

International Subcommission on Cambrian Stratigraphy
Business Meeting, Graz, Austria, 20 July 2015

1. Thank you to organizers and field trip leaders of the Austria meeting (Werner Pillar and others, field trip leaders). Thank you to all who have made this meeting possible, and who have made us welcome here.
2. Introduction of officers and Voting Members (for term ending 2016): Loren Babcock (Chair), Per Ahlberg (Secretary), and Xingliang Zhang (Vice-Chair); additional VMs who are here: Gerd Geyer, Rodolfo Gozalo, Brian Pratt, Malgorzata Moczydlowska-Vidal, Shanchi Peng (also Vice-Chair of ICS), Matthew Saltzman, Maoyan Zhu.

2.1. Chairs of Working Groups:

Terreneuvian: Maoyan Zhu

Stage 2: Michael Steiner (not present)

Stage 3: Xingliang Zhang

Stage 4: Jim Jago (not present)

Stage 5: Linda McCollum (not present)

Stage 10: Per Ahlberg

Web page: Malgorzata Moczydlowska-Vidal (Michael Streng, webmaster)

3. Current Voting Members (for the term 2012-2016):

- 1, Per Ahlberg, Lund, Sweden per.ahlberg@geol.lu.se
- 2, José-Javier Álvaro, Villeneuve d'Ascq, Spain jose-javier.alvaro@uni-lille1.fr
- 3, Loren E. Babcock, Columbus, USA, and Lund, Sweden babcockloren@gmail.com
- 4, Gabriella Bagnoli, Pisa, Italy bagnoli@dst.unipi.it
- 5, Duck K. Choi, Seoul, Korea dkchoi@snu.ac.kr
- 6, Olaf Elicki, Freiberg, Germany elicki@geo.tu-freiberg.de
- 7, Gerd Geyer, Germany gerd.geyer@mail.uni-wuerzburg.de
- 8, Rodolfo Gozalo, Valencia, Spain rodolfo.gozalo@uv.es
- 9, James B. Jago, Mawson Lakes, Australia jim.jago@unisa.edu.au
- 10, Pierre D. Kruse, Darwin, Australia pierre.kruse@dme.nt.gov.au
- 11, Linda B. McCollum, Cheney, Washington, USA lmccollum@ewu.edu
- 12, Malgorzata Moczydlowska-Vidal, Sweden malgo.vidal@pal.uu.se
- 13, Elena B. Naimark, Moscow, Russia naimark@paleo.ru
- 14, Tatyana V. Pegel, Novosibirsk, Russia pegel@mail.ru
- 15, Shanchi Peng, Nanjing China scpeng@nigpas.ac.cn
- 16, Leonid Popov, Wales, UK leonid.popov@museumwales.ac.uk
- 17, Brian R. Pratt, Saskatchewan, Canada brian.pratt@usask.ca
- 18, Matthew R. Saltzman, Columbus, Ohio, USA saltzman.11@osu.edu
- 19, Michael Steiner, Berlin, Germany michael.steiner@FU-Berlin.de
- 20, Alexei I. Varlamov, Moscow Russia varlamov@sniiggims.ru.vcf
- 21, Mark Webster, Chicago, Illinois mwebster@geosci.uchicago.edu
- 22, Xiangling Zhang, Xi'an, China xzhang69@nwu.edu.cn
- 23, Maoyan Zhu, Nanjing, China myzhu@nigpas.ac.cn
- 24, Anna Zylinska, Warsaw, Poland anna.zylinska@uw.edu.pl

4. Request for updated contact information (especially email addresses) from all VMs, Honorary Members, Corresponding Members; also alternate rapid contact (fax, etc.).

5. In 2013-2014, the new ISCS webpage was introduced and modified. Recent information is posted there.
6. ISCS sponsored/co-sponsored meetings this year:
 - 6.1. Strati 2 (this meeting)
 - 6.2. IGCP 591, Quebec, Canada, 2015.
7. Announcement of upcoming meetings.
 - 7.1. July 2016, Association of Australasian Palaeontologists, Adelaide, Australia. ISCS Subcommittee meeting.
 - 7.2. IGCP 591, July 2016, Ghent, Belgium. ISCS meeting with Ordovician, Silurian, Devonian Subcommissions.
 - 7.3. IGC, August 2016, Cape Town South Africa
8. Discussion of progress toward publication of stage and series names
 - 8.1. Ratified boundaries defined by GSSPs:
 - 8.1.1. Furongian Series/Paibian Stage – 2004, Lethaia
 - 8.1.2. Drumian Stage – 2007, Episodes
 - 8.1.3. Terreneuvian Series/Fortunian Stage – 2008, Episodes
 - 8.1.4. Guzhangian – 2009, Episodes
 - 8.1.5. Jiangshanian – 2011; GSSP, Episodes (2012); ASSP, Episodes 2013
9. Discussion of work toward defining remaining GSSPs.
 - 9.1. Stage 5 (*Oryctocephalus indicus* level): Three possibilities: FAD of *Oryctocephalus indicus*, FAD of *Ovatoryctocara granulata*, FAD *Paradoxides* s.l.. Possible GSSP sections: South China, Siberia, Nevada, Spain.
 - 9.2. Stage 10 (*Lotagnostus americanus* level). Alternate possibility for level: *Eoconodontus notchpeakensis* level. Possibilities for a GSSP section: Siberia, South China, Kazakhstan, Utah, etc.
 - 9.3. Stage 2: Possible levels - *Watsonella crosbyi* or *Aldanella attleborensis*. Possibilities for a GSSP section: Siberia, South China, etc.
 - 9.4. Stage 3 (approximately FAD trilobites): The earliest trilobite known seems to be *Profallotaspis jakutensis* (Siberia). Other early ones include *Hupetina antiqua* in Morocco and *Fritzaspis* in Laurentia. Possible GSSP levels - *Pelagiella subangulata* or *Microdictyon effusum*. Taxonomic revision of *Microdictyon* is needed (at least 8 species have been named.) Possibilities for a GSSP section: Siberia, South China, etc.
 - 9.5. Stage 4 (approximately FAD *Olenellus/Redlichia*): ISCS favors placing stage base at FAD of a single trilobite species. Possibilities: a species of *Olenellus* (s.l.), *Redlichia* (s.l.), *Arthrococephalus chauveaui*, *Judomia*, or *Bergeroniellus*. Such a position would be at a level roughly corresponding to the base of the Dyeran Stage of Laurentia, the base of the Duyunian of South China, and the base of the Botoman Stage of Siberia.
 - 9.6. Cambrian/Terreneuvian/Fortunian GSSP. A Working Group has been assembled to provide a recommendation about whether or not we should consider options for redefining the GSSP.

- We need to remind persons interested in sections for consideration as GSSPs of the ICS/ISCS procedure: the relevant Working Group must identify the preferred level first; then there will be a call for proposals from the WG; then the WG will decide on the best section and refer the decision to ISCS for a vote by the Voting Members.

10. Other matters?