

NEWSLETTER N°165 December 1999

OF SEDIMENTOLOGISTS

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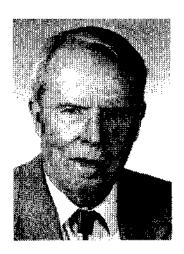
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IAS-Homepage:

http://www.blackwellscience.com/uk/society/ias

OBITUARY FOR HANS-ERICH REINECK (1918–1999)



n 15 August 1999, Hans-Erich Reineck, a figurehead of modern sedimentology, passed away at the age of 81 after a short illness. Having dedicated most of his life to the study of intertidal and shallow marine sediments, his ashes were returned to the environment that so fascinated him at a locality he had chosen himself many years earlier.

His extraordinary career is highlighted by a number of milestones. Having survived World War II with a shrapnel injury to his face, Hans-Erich completed his studies in Geology at the University of Mainz (Germany), obtaining his Ph.D. in 1953. A year later he suc-

cessfully applied for a job with the Senckenberg Natural History Society in Frankfurt. Rudolf Richter, at the time Director of the Senckenberg Institute, sent the young and aspiring scientist to the marine research station in Wilhelmshaven which had been founded many decades earlier (1928). It was in the splendid isolation of the Wadden Sea landscape that Hans-Erich was able to unfold his unique observational powers. In 1961 he followed in the footsteps of Wilhelm Schäfer as head of the station. Under his able leadership the small laboratory expanded into a well-equipped research institute focussing on the geology and biology of shallow marine environ-ments. In 1969 he was honoured with an extramural professorship by the University of Frankfurt. Hans-Erich Reineck was president of the IAS from 1968 to 1971.

Having developed or perfected the tools and methods for the undisturbed sampling and preservation of modern sediments, Hans-Erich set out to build up what must surely be one of the most comprehensive archives of primary sedimentary structures in the world. The superb products today illustrate numerous papers and textbooks, and have become legend for several generations of sedimentologists. It did not take long before his work gained international recognition.

Only a year after publishing the benchmark textbook "Depositional Sedimentary Environments" together with his student Indra Bir Singh, he was awarded the Francis P. Shepard Medal for excellence in marine geology by the Society of Economic Paleontologists and Mineralogists. In 1988 the same society honoured him with the Twenhofel Medal for excellence in sedimentology. Official recognition in his own country came late. In 1992 he was the first recipient of the newly founded Marine Science Award of the City of Wilhelmshaven and in 1998, on his 80th birthday and barely one year before his death, the Senckenberg Society for Natural History finally honoured him with the Cretzschmer Medal.

their highest award for scientific achievement.

Hans-Erich Reineck withdrawn person who shunned the limelight. He would suddenly appear by stepping out of the dark with a new and exiting piece of work only to disappear again into the hidden realms of his personal world. Yet, he was by no means uncommunicative. In small circles of familiar faces he would tell glowing stories of unusual experiences and observations or narrate short poems dedicated to the one or other person. At that, he had a subtle and sometimes cryptic sense of humour. He enjoyed publishing provoking and sometimes irritating observations whose meaning was not immediately apparent. One such case was a lone footprint in compacted snow on a stone terrace, the snow around it having long melted away. Having been published in the April issue of a popular science series, it drew the comment that it was surely an April fool's joke. Evidently some did not recognise that it was an excellent example illustrating the principle of preservation through compaction.

> Burg Flemming, Wilhelmshaven, Germany.

IAS REGIONAL MEETING, COPENHAGEN

The IAS runs annual Regional Meetings as well as larger Congresses every four years. This report, from a personal perspective, is on the 19th Regional Euro-Meeting, hosted by University of Copenhagen, About 300 people attended, from 36 countries (Europe, USA, Asia, Australasia, etc). There were four concurrent sessions over 3 days, covering 11 themes. "Tectonic, eustatic and climatic forcing of sedimentary systems" was the theme I attended the most.

There were many interesting keynote and session talks. Some of special interest for me were Gail Ashley's strategic analysis of future trends in sedimentary geology, Peter Scholle's talk on the role of sedimentology in hydrocarbon exploration (in particular, the development of horizontal drilling causing a need for higher-resolution reservoir studies) and André Strasser's talk on the interplay of Milankovitch effects and 3rd order eustatic cycles. I found Finn Surlyk's address on fan systems exposed in Greenland inspiring and Alec Trendall's well organised talk made banded iron formations a very interesting topic. The many papers on cyclostratigraphy gave me some useful perspectives and ideas, and I thought the papers on using grain size and fabrics to distinguish debris flow

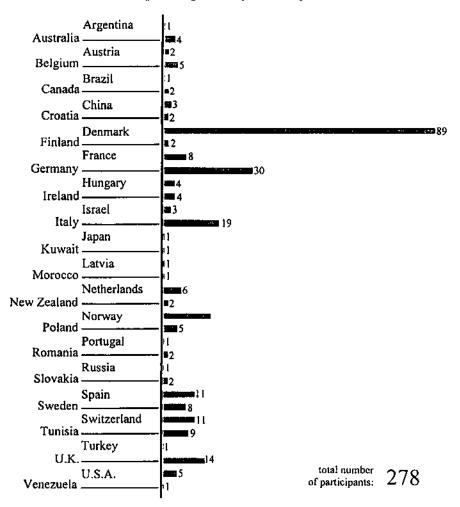
deposits from turbidites provided useful insights. Chris Fielding gave a concentrated summary of new results on the Cenozoic record of Antarctic glacial events. I can't mention all the talks that interested or impressed me: I would recommend to anyone who did not attend the meeting that they scan the Abstracts volume.

I went on the pre-meeting field trip to see Cretaceous and KTB sections at Stevns Klint, Faxe and Mons. Some of the units there are similar to our New Zealand (Marlborough) successions and it was good to see less lithified versions of the NZ rocks. The field guide notes were impressive and very well presented and the trip was very enjoyable and interesting, with some spectacular geology blended with beautiful scenery, not to mention the beer and the castle.

Social event highlights of the meeting included the reception in the ornate Town Hall and the memorable pre-dinner cruise on the canals of Copenhagen. I would like to thank Lars Clemmensen and the organising and scientific committees and sponsors for the success of the meeting, and their hospitality in what must be one of the most beautiful cities in Europe.

Brad Field, Wellington, New Zealand.

IAS Meeting 1999 Copenhagen participants by country



EVAPORITES AND CARBONATE – EVAPORITE TRANSITIONS

Report on the conference held in the Institute of Geology and Gechemistry of Combustible Minerals, Lviv, Ukraine, 11-13 September, 1999

round 80 delegates attended this conference, which was the first international geological meeting to be held in the Institute of Geology & Geochemistry in Lviv. People came from Poland, Slovakia, Belarus, Georgia, Russia, Bulgaria, Switzerland, Spain, Britain, and of course, Ukraine. The meeting involved one and a half days of talks and posters and a day and a half in the field.

Eighteen talks were given on a range of topics including the deposition and sequence stratigraphy of evaporites, the geochemistry of halite and sulphates notably trace element and isotope signatures, fluid inclusions in evaporites and their interpretation in terms of brine temperature and chemistry, the evidence for evaporite recycling, evaporite-related carbonates and carbonate replacements of sulphates, subsurface karst cavities in Zechstein anhydrite, bacterial sulphate reduction, salt diapirism, and mineralisation associated with evaporites. Evaporites from all parts of the geological record were discussed, but especially those from the Miocene (chiefly the Badenian of the Carpathian foredeep) and Permian, which occur in great abundance in this area of eastern Europe.

Posters, like the talks, covered an interesting array of topics and included the use of the preferred orientation of gypsum crystals to deduce the direction of water movement in the Miocene of the Carpathian foredeep, the stratigraphy of the Upper Devonian halite and carbonatesulphate cycles of the Pripyat Trough in Belarus where clearly spectacular evaporites occur in the subsurface and are seals for hydrocarbon reservoirs, the environmental problems associated with potash and other evaporite mines in Ukraine and elsewhere, manganese deposits associated with evaporites, and vein deposits in Silurian evaporites of the eastern European platform.

The fieldtrips provided a marvellous opportunity for delegates to see some spectacular exposures of rock types not normally seen at surface outcrop. In southwest Ukraine, in the Carpathian foredeep, an enormous potash quarry at Dombrovo near Kalush, 100 km south of Lviv was visited by some 30 people. Badenian kainite-langbeinite occur in great

quanitites, along with halite, polyhalite, kieserite, sylvite and some laminated gypsum. An exquisite blue variety of halite is locally present too. The cap rock here is a gypsiferous clay which has prevented dissolution by descending meteoric water through near-surface Quaternary gravels derived from erosion of the Carpathian flysch. Redeposited halite breccias are a particular feature of the succession and have been described and interpreted by Peryt & Kovaleich (J. Sed. Res., 1997) as debris flow deposits. The potash beds are involved in large and small isoclinal and recumbent folds thrusts, with movement direction towards the foreland in the northeast.

Badenian sulphates were visited in quarries near Lviv and spectacular sabre gypsum crystals up to 50 cm long were amazing. Also present were stromatolitic gypsum, resedimented gypsum and secondary nodular gypsum after nodular anhydrite after selenite gypsum (!). Many of the individual sulphate beds can be traced for several 100 km along strike in the Carpathian foredeep indicating very uniform brine conditions and shallow-subaqueous precipitation. A maorigin for these Miocene evaporites has been demonstrated by Kovalevich & Petrichenko (Slovak Geol. Mag., 1997) from analysis of brines in fluid inclusions, and Peryt (Sedimentology, 1996) has described the sulphate facies here in West Ukraine.

A native sulphur pit at Yaziv was incredible. An enormous hole in the ground had been excavated to expose limestone with up to 50% native sulphur, formed by bacterial reduction of gypsum through contact with hydrocarbons. As a result of subsidence from karstic dissolution and contamination of the groundwater, quarrying has ceased for the time being. However, sulphur is still being extracted nearby by steam injection through wells and melting of the mineral.

The organisers of the meeting, Professor Volodymyr Kovalevich and Dr Elena Khmelevska, are to be congratulated on running a most successful conference where there were excellent presentations and posters, much interchange of scientific ideas, and the great opportunity to see some most interesting and exciting rocks in the field.

The abstracts for this Lviv symposium and the abstracts for a conference which followed a few days later on "The Carpathian Foredeep Basin: its Evolution and Mineral Resources", held in Krakow, 17-18 September, have been published in a very nice book by the Institute of Geology, Warsaw. The abstracts book, all in English, is available from the IAS Treasurer's Office in Fontainbleau, price 50 French Francs.

Maurice Tucker, Durham, U.K.

HUNTSMAN AWARD: I. NICHOLAS McCAVE

he A.G. Huntsman Foundation is pleased to announce that the winner of the 1999 A.G. Huntsman Award is Prof. I. Nicholas McCave of the University of Cambridge, U.K.

This major Canadian award recognizes Dr. McCave's many seminal contributions to the evolution of a processed-based understanding of fine-sediment grain size distributions in the sea. His efforts to unravel the environmental record stored in muds have yielded insights that extend beyond marine sedimentology and into the broader field of marine particle dynamics and physical oceanography. His dedicated pursuit of mechanistic understanding of fine-sediment dynamics has led to important contributions in a wide range of marine sedimentary environments ranging from the nearshore to the deep sea.

His groundbreaking theory and observations of fine-sediment deposition, aggregation and hydrodynamic sorting continue to advance a field that in general has suffered from reliance on empirical calibration of poorly parameterized models. His work has led to greater understanding of phytoplankton bloom dynamics, vertical particle flux in the sea (a key element of the Joint Global Ocean Flux Study), and the kinematics of deep-sea circulation in the ancient ocean.

The A.G. Huntsman Award was established in 1980 by the Canadian marine science community to recognize excellence in research and outstanding contributions to marine sciences. It honours those men and women, of any nationality, who have had and continue to have a significant influence on the course of marine scientific thought. The A.G. Huntsman Award reflects the multifaceted nature of marine research. It is presented annually in one of three categories: marine geosciences, physical/chemical oceanography, and biological oceanography. The award was created to honour the memory of Archibald Gowanlock Huntsman (1883-1972), a pioneer Canadian oceanographer and fishery biologist. The A.G. Huntsman Award is funded by Fisheries and Oceans Canada, Natural Resources Canada, the Province of Nova Scotia, and the Canadian Association of Petroleum Producers.

Nomination information can be obtained from the

A.G. Huntsman Foundation, Bedford Institute of Oceanography, PO Box 1006, Dartmouth, Nova Scotia, B2Y 4A2.

Dartmouth, Nova Scotia, B2Y 4A2, Canada.

The category for the 2000 award will be physical/chemical oceanography.

Donald Gordon, Dartmouth, NS. Canada.

INTERNATIONAL CONFERENCE ON PALEOCEANOGRAPHY

his is to announce the "Seventh International Conference on Paleoceanography" which will be held September 17-21, 2001, in Sapporo, Japan.

Unlike previous ICP Conferences, we intend to provide all conference information on the World Wide Web; there will be no traditional circulars and other pre-conference information sheets. All information relevant to the conference will be given on the ICP VII Home Page. This will include conference schedule, travel and housing information, preregistration and abstract submission. To reach the widest possible audience we ask you to spread this information to your colleagues who may not be on the mailing list for this first announcement.

At this point we are in the process of locating government funds and private/industrial sponsors that are needed to make ICP VII as successful as our previous conferences. In the course of setting up the conference budget we will also search for possibilities for financial support for students and others in need of financial assistance. The options will be announced in due course on the ICP VII Home Page.

The ICP VII Home Page is located at:

http://www.iijnet.or.jp/JTB-CS/icp7/

Its contents will be continuously updated as conference planning progresses.

Helmi Weissert, Zurich, Switzerland.

CALENDAR

38TH BSRG AGM

December 19-21, 1999

U.K. (Edinburgh)

Contact: Dr. Mark Wilkinson

or: Dr. Stuart Haszeldine,

Department of Geology and Geophysics,

University of Edinburgh, U.K.

E-mail: mark.wilkinson@glg.ed.ac.uk or: stuart.haszeldine@glg.ed.ac.uk

INTERNATIONAL HANNS BRUNO GEINITZ SYMPOSIUM

(History of Geosciences, Regional Geology, Biostratigraphy and Paleontology in Central Europe)

January 28-30, 2000 GERMANY (Dresden) Contact: Ulf Linnemann

Staatliches Museum für Mineralogie und

Geologie Dresden,

Königsbrücker Landstrasse 159, D-01109 Dresden, Germany.

Tel: +49 351 892 64 03 Fax: +49 351 892 64 04 E-mail: mmg@sik.de

Web-site: http://www.sik.de/mmg/

8TH MEETING OF SWISS SEDIMENTOLOGISTS

January 29, 2000 SWITZERLAND (Fribourg) Contact: André Strasser, Institut de Géologie, Pérolles, 1700 Fribourg, Switzerland.

Tel: +41 26 300 89 78 Fax: +41 26 300 97 42

E-mail: andreas.strasser@unifr.ch

2ND LATIN AMERICAN SEDIMENTOLOGICAL CONGRESS 8TH ARGENTINIAN MEETING OF SEDIMENTOLOGY

March 14-17, 2000

ARGENTINA (Mar del Plata)

Contact: Centro de Investigaciones Geológi-

cas,

Facultad de Ciencias Naturales y Museo, Universidad Nacional de La Plata.

Calle 1 Nº 644.

1900, La Plata, Argentina.

Tel: +54 21 21 56 77 Fax: +54 21 25 86 96

E-mail: latinsed@cig.museo.unlp.edu.ar

Web site:

http://cig.museo.unlp.edu.ar/congreso/

MARINE SANDWAVE DYNAMICS International Workshop

March 23-25, 2000 FRANCE (Lille)

Contact: Alain Trentesaux, Université de Lille 1, SN5, UMR 8577

F-59 655 Villeneuve d'Ascq Cedex, France. E-mail: alain.trentesaux@univ-lille1.fr

Web site: http://www.univ-

lille1.fr/geosciences/pages_ufr/actualities/

sandwayes.html

ICELAND 2000 Modern Processes & Past Environments April 27-29, 2000

U.K. (Keele, Staffs)

Contact: Dr. Andrew J. Russell,

School of Earth Sciences & Geography,

Keele University, Staffs, ST5 5BG, U.K.

E-mail; a.j.russell@keele.ac.uk

MODERN & ANCIENT ICE-MARGINAL LANDSYSTEMS International Symposium

April 29-30, 2000

U.K. (Keele, Staffs)

Contact: Dr. Andrew J. Russell, Dr. David J. A. Evans

School of Earth Sciences & Geography, Keele University,

Staff's, ST5 5BG, U.K.

E-mail: a.j.russell@keele.ac.uk devans@geog.gla.ac.uk

LOWER CARBONIFEROUS OF THE TULAROSA BASIN – SACRAMENTO MTNS. AREA Pre-conference field trip

Pre-conference field trip May 12-14, 2000

PERMO-CARBONIFEROUS CARBONATE PLATFORMS AND REEFS

A Research and Field Conference jointly sponsored by SEPM and IAS

May 15-16, 2000 U.S.A. (El Paso, Texas)

Contact: Judy Tarpley,

SEPM,

1731 E. 71 Street,

Tulsa, OK 74136, U.S.A.

Tel: +1 918 493 33 61

Tel inside U.S.A.: 800 865 97 65

Fax: +1 918 493 20 93

E-mail: jtarpley@sepm.org

Web site:

http://www.sepm.org/research/conferences/permearb2000.html

PERMIAN PLATFORMS AND REEFS IN THE GUADALUPE AND HUECO MOUNTAINS

Post-conference field trip

May 17-19, 2000

SEDIMENT 2000

June 21-23, 2000

AUSTRIA (Leoben)

Contact:

Organisationskomitee Sediment 2000.

University of Leoben,

Institute of Geoscience:

Prospektion and Angewandte Sedimentolo-

gie, Peter-Tunner-Straße 5,

8700 Leoben, Austria.

Tel: +43 38 42 40 27 48 Fax: +43 38 42 40 26 40

E-mail: gawlick@unileoben.ac.at

MILLENNIUM FLUX – SEDIMENT SUPPLY TO BASINS

June 22-23, 2000
U.K. (Southampton)
Contact: Dr Stuart Jones,
School of Ocean and Earth Science,
University of Southampton,
Southampton Oceanography Centre,
European Way,
Southampton SO14 3ZH, U.K.

Tel: +44 1 703 59 36 41 Fax: +44 1 703 59 30 59

E-mail: stjj@mail.soc.soton.ac.uk

APC-2000

Combined Australian Palaeontological Convention; 3rd International Symposium on the Silurian System; and 2nd Australian Conodont Symposium July 11-15, 2000 AUSTRALIA (New South Wales) Contact: George Wilson, Department of Earth and Planetary Sciences, Macquarie University, Sydney, NSW 2109, Australia. Web-page: http://www.es.mq.edu.au/MUCEP/auscos/auscos.htm

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GEOFLUIDS III-2000

July 12-14, 2000 SPAIN (Barcelona) Contact: Secretariat, Institut de Ciences de la Terra, Jaume Almera, CSIC Lluis Sole i Sabaris, s/n 08028 Barcelona, Spain.

Fax; +34 93 411 00 12

E-mail: geofluids@natura.geo.ub.es

Web-page:

http://www.ub.cs/geoquimi/geofluids

HISTORY OF GEOLOGIC PIONEERS

August 3-5, 2000 U.S.A. (Troy, New York) Contact: D.M. Friedman, Northeastern Science Foundation, P.O. Box 746, 15 Third Street, Troy, NY 12181, U.S.A. Tel: +1 518 273 32 47 Fax: +1 518 273 32 49

E-mail: gmfriedman@juno.com

Web-site: http://www2.netcom.com/~gmfstf/

6TH NATIONAL CONGRESS OF PALAEOGEOGRAPHY AND SEDIMENTOLOGY IN CHINA

Mid-August, 2000 PEOPLE'S REPUBLIC OF CHINA (Liaohe/Liaoning)

Contact: Longyi Shao,

China University of Mining and Technol-

ogy, D11 Xueyuan Road,

Beijing 100083, People's Republic of China.

Fax: +86 10 62 34 10 89 Tel: +86 62 33 12 48 ext.8523 E-mail: shaol@mail.cumtb.edu.cn

APPLICATIONS OF NUMERICAL MODELLING IN STRATIGRAPHY AND BASIN ANALYSIS

September 11-12, 2000 U.K. (London)

Contact: Dr Peter Burgess.

Department of Earth Sciences,
University of Cardiff, Main Building,
PO Box 914. Park Place

Cardiff CF1 3YE, U.K. Tel: +44 (0) 12 22 87 49 28

Fax: +44 (0) 12 22 87 43 26 E-mail: burgesspm@cardiff.ac.uk

and

Dr Nigel Mountney, Department of Earth Sciences,

Keele University,

Keele, Staffordshire, ST5 5BG, U.K.

Tel: +44 (0) 17 82 58 31 71 Fax: +44 (0) 17 82 71 526 E-mail: gga00@keele.ac.uk

20TH REGIONAL MEETING OF SEDIMENTOLOGY

September 13-15, 2000 IRELAND (Dublin) Contact: Pat M. Shannon, Department of Geology, University College Dublin.

Beifield, Dublin 4, Ireland. Tel: +353 1 706 23 23

Fax: +353 1 283 77 33 E-mail: p.shannon@ucd.ie

Web-page:

http://www.tcd.ie/geology/ias2000.html

8TH INTERNATIONAL NANNOPLANKTON ASSOCIATION CONFERENCE

September 11-15, 2000 GERMANY (Bremen) Contact: Prof. Helmut Willems, FB 5 – Geowissenschaften,

Universität Bremen,

Postfach 330 440.

28334 Bremen, Germany.

Tel.: +49 421 21 82 198 Fax.: +49 421 21 84 451

E-mail: willems@micropal.uni-bremen.de

Web site; http://www.uni-bremen.de/~micropal/ina8.

html

FOURTH CONGRESS ON THE TERTIARY OF SPAIN

September 19-21, 2000 SPAIN (Tremp, Lleida)

Contact: Dr. E. Remacha or Dr. E. Maestro, Dept. de Geologia (Unitat d'Estratigrafia), Universitat Autònoma de Barcelona, 08193 Bellaterra (Barcelona), Spain.

Tel: +34 935 81 16 03 or 10 85

Fax: +34 935 81 12 63

Web-page:

http://www.catalunya.net/gettremp2000

9TH INTERNATIONAL CORAL REEF SYMPOSIUM

October 23-27, 2000 INDONESIA (Bali)

Contact: Secretariat of the International Coral Reef Symposium c/o COREMAP Jl. Raden Saleh 43,

Jakarta 10330, Indonesia.

Tel: +62 21 314 30 80 Fax: +62 21 327 958

E-mail: coremap@indosat.net.id

Wep-page: http://www.oseanologi.lipi.go.id

or: http://www.coremap.or.id

Abstracts and suggestions for minisymposia to be sent to: Dr. David Hopley, Chair ISRS Scientific Program Committee for 9ICRS,

c/o - CRC Reef Research Centre, James Cook University, Townsville, Oueensland 4811, Australia.

Tel: +61 7 47 25 28 32 Fax: +61 7 47 79 14 00

E-mail: david.hopley@ultra.net.au

16TH INTERNATIONAL SEDIMENTOLOGICAL CONGRESS

July 7-12, 2002

SOUTH AFRICA (Auckland Park, Gau-

teng)

Contact: Bruce Cairneross,

Department of Geology, Rand Africaans

University, P.O. Box 524,

Auckland Park, 2006, South Africa.

Tel: +27 11 489 23 13 Fax: +27 11 489 23 09 E-mail: bc@na.rau.ac.za

Web-page:

http://general.rau.ac.za/geology/

announcement.htm

7TH INTERNATIONAL CONFERENCE ON PALEOCEANOGRAPHY

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September 17-21, 2001 JAPAN (Sapporo)

Contact: Prof. Helmut Weissert, Geological Institute, ETH-Zurich, CH-8092 Zurich, Switzerland.

Tel: +41 (0)1 632 37 15 Fax: +41 (0)1 632 10 30 E-mail: helmi@erdw.ethz.ch

Web-page:

http://www.iijnet.or.jp/jtb-cs/icp7/