

## Minutes of the Commission on Applied Mineralogy (CAM) Business Meeting

Held on Edinburgh, 3rd September, 2002

### 1) Welcome

The Secretary Henrique Kahn on behalf of CAM Chairman Richard Hagni, who unfortunately could not join the meeting, opened the meeting. He welcomed the delegates and guests.

### 2) Acceptance/changes of Agenda

The agenda was accepted with no changes:

List of delegates and guest present at the meeting:

Name	Country	Institution	Email address
Anthony Naldrett	Canada	University of Toronto	ajn@quartz.geology.utoronto.ca
Carlo Aurisicchio	Italy	National Council Research CNR	carlo.aurisicchio@uniroma1.it
Dieter Rammlmair	Germany	BCR	rammlmair@bgr.de
Dogan Paktunc	Canada	CANMET	dpaktunc@nrcan.gc.ca
Elke Halenius	Sweden	Analytica	elke.halenius@analytica.se
Emilio Galan	Espanha	University of Seville	egalan@us.es
Eric Pirard	Belgium	University of Liege	eric.pirard@ulg.ac.be
Gyorgy A. Lovas	Hungary	Eotvos L. University	lovas@ludens.elte.hu
Henrique Kahn	Brazil	Uni. Sao Paulo, Escola Politecnica	henrkahn@usp.br
Johan de Villiers	South Africa	University of Pretoria	jpdev@postino.up.ac.za
Kari Kojonen	Finland	Geol. Survey of Finland	kari.kojonen@gsf.fi
Olga Kotova	Russia	Institute of Geology. Russian Acad. Sciences	kotova@geo.komisc.ru
Maria Franca Brigatti	Italy	Modena and Reggio Emilia University	brigatti@unimo.it
Mohamed Ali Mandour	Egypt	Geol. Sci. Dept. - National Research Center	mamandour@hotmail.com
Mozgova Nadejda	Russia	Inst of Ore Deposits IGEM RQS	mozgova@igem.ru
Olivier Legendre	France	BRGM	o.legendre@brgm.fr
Paul Gottlieb	Australia	CSIRO Minerals	paul.gottlieb@csiro.au
Robert B. Heimann	Germany	Freiberg University of Mining and Technology	heimann@mineral.tu-freiberg.de
Roland Merkle	South Africa	University of Pretoria	rmerkle@postino.up.ac.za
Thomas Kerstedjian	Bulgaria	Geol. Inst. Bulgarian Head Sci.	thomas@geology.bas.bg

### 3) Review of CAM-sponsored sessions at the last quadrennial CAM meeting at Toronto, Ontario, Canada in 1998. CAM sponsored two sessions titled:

- Applied Mineralogy: Extractive and Metallurgical Processes
- Applied Mineralogy of Ceramics and Cements.

The two sessions included a total of 26 papers on applied mineralogy, some of them published in a special issue of the Journal of Mineralogy and Petrology.

### 4) Review of CAM involvement in the quadrennial meeting of the International Congress on Applied Mineralogy (ICAM) held in Göttingen, Germany in July 2000. IMA-CAM was carried as a co-sponsor of the entire meeting with the following statement: "ICAM 2000 will be scientifically sponsored by the International Mineralogical Association (IMA) and its Commission on Applied Mineralogy (CAM)." The meeting consisted of 201 oral papers, 120 posters, 305 participants from 36 countries. The applied mineralogy papers were grouped into six areas: 1) Advanced Materials, 2) Mineral Surfaces, 3) Mining and Metallurgy, 4) Environmental Problems, 5) Materials, and 6) Cultural Heritage. There is a full report on this meeting on the IMA web site.

### 5) Review of CAM-sponsored one session at the last International Geological Congress (31 IGC) in Rio de Janeiro, Brazil:

- Session 8.1 Applied Mineralogy with a total of 58 papers on applied mineralogy. Five selected papers were presented in an oral session and the others in a poster session.

6) Short Courses sponsored by CAM:

- Applied Mineralogy of Mineral Raw Materials.  
Four annual short courses were co-sponsored by CAM (1999 to 2002). The courses organized by Henrique Kahn were held at University of Sao Paulo, Brazil. The topics included: review of mineralogy and crystallochemistry concepts; concepts and interfaces with other areas of Mineral Technology; basic concepts on mineral process and uses of mineral raw materials; laboratory sample preparation procedures; particle size analysis - techniques and results presentation; mineral separation techniques; microscopy techniques and mineral identification (optical and electron scanning techniques); analytical instrumental techniques: XRD, XRF, AAS, ICP-AES, FTIR, DTA/DTG; analysis and results interpretation, separability curves; case studies of Ni sulphide ore, feldspar for glass industry, bauxite and phosphate ores.

7) CAM activities at the 16<sup>th</sup> IMA meeting - Edinburgh:

CAM suggested to the organizing committee the following sections with co-sponsoring of the ICAM - International Council for Applied Mineralogy:

- A. Cathodoluminescence Microscopy Applied to Gemstones and Other Minerals To be co-sponsored with the IMA Commission on Gem Materials (CGM)
- B. General session on "Applied Mineralogy" - applications of mineralogy to metallurgy, ceramics, etc.

CAM also asked to co-sponsored the following sessions with the Commission on Ore Mineralogy (COM):

- 1) Applied Ore and Experimental Mineralogy
- 2) Environmental Mineralogy
- 3) Platinum-group Minerals

The sessions in which CAM finally achieved some involvement at the 16<sup>th</sup> IMA meeting - Edinburgh were:

- A. Session 33: Applied Mineralogy (15 papers);
- B. Session 13: Gem materials. CAM co-sponsored this from the Commission on Gem Minerals (15 papers);
- C. Session 14: General Mineralogy which included the initial proposal session "Cathodoluminescence Microscopy Applied to Gemstones and other Minerals" (24 papers);

7) Collaboration between CAM and ICAM at the 16<sup>th</sup> IMA meeting - Edinburgh:

The members of CAM and ICAM have previously agreed that the two groups will collaborate with regard to the sponsoring of sessions on applied mineralogy at the quadrennial meetings of IMA and ICAM. The intent of this agreement is to promote the co-sponsoring of ICAM with CAM sessions at IMA meetings, and CAM with ICAM sessions at ICAM meetings.

The organizers of the 16th IMA meeting did not support this collaboration, so there wasn't any session co-sponsored by ICAM.

8) Following the orientation of the IMA Council the proposition to hold a CAM business meeting at every two years, at the IMA General Meetings and at the ICAM Meetings (International Congress on Applied Mineralogy) was accepted.

9) Suggestions for CAM-sponsored sessions at the next quadrennial IMA meeting in Japan.

After a long discussion with the delegates and Anthony Naldrett, IMA President and the first Chairman of CAM, it was decided that CAM must strongly support the sessions related to their initial objectives:

- Process mineralogy (probably co-sponsored by COM-IMA);
- Applied mineralogy of ceramics, cements and new materials;
- Environmental mineralogy and health;
- Analytical techniques;
- Mineral surfaces and nano minerals.

CAM must also co-sponsor the following sessions of COM and CGM:

- Ore Mineralogy / Platinum-group minerals (COM);
- Gem materials (CGM),

10) Office Elections:

Despite the office elections must be done 3 months in the advance to the IMA meetings, none indication were previously submitted to the IMA Council.

- Election of the Chairman:  
Richard Hagni was reelected unanimously
- Election of the Vice-Chairman:  
Eric Pirard was elected unanimously
- Election of Secretary:  
Henrique Kahn was reelected unanimously

Special care must be taken in the future to avoid similar situation. A previous discussion regarding the new Office must be taken at the ICAM meetings and the names must be submitted at least 3 months in advance to the IMA meetings.

11) Suggestion on how to improve the CAM activities:

It was proposed that CAM would sponsor Conferences, Workshops and Short Courses in any topic of Applied Mineralogy. Sponsoring proposals must be submitted through the National Delegates to the members of CAM Offices.

12) Home page for CAM

A home page for CAM with a regular update containing information regarding: general information, executive office, national delegates, minutes of business meetings and activities reports is under construction by Henrique Kahn at the site <http://www.appliedmineralogy.org/private/cam.htm>, since the IMA web site is presenting some access difficulties (<http://www.dst.unipi.it/ima>).

13) Upcoming meeting for applied mineralogists:

- The 2nd International Applied Mineralogy Symposium, Applied Mineralogy'03, organized by Minerals Engineering International, will be held in Helsinki, Finland, from 17-18 March 2003, and the sessions may include: process mineralogy case studies from base, precious metal and industrial mineral operations; ore characterization studies; mineralogy of waste materials; advances in mineralogical analytical techniques for the modern mining industry; Any other aspects of applied mineralogy. Short abstracts, of no more than 150 words, should be sent by the end of September 2002. <http://www.min-eng.com/appliedmineralogy03/index.html>. The British Scientific Foundation will provide the funding to delegates from developing countries.
- The quadrennial ICAM meeting in Aguas de Lindoia, Brazil, September 19-22, 2004 (<http://www.appliedmineralogy.org/> or Henrique Kahn - [henrkahn@usp.br](mailto:henrkahn@usp.br)). Individuals interested in applied mineralogy are invited to participate in CAM and ICAM sessions at that meeting. ICAM' 04. Homepage will be available at mid of next October

Henrique Kahn  
CAM Secretary  
Edinburgh, 3rd of September 2002