

# *The Compleat Mesoangler*

A Newsletter About Mesozoic Fishes

Volume 9, Numbers 1-2

October 1, 2003

---

## **Upcoming Meetings for Mesozoic Fish Workers**

Several important meetings are rapidly approaching. Mesozoic Fish enthusiasts should plan now to participate in as many of these meetings as possible, but especially in the main meeting of our group, the Mesozoic Fishes meeting in Spain in 2005. This is an excellent opportunity to share research results and to establish warm friendships with fellow specialists. Also, the Early/Lower Vertebrates Symposia are excellent opportunities to share the excitement of Mesozoic fish research with other fish and lower tetrapod workers.

Here are the meetings, in order of date:

### **10th International Symposium on Early Vertebrates/Lower Vertebrates**

May 24-28, 2004

Universidade Federal do Rio Grande do Sul, Brazil

See page 2 for more details.



### **7th International Congress of Vertebrate Morphology**

July 27 - August 1, 2004

Boca Raton, Florida

Details page 3.

### **XI European Congress of Ichthyology**

September 6-10, 2004

Tallinn, Estonia

Details page 3.



### **Fourth International Meeting on Mesozoic Fishes - Systematics, Homology, and Character Definition**

August, 2005

Miraflores de la Sierra, Madrid, Spain

See page 2 for more details.

Special thanks go to John Bruner for doing most of the work compiling and editing this issue of *The Compleat Mesoangler*. We both hope that you find it useful and encourage you to keep sending us your news and publication notices!

by Mark Wilson ■

---

*(Left) Triassic fishes from Wapiti Lake, Canada. More pictures by Mark Wilson from 2003 field work are on p. 10. See also Mutter, p. 6.*

**Fourth International Meeting on  
Mesozoic Fishes - Systematics,  
Homology, and Character Definition**

August, 2005

Miraflores de la Sierra,

Madrid, Spain

Dear friends,

The first circular for the fourth edition of our beloved Mesozoic Fishes Meeting has already been sent to the mailing list. If you have not received it, and would like to, send an e-mail to: francisco.poyato@uam.es.

A pdf version (1 MB) of the First Circular can be downloaded from the Mesozoic Fishes Home Page: [www.biology.ualberta.ca/wilson.hp/mesofish.html](http://www.biology.ualberta.ca/wilson.hp/mesofish.html).

Francisco

Here is a brief reminder of the deadlines:

Preliminary registration: September 30, 2003

Preliminary room booking: June 30th, 2003 (to ensure rooms in the meeting facility)

Abstract submission (general): December 10th, 2004

Abstract submission (fund applicants): June 10th, 2004

Manuscript submission (general): during the meeting

Manuscript submission (fund applicants): April 10th, 2005 ■

**10th International Symposium on  
Early Vertebrates/Lower Vertebrates  
24-28 May 2004**

UNIVERSIDADE FEDERAL DO RIO  
GRANDE DO SUL, Brazil

Instituto de Geociências, Departamento de  
Paleontologia e Estratigrafia

First Announcement and Call for Papers is at  
<http://www.ufrgs.br/geociencias/evento.html>.

Gramado, RS, Brazil, 24-28th May 2004



The

*Mesozoic Fishes*  
*Home Page*

on the

**World Wide Web**

is at:

[www2.biology.ualberta.ca/wilson.hp/mesofish.html](http://www2.biology.ualberta.ca/wilson.hp/mesofish.html)

Add a link to your personal or museum's home page, or to a file that you are allowing others to download by sending us its WWW address.

You may submit [membership/news items](#) and [publication citations](#) via web forms.

Intercontinental and interhemispherical stratigraphic correlations based on lower/early vertebrates; palaeoenvironments/geochronological dating based on early vertebrate faunas; correlations of marine/non-marine fish-bearing strata; systematics and evolution of fossil and extant agnathans and fishes and basal tetrapods; IGCP business meetings; oral presentations and posters; post-meeting field trip to Devonian, Carboniferous, Permian, and Triassic vertebrate localities of the Paraná Basin.

An abstracts volume and a special volume of selected papers will be prepared for the Meeting.

Important dates are:

Abstract deadline: 30 November, 2003

Manuscript submission: 31 December, 2003

Early registration fee: 30 November, 2003

More information can be found at the meeting web site (see above). ■

---

## XI EUROPEAN CONGRESS OF ICHTHYOLOGY – ECI XI

September 6-10, 2004, **Tallinn, Estonia**

### First Announcement

We invite you to attend the XI European Congress of Ichthyology, to be held in Tallinn, Estonia on 6-10 September 2004. The scientific program will include sessions and symposia on many aspects of ichthyology. Oral and poster presentations will be accepted. Individuals wishing to organize a symposium on a specific topic are encouraged to contact the congress organizers or the European Ichthyological Society's (EIS) Board. A call for abstracts and the second announcement will be sent by email and regular mail in August 2003. The abstract deadline will be February 1, 2004. Additional information has been available since December 2002 at: [www.sea.ee/ECI](http://www.sea.ee/ECI). A questionnaire can also be downloaded at the EIS homepage: [www.nrm.se/ve/pisces/eis](http://www.nrm.se/ve/pisces/eis). ■

### 7th International Congress of Vertebrate Morphology

Presented by the International Society of Vertebrate Morphologists  
<http://www.iconferences.org/icvm7/>  
Florida Atlantic University, Boca Raton, Florida,  
27 Jul - 01 Aug 2004  
Abstract Submission and Early Registration  
Deadline, 01 October 2003, Midnight (US  
Eastern Time). Convener, Jeanette Wyneken,  
Dept. of Biological Sciences, Florida Atlantic  
University, 777 Glades Road, Boca Raton, FL  
33431-0991 USA.  
*Phone:* 561-297-0146 • *Fax:* 561-297-2749 •  
*Email:* [icvm7@science.fau.edu](mailto:icvm7@science.fau.edu) ■

---

## Mesozoic Fish Tales: News from Readers

---

**Arratia, Gloria.** I wish to inform all of the participants of the Mesozoic Fishes meetings that Spain has been chosen to hold the meeting in 2005. Dr. Francisco Poyato-Ariza, with the collaboration of the Universidad Autónoma de Madrid, will organize it. Mark your calendars and start planning ahead!

On behalf of all of us I would like to thank our Chinese colleagues for offering their country as next host; although most of our participants recognized that China would be a wonderful place for the next meeting, for most there would be severe financial difficulties with covering the travel expenses, so that many more people would be able to attend a meeting in Spain.

**Averianov, Alexander O.**, Zoological Institute, Russian Academy of Sciences, Universitetskaya nab. 1, St. Petersburg 199034, Russia. *Email:* [sasha@AA1923.spb.edu](mailto:sasha@AA1923.spb.edu).

Interests: Jurassic and Cretaceous sharks from Russia, Kirghizia, Kazakhstan, and Uzbekistan.

**Deynat, Dr. Pascal P.**, Head of the Odontobase Project, 12 rue Mouton Duvernet, 75014 Paris, France, *Email:* [pdeynat@free.fr](mailto:pdeynat@free.fr)  
Dear Elasmophiles,

In the beginning of 2002, I started putting together the results of my work on chondrichthyan dermal covering in a database I called Odontobase.

This database will be a valuable tool for identifying elasmobranchs by the characteristics of their isolated dermal denticles, tubercles, and thorns, and could be used by ichthyologists, paleoichthyologists, and paleontologists.

The first results will be focused on European species, in order to test the validity of the database, and will be available on my website ([www.odontobase.com](http://www.odontobase.com)) at the end of 2003. Publications about Platyrrhinidae, Zanobatidae, Pristidae, and Rajidae will be available soon. Three books and a CD-ROM will be published.

Study of specimens will be made using the major museum and institute collections. This work was started with my Brazilian colleagues and, now, I am completing my data in Paris (MNHN) and London (NHM). I hope to visit the American collections in the beginning of 2004. For this reason, I would like to know if some colleagues could provide me with skin samples of sharks and skates freshly caught, or if I could study their collections.

Financial support is difficult to get but a small grant has already been received for this database and any kind of help for this project will be very welcome and acknowledged in the books, publications, and forthcoming presentations.

All information about this project must be requested from myself and/or professor François

Meunier, head of the Laboratory of Ichthyology, and scientific advisor of this project (meunier@mnhn.fr).

In advance, I thank you for your help.  
Yours sincerely,  
Dr. Pascal P. Deynat

## New Members:

**Bean, Lynne** Department of Geology, Faculty of Science, Canberra, ACT 0200, Australia *Fax:* +61 2 6125 5544; *Phone:* +61 2 6205 7112  
*Email:* 333671@geology.anu.edu.au; landrbean@primus.com.au.

Interests: Jurassic and Cretaceous teleosts of Australia.

**Bruni, M. A.** Avenue Saint-Martin, Musée océanographique de Monaco, MC 98000, Monaco *Phone:* 00377 93 15 36 00; *Email* collections@ocean.org.

Interests: I am working on elasmobranch phylogenetic relationships of the lamniforms and on the skull of *Mitsukurina* using cladistics.

**Cadeña Rueda, Edwin Alberto**, Universidad Industrial de Santander, Escuela de Geología, Bucaramanga, AA 678 Colombia. *Phone:* 0332 795 457 *Email:* geodwin@hotmail.com.

Interests: I am working with Early Cretaceous fishes and marine turtles of Colombia.

**Chen, Li-de**, Yichang Institute of Geology and Mineral Resource, Gaoyao Road 37#, Yichang, Hubei, China. *Phone:* 0086-0717-634-6762  
*Email:* ycclide@cgs.gov.cn.

Interests: Triassic and Jurassic elasmobranchs

**Kim, Tae-wan** Chunggu High School, 850-6 Sincheon-dong, Dong-gu, Daegu Metropolitan-city, South Korea. *Phone:* 082-53-752-3649  
*Fax:* 082-53-752-3935; *Email:* kim3034@hanamil.net; *Web:* http://www.earth4u.net.

Interests: I am a member of the Society of paleontology in Korea and a high school teacher in Korea (earth science). I am working on a Ph.D. at Kyungpook National University on Mesozoic nonmarine fish fossils. I have found 19 new Cretaceous fish fossil localities in Korea.

**Liptrot, Pete S.** Bolton Museum, Art Gallery and Aquarium, Le Mans Crescent, Bolton, England, BL1 1SE United Kingdom. *Fax:* 01204 332241; *Phone:* 01204 332200; *Email:* pete.liptrot@bolton.gov.uk *Web:* http://www.boltonmuseums.org.uk.

## *The Compleat Mesoangler*

is edited and published by Mark V. H. Wilson. *TCM* is sent to more than 215 people in 25 Countries. To join the list or to update your entry, submit a Mesozoic Fish Tales item:

- research interests, address changes
- news from lab or reports of fieldwork
- meeting announcements
- hints or questions on techniques or specimens
- photos of Mesozoic fishes, localities, field parties, meetings, researchers, etc.
- employment & grad school opportunities available or needed
- publications (not listed before; reprints are greatly appreciated)

Send to:

- Email: mark.wilson@ualberta.ca
- FAX: 1-780-492-9234
- post: Dr. M. V. H. Wilson  
Dept. of Biological Sciences  
University of Alberta  
Edmonton, Alberta T6G 2E9  
CANADA

**Next Deadline March 31, 2004**

Optional contribution to defray expenses of production and mailing: \$5. U.S. per year.

Interests: As Aquarium Development Officer here at the Museum, I am seeking to educate our visitors about every aspect of the World of Fishes. This includes evolution and the fossil record. We display species from families that can be traced back into the Mesozoic (*Neoceratodus*, *Polypterus*, and *Lepisosteus*), and wish to ensure that any information associated with these displays is as scientifically accurate as possible.

If there is anyone who has a photograph or a drawing of a ceratodontid lungfish that they are willing to allow a one-off use of, for our interpretation graphics, please get in touch with me. It will be used to demonstrate the remarkable similarity in form between the extinct and extant species. Thanks, Pete Liptrot.

**Loyal, Dr. R. S.** Center for Advanced Study in Geology, Panjab University, Chandigarh – 160014, India *Fax:* +91-0172-545459 *Phone:* +91-0172-534249 *Email:* loyal.geo@lycos.com  
Cretaceous elasmobranchs, holosteans

(semionotids), protacanthopterygians, acanthopterygians (labrids, tetraodontids) from Rajasthan (Western India), Madhya Pradesh (C. India) and other Peninsular Indian localities on Cretaceous sediments, paleoenvironments, paleogeography, and tectonics.

**Marchildon, Jason**, 4819 Line 11 N, Moonstone, Ontario L0K 1N0 Canada. *Phone*: (705) 835-5860 *Email*: ripple7501@hotmail.com.

Interests: I am interested in Mesozoic fishes and am pursuing a career in biology at the University of Ottawa.

**Martínez, Nieves López** Directora  
Departamento de Paleontología, Facultad de Ciencias Geológicas, Universidad Complutense, Ciudad Universitaria, 28040 Madrid, España  
*Fax*: 91 394 4849; *Phone*: 91 394 4875; *Email*: lopezmar@geo.ucm.es.

**Mauer, R.**, 31A The Avenue, Cowley, Uxbridge, Middlesex, England, UB8 3AD U.K.  
*Phone*: 0044 1895 270701 *Fax*: 0044 1895 252861 *Email*: bob@fossils-r-us.com; *Web*: www.fossils-r-us.com.

I have collected several different unclassified fish fossils from the Andes in Bolivia. I wish to have them identified and classified. Apart from the Bolivian fish, I have also collected Permian fish in Co. Durham and recently an Eocene fish (part skull & body) from the Isle of Sheppey in the U.K. I have been invited to give lectures on fossil and mineral collecting in Bolivia to some British Geological Society affiliate clubs.

**Milner, Andrew R. C.** P. O. Box 1616, Parowan, Utah 84761-1616 USA. *Phone*: (435) 477-9467; *Email*: andrew@hanmansfossils.com  
*Web*: <http://www.dinotrax.com>.

I am the City Paleontologist for St. George, Utah, in charge of the recently discovered (February 2000) St. George Dinosaur Tracksite at Johnson Farm. All of our fossils are in the Lower Jurassic (Hettangian) Moenave Formation of the Glen Canyon Group. The site not only has dinosaur tracks among other fossils, but an abundance of fishes including semionotids, rare hybodont sharks, and colobodontids. Researchers at the site include Jim Kirkland, Karen Chin, and Martin Lockley (not working on fish). We also have fish swim traces and will no doubt have more fish types to add to our list as material continues to be unearthed from the site and prepared out of concretions. Our museum should be completed on site by May of 2004.

**Paredis, Guido J. H.** Pieter Van Isackerlaan 5, B-2100 Antwerp-Deurne, Belgium. *Email*: g.paredis@tiscali.be; *Web*: www.paleontologie.be .

Interests: Cretaceous fossil fishes from Lebanon. The URL is the home page of the "Belgian Association for Paleontology" (=Belgische Vereniging voor Paleontologie), of which I am the president. Since my last subscription my email address has changed. Everyone can get in touch with me at: 963864396, *Email*: pplasencia@ono.com.

I am starting to work on Middle Triassic fishes from Spain.

**Rowe, Susan**, 885 Shores Blvd., Rockwell, Texas 75087-2373 USA. *Email*: darowe75087@yahoo.com.

Interests: I am interested in Mesozoic fishes.

**Smadi, Ahmad**, P.O. Box 321, Jarash, Jordan  
*Fax*: 00962 6 5652312; *Phone*: 00962 2 654 550; *Email*: drsmadi@yahoo.com.

I am working on the K-T boundary using microfauna and the Upper Cretaceous fish fossils and ammonites. My college professor, paleontologist H. Abu Azzam, and I found a big fish fossil. We need help in identifying this species. Any advice would be appreciated.

## Address updates:

**Ahlberg, Per E**, Department of Evolutionary Organismal Biology, Evolutionary Biology Center, Uppsala University, Norbyvägen 18A, SE-752 36 Uppsala, Sweden.

At the end of July I left the Natural History Museum to take up the newly created chair of Evolutionary Organismal Biology at Uppsala University in Sweden. I do not yet have a new e-mail address or phone number but will send these round as soon as they become available. From August it should also be possible to find my details via the University's web site, <[www.uu.se](http://www.uu.se)>. Hopefully I will be able to keep my present e-mail address live until a new one has been set up, but I ask your forbearance and patience in case things snarl up during the transition.

**Cuny, Dr. Giles**, Geological Museum, University of Copenhagen, Aster Voldgade 5-7, 1350 Copenhagen K, Denmark. *Mobile*: (45) 2748 8814, *Phone*: (45) 3532 2364 - 3532 2345; *Fax*: (45) 3532 2325 *Email*: giles@savik.geomus.ku.dk.

URL: <http://www.gological-museum.dk>

Interests: I am still working on the micro-structure of the enameloid of fossil shark teeth, Triassic neoselachian and hybodont sharks, as well as the hybodont faunas from the Lower Cretaceous of Thailand and Tunisia.

**Kazmer, Barry S.** 407 5th Ave. N.E., St. Cloud, Minnesota, 56304-0326, USA Fax: (320) 259-1897 Email: <bkazmer@excite.com>; <bkazmer1@charter.net>; Website: <http://pliosaur.freeservers.com>.

**López-Arbarello, Adriana.** Museo Paleontológico Egidio Feruglio, Fontana 140, 9100 Trelew, Argentina Telephone: +54 2965 428951 / 420012; FAX: +54 2965 432100; Email: alarbare@hotmail.com.

**Ivanov, Dr. Alexander O.** Department of Palaeontology, St. Petersburg University, 16 Liníya 29, St. Petersburg, 199178, RUSSIA FAX: 812-218-13-46 Email: aoi@AI1205.spb.edu.

**Mörs, Dr. Thomas** Curator of Fossil Vertebrates, Naturhistoriska Riksmuseet, NRM, Swedish Museum of Natural History, Department of Palaeozoology, Svante Arrhenius väg 9-11; P.O.BOX 50007, SE-104 05 Stockholm, SWEDEN. Fax: +46 9 5195-4184 Phone: +46 9 5195-5107 /-4180 (Secretary); Email: thomas.moers@nrm.se.

Since January 2001, I have been employed as Curator of Fossil Vertebrates at NRM's Department of Palaeozoology. As most of you know, one of the finest collections of Palaeozoic lower vertebrates is housed at the NRM. Additionally, the Vertebrate Section of the Zoological Department curates a large collection of Recent fishes. If you are interested in studying material in our collections with a High Lat. grant (for details see the last issue of TCM), I can serve as a contact person.

**Mütter, Dr. Raoul J.,** Laboratory for Vertebrate Paleontology, Department of Biological Sciences, University of Alberta, Edmonton, Alberta, T6G 2E9 CANADA.

I am doing a post-doc at the University of Alberta. I organized 3 weeks of field work in July 2003 as part of a joint expedition (8 participants from UALVP and the Dept. of Earth and Atmospheric Sciences, U. of A.; Royal Tyrrell Museum of Palaeontology, and Pacific PaleoQuest) to Wapiti Lake, Early-Middle Triassic of British Columbia. We found over 300

nice macrofossils and lots of rock samples in need of processing for microfossils. I also collected some *in situ* invertebrates and fishes. My work on phylogeny and paleobiogeography of Triassic fishes becomes now even more interesting because I have - scarce - but nevertheless, evidence of actinopterygians previously known only from the Paleozoic (museum collections and field work) that definitely stem from early Sulphur Mountain Fm.

**Nolf, Dirk** Institut Royal des Sciences Naturelles de Belgique, Rue Vautier 29, B-1000 Bruxelles, BELGIUM. Fax: 00.32.2.627 41 74; Phone: 00.32.2.627 44 89; Email: Dirk.Nolf@natuurwetenschappen.be.

**de la Peña, Zarzuelo, C.** Ronda Gijon No. 96, Covibar 2, Rivas-Vaciamadrid, 28529 Madrid, Spain. Phone: 34 1 666 01 44 Email: adelapenazarzuelo@wanadoo.es.

**Richter, Dr. Martha,** Departamento de Geologia/IGEO, Universidade Federal do Rio de Janeiro, Av. Brigadeiro Trompowski, s/n, Prédio do CCMN/Iiha do Fundão, CEP: 21.914-900 Rio de Janeiro, RJ, Brazil Phone: +55(21)93433114; Fax: +55(21) 25989465 Email: richter@geologia.ufrj.br and richter@vortex.ufrgs.br.

Concerning the 10th International Symposium on Early Vertebrates/Lower Vertebrates (<http://www.ufrgs.br/geociencias/evento.html>) (Gramado, Brazil, may 2004) please send an email to BR2003@vortex.ufrgs.br.

**Rodina, Dr. Olga,** Laboratory of Palaeontology and Stratigraphy, Institute of Petroleum Geology, 3, Av. Akademika Koptyuga, Novosibirsk 630090, RUSSIA. Email: rod@uiggm.nsc.ru.

---

## Squish Fisch Fiche: Recent Publications

---

**Arratia, G., J. Kriwet, and W.-D. Heinrich. 2002.** Selachians and actinopterygians from the Upper Jurassic of Tendaguru, Tanzania. *Mitt. Mus. Nat. kd. Berl., Geowiss.* **8**:207-230.

**Arratia, G., Schultze, H.-P., and Casciotta, J. 2001.** Vertebral column and associated elements in Dipnoans and comparison with other fishes: development and homology. *Journal of Morphology* **250**(2):101-172.

**Arratia, G., and Thies, D. 2001.** A new teleost (Osteichthyes, Actinopterygii) from the Early Jurassic *Posidonia* shale of Northern Germany. *Mitt. Mus. Nat. kd. Berl., Geowiss.* **4**:167-187.

**Averianov, A. O. 2001.** Systematics of the Cretaceous-Paleogene chimaeroid fish of the genus *Elasmodus* (Chondrichthyes, Holocephali). *Paleontologicheskii Zhurnal*, **35(3)**:65-75.

**Bannikov, A. F., and Bacchia, F. 2000.** A remarkable clupeomorph fish (Pisces, Teleostei) from a new Upper Cretaceous marine locality in Lebanon. *Senckenbergiana Lethaea*, **80(1)**:3-11.

**Bellwood, D. R. 2003.** Origins and escalation of herbivory in fishes: a functional perspective. *Paleobiology*, **29(1)**:71-83.

**Bemis, W. E. 2002.** REVIEW OF: Mesozoic fishes: Systematics and Paleoeology (Proceedings of the International Meeting, Eichstätt, 1993). Gloria Arratia and Günter Viehl (eds.) 1996. Dr. Friedrich Pfeil, München, Germany. ISBN 3-923871-90-2. 576 p., many figures and tables. \$100.00 (hardcover). *Copeia*, **2002(2)**:539-542.

**Brinkman, D. 2002.** An Illustrated Guide to the Vertebrate Microfossils from the Dinosaur Park Formation. Alberta Palaeontological Society workshop on vertebrate microfossils, Mount Royal College, Calgary, Alberta, 77 pp.

**Brinkman, D. B., and Neuman, A. G. 2002.** Teleost centra from uppermost Judith River Group (Dinosaur Park Formation, Campanian) of Alberta, Canada. *Journal of Paleontology* **76(1)**:138-155.

**Brito, P. M., and Gallo, V. 2003.** A new species of *Lepidotes* (Neopterygii: Semionotiformes: Semionotidae) from the Santana Formation, Lower Cretaceous of northeastern Brazil. *Journal of Vertebrate Paleontology* **23(1)**:47-53.

**Cappetta, H., and Case, G. R. 1999.** Additions aux faunes de sélaciens du Crétacé du Texas. *Palaeo Ichthyologica* **9**:5-111.

**Carpenter, S. J., Erickson, J. M., and Holland, F. D., Jr. 2003.** Migration of a Late Cretaceous fish. *Nature*. **423**:70-74.

**Case, G. R. 2001.** A new selachian fauna from

the Coleraine Formation (Upper Cretaceous/Cenomanian) of Minnesota. *Palaeontographica A* **261**:113-124.

**Case, G. R., Borodin, P. D., and Leggett, J. J. 2001.** Fossil selachians from the New Egypt Formation (Upper Cretaceous, Late Maastrichtian) of Arneytown, Monmouth County, New Jersey. *Palaeontographica A* **261**: 113-124.

**Case, G. R., and Cappetta, H. 1997.** A new selachian fauna from the Late Maastrichtian of Texas (Upper Cretaceous/Navarroan; Kemp Formation). *Münchener Geowissenschaftliche Abhandlungen, Reihe A, Geologie und Paläontologie* **34**:131-189.

**Case, G. R., Schwimmer, D. R., Borodin, P. D., and Leggett, J. J. 2001.** A new selachian fauna from the Eutaw Formation (Upper Cretaceous/Early to Middle Santonian) of Chattahoochee County, Georgia. *Palaeontographica A* **261**:83-102.

**Cione, A. L., and Prasad, G. V. R. 2002.** The oldest known catfish (Teleostei: Siluriformes) from Asia (India, Late Cretaceous). *Journal of Paleontology* **76(1)**:190-193.

**Cochran, J. K., Landman, N. H., Turekian, K. K., Michard, A., and Schrag, D. P., 2003.** Paleooceanography of the Late Cretaceous (Maastrichtian) Western Interior Seaway of North America: evidence from Sr and O isotopes. *Palaeogeography, Palaeoclimatology, Palaeoecology*, **191**:45-64.

**Cuny, G., Rieppel, O., and Sander, P. M. 2001.** The shark fauna from the Middle Triassic (Anisian) of North-Western Nevada. *Zoological Journal of the Linnean Society* **133**:285-301.

**Cuny, G., Suteethorn, V., Buffetaut, E., and Ouaja, M. 2001.** Freshwater hybodont sharks in the Aptian-Albian of Tunisia and Thailand. Abstract, pp. 9-10 *In*: Harper, D. A. T. (editor). 45th Annual Meeting of the Palaeontological Association, December 15-19, 2001, Geological Museum, University of Copenhagen.

**Cuny, G., Suteethorn, V., Buffetaut, E., and Ouaja, M. 2001.** Freshwater hybodont sharks in the Aptian-Albian of Tunisia and Thailand. Abstract, p. 9. *In* Harper, D. A. T. (editor), 45th Annual Meeting, December 15-19, 2001, University of Copenhagen, The Palaeontological

Association. Newsletter Number 48, 52 pp.

**Cuny, G., Suteethorn, V., Buffetaut, E., and Ouaja, M. 2001.** Freshwater hybodont sharks in the Aptian-Albian of Tunisia and Thailand. Bulletin de la Société d'Étude des Sciences Naturelles D'Elbeuf **2001**(Colloquium on the Cenomanian Stage, Oct. 20-21, 2001, Rouen, France):27-29.

**Duffin, C. J. 2001.** A chimaerid (Holocephali, Chimaeriformes) vomerine toothplate from the Upper Cretaceous of Belgium. Palaeontology **44**(6):1179-1188.

**Gallo, V., and de Figueiredo, F. J. 2002.** *Farinichthys gigas*, a new albulid fish (Teleostei: Elopomorpha) from the Paleocene of the Pernambuco-Paraíba Basin, northeastern Brazil. Journal of Vertebrate Paleontology **22**(4):747-758.

**Gayet, M., Jégu, M., Bocquentin, J., and Negri, F. R. 2003.** New characoids from the Upper Cretaceous and Paleocene of Bolivia and the Mio-Pliocene of Brazil: phylogenetic position and paleobiogeographic implications. Journal of Vertebrate Paleontology **23**(1):28-46.

**Gayet, M., Meunier, F. J., and Werner, C. 2002.** Diversification in Polypteriformes and special comparison with the Lepisosteiformes. Palaeontology **45**(2):361-376.

**Goto, M. 2001.** Fossil teeth of chlamydoselachids from Japan and the phylogeny of Chlamydoselachiformes. p. 35, abstract *In*: Tintori, A. (editor) III International Meeting on Mesozoic Fishes: Systematics, Paleoenvironments and Biodiversity. August 26-31, 2001, Sarpiano-Monte San Giorgio.

**Goto, M. 2002.** Tooth remains of chlamydoselachids from Japan and the evolution of chlamydoselachian sharks. Abstracts of the 151th Regular Meeting of the Palaeontological Society of Japan **15**(1):15.

**Grande, L., Jin, F., Yabumoto, Y., and Bemis, W. E. 2002.** †*Protopsephurus liui*, a well-preserved primitive paddlefish (Acipenseriformes: Polyodontidae) from the Lower Cretaceous of China. Journal of Vertebrate Paleontology **22**(2):209-237.

**Hancock, J. M. 2003.** Lower sea levels in the middle Cenomanian. Carnets de Géologie/

Notebooks on Geology Letter, **2003/02** (CG2003\_LO2\_JMH):1-6.

**Hilton, E. J. 2003.** Comparative osteology and phylogenetic systematics of fossil and living bony-tongue fishes (Actinopterygii, Teleostei, Osteoglossomorpha). Zoological Journal of the Linnean Society, **137**:1-100.

**Kriwet, J. 2002.** Pycnodont fish remains (Neopterygii: Pycnodontiformes) from the Kimmeridgian (Upper Jurassic) of the Lusitanian Basin (Central Portugal). N. Jb. Geol. Palaeont. Mh. **2002**(10):577-587.

**Kriwet, J. 2002.** *Anomoeodus pauciseriale* n. sp. (Neopterygii, Pycnodontiformes) from the White Chalk Formation (Upper Cretaceous) of Sussex, South England. Paläontologische Zeitschrift, **76**(1):117-123.

**Kriwet, J., and Kussius, K. 2001.** Paleobiology and Paleobiogeography of sclerorhynchid sawfishes (Chondrichthyes, Batomorphi). Revista Española de Paleontología:35-46.

**Kumazawa, Y., and Nishida, M. 2000.** Molecular phylogeny of osteoglossoids: a new model for Gondwanian origin and plate tectonic transportation of the Asian arowana. Mol. Biol. Evol. **17**(12):1869-1878.

**Lambers, P. H. 1998.** A caturid (Actinopterygii, Halecomorphi) from the Lower Jurassic (upper Pliensbachian) of Bavaria. Archaeopteryx **16**:91-97.

**Lambers, P. H. 1998.** The genus *Furo* (Pisces, Halecomorphi) from the Upper Jurassic Plattenkalke of Germany. Oryctos **1**:23-35.

**Lambers, P. H. 1998.** Beenvissen. pp. 142-143 *In*: Jagt, J. W. M., Leloux, J., Dhondt, A. V., (editors) Limburgnummer 9B: Fossielen van de St. Pietersberg. Grondboor & Hamer, **52**:93-156.

**Lambers, P. H. 1999.** The actinopterygian fish fauna of the late Kimmeridgian and early Tithonian 'Plattenkalke' near Solnhofen (Bavaria, Germany): state of the art. Geologie en Mijnbouw **78**:215-229.

**Min, Z., and Schultze, H.-P. 2001.** Chapter 17. Interrelationships of basal osteichthyans. pp. 289-314. *In*: Ahlberg, P. E. (editor). Major Events in Early Vertebrate Evolution. Palaeon-



## China Scientific Book Services

-Academic books, Atlas  
Monographs, journals  
Proceedings, CD-ROM..



For more books and details please visit  
<http://www.hceis.com> <http://www.hceis.com/product/index/Fishes.htm>

**Chen Pei-ji.** 1999. Jehol Biota {In Chinese with English abstracts}. ISBN: 7-312-01165-9. 342 pages+ Plates Size: 185x260mm, Softcover Price: US\$55+\$8 by sea mail.

**Zhang Miman.** 2001. Jehol Biota-Splendid Lives From - More Than 100 Million Years Ago {In Chinese} Published in November, 2001, 150 pages, 183 figs Size: 290x215mm, Hard-back, Price: US\$58+\$8.

**Ma Fengzhen.** 1993. Late Mesozoic Fossil Fishes from the Jiuquan Basin of Gansu Province, China. Chinese Edition with English Summary (p.89-p.98). 103 pages+18 plates. ISBN 7-5027-3174-1 /Paperback Price : US\$17 by sea mail. 7£.

**Xiao Zongzheng et alii** (editors) 1994. The Mesozoic Stratigraphy and Biota of Beijing Area. {In Chinese with an English abstract} 135 pages + 10 plates. ISBN: 7-116-01579-5/P.1272; Size: 185x260mm; Price:US\$25+\$6 by sea mail.

ology, phylogeny, genetics and development. Systematics Association Special Volume, Series **61**. London and New York, Taylor and Francis.

**Murray, A. M.** 2001. The fossil record and biogeography of the Cichlidae (Actinopterygii: Labroidei). Biological Journal of the Linnean Society, **74**:517-532.

**Mutter, R. J.** 2002. Revision of the Triassic Family Colobodontidae *sensu* Andersson 1916 (emended) with a Tentative Assessment of Perleidiform Interrelationships (Actinopterygii: Perleidiformes). Dissertation zur Erlangung der naturwissenschaftlichen Doktorwürde,

Universität Zürich, Mathematisch-naturwissenschaftlichen Fakultät, Zürich, Switzerland, 335 pp. + 8 pp. Appendices + 54 Plates.

**Perea, D., Ubilla, M., Rojas, A., and Goso, C. A.** 2001. The West Gondwanan occurrence of the hybodontid shark *Prihybodus*, and the Late Jurassic-Early Cretaceous age of the Tacuarembó Formation, Uruguay. Palaeontology **44(6)**:1227-1236.

**Rees, J., and Underwood, C. J.** 2002. The status of the shark genus *Lissodus* Brough, 1935, and the position of nominal *Lissodus* species within the Hybodontioidea (Selachii). Journal of Vertebrate Paleontology **22(3)**:471-479.

**Schwimmer, D. R., Hooks III, G. E., and Johnson, B.** 2002. Revised taxonomy, age, and geographic range of the large lamniform shark *Cretodus semiplicatus*. Journal of Vertebrate Paleontology **22(3)**:704-707.

**Stahl, B. J., and Chatterjee, S.** 2002. A Late Cretaceous callorhynchid (Chondrichthyes, Holocephali) from Seymour Island, Antarctica. Journal of Vertebrate Paleontology **22(4)**:848-850.

**Takakuwa, Y., Goto, M., Hasegawa, Y., Yamazawa, T., Takayama, Y., and Shimizu, M.** 2001. Tooth remains of *Chlamydoselachus* (Chondrichthyes, Elasmobranchii) from the Tomioka Group (lower to middle Miocene) in Tomioka and Annaka City, Gunma prefecture, central Japan. Bull. Gunma Museum Nat. Hist. **5**:19-30.

**Taverne, L.** 2001. Position systématique et relations phylogénétiques de *Paraclupavus* ("*Leptolepis*") *caheni*, Téléostéen marin du Jurassique moyen de Kisangani (Calcaires de Songa, étage de Stanleyville), République Démocratique du Congo. Mus. roy. Afr. Centr., Tervuren, (Belg.) Dept. Geol. Min. Rapp. Ann. 1999-2000 **2001**:55-76.

**Taverne, L.** 2001. Révision de *Syntegmadous altus* (Teleostei, Tselfatiiformes), poisson marin du Crétacé Supérieur du Kansas (États-Unis). Cybium **25(3)**:251-260.

**Taverne, L.** 2002. Révision de *Luxilites striolatus*, poisson marin (Teleostei, Tselfatiiformes) du Crétacé supérieur du Kansas (États-Unis). Belg. J. Zool. **132(1)**:25-34.

**Taverne, L. 2002.** Les Poissons crétacés de Nardò. 12<sup>o</sup>. *Nardoclupea grandei* gen. et sp. nov. (Teleostei, Clupeiformes, Dussumieriinae). Bollettino del Museo Civico di Storia Naturale di Verona. **26**:3-23.

**Taverne, L. 2002.** Study of *Pseudanogmius maiseyi* gen. and sp. nov., marine fish (Teleostei, Tselfatiiformes) from the Late Cretaceous of Kansas (United States). *Geobios* **35**:605-614.

**Underwood, C. J. 2002.** Sharks, rays and a chimaeroid from the Kimmeridgian (Late Jurassic) of Ringstead, southern England. *Palaeontology* **45**(2):297-326.

**Vajda, V., Raine, J. I., and Hollis, C. J. 2001.** Indication of global deforestation at the Cretaceous-Tertiary boundary by New Zealand fern spike. *Science* **294**:1700-1702. ■



*Three members of the Wapiti Lake field party: Marji Johns, Andy Neuman, and Raoul Mutter.*



*View of 'T Cirque' from the air. R. Mutter and assistants spent 10 days collecting in this area.*



*One of several large specimens of Bobasatrania found by Allan Lindoe.*



*Fossil Fish Lake (foreground) and Wapiti Lake (background) seen from above 'F Cirque.'*



*Helicopter lifting equipment and specimens from the camp beside Fossil Fish Lake.*