

Tracking Change

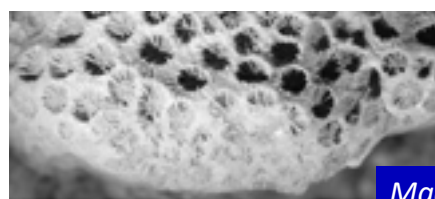
Subject matter: Corals first appeared within the geological record over 250 million years ago but not in Australian waters until approximately 500 000 years ago.

Recommended reading:

- Coral Reefs and Climate Change - The age of the Great Barrier Reef (p. 93), Tracking change (p.168-170), A paleo perspective (p. 225)
- View video: Coral Reefs and Climate Change DVD series - Tracking change and scientific finding.
- Kuznetsov V, The Evolution of Reef Structures through Time: Importance of Tectonic and Biological Controls, December 1990, Volume 22, Issue 1, pp 159-168 <https://link.springer.com/article/10.1007/BF02536950>
- Australian Cretaceous Cnidaria and Porifera, Jell P, et.al. An Australasian Journal of Palaeontology 35(2):241-284 June 2011, https://www.researchgate.net/publication/232901753_Australian_Cretaceous_Cnidaria_and_Porifera

Corals in Outback Queensland

During the Cretaceous period (144 to 65 million years ago) a great inland sea stretched over one quarter of the country, inhabited by large underwater creatures and brimming with sea life. Remains of marine reptiles, dinosaurs, pterosaurs, birds, fishes, crustaceans, cephalopods, gastropods, bivalves, echinoderms, plants and trace fossils are on display 'Kronosaurus Korner' Richmond and 'Age of Dinosaurs' in Winton. Major discoveries were done in 2016 (<https://www.abc.net.au/news/2016-07-12/marine-fossils-found-in-outback-qld/7589792>).



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Mackenziephyllio accordensis



Only one coral species (*Mackenziephyllio accordensis*) from 140 million years ago was found near Longreach.

Ancient coral reefs - Classroom

1. Search in the library or on the internet for ancient reefs near you or in Australia. Think about locations such as Monto and Cania in QLD or Wanjana Gorge in WA.
2. Write a little summary report of what you find. Think about for example:
 - Location of ancient reef
 - Distance to the coast
 - How did the reef get there
 - How old is the ancient reef
 - Is there a difference in the structure or coral size and shape/form
 - What other fossils did they find in ancient reefs
3. Discuss your or your groups findings with other people.



Fossil reef in Western Australia