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The Mesozoic Corals.
Bibliography 1758-1993.

Supplement 12 (-2006)

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Summary

This supplement to the bibliography (published in the Coral Research Bulletin 1, 1994) contains 23 additional references to literary material on the taxonomy, palaeoecology and palaeogeography of Mesozoic corals (Triassic - Cretaceous; Scleractinia, Octocorallia). The bibliography is available in the form of a data bank with a menu-driven search program for Windows-compatible computers. Updates are available through the Internet (www.cp-v.de).

Key words: Scleractinia, Octocorallia, corals, bibliography, Triassic, Jurassic, Cretaceous, data bank

Résumé

Le supplément à la bibliographie (publiée dans Coral Research Bulletin 1, 1994) contient 23 autres références au sujet de la taxinomie, paléoécologie et paléogéographie des coraux mesozoïques (Trias - Crétacé; Scleractinia, Octocorallia). Par le service de mise à jour (www.cp-v.de), la bibliographie peut être livrée sur la base des données avec un programme de recherche contrôlée par menu avec un ordinateur Windows-compatible.

Mots-clés: Scleractinia, Octocorallia, coraux, bibliographie, Trias, Jurassique, Crétacé, base des données

Zusammenfassung

Die Ergänzung zur Bibliographie (erschienen im Coral Research Bulletin 1, 1994) enthält 23 weitere Literaturzitate zur Taxonomie und Systematik, Paläoökologie und Paläogeographie der mesozoischen Korallen (Trias-Kreide; Scleractinia, Octocorallia). Die Daten sind als Datenbank zusammen mit einem menügeführten Rechercheprogramm für Windows-kompatible Computer im Rahmen eines Änderungsdienstes im Internet (www.cp-v.de) verfügbar.

Schlüsselworte: Scleractinia, Octocorallia, Korallen, Bibliographie, Trias, Jura, Kreide, Datenbank

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Preface

Numerous hints given by colleagues and new papers edited the previous year yield 23 references for a supplement to the bibliography. For the form of arrangement and abbreviations please refer to the bibliography itself (Coral Research Bulletin 1, 1994).

I am indebted to all colleagues who have sent me copies of their recently published papers for their help in completing the bibliography.

The supplement

BARON-SZABO, R.C.

2006. Corals of the K/T-boundary: Scleractinian corals of the Suborders Astrocoeniina, Faviina, Rhipidogyrina, and Amphiastraeina. -- *Journal of Systematic Palaeontology*, 4: 1-108; London. D • k

This taxonomic review of the scleractinian corals of the Maastrichtian and Paleocene period focuses on the scleractinian suborders Astrocoeniina, Faviina, Rhipidogyrina and Amphiastraeina. This, the first extensive compilation of coral species of the K/T (Cretaceous/Tertiary) boundary, deals with more than 2500 records of 550 nominal taxa. In addition to the re-examination and re-evaluation of described forms, this study also includes the first description of the largest Maastrichtian coral assemblage known (consisting of about 4000 specimens from Jamaica), as well as new material from the Campanian–Maastrichtian of Argentina, Lower Maastrichtian of Mexico (Cerralvo), and the Paleocene of Austria (Kambühel–Kalke). A diagnosis is provided for each species, as well as for each higher-level taxonomic category and issues concerning taxonomic assignment are discussed in detail. The descriptions are accompanied by illustrations of representatives of each species and, in many cases, include illustrations of type or original material. Also included is the first comprehensive overview of the stratigraphical and geographical ranges of each taxon. In the four suborders evaluated in this paper, 123 valid species can be reliably documented as occurring in the Maastrichtian and/or the Paleocene. The largest number of species is in the suborders Faviina and Astrocoeniina. In the Faviina 62 valid species are known from the Maastrichtian, of which 35 (56.5%) crossed the K/T-boundary, while in the Paleocene 14 new species appeared. In the Astrocoeniina 18 valid species occurred in the Maastrichtian, eight of which (44.4%) crossed the K/T-boundary and 16 new species appeared in the Paleocene. Only eight species of Rhipidogyrina and five species of Amphiastraeina occurred in the Maastrichtian and although two amphiastraeinid made it into the Paleocene, only one of the rhipidogyrinids crossed the K/T-boundary. No new species of Amphiastraeina appeared in the Paleocene. According to this revision on the genus level 44 out of the 65 genera crossed the K/T-boundary, which is 67.7% (12 genera went extinct, 9 genera have their first occurrence in the Paleocene). In comparison to previous estimates this result (generic extinction of around 32%) represents the best estimation for scleractinian corals at present and corresponds to recently reported results of other macroinvertebrate groups after taxonomic revision (e.g. echinoids).

BARON-SZABO, R.C., SCHAFHAUSER, A., GÖTZ, S. & STINNESBECK, W.

2006. Scleractinian corals from the Cardenas Formation (Maastrichtian), San Luis Potosí, Mexico. -- *Journal of Paleontology*, 80, 6: 1033-1046; Lawrence, Kan. D • k • MEX

A detailed taxonomical description of scleractinian corals from the Maastrichtian of Mexico (Cardenas Formation) is given for the first time. The coral association comprises 16 taxa which belong to 9 families: Dictuophyllia conferticostata (Vaughan), Cladocora jamaicaensis Vaughan, Cladocora gracilis (d'Orbigny), Antiguastrea cellulosa (Duncan), Multicolumnastraea cyathiformis (Duncan), Placocoenia major Felix, Siderastrea vancouverensis Vaughan, Siderastrea adkinsi (Wells), Goniopora sp., Actinacis haueri Reuss, Actinacis parvistella Oppenheim, Actinhelia elegans (Goldfuss), Meandrophyllia oceani (de Fromentel), Dermosmiliopsis orbignyi Alloiteau, Trochoseris aperta (Duncan), and Cyathoseris formosa d'Achiardi. The corals described herein were collected from mixed coral - rudist and coral -dominated assemblages in the Arroyo de la Atarjea, and one unnamed riverbed which lithologically correspond to the Arroyo de la Atarjea section, both of which belong to the upper member of the Cardenas Formation. On the genus level, 94 % of the Mexican fauna corresponds to the Maastrichtian coral assemblages of Jamaica. Moreover, the Cardenas fauna shows close affinities to both Upper Cretaceous coral associations of central Europe and the Caribbean, as well as to Lower Tertiary faunas of Central America and the Caribbean. On the species-level, 68.8 percent of the Cardenas corals are known from Lower Tertiary strata of Central America, the Caribbean, South America, Asia, European/Mediterranean region, and/or southeastern parts of the USA.

BLAIN, H.-A.

2005. Présence de coraux (Anthozoa, Hexacorallia) dans le Callovo-Oxfordien basal des falaise des Vaches-Noires (Calvados, France). -- *L'Écho des Falaises*, 9: 71-77, 1 pl.; Villers-sur-Mer. D • j • F

For the first time the occurrence of corals is reported from the lower part of the Vache-Noir Cliffs of Late Callovian to Early Oxfordian age. The corals are represented by very early stages of supposedly solitary corals which are attached to a gastropod shell. They do not allow determination.

DOZET, S.

2000. Hočevje oolitic group, Central Slovenia, -- *Acta carsologica*, 29, 1: 185-199; Ljubljana. C • j • SLO

A 450 to 500 metre thick and prevalently oolitic complex in the Suha Krajina area, lying conformably upon the Upper Liassic platy and thin-bedded limestones and discordantly under the Upper Malm Korinj breccias, has been denominated and described in this paper. A minor discordance separates the oolitic complex into two parts: the lower black oolitic part of Dogger age and the upper greyish oolitic part of Lower Malm age. The proposed name of the above-mentioned oolitic rocks is the "Hocevje group" consisting of the underlying Laze formation and overlying Sentrumar formation. The micropaleontological study showed that at least the topmost part of Dogger was not deposited.

DUNCAN, P.M.

1865. Note on the Madreporia from the "Sutton Stone". -- *Quarterly Journal of the Geological Society of London*, 22: 89-92; London. N • j • GB

FILKORN, H.F.

2006. Mesozoic corals of Mexico. [In:] Vega-Vera, F.J., Nyborg, T.G., Perrilliat, M.C. & et al. [Eds.]: Studies on Mexican Paleontology. Topics in geobiology, p. 47-59, 1 tab.; Dordrecht (Springer). p. 47-59, 1 tab. C • tj • MEX

The majority of the Mesozoic scleractinian corals reported from Mexico, 117 species or about 80 percent, are from Cretaceous strata. Comparatively little is known of the earlier Mesozoic corals. The Jurassic corals, a total of 17 species, have been described from five localities in Mexico, all in Upper Jurassic rocks. The 10 Triassic coral species described from Mexico are from the Upper Triassic Antimonio Formation of northwestern Sonora. The majority of the Jurassic and Triassic coral species reported from Mexico have been described previously from occurrences in Europe.

HELM, C. & SCHÜLKE, I.

2006. Patch reef development in the florigemma-Bank Member (Oxfordian) from the Deister Mts (NW Germany): a type example for Late Jurassic coral thrombolite thickets. -- *Facies*, 52, 3: 441-467; Erlangen. D • j • D

Small reefal bioconstructions that developed in lagoonal settings are widespread in a few horizons of the Late Jurassic (Oxfordian) succession of the Korallenoolith Formation, exposed southwest of Hannover, Northwest Germany. Especially the florigemma-Bank Member, "sandwiched" between oolite shoal deposits, exposes a high variety of build-ups, ranging from coral thrombolite patch reefs, to biostromes and to coral meadows. The reefs show a distribution with gradual facies variations along an out-crop belt that extends about 30 km from the Wesergebirge in the NW to the Osterwald Mts in the SE. The patch reefs from the Deister Mts locality at the "Speckhals" are developed as coral-chaetetid-solenoporid-microbialite reefs and represent a reef type that was hitherto unknown so far north of its Tethyan counterparts. They are mainly built up by coral thickets that are preserved in situ up to 1.5 m in height and a few metres in diameter. They contain up to 20 coral species of different morphotypes but are chiefly composed of phaceloid

Stylosmilia corallina and Goniocora socialis subordinately. The tightly branched Stylosmilia colonies are stabilized by their anastomosing growth. The coral branches are coated with microbial crusts and micro-encrusters reinforcing the coral framework. En-crusters and other biota within the thicket show a typical community replacement sequence: Lithocodium aggrega-tum, Koskinobullina socialis and Iberopora bodeuri are pioneer organisms, whereas the occurrence of non-rigid sponges represents the terminal growth stage. The latter are preserved in situ and seem to be characteristic so far poorly known constituents of the Late Jurassic cryptobiont reef dweller community. The distance and overall arrangement of branches seems to be the crucial factor for the manifestation of a (cryptic) habitat promoting such community replacement sequences. Widely spaced branches often lack any encrusting and/or other reef dwelling organisms, whereas tightly branched corals, as is St. corallina, stimulate such biota. Hence, such reefs are well suited for research on coelobites and community sequences of encrusting and cavity dwelling organisms.

HERRERA, S., BARTOLINI, C., PÉREZ RAMOS, O. & BUITRÓN-SÁNCHEZ, B.E.

1984. Paleontología del área de Lampazos, Sonora. -- *Boletín del Departamento de Geología, Universidad de Sonora*, (2) 1, 1: 50-59, 4 pls.; Hermosillo. D • k • MEX

KILIAN, W. & PETITCLERC, P.

1894. Contributions à l'étude du Bajocien dans le nord de la Franche-Comté in Notes géologiques sur le Jura du Doubs. -- *Mémoires de la Société d'émulation de Montbéliard*, 6: 1-161; Montbéliard. ? • j • F

LÖSER, H.

2006a. Morphology, taxonomy and distribution of the Cretaceous coral genus Paronastraea (Barremian-Cenomanian; Scleractinia). -- *Rivista italiana di paleontologia e stratigrafia*, 112, 1: 131-121, 1 pl.; Milano. N • k • D/F/GR/I/TUR

The middle Cretaceous genus Paronastraea Beauvais, 1977 is being revised on the basis of sample material available from Italy, France, Germany, and Greece. Paronastraea, a plocoid and cerioid coral similar to Pachycoenia, is characterised by regular secondary septal apophyses arranged in pairs. Six species are distinguished by their respective numbers of septal cycles and systems, two of them in open nomenclature and one, Paronastraea occulta from the Early Aptian of Greece, is newly described. The genus occurred from the Barremian to the basal Cenomanian in the central and eastern Tethys.

LÖSER, H.

2006b. Taxonomy, stratigraphic distribution and palaeobiogeography of the Early Cretaceous coral genus Holocystis. -- *Revista mexicana de ciencias geológicas*, 23, 3: 288-301; Mexico City. N • k • E/GB/GR/I/MEX

The Early Cretaceous Scleractinian coral genus Holocystis Lonsdale, 1849 - first reported for southern England and for a long time believed to be restricted to this region - is easy to recognise but it is also rare. Abundant material from the Late Barremian to Early Albian found in Sonora (Mexico) as well as the available type material and additional material from Europe and East Africa allowed a systematic revision. Five species are distinguished. One of them - Holocystis nomikosi - is described as a new species. Three species previously described for other genera were assigned to the genus Holocystis and two species formerly assigned to Holocystis were found to belong to other genera. Two genera (Tetracoenia and Nowakocoenia) are considered junior synonyms of Holocystis. The stratigraphic extent of the genus was limited to the range from the Barremian to the Early Albian. Holocystis is not a common coral genus but occurred in a large geographic area comprising the central Tethys, the Caribbean, and even the eastern to south-eastern Tethys. It is restricted to sediments with a certain terrigenous input.

LÖSER, H. & FERRY, S.

2006. Coraux du Barrémien du Sud de la France (Ardèche et Drôme). -- *Geobios*, 39, 4: 469-489; Lyon. D • k • F

Corals from the Barremian of southern France (dépt. Ardèche and Drôme) are described. The rather small fauna of colonial corals encompasses 23 species belonging to 18 genera of both Hexa- and Octocorals. The assemblages from the lower as well as upper Barremian show stratigraphic relationships to those of the Hauterivian and Aptian of the Tethys and the Caribbean province.

MEYER, R. & SCHMIDT-KALER, H.

1983. Erdgeschichte sichtbar gemacht - Ein geologischer Führer durch die Altmühlalb. -- 260 pp., 260 figs.; München (Bayerisches Geologisches Landesamt). D • j • D

MEYER, R., SCHMIDT-KALER, H., KAULICH, B. & TISCHLINGER, H.

1994. Unteres Altmühltal und Weltenburger Enge. -- *Wanderungen in die Erdgeschichte*, 6: 152 pp., 170 figs., 3 maps; München (F. Pfeil). D • j • D

OLIVIER, N., LATHUILIÈRE, B. & THIRY-BASTIEN, PH.

2006. Growth models of Bajocian coral-microbialite reefs of Chargey-lès-Port (eastern France): palaeoenvironmental interpretations, -- *Facies*, 52, 1: 113 - 127; Erlangen. C • j • F

Very large amount of microbialites, up to 70% of the reef volume takes part in the edification of Lower Bajocian coral reefs in the Chargey-lès-Port quarry (Haute-Saône, France). Such high amounts of microbialites were unknown within bioconstructions of Middle Jurassic age. Along the 16 m-thick section, seven successive biohermal or biostromal units developed on a shallow platform. Bioconstructions display a first coral growth phase with either constratal or superstratal growth fabrics. Coral fauna is relatively poorly diversified and is dominated by massive forms (Isastrea, Thamnasteria, and Periseris) or branched phaceloid (Cladophyllia) and ramose (Dendraraea) colonies. Corals can be heavily encrusted by microbialites of diverse forms and fabrics (leiolitic, thrombolitic, and stromatolitic). According to the coral growth fabrics, microbialite crusts developed on top of or at the underside of coral colonies, forming a coral-microbialite elementary unit. Microbialites show a multiphase development: (i) directly at the coral surface, a first and mm-scale microbialite layer locally developed; (ii) a second, cm-scale microbialite layer (up to 8 cm thick) covered the entire coral reef framework and assumed the main building role; and (iii) a third, mm- to cm-scale, laminated microbialite layer may also be observed onlapping previous reef structures, before having been progressively buried under sediments. Contemporaneously to the coral growth phase, the first microbialite layer developed on dead portions of coral colonies. The transition between coral growth and microbialite development (i.e., second layer of microbialites) is interpreted as a result of a coral reef crisis, probably reflecting more nutrient-rich conditions. The passage to a stromatolitic (third) layer suggests a control of the accumulation rate. Composition and architecture of coral-microbialite reef units of Chargey-lès-Port highlight the relations between high-frequency fluctuating environmental factors (mainly accumulation rate and trophic conditions) and reef development.

PÉREZ URRESTI, I.

2005. Guía de los fósiles de Ricla. -- *Cuadernos de paleontología Aragonesa*, 3: 50-86, num figs. D • j • E

REYEROS DE CASTILLO, M.M.

1978. Invertebrados (Porifera y Coelenterata) del Jurásico Tardío del Estado de San Luis Potosí. -- *Revista de Instituto de Geología, UNAM*, 2, 1: 69-74; Mexico City (Universidad Nacional Autónoma de México). D • j • MEX

RODRIGUEZ-CASTAÑEDA, J.L.

1991. Mesozoic stratigraphy in north-central Sonora, Mexico. -- *Boletín del Departamento de Geología, Universidad de Sonora*, 8, 1: 13-27; Hermosillo. C • k • MEX

SIMMS, M.J., LITTLE, C.T.S. & ROSEN, B.R.

2002. Corals not serpulids: mineralized colonial fossils in the Lower Jurassic marginal facies of South Wales. -- *Proceedings of the Geologists' Association*, 113: 31-36; London. ? • j • GB

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1904. Note on the Cretaceous fossils. -- [In:] Ransome, F.L. [Ed.]: The geology and ore deposits of the Bisbee quadrangle Arizona. Geological Survey professional paper, p. 70; Washington, D.C. C • k • USA

THIRRIA, E.

1836. Carte géologique du départment de la Haute-Saone. -- 16 pp., 1 pl. C • j • F

VIDAL SERRATOS, R., BUITRÓN-SÁNCHEZ, B.E. & ALENCASTER YBARRA, G.

1991. Estratigrafía del área Ixcateopan-Puerto Lancón, Estado de Guerrero (NW de la Plataforma Guerrero-Morales, terreno mixteco). -- *Revista de la Sociedad Mexicana de Paleontología*, 4: 95-107; Mexico City. C • k • MEX

YIN, JIARUN & ENAY, R.

2004. Tithonian ammonoid biostratigraphy in eastern Himalayan Tibet. -- *Geobios*, 37: 667-686, 12 figs.; Lyon. D • j • RC