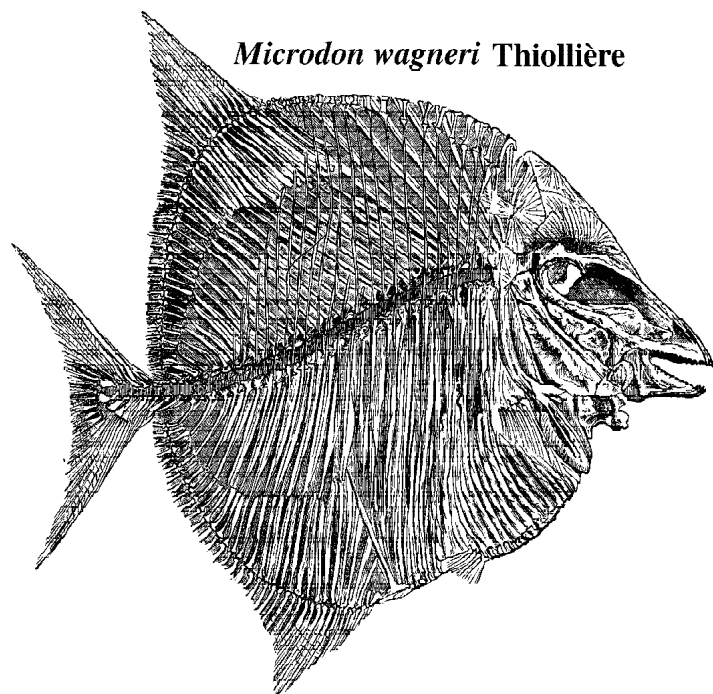


# The Compleat Mesoangler

A newsletter About Mesozoic Fishes

Volume 3, Number 1

May 10, 1996



*Microdon wagneri* Thiollière

*As figured in Eastman's 1902 English translation of Zittel, Vol. II, p. 87.*

in Kent and from several inland quarries along the A25 corridor between Westerham and Wrotham for microvertebrates and invertebrates. In the summer of 1995 I gained access to a new working pit with a unique exposure of the Gault from its base to near the top and have sampled 2000 kilos from 12 levels in the quarry, all of which has been processed down to 0.5 mm and the fossil micro-vertebrates removed. In addition to a very spectacular and diverse shark fauna (about 28 taxa based on over 1000 specimens of microteeth) I also have a wide range of tiny teleost fish teeth. All of this material is highly localized and lends itself to detailed stratigraphical analysis. I am able to capture images of tiny shark teeth (from 0.5 mm up to 5.0 mm) with a ccd camera connected to a

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## Mesozoic Fish

### Tales:

#### News from Readers

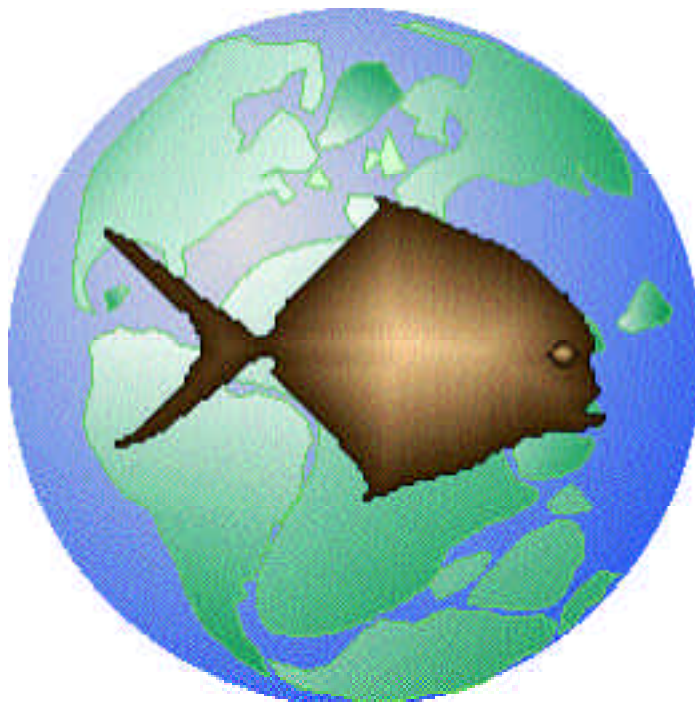
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**Craig, Jim "Toliapicus"**, Augustine Road, Minster-on-Sea, Isle of Sheppey, Kent, England, ME12 2LZ U.K.

Phone: 44 (1795) 875542, 44 (1795) 871694

email: jim.craig@dial.pipex.com

*Current Research:* In 1987 I started to bulk sample Gault Clay (British Cretaceous) from the type section at Folkestone



trinocular microscope and linked back into my PC via a frame grabber (images can be sent by email). Larger material can be scanned on a 2400dpi scanner and I can print (for my own record but not really of publishable quality) images via a (true) 1200dpi b&w Lexmark printer. I am looking at taking conventional photographs and developing these onto CD ROM for the intermediate sized teeth. In parallel, I am trying to develop a relational data-base using Microsoft Access but progress on this is slow. Identification is sometimes a problem, particularly the tiny "lamniform" teeth. I also have what I think may be new records for the English Albian and maybe one or two new species.

**Gottfried, Mike**, Calvert Marine Museum, P. O. Box 97, Solomons, Maryland, 20688, USA

Phone: (410) 326-2042

FAX: (410) 326-6691

*Current Research:* (1) I've been working on Late Cretaceous fishes from NW Madagascar (Mahajanga Basin) as part of the team led by David Krause (SUNY-Stony Brook). The fauna collected to date includes gars (the first Madagascar record), pycnodonts, and albuloids and indeterminate acanthomorphs (the first Mesozoic teleosts from Madagascar; Gottfried & Krause, 1994). At this preliminary stage it appears that the Recent endemic freshwater fishes of Madagascar have affinities with post-Mesozoic groups that colonized the island,

G. Arratia & G. Viohl, eds.

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rather than representing the descendants of Mesozoic fishes that evolved in isolation on the island.

(2) I've also started looking at shark inner ear structures using CT-scans, and would appreciate "hearing" from anyone who is aware of Cenozoic or Mesozoic neoselachian crania with well-preserved otic regions —thanks!

**Jin, Fan**, Institute of Vertebrate Paleontology and Paleoanthropology, Academia Sinica, P.O. Box 643, Beijing 100044, P. R. China.

Phone: 86-10-8355511 x 427

FAX: 86-10-8323680

*Current Research:* (1) Ph.D. dissertation on the Middle Jurassic-Early Cretaceous acipenseriform fossils, including *Liaosteus*, *Yanosteus*, *Peipiaosteus*, and *Protospheurus*,

from Northern Hebei and Western Liaoning, China; (2) osteoglossomorph fossils from South-eastern China and Kitakyushu of Japan, with Dr. Yoshitaka Yabumoto; (3) Jurassic stratigraphy and vertebrate fossils of Northern China.

**Kemp, Anne**, Dept. of Anatomy, University of Queensland, St. Lucia, Queensland 4072, Australia

*email (corrected)* a.kemp@mailbox.uq.oz.au

*Current Research:* Bob Nicoll and I will be presenting another paper in June 1996 on the

protochordate affinities of conodonts and the project is now being supported financially by the Australian Research Council's small grants scheme administered by the University. I'm finishing some work on palaeopathology and palaeoecology of dipnoans, having completed papers on the taxonomy of the Australian specimens. This work is also funded by the small grants scheme. I'm still on a half-time appointment at the University, and this will last until the end of this year. Apart from that, I'm trying to complete projects while I still have money and facilities.

## Second Meeting: Mesozoic Fishes - Fossil Record & Systematics

July 7 - 10, 1997

Bucknow, near Berlin, Germany

Buckow is a small village outside Berlin. There is a meeting place with inexpensive accommodations. The whole group will be together during the meeting, and people could enjoy the area around (lake and forest). Arrival on July 6, 1997 and departure either on July 10, 1997 at night or July 11, 1997 in the morning.

We may also plan a one day trip to Liassic fish localities in Northern Germany before or after the meeting, which is scheduled just before the Vertebrate Morphology meeting in Bristol.

Please respond to these questions:

1. Is the date acceptable: YES NO (WHY?)
2. Have you interest in an excursion to Liassic localities in Northern Germany? YES, NO, AFTER THE MEETING? BEFORE THE MEETING?

Please respond to:

Drs. Gloria Arratia or H.-P. Schultze  
Institut für Paläontologie  
Museum für Naturkunde der H.U.B.  
Invalidenstraße 43  
D-10115 Berlin, Germany

**Li Guo-Qing**, Laboratory for Vertebrate Paleontology and Department of Biological Sciences, University of Alberta, Edmonton, Alberta T6G 2E9, Canada; and, Institute of Vertebrate Paleontology and Paleoanthropology, Chinese Academy of Sciences, P.O. Box 643, Beijing 100044, China

*Phone:* (403) 492-1252

*Fax:* (403) 492-9234

*E-mail:* guo-qing.li@ualberta.ca

*Current Research:* 1) Early evolution of Salmoniformes, including an osteological reexamination of †*Eosalmos*; 2) Historical biogeography of Osteoglossomorpha; 3) Paleoeological and paleozoogeographical implications of fish assemblages from the Middle Jurassic to Lower Tertiary of northwestern China; and 4) preparing an oral presentation titled "Late Mesozoic Osteoglossomorph fishes and their implications on historical biogeography" for the Symposium of Paleobiogeography and Reconstruction of Palaeocontinents, 30th International Geological Congress, August 4-14, 1996. Beijing, China.

**Schaeffer, Bobb**, 1400 East Ave., No. 505, Rochester, New York, 14610 USA

*Current Research:* Brian Gardiner and I are hopefully winding up a long PAUP session with the lower actinopt. Judy Massare has made this possible with her computer facility at Brockport (part of the State University System). John Maisey and I have been talking about getting the paleoichthyologists together at an informal session(s) at the AMNH during the SVP meeting in October 1996 in New York, N.Y. ■

## Squish Fisch Fiche: Recent Publications

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**Beavan, N. R. 1995.** A marine fossil assemblage from the Foremost Formation (Cretaceous, Campanian), Southern Alberta, and an evaluation of North American Cretaceous Elasmobranch biostratigraphy. M.Sc. thesis, University of Calgary, Calgary, Canada, 163 pp.

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**Chiappe, L. M., Rivarola, D., Cione, A., Fregenal-Martínez, M., and Lopez-Albarello, A. 1995.** Inland biotic association from the

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**Clack, J. A. 1996.** Otoliths in fossil coelacanths. J. Vert. Paleontol., **16**: 168-171.

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*Delegates to the Sixth Symposium on Mesozoic Terrestrial Ecosystems and Biota, meeting in Beijing, China, in 1995.*



*Chinese vertebrate paleontologists photographed in Beijing, in 1995.*

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# Habitat of the Australian lungfish, *Neoceratodus forsteri*, needs protection

Conservationists in Queensland are fighting to save one of the few remaining unchanged habitats of the Queensland lungfish, and we need the help of concerned scientists overseas to get the species, and the environment, fully protected. If the environment is ruined, the lungfish could become extinct, and we'd appreciate it if you could send a note to the address below stating why you feel the lungfish is important to science.

The environment of the Australian lungfish, *Neoceratodus forsteri*, is under threat. Three major lungfish habitats in southeast Queensland, in the Brisbane, Mary and Burnett Rivers, have already been altered by the construction of weirs and dams, and more water impoundments are planned in the near future. Fluctuating water levels in existing reservoirs damage the spawning sites and juvenile habitats by destroying aquatic plants in the shallows where most eggs are laid, and this reduces recruitment of young fish to the adult population. If the remaining riverine habitats are altered in the same way, recruitment could fall to critically low levels. In addition, detailed scientific studies on the ecology of lungfish in all of its current habitats have not been done, and we do not even have an estimate of the size of the present adult population.

Conservation agencies in Queensland are preparing an application to have the lungfish listed in Schedule 1 of the Endangered Species Protection Act, 1993. The lungfish is already protected by Queensland state law, and is on the CITES Schedule 2 List of species threatened by trade. This is not enough. Current demands by agriculture for increasing amounts of water for irrigation could result in changes to the few unaltered stretches of the three major rivers where lungfish are still found, and the species may not be able to spawn successfully in the altered habitats.

Despite the fact that the needs of agriculture in the coastal regions affected by the proposed reservoirs could be met by improved management practices, the Queensland Government intends to push ahead soon with two large new impoundments on the Burnett River, where the lungfish was first discovered. To date, the efforts of conservationists have not achieved a decision to reverse the proposals to build the weirs, despite private assurances that they are correct in their assessment of risk to lungfish populations, because "a political decision has been made".

Conservation agencies in Queensland are appealing to scientists who have an interest in the Australian lungfish to support their application for protection of the habitat and the species. Please write a short note explaining your perception of the importance of *N. forsteri* for science and send it to:

Mrs Pam Soper  
Wide Bay Conservation Council  
29 Watson's Road  
Kelly's Creek  
Bargara  
Queensland 4670  
Australia  
FAX (international code) 61 71 591919.

If it is more convenient, send your comments on e-mail to me ([a.kemp@mailbox.uq.oz.au](mailto:a.kemp@mailbox.uq.oz.au)) and I will pass the messages on to the Wide Bay Conservation Council.

Please find the time to send a short comment. Thank you, on behalf of the lungfish, for your assistance.

Yours sincerely  
Anne Kemp (Dr.)