 (NIWAKD 1386, Picton PHS) E
Chalinula sp. MITS 05 (NIWAKD 5865, Kaikoura PHS) E
Chalinula sp. MITS 06 (NIWAKD 5936, Chatham Is PHS) E
Chalinula sp. MITS 07 (NIWAKD 5872, Kaikoura PHS) E
Chalinula sp. MITS 08 (NIWAKD 5880, Kaikoura PHS) E
Cladocroce sp. 01 (NIWA 25255, Chatham Rise) E
Cladocroce sp. 02 (NIWA 39963, Southern Ocean) E
Cladocroce sp. 03 (NIWA 52057, Bay of Plenty) E
Haliclona (*Flagellia*) *flagellifera* (Ridley & Dendy, 1886) *sensu* Bergquist & Warne (1980)
Haliclona (*Gellius*) cf. *glacialis* (Ridley & Dendy, 1886) *sensu* Bergquist & Warne (1980)
Haliclona (*Gellius*) *holgerbrondstedi* Van Soest & Hooper, 2020 E
Haliclona (*Gellius*) *intermedia* (Brondsted, 1924) E
Haliclona (*Gellius*) *patbergquistiae* Van Soest & Hooper, 2020 E
Haliclona (*Gellius*) *petrocalyx* (Dendy, 1924) E
Haliclona (*Gellius*) *regia* (Brondsted, 1924)
Haliclona (*Gellius*) *toxophora* (Hentschel, 1912) *sensu* Bergquist & Warne (1980) E
Haliclona (*Gellius*) *tubuloramosa* (Dendy, 1924) E
Haliclona (*Gellius*) sp. 01 (NIWA 51776, Cavalli Is) E
Haliclona (*Gellius*) sp. 02 (NIWA 52504, Cavalli Seamount) E
Haliclona (*Gellius*) sp. 03 (NIWA 52060, Bay of Plenty) E
Haliclona (*Gellius*) sp. 04 (NIWA 101580, Three Kings) E
Haliclona (*Gellius*) sp. 05 (NIWA 52489, Bay of Plenty) E
Haliclona (*Gellius*) sp. 06 (NIWA 52607, Macquarie Ridge) E
Haliclona (*Gellius*) sp. 07 (NIWA 87056, Macquarie Ridge) E
Haliclona (*Gellius*) sp. 08 (NIWA 82945, Kermadec Is) E
Haliclona (*Gellius*) sp. 09 (NIWA 86770, Chatham Rise) E
Haliclona (*Gellius*) sp. 10 (NIWA 94271, Louisville Seamount) E2
Haliclona (*Gellius*) sp. 11 (NIWA 101758, Colville Ridge) E
Haliclona (*Halichoclona*) *caminata* Bergquist & Warne, 1980 E
Haliclona (*Halichoclona*) *sonnae* Kelly & Rowden, 2019 E
Haliclona (*Reniera*) *cinerea* (Grant, 1826) *sensu* Brondsted (1924) & Bergquist & Warne (1980) E
Haliclona (*Reniera*) *clathrata* (Dendy, 1895) *sensu* Brondsted (1924) & Bergquist & Warne (1980)
Haliclona (*Reniera*) sp. (Brondsted, 1924) E
Haliclona (*Rhizoniera*) *brondstedi* Bergquist & Warne, 1980 E
Haliclona (*Rhizoniera*) sp. 01 (NIWA 52523, Challenger Plateau) E
Haliclona (*Soestella*) *battershilli* Kelly & Rowden, 2019 E
Haliclona (*Soestella*) *implexa* (Schmidt, 1868) *sensu* Brondsted (1924) & Bergquist & Warne (1980)
Haliclona *berquistiae* Van Soest & Hooper, 2020 E
Haliclona *glabra* Bergquist, 1961 E
Haliclona *isodictyalis* Bergquist, 1961 E
Haliclona *kaikoura* Bergquist & Warne, 1980 E
Haliclona *maxima* Bergquist & Warne, 1980 E
Haliclona *pacifica* Hooper in Hooper & Wiedenmayer 1994
Haliclona *parietaliooides* (Bergquist, 1961) E
Haliclona *pulcherrima* (Brondsted, 1924) E
Haliclona *punctata* Bergquist & Warne, 1980 E
Haliclona *reversa* (Kirk, 1911) E
Haliclona *sabulosa* Bergquist & Warne, 1980 E
Haliclona *siphonoides* (*sensu* Ridley, 1884) *sensu* Brondsted (1924)
Haliclona *stelliderma* Bergquist & Warne, 1980 E
Haliclona *tenacior* Bergquist, 1961 E
Haliclona *venustina* Bergquist, 1961
Haliclona sp. 01 (NIWA 101684, Kaikoura) E
Haliclona sp. 02 (NIWAKD 766, Spirits Bay) E
Haliclona sp. 03 (NIWA 113939, Campbell Heritage) E
Haliclona sp. 04 (NIWA 93498, Campbell Is) E
Haliclona sp. 05 (NIWA 101307, Three Kings) E
Haliclona sp. 06 (NIWA 51779, Cavalli Seamount) E
Haliclona sp. 07 (NIWA 101758, Three Kings) E
Haliclona sp. 08 (NIWA 101680, Kaikoura) E
Haliclona sp. 09 (NIWA 100898, Fiordland) E
Haliclona sp. 10 (NIWA 101623, Three Kings) E
Haliclona sp. 11 (NIWA 28575, Chatham Rise) E
Haliclona sp. 12 (NIWA 52617, Macquarie Ridge) E
Haliclona sp. 13 (NIWA 113943, Campbell Heritage) E
Haliclona sp. 14 (NIWA 62172, Bay of Islands) E
Haliclona sp. 15 (NIWA 74782, Otago Shelf) E
Haliclona sp. 16 (NIWA 74775, Otago) E
Haliclona sp. 17 (NIWA 62497, Otago Shelf) E
Haliclona sp. 18 (NIWA 62498, Otago Shelf) E
Haliclona sp. 19 (NIWA 89744, Bounty Plateau) E
Haliclona sp. MITS 01 (NIWAKD 1140, Wellington PHS) E
Haliclona sp. MITS 02 (NIWAKD 1218, Wellington PHS) E
Haliclona sp. MITS 03 (NIWAKD 1331, Wellington PHS) E
Haliclona sp. MITS 04 (NIWAKD 1670, Tauranga PHS) E
Haliclona sp. MITS 05 (NIWAKD 1774, Tauranga PHS) E
Haliclona sp. MITS 06 (NIWAKD 1789, Tauranga PHS) E
Haliclona sp. MITS 07 (NIWAKD 1575, Nelson PHS) E
Haliclona sp. MITS 08 (NIWAKD 1638, Lyttleton PHS) E
Haliclona sp. MITS 09 (NIWAKD 2643, Opua PHS) E
Haliclona sp. MITS 10 (NIWAKD 2665, Gisborne PHS) E
Haliclona sp. MITS 11 (NIWAKD 2684a, Dunedin PHS) E
Haliclona sp. MITS 12 (NIWAKD 2689a, Dunedin PHS) E
Haliclona sp. MITS 13 (NIWAKD 2740b, Dunedin PHS) E
Haliclona sp. MITS 14 (NIWAKD 2741, Dunedin PHS) E
Haliclona sp. MITS 15 (NIWAKD 2784, Dunedin PHS) E
Haliclona sp. MITS 16 (NIWAKD 3021, Auckland PHS) E
Haliclona sp. MITS 17 (NIWAKD 3409, Lyttleton PHS) E
Haliclona sp. MITS 18 (NIWAKD 3812, Milford Sound PHS) E
Haliclona sp. MITS 19 (NIWAKD 6602, Port Underwood PHS) E
Haliclona sp. MITS 20 (NIWAKD 5996, Chatham PHS) E
Haliclona sp. MITS 21 (NIWAKD 6513, Kaipara PHS) E
Haliclona sp. MITS 22 (NIWAKD 6037, Dunedin PHS) E
Haliclona sp. MITS 23 (NIWAKD 6095, Dunedin PHS) E
Family PETROSIIDAE
Neopetrosia sp. 02 (NIWA 100974, Great Barrier Is) E
Neopetrosia sp. 03 (NIWA 101626, Three Kings) E
Neopetrosia sp. 04 (NIWA 101485, North Cape) E
Neopetrosia sp. 05 (NIWA 32044, Hikurangi) E
Neopetrosia sp. 07 (NIWA 25245, Chatham Rise) E
Neopetrosia sp. 08 (NIWA 101492, Spirits Bay) E
Neopetrosia sp. 09 (NIWA 101495, Spirits Bay) E
Neopetrosia sp. 10 (NIWA 101267, Mokohinau) E
Neopetrosia sp. 11 (NIWA 81585, South Taranaki Bight) E
Neopetrosia sp. 12 (NIWA 82881, Clarke Seamount) E
Petrosia (*Petrosia*) *australis* Bergquist & Warne, 1980 E
Petrosia (*Petrosia*) *hebes* Lendenfeld, 1888 *sensu* Bergquist & Warne (1980) E
Petrosia (*Petrosia*) *pluricrustata* Lévi & Lévi, 1983
Petrosia (*Petrosia*) sp. 01 (NIWA 2556, Kermadecs) E
Petrosia (*Petrosia*) sp. 02 (NIWA 100485, Bay of Plenty) E
Petrosia (*Petrosia*) sp. 03 (NIWA 75607, Ranfurly Banks) E
Petrosia (*Petrosia*) sp. 04 (NIWA 52495, Bay of Plenty) E
Petrosia (*Petrosia*) sp. 06 (NIWA 73770, North Taranaki Bight) E
Petrosia (*Strongylophora*) *mamillata* (Lévi & Lévi, 1983)
Petrosia (*Strongylophora*) *sp.* 01 (NIWA 86170, Mahina Knoll) E
Petrosia (*Strongylophora*) *sp.* 02 (NIWA 100496, Mahina Knoll) E
Petrosia (*Strongylophora*) *sp.* 03 (NIWA 31179, Bay of Plenty) E
Petrosia (*Strongylophora*) *sp.* 05 (NIWA 73772, Taranaki E)
Xestospongia (*coralloides*) (Dendy, 1924)
Xestospongia (*novaezealandiae*) Bergquist & Warne, 1980 E
Xestospongia sp. 01 (NIWA 52024, Cavalli Seamount) E
Xestospongia sp. 02 (NIWA 31135, Bay of Plenty) E
Xestospongia sp. 03 (NIWA 52621, Macquarie Ridge) E
Xestospongia sp. 04 (NIWA 52618, Macquarie Ridge) E
Xestospongia sp. 05 (NIWA 53347, Chatham Rise) E
Xestospongia sp. 06 (NIWA 81566, Taranaki) E
Xestospongia sp. 07 (NIWA 83347, Kermadec Is) E
Xestospongia sp. 08 (NIWA 52943, Bay of Plenty) E
Xestospongia sp. 09 (NIWA 61939, Macquarie Ridge) E
Xestospongia sp. 10 (NIWA 51448, Spirits Bay) E
Xestospongia sp. 11 (NIWA 51456, Spirits Bay) E
Family PHLOEODICTYIDAE
Calyx *imperialis* (Dendy, 1924) E
Calyx sp. 01 (NIWA 101401, North Cape) E
Calyx sp. 02 (NIWA 61946, Snares Islands) E
Calyx sp. 03 (NIWA 31148, Bay of Plenty) E
Calyx sp. 04 (NIWA 52360, Spirits Bay) E
Calyx sp. 05 (NIWA 73759, Taranaki) E
Calyx sp. 06 (NIWA 83089, Bay of Plenty) E
Calyx sp. 07 (NIWA 73236, Middlesex Bank) E
Oceanapia *aberrans* (Dendy, 1924) E
Oceanapia *arcifera* Dendy, 1924 E
Oceanapia *fistulosa* (Bowerbank, 1874) *sensu* Dendy (1924)
Oceanapia sp. 01 (NIWA 101617, Three Kings) E
Oceanapia sp. 02 (NIWA 100935, Three Kings) E
Oceanapia sp. 03 (NIWA 52429, Spirits Bay) E
Pachypellina sp. 01 (NIWA 51421, Spirits Bay) E
Pachypellina sp. 02 (NIWA 51422, Spirits Bay) E
Siphonodictyon sp. 01 (NIWA 51720, Bay of Plenty) E
Phloeodictyidae gen. et sp. nov. 01 (NIWA 51353, Spirits Bay)
Order MERLIIDA
Family HAMACANTHIDAE
Hamacantha (*Vomerula*) sp. 01 (NIWA 51786, Cavalli Seamount) E
Order POECILOSCLERIDA
Family ACARNIDAE
Acanthorhabdus sp. 01 (NIWA 73240, Three Kings) E
Cornulum *virguliferum* (Lévi & Lévi, 1983)
Iophon *laevistylus* Dendy, 1924 E
Iophon *minor* (Brondsted, 1924) E
Iophon cf. *proximum* (Ridley, 1881) *sensu* Bergquist & Fromont (1988)
Iophon *semispinosus* Bergquist, 1961 E
Iophon sp. 01 (NIWA 31149, Bay of Plenty) E
Iophon sp. 02 (NIWA 25246, Chatham Rise) E
Iophon sp. 03 (NIWA 145350, Macquarie Ridge) E
Iophon sp. MITS 04 (NIWAKD 2621b, Whangarei PHS) E
Paracornulum *sinclairae* Bergquist & Fromont, 1988 E
Paracornulum *strepsichela* (Dendy, 1922)
Paracornulum sp. 01 (NIWA 51093, Spirits Bay) E
Paracornulum sp. 02 (NIWA 51425, Spirits Bay) E
Zyzyza fuliginosa (Carter, 1879) *sensu* Bergquist & Fromont (1988)
Zyzyza sp. 01 (NIWA 101587, Three Kings) E
Family CHONDROPSIDAE
Chondropsis *kirkii* (Bowerbank, 1841) NI
Chondropsis *topsenti* Dendy, 1895 NI
Chondropsis sp. Bergquist & Fromont (1988) E
Chondropsis sp. 01 (NIWA 61936, Southern Ocean)
Chondropsis sp. 02 (NIWA 101657, Mernoo Bank) E
Chondropsis sp. 03 (NIWA 100869, Doubtful Sound) E
Chondropsis sp. 04 (NIWA 28431, East Coast South Island) E
Chondropsis sp. 05 (NIWA 139355, Spirits Bay) E
Chondropsis sp. 06 (NIWA 101467, Spirits Bay) E
Chondropsis sp. 07 (NIWA 74287, Otago) E
Chondropsis sp. 08 (NIWA 74712, Otago Shelf) E
Chondropsis sp. 09 (NIWA 86731, Bounty Plateau) E
Chondropsis sp. 10 (NIWA 52438, Spirits Bay) E
Chondropsis sp. 11 (NIWA 75053, Mernoo Bank) E
Chondropsis sp. MITS 12 (NIWAKD 2732, Dunedin PHS) E
Chondropsis sp. MITS 13 (NIWAKD 5934, Chatham Is PHS) E
Chondropsis sp. MITS 14 (NIWAKD 5879, Kaikoura PHS) E
Psammoclema sp. A Brondsted, 1927 E
Psammoclema sp. B Brondsted, 1927 E
Psammoclema sp. 01 (NIWA 101111, Marlborough Sounds) E
Psammoclema sp. 02 (NIWA 101601, Three Kings) E
Psammoclema sp. 03 (NIWA 28487, Chatham Rise) E
Psammoclema sp. 04 (NIWA 75629, Ranfurly Banks) E
Psammoclema sp. 05 (NIWA 72434, Ranfurly Banks) E
Psammoclema sp. 06 (NIWA 74376, Otago) E
Psammoclema sp. 07 (NIWA 81605, South Taranaki Bight) E
Psammoclema sp. 08 (NIWA 113875, Campbell Is) E
Psammoclema sp. MITS 09 (NIWAKD 5934a, Chatham Is PHS) E
Psammoclema sp. MITS 10 (NIWAKD 5942, Chatham Is PHS) E
Psammoclema sp. MITS 11 (NIWAKD 5943, Chatham Is PHS) E
Psammoclema sp. 01 (NIWA 101111, Marlborough Sounds) E
Psammoclema sp. 02 (NIWA 101601, Three Kings) E
Psammoclema sp. 03 (NIWA 28487, Chatham Rise) E
Psammoclema sp. 04 (NIWA 75629, Ranfurly Banks) E
Psammoclema sp. 05 (NIWA 72434, Ranfurly Banks) E
Psammoclema sp. 06 (NIWA 74376, Otago) E
Psammoclema sp. 07 (NIWA 81605, South Taranaki Bight) E
Psammoclema sp. 08 (NIWA 113875, Campbell Is) E
Psammoclema sp. MITS 09 (NIWAKD 5934a, Chatham Is PHS) E
Psammoclema sp. MITS 10 (NIWAKD 5942, Chatham Is PHS) E
Psammoclema sp. MITS 11 (NIWAKD 5943, Chatham Is PHS) E
Psammoclema sp. 01 (NIWA 101111, Marlborough Sounds) E
Psammoclema sp. 02 (NIWA 101601, Three Kings) E
Psammoclema sp. 03 (NIWA 28487, Chatham Rise) E
Psammoclema sp. 04 (NIWA 75629, Ranfurly Banks) E
Psammoclema sp. 05 (NIWA 72434, Ranfurly Banks) E
Psammoclema sp. 06 (NIWA 74376, Otago) E
Psammoclema sp. 07 (NIWA 81605, South Taranaki Bight) E
Psammoclema sp. 08 (NIWA 113875, Campbell Is) E
Psammoclema sp. MITS 09 (NIWAKD 5934a, Chatham Is PHS) E
Psammoclema sp. MITS 10 (NIWAKD 5942, Chatham Is PHS) E
Psammoclema sp. MITS 11 (NIWAKD 5943, Chatham Is PHS) E
Psammoclema sp. 01 (NIWA 101111, Marlborough Sounds) E
Psammoclema sp. 02 (NIWA 101601, Three Kings) E
Psammoclema sp. 03 (NIWA 28487, Chatham Rise) E
Psammoclema sp. 04 (NIWA 75629, Ranfurly Banks) E
Psammoclema sp. 05 (NIWA 72434, Ranfurly Banks) E
Psammoclema sp. 06 (NIWA 74376, Otago) E
Psammoclema sp. 07 (NIWA 81605, South Taranaki Bight) E
Psammoclema sp. 08 (NIWA 113875, Campbell Is) E
Psammoclema sp. MITS 09 (NIWAKD 5934a, Chatham Is PHS) E
Strongylacidon *conulosum* Bergquist & Fromont, 1988 E

- Stonycladion inaequale* (Hentschel, 1911) *sensu* Bergquist & Fromont (1988)
- Strongylocidion* sp. 01 (NIWA 66169, Snare) E
- Family CLADORHIZIDAE
- Abyssocladia bruuni* Lévi, 1964 E
- Abyssocladia carcharias* Kelly & Vacelet, 2011 E
- Abyssocladia lanceola* Kelly & Vacelet, 2023 E2
- Abyssocladia rowdeni* Kelly & Vacelet, 2023 E
- Abyssocladia sonnacae* Kelly & Vacelet, 2023 E
- Abyssocladia tumulorum* Kelly & Vacelet, 2023 E
- Abyssocladia* sp. nov. (cf. *lanceola* Kelly & Vacelet, 2023, NIWA 143637) E
- Abyssocladia* sp. nov. (NIWA 155411, Kermadec Is) E
- Asbestopluma* (*Asbestopluma*) *anisoplacochela* Kelly & Vacelet, 2011 E
- Asbestopluma* (*Asbestopluma*) *biserialis* (Ridley & Dendy, 1886)
- Asbestopluma* (*Asbestopluma*) *desmophora* Kelly & Vacelet, 2011
- Asbestopluma* (*Asbestopluma*) *wolffi* Lévi, 1964 E2
- Asbestopluma* (*Asbestopluma*) sp. (NIWA 65015, Kermadec Ridge) E
- Asbestopluma* (*Asbestopluma*) sp. (NIWA 91036, Caraval, North Otago) E
- Asbestopluma* (*Asbestopluma*) sp. (NIWA 32053, Hikurangi) E
- Asbestopluma* (*Asbestopluma*) sp. (NIWA 99639, West Norfolk Ridge) E
- Asbestopluma* (*Asbestopluma*) sp. (NIWA 21343, Chatham Rise) E
- Asbestopluma* (*Asbestopluma*) sp. (NIWA 21352a, Chatham Rise) E
- Asbestopluma* (*Asbestopluma*) sp. (NIWA 21365, Chatham Rise) E
- Australocladia alopecura* Kelly & Vacelet, 2023 E2
- Australocladia sphaericheila* Kelly & Vacelet, 2023 E2
- Axoniderma similis* (Ridley & Dendy, 1886)
- Cercicladia australis* Rios et al., 2011
- Chondrocladia* (*Chondrocladia*) *asigmata* Lévi, 1964 E
- Chondrocladia* (*Chondrocladia*) *clavata* Ridley & Dendy, 1886
- Chondrocladia* (*Chondrocladia*) *scolionema* Lévi, 1993
- Chondrocladia* (*Chondrocladia*) sp. (NIWA 28612, Challenger Plateau) E2
- Chondrocladia* (*Chondrocladia*) sp. (NIWA 83215, Bay of Plenty) E
- Chondrocladia* (*Chondrocladia*) sp. (NIWA 21354, Kermadec Ridge) E
- Chondrocladia* (*Chondrocladia*) sp. (NIWA 35095, Hikurangi Plateau) E
- Chondrocladia* (*Chondrocladia*) sp. (NIWA 25826, Chatham Rise) E
- Chondrocladia* (*Chondrocladia*) sp. (NIWA 69523, Wanganella Bank) E
- Chondrocladia* (*Chondrocladia*) sp. (NIWA 82026, Bay of Plenty) E
- Chondrocladia* (*Chondrocladia*) sp. (NIWA 143635, Kermadec Is) E
- Chondrocladia* (*Meliiderma*) *turbiformis* Vacelet et al., 2009 E
- Cladophila pentacrinus* Dendy, 1887 E
- Cladophila* sp. (NIWA 52672, Macquarie Ridge) E
- Cladophila* sp. (NIWA 72694, Bay of Plenty) E
- Cladophila* sp. (NIWA 25834, Norfolk Ridge) E2
- Lycopodina hadalis* (Lévi, 1964) E
- Nullarboria rectangularis* (Ridley & Dendy, 1887)
- Patricialocladiella enigmatica* Kelly & Vacelet, 2023 E2
- Family COELOSPHAERIADAE
- Coelosphaera* (*Coelosphaera*) *bullata* Lévi, 1993
- Coelosphaera* (*Coelosphaera*) *calcifera* (Burton, 1934)
- Coelosphaera* (*Coelosphaera*) *globosa* Bergquist, 1961
- Coelosphaera* (*Coelosphaera*) *transiens* Bergquist & Fromont, 1988 E
- Coelosphaera* (*Coelosphaera*) sp. 01 (NIWA 83314, Clarks Seamount) E
- Forcepia* (*Forcepia*) sp. 01 (NIWA 111053, Foveaux Strait) E
- Forcepia* (*Forcepia*) sp. 02 (NIWA 63354, Hikurangi) E
- Forcepia* (*Forcepia*) sp. 03 (NIWA 89568, Chatham Rise) E
- Forcepia* (*Forcepia*) sp. 04 (NIWA 88741, Canterbury) E
- Histodermella australis* Dendy, 1924 E
- Histodermella* sp. 01 (NIWA 51058, Spirits Bay) E
- Histodermella* sp. 02 (NIWA 51334, Spirits Bay) E
- Lissodendoryx* (*Ectyodoryx*) *bifascialis* Lévi & Lévi, 1983
- Lissodendoryx* (*Ectyodoryx*) *creolloides* (Brondsted, 1924) E
- Lissodendoryx* (*Ectyodoryx*) *frondosa* (Ridley & Dendy, 1886) E
- Lissodendoryx* (*Ectyodoryx*) sp. 01 (NIWA 113910, Campbell Is) E
- Lissodendoryx* (*Ectyodoryx*) sp. 02 (NIWA 52081, Subantarctic NZ) E
- Lissodendoryx* (*Ectyodoryx*) sp. 03 (NIWA 72259, Kermadec Is) E
- Lissodendoryx* (*Ectyodoryx*) sp. 04 (NIWA 74833, Otago Shelf) E
- Lissodendoryx* (*Ectyodoryx*) sp. 05 (NIWA 13911, Campbell Is) E
- Lissodendoryx* (*Ectyodoryx*) sp. 06 (NIWA 145708, South Kermadec Ridge) E
- Lissodendoryx* (*Ectyodoryx*) sp. 07 (NIWA 51644, Spirits Bay) E
- Lissodendoryx* (*Lissodendoryx*) cf. *isodictyalis* (Carter, 1882) *sensu* Bergquist & Fromont (1988)
- Lissodendoryx* (*Lissodendoryx*) sp. 10 (NIWA 89733, Bounty Plateau) E
- Lissodendoryx* (*Lissodendoryx*) sp. 02 (NIWA 73224, Middlesex Bank) E
- Lissodendoryx* (*Lissodendoryx*) sp. 03 (NIWA 100952, Three Kings) E
- Lissodendoryx* (*Lissodendoryx*) sp. 04 (NIWA 28523, Chatham Rise) E
- Lissodendoryx* (*Lissodendoryx*) sp. 05 (NIWA 28553, Chatham Rise) E
- Lissodendoryx* (*Lissodendoryx*) sp. 06 (NIWA 39763, Macquarie Ridge) E
- Lissodendoryx* (*Lissodendoryx*) sp. 07 (NIWA 63017, Hikurangi Margin) E
- Lissodendoryx* (*Lissodendoryx*) sp. 08 (NIWA 63863, Hikurangi Margin) E
- Family CRAMBEIDAE
- Crambe* sp. 01 (NIWA 51235, Spirits Bay) E
- Family CRELLIDAE
- Crella* (*Pytheas*) *affinis* (Brondsted, 1924) E
- Crella* (*Pytheas*) *fristedi* (Dendy, 1924) E
- Crella* (*Pytheas*) *novaeseelandiae* (Bergquist & Fromont, 1988) E
- Crella* (*Ynesia*) *acanthosclera* (Lévi & Lévi, 1983)
- Crella* (*incrustans* (Carter, 1885) NI
- Crella* sp. 01 (NIWA 52391, Spirits Bay) E
- Crella* sp. 02 (NIWA 28656, Challenger Plateau) E
- Crella* sp. 03 (NIWA 74289, Moeraki) E
- Family DENDORICELLIDAE
- Dendoricella* sp. 01 (NIWA 51497, Cavalli Seamount) E
- Dendoricella* sp. 02 (NIWA 51782, Cavalli Seamount) E
- Dendoricella* sp. 03 (NIWA 127234, Hikurangi Margin) E
- Fibulia intermedia* (Dendy, 1896)
- Fibulia* (*novaesealandiae* (Brondsted, 1924) E
- Fibulia* sp. 01 (NIWA 28563, Chatham Rise) E
- Pylodermella demonstrans* Dendy, 1924 E
- Pylodermella latrunculoides* (Ridley & Dendy, 1886)
- Pylodermella sphera* (Dendy, 1924) E
- Pylodermella* sp. 01 (NIWA 51795, Cavalli Seamount) E
- Family DESMACIDIIDAE
- Desmacidon* *millatulum* Bergquist & Fromont, 1988 E
- Family ESPERIOPSIDAE
- Amphilectus* *fucorum* (Esper, 1794) *sensu* Bergquist & Fromont (1988) & Dendy (1924) NI
- Amphilectus* *glaber* (Brondsted, 1924) E
- Amphilectus* sp. 01 (NIWA 75051, North Canterbury) E
- Eisperiopsis* *crassofibrosa* Brondsted, 1924 E
- Eisperiopsis* *inodes* Lévi, 1993
- Eisperiopsis* *macrosigna* var. *novaesealandiae* Dendy, 1924
- Eisperiopsis* *megachela* Dendy, 1924 E
- Eisperiopsis* sp. 01 (NIWA 28557, Chatham Rise) E
- Eisperiopsis* sp. 02 (NIWA 82267, Bay of Plenty) E
- Family GUITARRIDAE
- Coelodiscella* *massa* Lévi & Lévi, 1983
- Guitarra* (*bipocillifera* Brondsted, 1924 E
- Guitarra* (*novaesealandiae* Dendy, 1924 E
- Guitarra* sp. 01 (NIWA 28578, Chatham Rise) E
- Tetrapocillon* (*novaesealandiae* Brondsted, 1924
- Family HYMEDIESTRIDAE
- Hamigera kellyae* Santini et al., 2020 E
- Hamigera macrostrongyla* Bergquist & Fromont, 1988 E
- Hamigera taragaensis* Bergquist & Fromont, 1988 E
- Hymedesmia* (*Hymedesmia*) *anisostrongyloxea* Bergquist & Fromont, 1988 E
- Hymedesmia* (*Hymedesmia*) *lundbecki* Dendy, 1924 E
- Hymedesmia* (*Hymedesmia*) *microstrongyla* Bergquist & Fromont, 1988 E
- Hymedesmia* (*Stylopus*) *australis* Bergquist & Fromont, 1988 E
- Hymedesmia* (*Stylopus*) *lissostyla* Bergquist & Fromont, 1988 E
- Hymedesmia* sp. 01 (NIWA 51866, Chatham Rise) E
- Hymedesmia* sp. 02 (NIWA 28593, Challenger Plateau) E
- Hymedesmia* sp. 03 (NIWA 4011, Chatham Rise) E
- Kirkpatrickia* sp. 01 (NIWA 64005, Hikurangi Margin) E
- Phorbas* *bergmontae* Hajdu & Teixeira, 2011 E
- Phorbas* *fulvus* (Bergquist & Fromont, 1988) E
- Phorbas* *intermedius* Bergquist, 1961 E
- Phorbas* sp. 01 (NIWA 131862, Campbell Plateau) E
- Phorbas* sp. 02 (NIWA 74374, Otago) E
- Phorbas* sp. 03 (NIWA 86242, Kermadec Is) E
- Phorbas* sp. 04 (NIWA 25243, Chatham Rise) E
- Phorbas* sp. 05 (NIWA 63686, Hikurangi Margin) E
- Phorbas* sp. 06 (NIWA 76824, Bollons Seamount) E
- Phorbas* sp. 07 (NIWA 75035, Canterbury) E
- Phorbas* sp. 08 (NIWA 51537, Spirits Bay) E
- Phorbas* sp. MITS 01 (NIWAKD 1690, Tauranga PHS) E
- Phorbas* sp. MITS 02 (NIWAKD 1876, Taranaki PHS) E
- Pseudohalicordia* sp. 01 (granular, Bergquist species) E2
- Family IOTROCHOTIDAE
- Amphiastrella* *kirkpatricki* Dendy, 1924 E
- Iotrota* *lamellata* (Bergquist & Fromont, 1988) E
- Iotrota* sp. 01 (NIWA 106272, Reinga Ridge) E
- Family ISODICTYIDAE
- Coelocarteria* *spatulosa* Bergquist & Fromont, 1988 E
- Isodictya* *cavicornuta* Dendy, 1924 E
- Family LATRUNCULIIDAE
- Latruncula* (*Biannulata*) *duckworthi* Alvarez et al., 2002 E
- Latruncula* (*Biannulata*) *kaakaari* Alvarez et al., 2002 E
- Latruncula* (*Biannulata*) *kaikoura* Alvarez et al., 2002 E
- Latruncula* (*Biannulata*) *macquariensis* Kelly & Sim-Smith, 2022 E
- Latruncula* (*Biannulata*) *millerae* Alvarez et al., 2002 E
- Latruncula* (*Biannulata*) *procumbens* Alvarez et al., 2002 E
- Latruncula* (*Biannulata*) *spinispiraefera* Brondsted, 1924 E
- Latruncula* (*Biannulata*) *wellingtonensis* Alvarez et al., 2002 E
- Latruncula* (*Latrunculia*) *brevis* Ridley & Dendy, 1886 E
- Latruncula* (*Latrunculia*) *brevissima* Kelly & Sim-Smith, 2022 E
- Latruncula* (*Latrunculia*) *fiordensis* Alvarez et al., 2002 E
- Latruncula* (*Latrunculia*) *gracilis* Kelly & Sim-Smith, 2022 E
- Latruncula* (*Latrunculia*) *incrystata* Kelly & Sim-Smith, 2022 E
- Latruncula* (*Latrunculia*) *kiwi* Kelly & Sim-Smith, 2022 E
- Latruncula* (*Latrunculia*) *magistra* Kelly & Sim-Smith, 2022 E
- Latruncula* (*Latrunculia*) *morrisoni* Kelly & Sim-Smith, 2022 E
- Latruncula* (*Latrunculia*) *oxydiscorhabda* Alvarez et al., 2002 E
- Latruncula* (*Latrunculia*) *triverticillata* Alvarez et al., 2002 E
- Family MICROCIONIDAE
- Subfamily MICROCIONINAE
- Clathria* (*Axosuberites*) *fromontae* Hooper, 1996 E
- Clathria* (*Axosuberites*) *macrotoxa* (Bergquist & Fromont, 1988) E
- Clathria* (*Axosuberites*) *multitoxaformis* (Bergquist & Fromont, 1988) E
- Clathria* (*Axosuberites*) sp. 01 (NIWA 73220, Three Kings) E
- Clathria* (*Axosuberites*) sp. 02 (OCDN6720-O, Cape Reinga) E
- Clathria* (*Clathria*) *bergquistae* Van Soest & Hooper, 2020 E
- Clathria* (*Clathria*) *chelifera* (Hentschel, 1911) *sensu* Bergquist & Fromont (1988)
- Clathria* (*Clathria*) *contorta* (Bergquist & Fromont, 1988)
- Clathria* (*Clathria*) *intermedia* Kirk, 1911 E
- Clathria* (*Clathria*) *lissosclera* Bergquist & Fromont, 1988 E
- Clathria* (*Clathria*) *mortensenii* (Brondsted, 1924) E
- Clathria* (*Clathria*) *pyramidalis* (Brondsted, 1924) E
- Clathria* (*Clathria*) *terraenovae* Dendy, 1924
- Clathria* (*Clathria*) sp. 01 (NIWA 32132, Three Kings) E
- Clathria* (*Clathria*) sp. 02 (NIWA 69585, Wanganella Bank) E
- Clathria* (*Clathria*) sp. 03 (NIWA 52940, Bay of Plenty) E
- Clathria* (*Isociella*) *incrustans* (Bergquist, 1961) E
- Clathria* (*Isociella*) *macropora* Lendenfeld, 1888
- Clathria* (*Microciona*) *coccinea* (Bergquist, 1961) E
- Clathria* (*Microciona*) *dendyi* (Bergquist & Fromont, 1988) E
- Clathria* (*Microciona*) *leighensis* Hooper, 1996 E
- Clathria* (*Microciona*) *novaezealandiae* (Brondsted, 1924) E
- Clathria* (*Thaliopsis*) *coriocrassus* (Bergquist & Fromont, 1988) E
- Clathria* sp. MITS 01 (NIWAKD 1674, Tauranga PHS) E
- Clathria* sp. MITS 02 (NIWAKD 1772, Tauranga PHS) E
- Clathria* sp. MITS 03 (NIWAKD 1822, Tauranga PHS) E
- Holopasmia crassa* Carter, 1885 *sensu* Bergquist & Fromont (1988)
- Subfamily OPHLITASPONGIINAE
- Antho* (*Acarnia*) *prima* (Brondsted, 1924)
- Antho* (*Acarnia*) sp. 01 (NIWA 86093, Colville Ridge) E
- Antho* (*Acarnia*) sp. 02 (NIWA 52934, Bay of Plenty) E
- Antho* (*Antho*) *brondstedi* Bergquist & Fromont, 1988
- Antho* (*Plocamia*) *novizelanica* (Ridley & Duncan, 1881)
- Artemisina* *jovis* Dendy, 1924 E
- Artemisina* *elegantula* Dendy, 1924
- Artemisina* sp. 01 (NIWA 99636, Bay of Plenty) E
- Artemisina* sp. 02 (NIWA 126157, Hikurangi Margin) E
- Echinocladria* *oceaeta* (Bergquist & Fromont, 1988) E
- Echinocladria* *reticulata* (Bergquist & Fromont, 1988) E
- Echinocladria* sp. 01 (NIWA 80613, Kermadec Is) E
- Ophlitaspomia* sp. 01 (NIWAKD 2005, Cavalli Seamount) E
- Ophlitaspomia* sp. 02 (NIWA 28568, Chatham Rise) E
- Ophlitaspomia* sp. 03 (NIWA 28642, Chatham Rise) E
- Ophlitaspomia* sp. Bergquist & Fromont, 1988 E
- Ophlitaspomia* sp. MITS 01 (NIWAKD 1734, Tauranga PHS) E
- Family MYCALIDAE
- Mycale* (*Aegogropila*) *flagelliformis* (Bergquist & Fromont, 1988) E
- Mycale* (*Arenochalina*) *rara* (Dendy, 1896)
- Mycale* (*Carmia*) *hentscheli* (Bergquist & Fromont, 1988) E
- Mycale* (*Carmia*) *murrayi* (Ridley & Dendy, 1886) *sensu* Bergquist & Fromont (1988)
- Mycale* (*Carmia*) *tasmani* (Bergquist & Fromont, 1988) E
- Mycale* (*Carmia*) sp. 01 (NIWA 99618, South Kermadec Ridge) E
- Mycale* (*Carmia*) sp. 02 (NIWA 51036, Spirits Bay) E
- Mycale* (*Carmia*) sp. 03 (NIWA 51251, Spirits Bay) E
- Mycale* (*Carmia*) sp. MITS 01 (NIWAKD 2715, Dunedin PHS) E
- Mycale* (*Carmia*) sp. MITS 02 (NIWAKD 2720c, Dunedin PHS) E
- Mycale* (*Carmia*) sp. MITS 03 (NIWAKD 2861, Bluff PHS) E
- Mycale* (*Carmia*) sp. MITS 04 (NIWAKD 5517, Whangarei PHS) E
- Mycale* (*Carmia*) sp. MITS 05 (NIWAKD 5679, Chatham PHS) E
- Mycale* (*Carmia*) cf. *macilenta* (Bowerbank, 1866) *sensu* Bergquist & Fromont (1988)
- Mycale* (*Mycale*) *incurvata* Lévi, 1993

- Mycale (Mycale) novaezealandiae* Dendy, 1924 E
Mycale (Naviculina) sp. 01 (NIWA 52874, Bay of Plenty) E
Mycale (Oxymycale) cf. stecarmia (de Laubenfels, 1954) NI
Mycale (Paresperella) microsigma (Bergquist & Fromont, 1988) E
Mycale (Paresperella) sp. 01 (NIWA 101077, Marlborough Sounds) E
Mycale (Paresperella) sp. 02 (NIWA 52754, Chatham Rise) E
Mycale (Paresperella) sp. 03 (NIWA 74784, Otago) E
Mycale (Paresperella) sp. 04 (NIWA 74776, Otago Shelf) E
Mycale (Paresperella) sp. MITS 01 (NIWAKD 1872b, Taranaki PHS) E
Mycale sp. 01 (NIWA 51763, Cavalli Seamount) E
Mycale sp. 02 (NIWA 52147, Kermadecs) E
Mycale sp. 03 (NIWA 86370, Bay of Plenty) E
Mycale sp. 04 (NIWA 99609, Bay of Plenty) E
Phylactaenopora (Barbozia) spina Kelly, 2021 E2
Family MYXILLIDAE
Myxilla (Burtonanchora) sp. 01 (NIWA 52471, Pukaki Rise) E
Myxilla (Burtonanchora) sp. 02 (NIWA 99631, South Norfolk Basin) E
Myxilla (Ectyomyxilla) janeae Van Soest & Hooper, 2020 E
Myxilla (Ectyomyxilla) kerguelensis (Hentschel, 1914)
Myxilla (Ectyomyxilla) tornatota Brondsted, 1924 E
Myxilla (Ectyomyxilla) sp. 01 (NIWA 53368, Chatham Rise) E
Myxilla (Ectyomyxilla) sp. 02 (NIWA 25261, Chatham Rise) E
Myxilla (Ectyomyxilla) sp. 03 (NIWA 52488, Bay of Plenty) E
Myxilla (Ectyomyxilla) sp. 04 (NIWA 25219, Chatham Rise) E
Myxilla (Ectyomyxilla) sp. 05 (NIWA 95102, North Macquarie Ridge) E
Myxilla (Myxilla) columnata Bergquist & Fromont, 1988 E
Myxilla (Myxilla) novaezealandiae Dendy, 1924 E
Myxilla (Styloptilon) fromontae Van Soest & Hooper, 2020 E
Stelodoryx sp. 01 (NIWA 77121, West Norfolk Ridge) E
Family PHELLODERMIDAE
Echinostylinos patriciae Carvalho et al., 2016 E
Echinostylinos stylophora (Lévi & Lévi, 1983)
Echinostylinos tubiformis (Lévi, 1993)
Echinostylinos sp. 01 (NIWA 51755, Cavalli Seamount) E
Echinostylinos sp. 02 (NIWA 51799, Cavalli Seamount) E
Echinostylinos sp. 03 (NIWA 28561, Chatham Rise) E
Echinostylinos sp. 04 (NIWA 31102, Macquarie Ridge) E
Echinostylinos sp. 05 (NIWA 62440, Chatham Is west) E
Family PODOSPONGIIDAE
Diplopodospongia rara Sim-Smith & Kelly, 2011 E
Diplopodospongia teliformis Sim-Smith & Kelly, 2011 E
Neopodospongia bergquistae Sim-Smith & Kelly, 2011 E
Neopodospongia exilis Sim-Smith & Kelly, 2011 E
Neopodospongia pagei Sim-Smith & Kelly, 2011 E
Podospongia virga Sim-Smith & Kelly, 2011 E
Family TEDANIIDAE
Tedania (Tedania) battershilli Bergquist & Fromont, 1988 E
Tedania (Tedania) connectens (Brondsted, 1924) E
Tedania (Tedania) diversiraphidiophora Brondsted, 1924 E
Tedania (Tedania) purpurescens Bergquist & Fromont, 1988 E
Tedania (Tedania) spinostylota Bergquist & Fromont, 1988 E
Tedania (Tediopsis) cristagalli Dendy, 1924 E
Tedania (Tediopsis) massa Ridley & Dendy, 1886
Tedania (Tediopsis) turbinata (Dendy, 1924)
Tedania (Tediopsis) sp. 01 (NIWAKD 3152, Nelson) E
Tedania (Tediopsis) sp. 02 (NIWA 63909, Hikurangi) E
Tedania (Tediopsis) sp. 03 (NIWA 119978, Reinga Ridge) E
Tedania sp. 01 (NIWA 52363, Spirits Bay) E
Tedania sp. 02 (NIWA 28856, Chatham Rise) E
Tedania sp. 03 (NIWA 28644, Challenger Plateau) E
Tedania sp. 04 (NIWA 126058, Kermadec Is) E
Tedania sp. 05 (NIWA 127200, Canterbury) E
Tedania sp. MITS 01 (NIWAKD 3811, Milford Sound PHS) E
Tedania sp. MITS 02 (NIWAKD 5974, Chatham PHS) E
Tedania sp. MITS 03 (NIWAKD 5852, Kaikoura PHS) E
Tedania sp. MITS 04 (NIWAKD 5914, Kaikoura PHS) E
Tedania sp. MITS 05 (NIWAKD 6518, Kaipara PHS) E
Order POLYMASTIIDAE
Family POLYMASTIIDAE
Acanthopolymastia cf. acanthoxa (Koltun, 1964)
Acanthopolymastia bathamae Kelly-Borges & Bergquist, 1997 E
Acanthopolymastia pisiformis Kelly-Borges & Bergquist, 1997
Acanthopolymastia sp. 01 (NIWA 86368, Kermadec Is) E
Atergia villosa Kelly-Borges & Bergquist, 1997 E
Polymastia aurantia Kelly-Borges & Bergquist, 1997 E
Polymastia conigera Bowerbank, 1874 sensu Bergquist (1968)
Polymastia crocea Kelly-Borges & Bergquist, 1997 E
Polymastia echinus Kelly-Borges & Bergquist, 1997 E
Polymastia fusca Brondsted, 1961 E
Polymastia granulosa Brondsted, 1924
Polymastia hirsuta Bergquist, 1968
Polymastia invaginata Kirkpatrick, 1907
Polymastia lorum Kelly-Borges & Bergquist, 1997 E
Polymastia cf. massalis Carter, 1886 (Kelly-Borges & Bergquist, 1997)
Polymastia pepo Kelly-Borges & Bergquist, 1997 E
Polymastia rubens Kelly-Borges & Bergquist, 1997 E
Polymastia umbraculum Kelly-Borges & Bergquist, 1997 E
Polymastia sp. 01 (NIWA 101406, Three Kings) E
Polymastia sp. 02 (NIWAKD 3099, Whangarei) E
Polymastia sp. 03 (NIWA 101698, Kaikoura) E
Polymastia sp. 04 (NIWA 100880, Fiordland) E
Polymastia sp. 05 (NIWA 83123, Bay of Plenty) E
Polymastia sp. 06 (NIWA 52865, Bay of Plenty) E
Polymastia sp. 07 (NIWA 51158, Spirits Bay) E
Polymastia sp. 08 (NIWA 51065, Spirits Bay) E
Polymastia sp. 09 (NIWA 51652, Spirits Bay) E
Polymastia sp. MITS 01 (NIWAKD 5900, Kaikoura PHS) E
Protelea tapetum Kelly-Borges & Bergquist, 1997 E
Radiella irregularis (Ridley & Dendy, 1886)
Sphaerotylus sp. 01 (NIWAKD 3694, Bay of Plenty) E
Spinularia australis Lévi, 1993
Spinularia sp. 01 (NIWA 53230, Chatham Rise) E
Spinularia sp. 02 (NIWA 73208, Middlesex Bank) E
Tentorium papillatum (Kirkpatrick, 1908) E
Tentorium sp. 01 (NIWA 32034, Hikurangi Plateau) E
Tentorium sp. 02 (NIWA 72097, Kermadecs) E
Tentorium sp. 03 (NIWA 52383, Spirits Bay) E
Tentorium sp. 04 (NIWA 53783, Chatham Rise) E
Polymastiidae gen. et sp. 1 (NIWA 28492, Chatham Rise) E
Polymastiidae gen. et sp. 2 (NIWA 51125, Spirits Bay) E
Polymastiidae gen. et sp. 3 (NIWA 51138, Spirits Bay) E
Order SCOPALINIDA
Family SCOPALINIDAE
Scopalina sp. 01 (NIWA 94724, Spirits Bay, of Alvarez) E
Scopalina sp. MITS 02 (NIWAKD 2592a, Whangarei PHS) E
Stylissa haurakii (Brondsted, 1924) E
Stylissa sp. 01 (NIWA 52377, Spirits Bay) E
Order SUBERITIDA
Family HALICHONDRIIDAE
Amorphinopsis sp. 01 (NIWAKD 3156, Nelson) E
Amorphinopsis sp. MITS 02 (NIWAKD 2651, Napier PHS) E
Axinyssa sp. 01 (NIWA 62364, Marlborough Sounds) E
Axinyssa sp. 02 (NIWA 73800, North Taranaki Bight) E
Axinyssa sp. 03 (NIWA 75319, Ranfurly Banks) E
Ciocalyptra penicillus Bowerbank, 1862 sensu Bergquist (1970) NI
Ciocalyptra polymastia (Lendenfeld, 1888) sensu Bergquist (1970) NI
Ciocalyptra tyleri Bowerbank, 1873
Ciocalyptra sp. 01 (NIWA 52415, Spirits Bay) E
Ciocalyptra sp. 02 (NIWA 141767, Bay of Plenty) E
Ciocalyptra sp. 03 (NIWA 101961, Spirits Bay) E
Ciocalyptra sp. 04 (NIWA 51253, Spirits Bay) E
Ciocalyptra sp. 05 (NIWA 51264, Spirits Bay) E
Ciocalyptra sp. 06 (NIWA 51146, Spirits Bay) E
Ciocalyptra sp. 07 (NIWA 51150, Spirits Bay) E
Ciocalyptra sp. 08 (NIWA 51284, Spirits Bay) E
Ciocalyptra sp. 09 (NIWA 51164, Spirits Bay) E
Halichondria (Halichondria) intermedia Brondsted, 1924 E
Halichondria (Halichondria) knowltoni Bergquist, 1961 E
Halichondria (Halichondria) moorei Bergquist, 1961 E
Halichondria (Halichondria) panicea (Pallas, 1766) sensu Bergquist (1970) NI
Halichondria (Halichondria) punctata Bergquist, 1970 E
Halichondria sp. 01 (NIWA 100964, Three Kings) E
Halichondria sp. 02 (NIWA 155515, Port Waikato) E
Halichondria sp. 03 (NIWA 53476, Chatham Rise) E
Halichondria sp. 04 (NIWA 51893, Chatham Rise) E
Halichondria sp. 05 (NIWA 102112, Manukau) E
Halichondria sp. 06 (NIWA 126303, Hawke Bay) E
Halichondria sp. 07 (NIWA 81615, Taranaki) E
Halichondria sp. 08 (NIWA 51581, Spirits Bay) E
Halichondria sp. MITS 01 (NIWAKD 1138, Nelson PHS) E
Halichondria sp. MITS 02 (NIWAKD 1334, Wellington PHS) E
Halichondria sp. MITS 03 (NIWAKD 1669, Tauranga PHS) E
Halichondria sp. MITS 04 (NIWAKD 1870, Taranaki PHS) E
Halichondria sp. MITS 05 (NIWAKD 1566, Nelson PHS) E
Halichondria sp. MITS 06 (NIWAKD 1581, Timaru PHS) E
Halichondria sp. MITS 07 (NIWAKD 2680, Dunedin PHS) E
Halichondria sp. MITS 08 (NIWAKD 2749, Dunedin PHS) E
Halichondria sp. MITS 09 (NIWAKD 5807, Manukau PHS) E
Halichondria sp. MITS 10 (NIWAKD 5818, Manukau PHS) E
Halichondria sp. MITS 11 (NIWAKD 5865a, Kaikoura PHS) E
Hymeniacidon agminata (Ridley, 1884 sensu Brondsted (1924))
Hymeniacidon conica (Kirk, 1909) E
Hymeniacidon cf. perlevis (Montague, 1814) sensu Bergquist (1970) NI
Hymeniacidon racemosa Brondsted, 1924 E
Hymeniacidon sphaerodigitata Bergquist, 1970 E
Hymeniacidon sp. 01 (NIWA 100816, off East Cape) E
Hymeniacidon sp. 02 (NIWA 28572, Chatham Rise) E
Hymeniacidon sp. 03 (OCDN6761-J, Spirits Bay) E
Hymeniacidon sp. MITS 01 (NIWAKD 2729, Dunedin PHS) E
Spongisorites sp. 01 (NIWA 94243, Bream Bay) E
Topsisentia bubaroides (Lévi & Lévi, 1983)
Topsisentia novaezealandiae (Dendy, 1924) E
Topsisentia rugosa (Ridley & Dendy, 1886) sensu Bergquist (1961)
Topsisentia sp. 01 (NIWA 100993, North Cape) E
Topsisentia sp. 02 (NIWA 51798, Cavalli Seamount) E
Topsisentia sp. 03 (NIWA 101494, Spirits Bay) E
Topsisentia sp. 04 (NIWA 80634, Subantarctic NZ) E
Topsisentia sp. 05 (NIWA 69615, Northland) E
Topsisentia sp. 06 (NIWA 92892, Campbell Is) E
Topsisentia sp. 07 (NIWA 83291, South Kermadec Ridge) E
Halichondriidae gen. et sp. nov. 01 (AMZ7027, Kermadec Is) E
Halichondriidae gen. et sp. nov. 02 (NIWA 26993, Hikurangi Margin) E
Family STYLOCORDYLIDAE
Stylocordyla australis Bergquist, 1972 E
Stylocordyla borealis (Loven, 1868) sensu Bergquist (1972)
Stylocordyla fragilis Bergquist, 1972
Family SUBERITIDAE
Aaptos conferta Kelly-Borges & Bergquist, 1994 E
Aaptos globosa Kelly-Borges & Bergquist, 1994 E
Aaptos rosacea Kelly-Borges & Bergquist, 1994 E
Aaptos tenta Kelly-Borges & Bergquist, 1994 E
Aaptos sp. 01 (NIWA 51568, Spirits Bay) E
Aaptos sp. 02 (NIWA 28592, Challenger Plateau) E
Homaxinella erecta (Brondsted, 1924) E
Homaxinella sp. 01 (NIWAKD 1961, Cavalli Seamount) E
Homaxinella sp. 02 (NIWA 31185, Hikurangi Plateau) E
Homaxinella sp. 03 (NIWA 28576, Chatham Rise) E
Plicatellopsis sp. 01 (NIWA 86171, Colville Ridge) E
Plicatellopsis sp. 02 (NIWA 31159, Bay of Plenty) E
Plicatellopsis sp. 03 (NIWA 25140, Chatham Rise) E
Plicatellopsis sp. 04 (NIWA 27284, Chatham Rise) E
Plicatellopsis sp. 05 (NIWA 75608, Ranfurly Banks) E
Protosuberites novaezealandiae Kelly & Rowden, 2019 E
Prosuberites sp. 01 (NIWA 52855, Bay of Plenty) E
Prosuberites sp. 01 (NIWA 28554, Chatham Rise) E
Prosuberites sp. 02 (NIWA 92893, Campbell Is) E
Pseudosuberites sulcatus (Thiele, 1905) sensu Bergquist (1968) NI
Pseudosuberites thurberi Kelly & Rowden, 2019 E
Pseudosuberites sp. 01 (NIWA 93408, Bay of Islands) E
Pseudosuberites sp. 02 (NIWA 74300, Canterbury) E
Pseudosuberites sp. 03 (NIWA 113881, Campbell Is) E
Rhizaxinella cf. dichotoma Lévi, 1993
Rhizaxinella sp. 01 (NIWA 53091, Chatham Is) E
Suberites perfectus Ridley & Dendy, 1886 sensu Bergquist (1968) NI
Suberites affinis Brondsted, 1924 E
Suberites anastomosis Brondsted, 1924 E
Suberites australiensis Bergquist, 1968
Suberites axinelloides Brondsted, 1924
Suberites caminatus Ridley & Dendy, 1886
Suberites carnosus var. *novaezealandiae* Dendy, 1924 E
Suberites cupuloides Bergquist, 1961
Suberites holgeri Van Soest & Hooper, 2020 E
Suberites cf. microstomus Ridley & Dendy, 1887
Suberites pisiformis Lévi, 1993
Suberites sp. 01 (NIWA 48515, Chatham Rise) E
Suberites sp. 02 (NIWA 52151, Kermadec Ridge) E
Suberites sp. 03 (NIWA 101465, Cape Reinga) E
Suberites sp. 04 (NIWA 53439, Chatham Rise) E
Suberites sp. 05 (NIWA 51064, Spirits Bay) E
Suberites sp. 06 (NIWA 51393, Spirits Bay) E
Suberites sp. 07 (NIWA 51489, Spirits Bay) E
Order TETHYIDA
Family HEMIASTERELLIDAE
Hemasterella topsenti (Lévi & Lévi, 1983) E
Hemasterella sp. 01 (NIWA 73223, Middlesex Bank) E
Family TETHYIDAE
Halicometes hooperi Lévi, 1993
Halicometes sp. MITS 01 (NIWAKD 5935, Chatham Is PHS) E
Tethya amplexa Bergquist & Kelly-Borges, 1991 E
Tethya bergquistae Hooper in Hooper & Wiedenmayer 1994 NI
Tethya bullae Bergquist & Kelly-Borges, 1991
Tethya burtoni Sarà & Sarà, 2004 E
Tethya compacta Bergquist, 1961 E
Tethya deformis Thiele, 1898
Tethya expansa Sarà & Sarà, 2004
Tethya fastigata Bergquist & Kelly-Borges, 1991 E
Tethya mortoni Bergquist & Kelly-Borges, 1991 E
Tethya multistella Lendenfeld, 1888 sensu Sarà & Sarà (2004)
Tethya stolonifera Bergquist & Kelly-Borges, 1991 E
Tethya sp. 01 (NIWA 101705, Kaikoura) E
Tethya sp. 02 (NIWA 80616, Kermadec Is) E
Tethya sp. 03 (NIWA 5677, South Island) E
Family TIMEIDAE
Timea alba Bergquist, 1968 E
Timea aurantiaca Bergquist, 1968 E
Order TETRACTINELLIDA
Suborder ASTROPHORINA
Family ANCORINIDAE
Ancorina bellae Kelly & Sim-Smith, 2012 E
Ancorina diplococcus Dendy, 1924 E
Ancorina globosa Kelly & Sim-Smith, 2012 E
Ancorina stalagmoides Dendy, 1924 E
Chelotropella sp. 01 (NIWA 91029, Otago) E
Chelotropella sp. 02 (NIWA 44561, Challenger Plateau) E

- Ecionemia alata* (Dendy, 1924) E
Ecionemia novaezealandiae (Dendy, 1924) E
Ecionemia sp. 01 (NIWA 94368, Louisville Seamount) E2
Holoxea sp. 01 (NIWA 101646, Mernoon Bank) E
Holoxea sp. 02 (NIWA 139315, North Cape) E
Jaspis novaezealandiae Dendy, 1924 E
Jaspis sp. 01 (NIWA 101563, Three Kings) E
Jaspis sp. 02 (NIWA 106469, Campbell Plateau) E
Rhabdastrella cf. *aurora* (Hentschel, 1909) *sensu* Bergquist (1968)
Rhabdastrella sp. 01 (NIWA 102222, Snares Platform) E
Stelletta arenaria Bergquist, 1968 E
Stelletta centroradiata Lévi & Lévi, 1983
Stelletta cf. *communis* (Sollas, 1886)
Stelletta conulosa Bergquist, 1968 E
Stelletta crater Dendy, 1924 E
Stelletta lithodes Bergquist, 1968 E
Stelletta maori Dendy, 1924 E
Stelletta maxima Thiele, 1898
Stelletta novaezealandiae Brondsted, 1924 E
Stelletta phialimorpha Lévi, 1993
Stelletta cf. *purpurea* Ridley, 1884
Stelletta cf. *radicifera* Wilson, 1925
Stelletta sandalinum Brondsted, 1924 E
Stelletta sp. 01 (NIWA 76473, Chatham Rise) E
Stelletta sp. 02 (NIWA 72695, Kermadecs) E
Stelletta sp. 03 (NIWA 51766, Cavalli Seamount) E
Stelletta sp. 04 (NIWA 51777, Cavalli Seamount) E
Stelletta sp. 05 (NIWA 51218, Kermadecs) E
Stelletta sp. 06 (NIWA 51266, Spirits Bay) E
Stelletta sp. 07 (NIWA 75781, Chatham Rise) E
Stelletta sp. 08 (NIWA 52520, Challenger Plateau) E
Stelletta sp. 09 (NIWA 31619, Challenger Plateau) E
Stelletta sp. 10 (NIWA 34606, Chatham Rise) E
Stelletta sp. 11 (NIWA 52647, Macquarie Ridge) E
Stelletta sp. 12 (NIWA 39718, Kermadec Ridge) E
Stelletta sp. 14 (NIWA 75630, Ranfurly Banks) E
Stelletta sp. 15 (NIWA 86092, Colville Ridge) E
Stelletta sp. 16 (NIWA 52905, Bay of Plenty) E
Stelletta sp. 17 (NIWA 94881, Canterbury) E
Stelletta sp. 18 (NIWA 62447, Campbell Rise) E
Stelletta sp. MITS 01 (NIWAKD 5986, Chatham Is PHS) E
Stelletta sp. MITS 02 (NIWAKD 5905, Kaikoura PHS) E
Stryphnus ariena Kelly & Sim-Smith, 2012
Stryphnus atypicus Kelly & Sim-Smith, 2012 E
Stryphnus levis Kelly & Sim-Smith, 2012 E
Stryphnus novaezealandiae Kelly & Sim-Smith, 2012 E
Stryphnus poculum Kelly & Sim-Smith, 2012 E
Stryphnus spelunca Kelly & Sim-Smith, 2012 E
Tethyopsis calcifera (Bergquist, 1968) E
Tethyopsis mortensenii (Brondsted, 1924) E
Tethyopsis sp. 01 (NIWA 61541, Chatham Rise) E
Tethyopsis sp. 02 (NIWA 101191, Great Barrier Is) E
Tethyopsis sp. 03 (NIWA 25158, Chatham Rise) E
Tethyopsis sp. 04 (NIWA 86754, Middlesex Bank) E
Family CALTHROPELLIDAE
Calthropella (*Calthropella*) sp. 01 (NIWA 86095, Kermadec Ridge) E
Calthropella (*Calthropella*) sp. 02 (NIWA 62850, Chatham Rise) E
Calthropella (*Corticellopsis*) *novaezealandiae* (Bergquist, 1961) E
Calthropella (*Pachataxa*) *enigmatica* (Lévi & Lévi, 1983)
Family CORALLISTIDAE
Awhiohio oshei Kelly, 2007 E
Awhiohio sepalichrum Kelly, 2007 E
Awhiohio undula Kelly, 2007 E
Awhiohio sp. 01 (NIWA 93463, South Maria Ridge) E
Herengeria auriculata Lévi & Lévi, 1988
Herengeria vasiformis Schlacher-Hoellinger et al., 2005
Neoschrammiella fulvodesmus (Lévi & Lévi, 1983)
Family GEODIIDAE
Subfamily ERYLINAE
Erylus fallax Sim-Smith & Kelly, 2015 E
Erylus niger Bergquist, 1968 E
Penares astronavis Sim-Smith & Kelly, 2019 E
Penares aureus Sim-Smith & Kelly, 2019 E
Penares deformis Sim-Smith & Kelly, 2019 E
Penares kermadecensis Sim-Smith & Kelly, 2019 E
Penares micraster Lévi, 1994
Penares mollis Sim-Smith & Kelly, 2019 E
Penares okokewae Sim-Smith & Kelly, 2019 E
Penares orbis Sim-Smith & Kelly, 2019 E
Penares palmatoclada Lévi, 1994
Penares schulzei (Dendy, 1905)
Penares turmericolor Sim-Smith & Kelly, 2019 E
Penares tylostater Dendy, 1924 E
Penares vermiculatus Sim-Smith & Kelly, 2019 E
Subfamily GEODIINAE
Geodia campbellensis Sim-Smith & Kelly, 2015
Geodia chathamensis Sim-Smith & Kelly, 2015 E
Geodia copiosa Sim-Smith & Kelly, 2015 E
Geodia evok Sim-Smith & Kelly, 2015 E
Geodia harpago Sim-Smith & Kelly, 2015 E
Geodia kermadecensis Sim-Smith & Kelly, 2015 E
Geodia leosimi Sim-Smith & Kelly, 2015 E
Geodia margarita Sim-Smith & Kelly, 2015 E
Geodia nodosa (Sim-Smith & Kelly, 2015) E
Geodia praelonga Sim-Smith & Kelly, 2015 E2
Geodia regina Dendy, 1924 E
Geodia rex Dendy, 1924 E
Geodia sadiemilliae Sim-Smith & Kelly, 2015 E
Geodia sagitta Sim-Smith & Kelly, 2015 E
Geodia tenera Sim-Smith & Kelly, 2015 E2
Geodia vadi Sim-Smith & Kelly, 2015 E
Geodia vaubani Lévi & Lévi, 1983
Geodia vestigifera (Dendy, 1924)
Geodia williami Sim-Smith & Kelly, 2015 E
Family ISORAPHINIIDAE
Costifer wilsoni Lévi, 1994
Family MACANDREWIAE
Macandrewia spinifolifata Lévi & Lévi, 1983
Family NEOPELTIIDAE
Homophymia stipitata Kelly, 2000 E2
Neopeltis pulvinis Kelly, 2007 E
Sollasipelta punctata (Lévi & Lévi, 1983)
Family PACHASTRELLIDAE
Ancorella sp. 01 (NIWA 52535, Chatham Rise) E
Ancorella sp. 02 (NIWA 64335, Kermadecs) E
Brachiaster simplex Wilson, 1925
Characella sp. 01 (NIWA 102227, Southern Ocean) E
Characella sp. 02 (NIWA 72191, South Kermadec Ridge) E
Characella sp. 03 (NIWA 53154, Bay of Plenty) E
Characella sp. 04 (NIWA 76256, Mahina Knoll) E
Characella sp. 05 (NIWA 86793, Macquarie Ridge) E
Characella sp. 06 (NIWA 69582, Wangangella Bank) E
Pachastrella incrassata Bergquist, 1968 E
Pachastrella sp. 01 (NIWA 25108, Chatham Rise) E
Pachastrella sp. 02 (NIWA 28590, Challenger Plateau) E
Pachastrella sp. 03 (NIWA 86757, Middlesex Bank) E
Triptolemma sp. 01 (NIWA 44567, South Maria Ridge) E
Pachastrellidae sp. 01 (NIWA 155018, Macquarie Ridge) E2
Pachastrellidae sp. 02 (NIWA 41140, Macquarie Ridge) E
Pachastrellidae sp. 03 (NIWA 62913, Thompson Seamount) E
Family PHYMARAPHINIIDAE
Lepidothenea incrustans (Dendy, 1924) E
Family PHYMATELLIDAE
Neoaulaxinia clavata (Lévi & Lévi, 1988)
Neoaulaxinia persicum Kelly, 2007
Neoaulaxinia zingiberidax Kelly, 2007
Neosiphonia motukawani Kelly, 2007 E
Neosiphonia superstes Sollas, 1888
Reidispongia corerulea Lévi & Lévi, 1988
Family PLEROMIDAE
Pleroma aotea Kelly, 2003 E
Pleroma menoui Lévi & Lévi, 1983
Pleroma turbinatum Sollas, 1888
Family THENEIDAE
Thenea novaezealandiae Bergquist, 1961 E
Thenea sp. 01 (NIWA 76262, Bay of Plenty) E
Thenea sp. 02 (NIWA 28587, Challenger Plateau) E
Cladothenea sp. 01 (NIWA 28581, Challenger Plateau) E
Cladothenea sp. 02 (NIWA 64757, South Kermadec Ridge) E
Cladothenea sp. 03 (NIWA 33761, Chatham Rise) E
Cladothenea sp. 04 (NIWA 94028, Louisville Seamount) E2
Thenea cf. *wrightii* Sollas, 1886
Family THEONELLIDAE
Discodermia proliferans Lévi & Lévi, 1983
Family THROMBIDAE
Thrombus sp. 01 (NIWA 43407, West Cavalli Seamount) E
Family VULCANELLIDAE
Vulcanella orthotriaena (Lévi & Lévi, 1983)
Lamellomorpha australis Kelly & Cardenas, 2019 E
Lamellomorpha strongylata Bergquist, 1968 E
Poecillastra ducitriaena Kelly & Cardenas, 2019 E
Poecillastra laminaris (Sollas, 1888)
Poecillastra macquariensis Kelly & Cardenas, 2019 E
Poecillastra schulzei (Sollas, 1886)
Poecillastra sp. 01 (NIWA 94438, Louisville Ridge) E2
Poecillastra sp. 02 (NIWA 39600, Macquarie Ridge) E
Poecillastra sp. 03 (NIWA 94238, Louisville Seamount) E2
Suborder SPiROPHORINA
Family AZORICIDAE
Leiodermatium linea Kelly, 2007 E
Family SCLERITODERMIDAE
Aciculites manawatawai Kelly, 2007 E
Aciculites pulchra Dendy, 1924
Aciculites sulcus Kelly, 2007 E
Microscleroderma novaezealandiae Kelly, 2007 E
Sclerodifteria flabelliformis Sollas, 1888
Family STUPENDIIDAE
Stupenda singularis Kelly & Cardenas, 2016 E
Family TEILTILLIDAE
Antartotetilla leptoderma (Sollas, 1886)
Antarctotetilla sagitta (Lendenfeld, 1907)
Cinachrya barbata Sollas, 1886
Cinachrya sp. 01 (NIWA 80628, Subantarctic NZ)
Cinachrylla novaezealandiae (Brondsted, 1924) E
Cinachrylla uteoides (Dendy, 1924) E
Cinachrylla sp. 01 (NIWA 101507, Spirits Bay) E
Craniella metaclada (Lendenfeld, 1907)
Craniella neocoledonica Lévi & Lévi, 1983
Craniella sp. 01 (NIWA 101777, Campbell Plateau) E
Craniella sp. 02 (NIWA 25223, Chatham Rise) E
Craniella sp. 03 (NIWA 25213, Macquarie Ridge) E
Craniella sp. 04 (NIWA 52095, Stewart Island) E
Craniella sp. 05 (NIWA 51312, Spirits Bay) E
Fangophilina sp. Szitzenberg et al., 2013 E
Fangophilina sp. 01 (NIWA 28545, Chatham Rise) E
Fangophilina sp. 02 (NIWA 82486, Bay of Plenty) E
Fangophilina sp. 03 (NIWA 93429, Caravel, Otago) E
Tetilla australis Bergquist, 1968 E
Tetilla sp. 01 (NIWA 52400, Spirits Bay) E
Tetillidae sp. 01 (NIWA 75316, Ranfurly Banks) E
Suborder THOOSINA
Family THOOSIDAE
Alectona sp. 01 (NIWA 76239, Chatham Rise) E
Order TRACHYCLADIDA
Family TRACHYCLADIDAE
Rhaphidhista mirabilis (Dendy, 1924) E
Trachycladus spinispirulifer (Carter, 1879)
Trachycladus stylifer Dendy, 1924
Trachycladus sp. 01 (NIWA 98616, Macquarie Ridge) E
Trachycladus sp. 02 (0CDN6708-Z, Three Kings) E
Subclass KERATOSA
Order DENDROCRATIDA
Family DARWINELLIDAE
Armodendrilla bergquistiae Van Soest & Hooper, 2020
Chelonaplysilla cf. *violacea* (Lendenfeld, 1883) *sensu* Bergquist (1996) NI
Darwinella cf. *gardineri* Topsent, 1905 *sensu* Bergquist (1996)
Darwinella oxeata Bergquist, 1961
Darwinella sp. 01 (NIWA 73712, of Bergquist, Taranaki) E
Dendrilla rosea Lendenfeld, 1883
Dendrilla sp. 01 (NIWA 11654, Foveaux Strait) E
Dendrilla sp. MITS 02 (NIWAKD 6007, Dunedin PHS) E
Dendrilla sp. MITS 03 (NIWAKD 2591, Auckland Viaduct PHS) E
Family DICTYODENDRILLIDAE
Acanthodendrilla sp. 01 (NIWA 52301, Kawau) E
Acanthodendrilla sp. 02 (NIWA 52519, Challenger Plateau) E
Acanthodendrilla sp. 03 (NIWA 74290, North Otago) E
Acanthodendrilla sp. 04 (NIWA 73213, Middlesex Bank) E
Dictyodendrilla *dendyi* Bergquist, 1996
Dictyodendrilla sp. 01 (NIWA 51188, Spirits Bay) E
Dictyodendrilla sp. 02 (NIWA 81610, South Taranaki Right) E
Dictyodendrilla sp. 03 (NIWA 51521, Spirits Bay) E
Dictyodendrilla sp. MITS 01 (NIWAKD 6022, Dunedin PHS) E
Order DICTYOCERATIDA
Family DYSIDEIDAE
Dysidea cristagalli Bergquist, 1961 E
Dysidea hirciniformis (Carter, 1885) *sensu* Dendy (1924)
Dysidea navicularis (Lendenfeld, 1888) E
Dysidea ramsayi (Lendenfeld, 1888)
Dysidea spiculivora (Dendy, 1924) E
Dysidea teawanui Kelly et al., 2020 E
Dysidea tuapokeri Kelly et al., 2020 E
Dysidea sp. a Brondsted, 1924 E
Dysidea sp. b Brondsted, 1924 E
Dysidea sp. nov. Battershill et al., 2010 E
Dysidea sp. 01 (NIWA 51207, Spirits Bay) E
Dysidea sp. 02 (NIWA 51083, Spirits Bay) E
Dysidea sp. 03 (NIWA 51139, Spirits Bay) E
Dysidea sp. 04 (NIWA 51591, Spirits Bay) E
Dysidea sp. MITS 01 (NIWAKD 1160, Wellington PHS) E
Dysidea sp. MITS 02 (NIWAKD 1701, Tauranga PHS) E
Dysidea sp. MITS 03 (NIWAKD 1527, Picton PHS) E
Dysidea sp. MITS 04 (NIWAKD 2753, Dunedin PHS) E
Dysidea sp. MITS 05 (NIWAKD 2768, Dunedin PHS) E
Dysidea sp. MITS 06 (NIWAKD 5514d, Whangarei PHS) E
Dysidea sp. MITS 07 (NIWAKD 5965, Chatham Is PHS) E
Dysidea sp. MITS 08 (NIWAKD 5980, Chatham Is PHS) E
Eurypongia arenaria Bergquist, 1961 E
Eurypongia sp. 01 (NIWA 100878, Fiordland) E
Eurypongia sp. 02 (NIWA 101124, Great Barrier Is) E
Eurypongia sp. 03 (NIWA 52458, Chatham Rise) E
Eurypongia sp. 04 (NIWA 74172, Pegasus Canyon) E
Eurypongia sp. MITS 01 (NIWAKD 1154, Wellington PHS) E
Eurypongia sp. MITS 02 (NIWAKD 1677, Tauranga PHS) E
Eurypongia sp. MITS 03 (NIWAKD 1709, Whangarei PHS) E
Pleraplysilla sp. MITS 01 (NIWAKD 4599d, Wellington PHS) E
Family IRPINIIDAE
Ircinia akaroa Cook & Bergquist, 1999 E
Ircinia aucklandensis Cook & Bergquist, 1999 E
Ircinia fistulosa Cook & Bergquist, 1999 E
Ircinia novaezealandiae Bergquist, 1961 E
Ircinia subsapera Cook & Bergquist, 1999 E
Ircinia turritta Cook & Bergquist, 1999 E
Ircinia undulans Cook & Bergquist, 1999 E
Ircinia sp. 01 (NIWA 86757, Pelorus Sound) E
Ircinia sp. 02 (NIWAKD 5027, Pelorus Sound) E
Ircinia sp. 03 (NIWAKD 5019, Bream Bay) E
Ircinia sp. 04 (NIWA 81572, Taranaki) E
Psammocinia amodes Cook & Bergquist, 1998 E
Psammocinia beresfordae Cook & Bergquist, 1998 E
Psammocinia charadrodes Cook & Bergquist, 1998 E
Psammocinia sp. *haware* Cook & Bergquist, 1996 E
Psammocinia *hirsuta* Cook & Bergquist, 1998 E
Psammocinia *maorimotu* Cook & Bergquist, 1998 E
Psammocinia *papillata* Cook & Bergquist, 1998 E
Psammocinia *perforadora* Cook & Bergquist, 1998 E
Psammocinia *verrucosa* Cook & Bergquist, 1996 E
Psammocinia sp. 01 (NIWA 28430, East Coast South Island) E
Psammocinia sp. 02 (NIWA 52902, Bay of Plenty) E
Psammocinia sp. MITS 01 (NIWAKD 5960, Chatham Is PHS) E
Psammocinia sp. MITS 02 (NIWAKD 6146, Dunedin PHS) E

- Psammocinia* sp. A (SDCC/NZ184) Cook & Bergquist, 1998 E
Psammocinia sp. B (SDCC/NZ175) Cook & Bergquist, 1998 E
Psammocinia sp. C (SDCC/NZ067) Cook & Bergquist, 1998 E
Psammocinia sp. D (SDCC/NZ103) Cook & Bergquist, 1998 E
Sarcotragus sp. 01 (NIWA 31120, Mahina Knoll) E
Sarcotragus sp. 02 (NIWA 101400, North Cape) E
Sarcotragus sp. 03 (NIWA 88636, West Norfolk Ridge) E2
Sarcotragus sp. A Cook, 2000 E
Sarcotragus sp. B Cook, 2000 E
Family SPONGIIDAE
Coscinoderm sp. 01 (NIWA 28641, Challenger Plateau) E
Coscinoderm sp. 02 (NIWA 75609, Ranfurly Bank) E
Leiosella levis (Lendenfeld, 1886)
Spongia (Australospingia) gracilis Cook & Bergquist, 2001 E
Spongia (Heterofibria) corrugata Cook & Bergquist, 2001 E
Spongia (Heterofibria) decooki Van Soest & Hooper, 2020 E
Spongia (Heterofibria) gorgonocephalus Cook & Bergquist, 2001
Spongia (Heterofibria) manipulatus Cook & Bergquist, 2001 E
Spongia (Heterofibria) mokohinau Cook & Bergquist, 2001 E
Spongia (Heterofibria) sp. 01 (NIWA 52044, Mahina Knoll) E
Spongia (Heterofibria) sp. 02 (NIWA 62481, Port Pegasus) E
Spongia sp. 03 (NIWA 100960, Three Kings) E
Spongia sp. 04 (NIWA 75621, Ranfurly Bank) E
Family THORECTIDAE
Subfamily THORECTINAE
Aplysinopsis sp. 01 (NIWA 51608, Spirits Bay)
Cacospongia *serta* (Lendenfeld, 1888)
Cacospongia sp. 01 (NIWA 101498, Spirits Bay) E
Fasciopongia *turgida* (Lamarck, 1814)
Narrabeena sp. 01 (NIWA 101351, Pandora Bank) E
Semitaspongia *bactriana* Cook & Bergquist, 2000 E
Semitaspongia *glebosca* Cook & Bergquist, 2000 E
Semitaspongia *incompta* Cook & Bergquist, 2000 E
Semitaspongia *nigrachorda* Cook & Bergquist, 2000 E
Semitaspongia *pulvinata* Cook & Bergquist, 2000 E
Taonura *marginalis* (Lendenfeld, 1888)
Thorecta *reticulata* Cook & Bergquist, 1996 E
Thorectandra *papillosa* Cook & Bergquist, 1996 E
Subclass VERONGIMORPHA
Order CHONDRILLIDA
Family CHONDRILLIDAE
Thymosina sp. 01 (NIWA 101677, Kaikoura) E
Family HALISARCIDAE
Halisarca dujardinii Johnston, 1842 *sensu* Bergquist (1996) NI
Order CHONDROSIIDA
Family CHONDROSIIDAE
Chondrosia sp. 01 (NIWA 80617, Kermadecs) E
Chondrosia sp. 02 (NIWA 52844, Bay of Plenty) E
Chondrosia sp. 03 (NIWA 89730, Bounty Plateau) E
Order VERONGIIDA
Family APLYSINELLIDAE
Patriciophysina sp. 01 (NIWA 101244, Three Kings) E
Suberea *meandrina* Kelly, 2015 E
Pseudoceratina sp. 01 (NIWA 101349, Pandora Bank) E
Class HEXACTINELLIDA
Subclass AMPHIDISCOPHORA
Order AMPHIDISCOSIDA
Family HYALONEMATIDAE
Chalaronema *sibogae* Ijima, 1927
Hyalonema (Corynonema) *tenuifusum* Lendenfeld, 1915 E2
Hyalonema (Coscinonema) sp. 01 (NIWA 64472, South Kermadec Ridge) E
Hyalonema (Coscinonema) sp. 02 (NIWA 82948, South Kermadec Ridge) E
Hyalonema (Cyliconema) *apertum* *apertum* Schulze, 1888
Hyalonema (Cyliconema) *tasmani* Lévi, 1964 E
Hyalonema (Cyliconema) sp. 01 (NIWA 52043, Bay of Plenty) E
Hyalonema (Cyliconema) sp. 02 (NIWA 72260, South Kermadec Ridge) E
Hyalonema (Oonema) cf. *bipinnulum* Lévi, 1964 E2
Hyalonema (Oonema) sp. 01 (NIWA 64948, Kermadec Deep) E
Hyalonema (Oonema) sp. 02 (NIWA 85304, Chatham Rise) E
Hyalonema (Thamnonemiella) *thamnophorum* Ijima, 1927
Hyalonema sp. (NIWA 94260, Louisville Ridge) E2
Hyalonema sp. nov. (NIWA 126036) Dohrmann et al., 2023 (p. 11, fig. 2A–C) E
Hyalonema sp. Lévi, 1964 E
Family MONORHAPHIDIDAE
Monorhaphis chuni Schulze, 1904
Family PHERONEMATIDAE
Schulzevella gigas (Schulze, 1886)
Ijimalophus cf. *reflexus* (Iijima, 1894)
Pheronema cf. *conicum* Lévi & Lévi, 1982 E2
Pheronema cf. *semiglobosum* Lévi & Lévi, 1982
Pheronema cf. *amphorae* Reiswig, 1992
Pheronema cf. *annae* Leidy, 1868
Pheronema sp. nov. (NIWA 126138) Dohrmann et al., 2023 (p. 11, fig. 2D–F) E
Pheronema sp. 01 (NIWA 76481, off Hawke Bay) E
Poliopogon sp. nov. (NIWA 126337) Dohrmann et al., 2023 (p. 11, fig. 2G, H) E
Semperella schultzei (Semper, 1868)
Semperella sp. 01 (NIWA 34633, Chatham Rise) E
Semperella sp. 02 (NIWA 25195, Chatham Rise) E
Semperella sp. 03 (NIWA 51939, Chatham Rise) E
Subclass HEXASTEROPHORA
Order HEXASTEROPHORA INCERTAE SEDIS
Heteroreta norfolkense Reiswig & Kelly, 2017
Order LYSSACINOSIDA
Family AULOCALYCIDAЕ
Subfamily AULOCALYCIINAE
Aulocalyx australis Reiswig & Kelly, 2011 E
Aulocalyx sp. nov. (NIWA 126318) Dohrmann et al., 2023 (p. 15, fig. 5A–C) E
Euryplegma auriculare Schulze, 1886
Rhabdotidium sp. nov. (NIWA 126083) Dohrmann et al., 2023 (p. 17, fig. 5D, E) E
Family EUPLECTELLIDAE
Subfamily BOLOSOMINAE
Amphidiscella abyssalis Reiswig & Kelly, 2018 E
Amphidiscella sonnai Reiswig & Kelly, 2018 E
Amphoreus schuppi Reiswig & Kelly, 2018 E2
Bolosoma bioculatum Tabachnick & Lévi, 2004 E2
Bolosoma charcoti Tabachnick & Lévi, 2004 E
Bolosoma cyanab Tabachnick & Lévi, 2004 E
Bolosoma meridionale Tabachnick & Lévi, 2004 E
Saccocalyx tetractinus Reiswig & Kelly, 2018 E
Trychella kermadecensis Reiswig & Kelly, 2018 E
Trychella sp. nov. (NIWA 126306) Dohrmann et al., 2023 (p. 15, fig. 4H, I) E
Subfamily CORBITELLINAE
Atlantisella lorraineae Reiswig & Kelly, 2017 E
Cortibella inopiosa Reiswig & Kelly, 2018 E2
Corbitella plagiariorum Reiswig & Kelly, 2018 E
Corbitella sp. nov. (NIWA 126122) Dohrmann et al., 2023 (p. 15, fig. 4A–G) E
Dictyaulus crinolinum Reiswig & Kelly, 2018 E
Dictyaulus hydrangeiformis Reiswig & Kelly, 2018 E
Dictyaulus orientalis Reiswig & Kelly, 2018 E
Plumicoma solida Reiswig & Kelly, 2018 E
Regadrella hispida Reiswig & Kelly, 2018 E
Regadrella okinoseana Ijima, 1896
Regadrella pedunculata Reiswig & Kelly, 2018 E
Regadrella sp. indet. Reiswig & Kelly, 2018 E
Walteria flemmingii Schulze, 1886
Walteria leuckarti Ijima, 1896
Walteria sp. indet. Reiswig & Kelly, 2018 E
Subfamily EUPLECTELLINAE
Euplectella imperialis Ijima, 1894
Euplectella plumosa Tabachnick & Lévi, 2004
Euplectella semisimplex Reiswig & Kelly, 2018 E
Euplectella sp. indet. Reiswig & Kelly, 2018 E
Holascus pannosus Reiswig & Kelly, 2018 E2
Holascus tasmanensis Reiswig & Kelly, 2018 E2
Malacosaccus erectus Lévi, 1964 E2
Malacosaccus microglobus Reiswig & Kelly, 2018 E2
Family LEUCOPSACIDAE
Chaunoplectella sp. 01 (NIWA 3289, North Chatham Rise) E
Chaunoplectella sp. nov. (NIWA 126325) Dohrmann et al., 2023 (p. 17, fig. 5F, G) E
Leucopscus distans Tabachnick & Lévi, 2004 E
Leucopscus sp. nov. (NIWA 126063) Dohrmann et al., 2023 (p. 17, fig. 5H–J) E
Family RÖSSELLIDAE
Subfamily LANUGINELLINAE
Caulophacus (*Caulodiscus*) *onychohexactus* Tabachnick & Lévi, 2004
Caulophacus (*Caulodiscus*) sp. 01 (NMNZ POR.484, Kermadecs) E
Caulophacus (*Caulodiscus*) sp. 02 (NIWA 52965, Hikurangi Margin) E
Caulophacus (*Caulophacus*) *discohexaster* Tabachnick & Lévi, 2004
Caulophacus (*Caulophacus*) *hadalis* Lévi, 1964 E
Caulophacus (*Caulophacus*) *ramosus* Reiswig, Dohrmann & Kelly, 2021 E
Caulophacus (*Caulophacus*) *schulzei* Wilson, 1904
Caulophacus (*Caulophacus*) *serpens* Reiswig, Dohrmann & Kelly, 2021 E
Caulophacus (*Caulophacus*) sp. 03 (NIWA 70932, west of Challenger Plateau) E
Lophocalyx sp. nov. (NIWA 126005) Dohrmann et al., 2023 (p. 17, fig. 6A–C) E
Sympagella clavipinula Tabachnick & Lévi, 2004
Sympagella sp. 1 (NMNZ POR.522, Bay of Plenty) E
Sympagella sp. 2 (NMNZ POR.707, Chatham Rise) E
Sympagella sp. 3 (NIWA 158392, Subantarctic New Zealand)
Lanuginellinae gen. et sp. nov. (NIWA 126169) Dohrmann et al., 2023 (p. 19, fig. 6D–I) E
Subfamily ROSSELLINAE
Bathydorus poculum Reiswig et al., 2021 E
Crateromorpha (*Aulochone*) *cylindrica* (Schulze, 1886)
Crateromorpha (*Aulochone*) *haliprum* Tabachnick & Lévi, 2004
Crateromorpha (*Caledochone*) *caledoniensis* Tabachnick 2002
Crateromorpha (*Crateromorpha*) cf. *meyeri* Gray, 1872
Crateromorpha subgen. 1 sp. 01 (NMNZ POR.706, Chatham Rise) E
Hydascus sp. 01 (NIWA 61544, Chatham Rise) E
Hydascus sp. 02 (NIWA 28637, Challenger Plateau) E
Nubes pectiniformis Reiswig et al., 2021 E2
Nubes tubulata Reiswig et al., 2021 E
Rossella antarctica Carter, 1872
Rossella ijimai Dendy, 1924 E
Rossella sp. racovitzae Topsent, 1901
Scyphidium australiense Tabachnick et al., 2008 E
Scyphidium variopinosum Reiswig et al., 2021 E
Symplectella rowi Dendy, 1924
Rossellinae gen. 1 sp. 01 (NIWA 76915, Antipodes Islands) E
Rossellinae gen. 2 sp. 01 (QM G316480, North Norfolk Ridge) E2
Rossellinae gen. et sp. indet. (NIWA 126275, Wairarapa Slope) E
Order SCEPTRULOPHORA
Family APHROCALLISTIDAE
Aphrocallistes (*beatrix*) *beatrix* Gray, 1858
Family AULOPLACIDAE
Auloplax breviscopulata Reiswig & Kelly, 2011 E
Auloplax sonnai Reiswig & Kelly, 2011 E
Family EURETIDAE
Subfamily CHONELASMATINAE
Chonelasma australe Reiswig & Kelly, 2011 E
Chonelasma bispiculatum Reiswig & Kelly, 2011 E
Chonelasma chathamense Reiswig & Kelly, 2011 E
Chonelasma glaciale Reiswig & Kelly, 2011 E
Chonelasma hamatum Schulze, 1886 E2
Chonelasma lamella Schulze, 1886
Chonelasma sp. Reiswig & Kelly, 2011 E2
Periphregella elisae Marshall, 1875
Subfamily EURETINAE
Concrete gordoni Reiswig & Kelly, 2011 E
Eurete sp. nov. 1 (NIWA 126028) Dohrmann et al., 2023 (p. 13, fig. 3A–C) E
Eurete sp. nov. 2 (NIWA 126276) Dohrmann et al., 2023 (p. 13, fig. 3D, E) E
Gymnoretre pacificum Reiswig & Kelly, 2011 E
Gymnoretre stabulatum Reiswig & Kelly, 2011 E2
Lefroyella ceramensis Ijima, 1927
Family FARREIDAE
Farrea occa Bowerbank, 1862
Farrea sp. subsp. nov. (NIWA 126307) Dohrmann et al., 2023 (p. 13, fig. 3F, G) E
Farrea sp. *anchorata* Reiswig & Kelly, 2011 E2
Farrea sp. *anoxypexastera* Reiswig & Kelly, 2011 E
Farrea sp. *medusiforma* Reiswig & Kelly, 2011
Farrea sp. *onychohexastera* Reiswig & Kelly, 2011 E
Farrea sp. *raoulienensis* Reiswig & Kelly, 2011
Farrea sp. *similaris* Reiswig & Kelly, 2011 E2
Farrea sp. nov. (NIWA 126004) Dohrmann et al., 2023 (p. 13, fig. 3H, I) E
Farrea sp. Reiswig & Kelly, 2011 E
Family TRETODICTYIDAE
Hexactinella acanthacea Reiswig & Kelly, 2011 E
Hexactinella aurea Reiswig & Kelly, 2011 E
Hexactinella simplex Reiswig & Kelly, 2011
Psilocalyx wilsoni Ijima, 1927
Family SCEPTRULOPHORA INCERTAE SEDIS
Homioeurete macquariense Reiswig & Kelly, 2011 E2
Class HOMOSCLEROMORPHA
Order HOMOSCLEROPHORIDA
Family PLAKINIDAE
Corticium bargibanti Lévi & Lévi, 1983
Plakinolopha sp. 01 (NIWA 52833, Bay of Plenty) E
Plakina monolopha Schulze, 1880 *sensu* Bergquist (1968)
Plakina trilopha Schulze, 1880 *sensu* Bergquist (1968)
Plakinastrella sp. 01 (NIWA 101758, Three Kings) E

Checklist of fossil Porifera known from the New Zealand EEZ

Kelly *et al.* (2009) stated that taxa listed by Hinde and Holmes (1892) are problematic in many cases. Where their genus assignments can today be attributed to more than one genus, on the basis of spicules, they are not included in the checklist below. Only named species and those generic assignments easily recognised by particular microscleres or megascleres are included. Fossil species are followed by stratigraphic names using the standard nomenclature within the New Zealand Geological Timescale, updated in 2015 (Raine *et al.* 2015), and illustrated in Preface Figure 6. Endemic fossil taxa are indicated by E, non-indigenous taxa are indicated by NI.

Phylum PORIFERA	<i>Latrunculia (Uniannulata) edwardsi</i> Kelly <i>et al.</i> , 2016 E	Suborder SPIROPHORINA
Class CALCAREA	Runangan	Family SCLERITODERMIDAE
Calcarea gen. et sp. indet. Edwards, 1991 E Runangan—		Scleritodermidae gen. et sp. indet. Kelly & Buckeridge, 2005 E Teurian–Waipawan
Waitakian		Suborder THOOSINA
Class DEMOSPONGIAE	<i>Latrunculia (Uniannulata) paeonia</i> Kelly <i>et al.</i> , 2016 E	Family THOOSIDAE
Subclass CERACTINOMORPHA	Runangan	<i>Alectona</i> spp. indet. Hinde & Holmes, 1892 E Runangan
Order VERTICILLITIDA	<i>Latrunculia (Uniannulata) pupaparvula</i> Kelly <i>et al.</i> , 2016 E	Subclass TETRACTINOMORPHA
Suborder PORATA	Runangan	Order STREPTOSCLEROPHORIDA
Family SEBARGASIIDAE	<i>Latrunculia (Uniannulata) turbo</i> Kelly <i>et al.</i> , 2016 E	Suborder EUTAXICLADINA
<i>Amblysiphonella</i> cf. <i>merlai</i> Parona, 1933 Permian	Runangan	Family HINDIIDAE
Subclass HETEROSCLEROMORPHA	<i>Latrunculia (Latrunculia) tutu</i> Kelly & Sim-Smith, 2022 E	<i>Microspongia</i> sp. Cooper, 1965 E Ordovician–Permian
Order AXINELLIDA	Runangan	Class HEXACTINELLIDA
Family RASPAILIDAE	<i>Latrunculia obtusa</i> Hinde & Holmes, 1892 E Runangan	Subclass AMPHIDISCOPHORA
Subfamily RASPAILINAE	<i>Latrunculia</i> spp. indet. Hinde & Holmes, 1892 E	Order AMPHIDISCOSIDA
<i>Hymeraphia</i> sp. indet. Hinde & Holmes, 1892 E	Runangan	Family HYALONEMATIDAE
Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 4) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Hyalonema</i> spp. indet. Hinde & Holmes, 1892 E
Order CLIONAIDA	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Runangan
Family CLIONAIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Family PHERONEMATIDAE
<i>Cliona</i> sp. Buckeridge, 1999 E Haumurian	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Pheronema</i> spp. indet. Hinde & Holmes, 1892 E Runangan
<i>Cliona</i> spp. indet. Lee <i>et al.</i> , 2014 E Dunroonian	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Subclass HEXASTEROPHORA
<i>Cliona</i> spp. indet. Hinde & Holmes, 1892 E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Order LYSSACINOSIDA
<i>Thoosa</i> sp. 'ancocki' of Hinde & Holmes (1892) E	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Family ROSELLIDAE
Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Subfamily ROSSELLINAE
<i>Dotona</i> sp. indet. Hinde & Holmes, 1892 E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Crateromorpha</i> spp. indet. Hinde & Holmes, 1892 E
<i>Spirastrella</i> spp. indet. Hinde & Holmes, 1892 E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Runangan
<i>Thoosa</i> sp. indet. Hinde & Holmes, 1892 E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Rossella cylindrica</i> Buckeridge & Kelly, 2013 E Teurian–Waipawan
Order HAPLOSCLERIDA	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Family EUPLECTELLIDAE
Family CHALINIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Subfamily CORBITELLINAE
Chalinidae gen. et spp. indet. Hinde & Holmes, 1892 E	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Walteria</i> cf. <i>leuckarti</i> Ijima, 1896 in Kelly & Buckeridge 2005 Teurian
Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Order SCEPTRULOPHORA
Family PHLOEODICTYIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Family APHROCALLISTIDAE
<i>Janulum princeps</i> Kelly & van Soest, 2015 E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Aphrocallistes</i> spp. indet. Hinde & Holmes, 1892 E
Order MERLIIDA	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Runangan
Family HAMACANTHIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Family AÜLOPLACIDAE
<i>Hamacantha</i> (<i>Hamacantha</i>) <i>johsoni</i> (Bowerbank, 1864) in Hinde & Holmes 1892 E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Auloplax?</i> sp. Consoli <i>et al.</i> , 2009 E Haumurian–Teurian
<i>Hamacantha</i> (<i>Hamacantha</i>) <i>huttoni</i> Hinde & Holmes, 1892 E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Family EURETIDAE
<i>Hamacantha</i> spp. indet. Hinde & Holmes, 1892 E	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Subfamily EURETINAE
Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Pararete</i> sp. Consoli <i>et al.</i> , 2009 E Haumurian–Teurian
Family MERLIIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Ectretocochne australis</i> Consoli <i>et al.</i> , 2009 E Haumurian–Teurian
<i>Merlia morlandi</i> (Hinde & Holmes, 1892) E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Euretidae gen. et sp. indet. Consoli <i>et al.</i> , 2009 E Haumurian–Teurian
Order POECIOLSCLERIDA	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Family FARREIDAE
Family ACARNIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Aspidiscopulida</i> sp. Tabachnick <i>et al.</i> (2011) Teurian–Waipawan
<i>Acarnus</i> sp. indet. Hinde & Holmes, 1892 E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Farrea</i> cf. <i>occa</i> Bowerbank, 1862 in Kelly & Buckeridge 2005 Teurian
<i>Lophon</i> <i>hybridus</i> Hinde & Holmes, 1892 E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Family TRETOIDICTYIDAE
Family CLADORHIZIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Anomochone chathamensis</i> Buckeridge & Kelly, 2013 E
<i>Chondrocladia</i> spp. indet. Hinde & Holmes, 1892 E	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Teurian–Waipawan
Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Psilocalyx</i> cf. <i>wilsoni</i> Ijima, 1927 in Kelly & Buckeridge 2005 Teurian
Family COELOSPHAERIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Tretodictyidae gen. et sp. indet. Consoli <i>et al.</i> , 2009 E
<i>Forcepia carteri</i> Hinde & Holmes, 1892 E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Haumurian–Teurian
<i>Forcepia vosmari</i> Hinde & Holmes, 1892 E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Order HEXASTOPHORA INCERTAE SEDIS
Family CRAMBEIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Family DACTYLOLOCALYCIDAE
<i>Crambe oamaruensis</i> (Hinde & Holmes, 1892) E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Dactylocalyx</i> cf. <i>callodiscus</i> Carter, 1871 in de Laubenfels 1953 NI Cenozoic
Family DESMACIDIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Class HOMOSCLEROMORPHA
<i>Desmacidium</i> spp. indet. Hinde & Holmes, 1892 E	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Order HOMOSCLEROPHORIDA
Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Family PLAKINIDAE
Family ESPERIOPSIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Corticium</i> spp. indet. Hinde & Holmes, 1892 E Runangan
<i>Amphilectus</i> spp. indet. Hinde & Holmes, 1892 E	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Plakina</i> sp. 'australis' in Hinde & Holmes, 1892 E
Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Runangan
<i>Esperiopsis</i> spp. indet. Hinde & Holmes, 1892 E	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Class STROMATOPOROIDEA
Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Order STROMATOPOROIDEA
Family GUITARRIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	Family CLATHRODICTYIDAE
<i>Guitarra carteri</i> Hinde & Holmes, 1892 E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Anostylostroma clarum</i> (Počta, 1894) E Emsian
<i>Guitarra intermedia</i> Hinde & Holmes, 1892 E Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	<i>Stromatopora</i> cf. <i>hupschii</i> Bargatzky, 1937 E Emsian
Family HYMEDESMIIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	
<i>Hamigera</i> spp. indet. Hinde & Holmes, 1892 E	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	
Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	
Family PSEUDOHALICHONDRIIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	
<i>Pseudohalichondria deformis</i> Hinde & Holmes, 1892 E	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	
Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	
Family LATRUNCULIDAE	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	
<i>Latrunculia</i> (<i>Uniannulata</i>) <i>carduus</i> Kelly <i>et al.</i> , 2016 E	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	
Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	
<i>Latrunculia</i> (<i>Uniannulata</i>) <i>daphneleeae</i> Kelly <i>et al.</i> , 2016 E	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	
Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	
<i>Latrunculia</i> (<i>Uniannulata</i>) <i>delautouri</i> Kelly <i>et al.</i> , 2016 E	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	
Runangan	<i>Latrunculidae</i> sp. indet. Locker & Martini (1986: pl. 13 fig. 5) in Sim-Smith <i>et al.</i> 2022 E upper Miocene	

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