This and earlier issues of the Newsletter can be downloaded from our website

http://www.clab.edc.uoc.gr/hpm/

These and other news of the HPM group are also available on the website

http://grouphpm.wordpress.com/

(the online and on time version of this newsletter).

The HPM 2012 Meeting will celebrate the 40th anniversary of the HPM Group in Daejeon (Korea)

In the Meeting ICME 1972 of Exeter, a Working Group on « History and pedagogy of Mathematics » was organized by Phillip Fones (University of Michigan, USA) and Leo Rogers (Roehampton Institute of Higher Education, UK). It was the birthday of the HPM Group. Four years later, the creation of a new Study Group affiled to ICME was decided in ICME 1976 Karlsruhe. If you want to know more about, please read the excellent paper of Florence Fasanelli on the HPM Website.

40 years of HPM, it is eight satellite Meetings in Australia, Italy, Canada, Portugal, Taiwan, Sweden, Mexico and Korea. But it is also many others Congress, Colloquiums, Summer Universities organized in different countries by HPM Subgroups.

HPM 2012 is structured around seven themes : 1. Theoretical and/or conceptual frameworks for integrating history in mathematics education; 2. History and epistemology implemented in mathematics education: classroom experiments & teaching materials; 3. Original sources in the classroom, and their educational effects; 4. Mathematics and its relation to science, technology and the arts: historical issues and educational implications; 5. Cultures and mathematics; 6. Topics in the history of mathematics education; 7. Mathematics from Eastern Asia.

During HPM 2012, we will have seven plenary lectures by Tinne Hoff Kjeldsen (Danemark) Tsang-Yi Lin (Taiwan) Janet Barnett (USA) Dominique Tournés (France), Anne Michel-Pajus (France), Johan Prytz (Sweden) and Sung Sa Hong (Korea), and two panels. The programme contains 60 oral presentations, 7 workshops and poster exhibitions.

Evelyne Barbin

HPM Activities 2008 - 2012 Report by HPM

Evelyne Barbin,
HPM Group chair 2008-2012
Laboratory of Mathematics Jean Leray & IREM
University of Nantes, France
evelyne.barbin@wanadoo.fr

Since *ICME 11* and the *HPM 2008 Satellite Meeting* in Mexico City, the Group HPM had several activities, with a new organization of the international meetings and many initiatives, which will enlarge local and international audiences of HPM. Activities of HPM concerns conferences and publications, as well as the improvement of the *HPM Newsletter* and the HPM websites, by making systematic use of the Internet.

As in the past, there has been a continuous effort:

- to enrich the *HPM Newsletter* and the *HPM websites*, which have been developed as important tools complementary to each other, for making easier the contact among the members of the group and for increasing its visibility.

- to actively support magazines, or journals related to the *HPM* perspective and encourage, or motivate the publication of special issues of other journals devoted to themes that emphasize the historical dimension in Mathematics Education.

- to collaborate in the organization of local and international activities (meetings, conferences, etc) to stimulate collaborations among mathematics teachers, mathematicians, historians of mathematics and mathematics educators, who are working together to integrate history into Mathematics Education.

1. *The structure of HPM*

The *HPM* Advisory Board has been enlarged and consisted of 33 persons from 24 different countries New countries has been included: People's Republic of China, South Korea, Spain, Peru. So, we have a better geographic representation and a balanced representation of the three dimensions of *HPM* (*H*istory, *P*edagogy, *M*athematics).

The *HPM Newsletter* is an important tool to realize the aims and the associated activities of the Group. During the preceding period, chaired by F. Furinghetti and C. Tzanakis, the *HPM Newsletter* has been successfully prepared and edited.

Since 2008, the HPM Advisory Board decided to organize an international meeting every two year: HPM Satellite Meeting and European Summer University on History and Epistemology in Mathematics education (ESU).

2. *The HPM Newsletter*

The *HPM Newsletter* has evolved into an informative document, published three times a year and distributed worldwide via a network of 29 distributors, who are in charge of sending it, either in paper or in electronic form, to interested people of a particular region in the world. In addition the *HPM Newsletter* is available on the web through the two main websites of the HPM Group.

Since 2008, each issue of the *HPM Newsletter* has 28 pages, including some standard sections, namely, recent publications, list of relevant websites, book reviews, presentations of recent PhD theses, announcement of events (conferences, meetings, workshops etc), conferences and meetings' reports, interviews with leading scholars in this area. In addition there are texts devoted to special subjects, in the history of mathematics, the history of mathematics education, or the integration of a historical dimension in mathematics education. Since July 2008, 12 issues have been published (No 68 to No 79).

Since 2008, the major innovation is the Spanish version of the *HPM Newsletter*. The purpose is to enlarge the audience among the countries of South America and other Spanish-speaking countries. The new editorial team of *HPM Newsletter* has 5 persons from 5 countries: Norway, Great Britain, Portugal, United States of America and Spain.
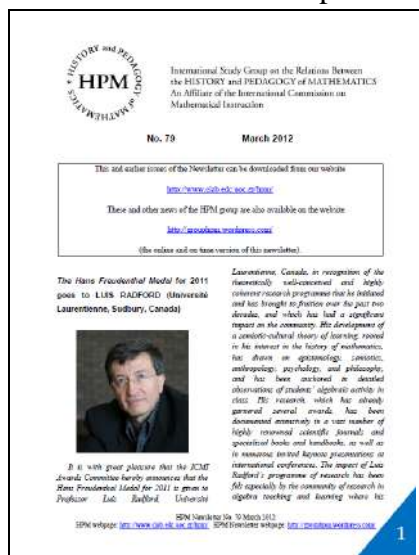
3. *The HPM websites*

Information on the HPM Group, its aims, history and activities, together with details on relevant documents and resources can be found in the HPM official website http://www.clab.edc.uoc.gr/HPM/ and the website of the *Americas Section of the HPM Group* http://www.hpm-americas.org/ All issues of the *HPM Newsletter* since 2000 (from No 45 onwards) are available for download. In addition, details on conferences and meetings, as well as links to societies, unions, other groups, resources in several languages, journals etc are also available there.

4. *Conferences and Meetings*

4.1 The HPM Group at ICME 11, Monterrey, Mexico, 6-13 July 2008

Activities of the HPM Group during ICME 11

-Topic Study Group 23: *The role of history of mathematics in mathematics education*

Organizing Team: A. Elidrissi (Morocco), A. Miguel (Brazil), E. Barbin (France), A. Garciadiego (Mexico).

-Topic Study Group 38: The History of the Teaching and Learning of Mathematics

Organizing Team: R. d'Enfert (France), Á. Ruiz (Costa Rica), L. C. Arboleda (Colombia), R. Cambray (Mexico), W-S. Horng (Taiwan).

-The ASG meetings of HPM in ICME-11: There were talks and discussions to report on the work that has been done in the last four years, the future perspectives and ways to arouse further the interest on the activities of the group and increase its visibility. They concerned

(i) The history of Mathematics Education;
(ii) Women's role in Mathematics

Education since ICMI was founded;

(iii) A tribute to J. Cabillon and his discussion list *Historia Matematica*;

(iv) The future of the group with focus on its activities so far, their further development and new possibilities.

-Regular Lectures related to the HPM Group: There were three such lectures by K. Bjarnadóttir, (Iceland), G. Schubring (Germany) W. Rodrigues Valente (Brazil & Portugal),

-Workshops: Two workshops (by E. de Souza Lodron Zuin and J. C. Barreto Garcia) were related to the HPM interests.

- Poster exhibition: Two posters related to HPM Issues were included in the programme.

4.2 The HPM Satellite Meeting HPM 2008, Mexico City, Mexico 14-18 July 2008

Main Themes:

1. Integrating the History of Mathematics in Mathematics Education

2. Topics in the History of Mathematics Education

3. Mathematics and its relation to science, technology and the arts: historical issues and educational implications

4. Cultures and Mathematics

5. Historical, philosophical and epistemological issues in Mathematics Education

6. Mathematics from the Americas.

Structure of the Program

1. *Eight plenary sessions*: 7 invited lectures by E. Barbin, U. D'Ambrosio, E. Michelle, R. M. Farfan, K. Parshall Hunger Karen, D. Pengelley, G. Vn Brummelen.

2. *Panel discussion* on History of Mathematics in Education.

3. *Sessions consisting of: 5 one-hour workshops*: 70 paper presentations (in 4 parallel sessions).

Participation: 132 participants from 26 countries

4.3 The European Summer University ESU 5, Prague, Czech Republic, 19-24 July 2007

Organisers: E. Barbin (France), C. Tzanakis (Greece), N. Stlhikova (Czech Republic)

Main Themes

1. History and Epistemology as tools for an interdisciplinary approach in the teaching and learning of Mathematics and the Sciences

2. Introducing a historical dimension in the teaching and learning of Mathematics

3. History and Epistemology in Mathematics teachers' education

4. Cultures and Mathematics

5. History of Mathematics Education in Europe

6. Mathematics in Central Europe

Structure of The Program

1. *Six plenary sessions*, including: 6 invited lectures (one per day),

2. Two *Panel discussions*

3. *Sessions* consisting of: 19 2-hour workshops (based on didactical and pedagogical material), 25 3-hour workshops (based on historical and epistemological material), 44 oral presentations and 26 short announcements, in six parallel sessions.

Participation: 192 participants from 33 different countries.

4.4 The European Summer University ESU 6, Vienna, Austria, 19-23 July 2010

Organisers : E. Barbin (France) , M. Kronfellner (Austria), C. Tzanakis (Greece)

Main Themes

1. Theoretical and/or conceptual

frameworks for integrating history in mathematics education

2. History and epistemology implemented in mathematics education: classroom experiments & teaching materials, considered from either the cognitive or/and affective points of view; surveys of curricula and textbooks

3. Original sources in the classroom, and their educational effects

4. History and epistemology as tools for an interdisciplinary approach in the teaching and learning of mathematics and the sciences

5. Cultures and mathematics

6. Topics in the history of mathematics education.

Structure of The Program

1. *Six plenary sessions*, including: 6 invited lectures

2. Two *Panel discussions*

3. *Sessions* consisting of: 17 3-hour workshops (based on historical and epistemological material), 19 2-hour workshops (based on didactical and pedagogical material) and 45 oral presentations, with also posters sessions.

Participation: 152 participants from 28 different countries.

5. HPM Publications

(a) *History and Epistemology in Mathematics Education: Proceedings of the Fifth European Summer University (ESU 5)* Editors: E. Barbin (France), N. Stehlikova (Czech Republic), C. Tzanakis (Greece), Vydavatelsky servis, Plzeň, Prague, Czech Republic, 2008. ISBN 978-80-86843-19-3 (902 pages).

This volume consists of 120 peer reviewed papers and abstracts, based on the activities during ESU 5, divided into six sections

corresponding to the six main themes of the Summer University.
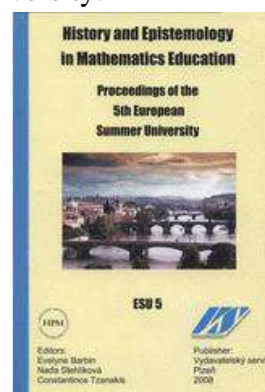
(b) *Recent developments on introducing a historical dimension in mathematics education* Editors: V. Katz (USA), C. Tzanakis (Greece), The Mathematical Association of America, 78, 2011. ISBN 978-16-14443-00-1.

This book is based on contributions in meetings of ESU 5, ICME 11, HPM 2008. It consists of 24 papers (coming from 13 countries). The book is organized into four parts. The first deals with theoretical ideas for integrating the history of mathematics into mathematics education. The second part contains research studies on the use of the history of mathematics in the teaching of numerous mathematics topics at several levels of education. The third part concentrates on how history can be used with prospective and current teachers of mathematics. We also include a special fourth part containing three purely historical papers based on invited talks at the HPM meeting of 2008.

(c) *History and Epistemology in Mathematics Education: Proceedings of the Fifth European Summer University (ESU 6)* Editors: E. Barbin (France), M. Kronfellner (Austria), C. Tzanakis (Greece), Verlag Holzhausen, Vienna, Austria, 2011. ISBN 978-3-85493-208-6 (709 pages).

This volume consists of 91 peer reviewed papers and abstracts, based on the activities during ESU 6, divided into six sections corresponding to the six main themes of the Summer University.
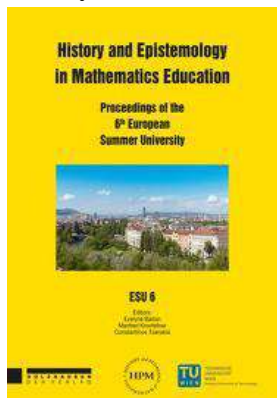
Welcome to HPM 2012!

The HPM 2012 is a satellite meeting of ICME-12 and is the eighth quadrennial meeting of the HPM Group, which is the International Study Group on the Relations between the History and Pedagogy of Mathematics. Especially, the HPM 2012 is the conference celebrating the 40th anniversary of the HPM Group, and focuses the insights into Eastern Asia Mathematics History. Members of the HPM Group consists of mathematicians, researchers in Mathematics education, historians of mathematics, teachers

of mathematics, and curriculum developers. The HPM 2012 is welcoming everyone who is interested in the history of mathematics and mathematics education.

The web site. Making known the HPM 2012 in various countries is a major task to be realized by the SPC. To this end, a web site is available at http://www.hpm2012.org. This is going to be a very efficient tool to make known the HPM 2012 worldwide, allowing online registration etc.

Program

[DAY 1] MONDAY, JULY 16	
08:00 AM - 19:00 PM	**Registration & Information**
09:00 AM - 10:00 AM	**Opening Ceremony**
	Welcoming Remarks [Sangki Choi] Evelyne Barbin: Chair of the HPM Group Constantinos Tzanakis: Co-Chair of HPM 2012 Sunwook Hwang: Chair of HPM 2012 LOC **Introduction of Honored Guests [Sunwook Hwang] Welcoming Performance [Sangki Choi]** To be Announced
10:00 AM - 11:00 AM	**Plenary Lecture** (Theme 2) **[Man-Keung Siu]**
	Tsang-Yi Lin (Taiwan): Using History of Mathematics in High School Classroom: Some Experiments in Taiwan.
11:30 AM - 12:30 PM	**Oral Presentation** (Theme 2)
	Session 1 [Evelyne Barbin] Uffe Thomas Jankvist: A Historical Teaching Module on "The Unreasonable Effectiveness of Mathematics" - the Case of Boolean Algebra and Shannon Circuits. Jerry Lodder: Historical Projects in Discrete Mathematics.
	Session 2 [Sunwook Hwang] Jin Ho Kim* & In Kyung Kim: Future Research Topics in the Field of Mathematical Problem Solving: Using Delphi Method.

	Kyunghee Shin: Harriot's Algebraic Symbols and the Roots of Equations.
12:30 PM	**Official Photographing** at the entrance of DCC.
14:30 PM - 16:00 PM	**Oral Presentation** (Theme 2)
	Session 1 [Kristin Bjarnadottir] Michael Kourkoulos & Constantinos Tzanakis: An Experiment on Teaching the Normal Approximation to the Symmetric Binomial Using De Moivre & Nicholas Bernoulli's Approaches. Mustafa Alpaslan*, Mine Isiksal & Cigdem Haser: Relationship Between Pre-service Mathematics Teachers' Knowledge of History of Mathematics and Their Attitudes and Beliefs towards the Use of History of Mathematics in Mathematics Education. Kathleen M. Clark: The Influence of Solving Historical Problems on Mathematical Knowledge for Teaching.
	Session 2 [Michael Fried] Yoichi Hirano & Yoshihiro Goto: An Essay on an Experiment in Mathematics Classroom - the Golden Ratio Related in the Form of the Nautilus Shell. Man-Keung Siu & Yip-Cheung Chan*: On Alexander Wylie's Jottings on the Science of the Chinese Arithmetic. Jeyanthi Subramanian: Indian Pedagogy and Problem Solving in Ancient Thamizhakam.
	Session 3 [Young Wook Kim] Guo-qiang Li & Li-hua Xu: Analysis of Mathematics Teaching in the View of the History of Mathematics. Toshimitsu Miyamoto: Mathematics Education and Teaching Practice to Bring up History of Mathematics Culture Richly. Nobuki Watanabe: Sundial and Mathematics: Analysis of Oldest Horizontal Sundials in Japan by Mathematics.
16:30 PM - 17:30 PM	**Workshop** (Theme 2)
	Janet Heine Barnett, Jerry Lodder & David Pengelley: Projects for Students of Discrete Mathematics via Primary Historical Sources: Euclid on His Algorithm.
	Renaud Chorlay: The Journey to a Proof: If f´ is Positive, then f is an Increasing Function.
	Frederic Metin: Using History for Mathematics in EFL Teaching.
	Peter Ransom: Fortifying France: Les Villes de Vauban.
17:30 PM - 18:30 PM	**Poster Session**

	Moonja Jeong: The Trends on Mathematics in Novels. Sung Sook Kim: Orthogonal Latin Squares of Choi Seok-Jeong. Sang-Gu Lee, Kyung-Won Kim & Jyoung jenny Lee: Teaching History of Mathematics by Creating Your Own Deck of Card and Poster of World Mathematicians (Including Your Fellow Countrymen). Alejandro Rosas & Leticia Pardo: Arithmetical and Geometrical Progressions, and Numerical Series in China before 14th Century. (Delete period.) Hye-Soon Yun: Chosun Mathematician Lee Sang Hyuk's Genealogy.
18:00 PM - 19:00 PM	**Preparatory Session 1 for Asian HPM**
	Opening Remark [Sung Sa Hong] Chang-Koo Lee (Korea): TBA. Morimoto (Japan): Three Authors of the Taisei Sankei.
19:10 PM - 20:30 PM	**Welcoming Banquet**
09:00 AM - 19:00 PM	**Exhibitions**
	Jangjoo Lee: An Eight-Fold Folding Screen Using the 24 Finest Scenes of Mathematics of Joseon Dynasty. Sang-Gu Lee & Yoonmee Ham: Modern Mathematics Books by Korean Authors during 1884-1910. Yongmei Liu & Tingting Liu: Some Questions and Reflections about 'Mathematization'. Zhe Zhu: Textbook Preparation Based on the Conception of "Integrating the History of Mathematics into Mathematics Curriculum".
	[DAY 2] MONDAY, JULY 17
08:00 AM - 19:00 PM	**Registration & Information**
09:00 AM - 10:00 AM	**Plenary Lecture** (Theme 3) [Sung Sook Kim]
	Janet Barnett (USA): Bottled at the Source: The Design and Implementation of Classroom Projects for Learning Mathematics via Primary Historical Sources.
10:00 AM - 11:00	**Plenary Lecture** (Theme 1) [Sung Sook Kim]

AM	
	Tinne Hoff Kjeldsen (Denmark): Uses of History for the Learning of and about Mathematics: Towards a Theoretical Framework for Integrating History of Mathematics in Mathematics Education.
11:30 AM - 12:30 PM	**Oral Presentation** (Theme 1)
	Session 1 [Yoichi Hirano] Mi Kyung Ju, Jong Eun Moon & Ryoon Jin Song: Ethnomathematics and its Educational Meaning: A Comparative Analysis of Academic Discourse and Educational Practice of Mathematics History in Korea. Immaculate K. Namukasa: History of Mathematics Implemented in Mathematics Education Programs: The Development, Implementation and Evolution of a University Course.
	Session 2 [Uffe Jankvist] Toshimitsu Miyamoto: Theoretical Framework Concerning Drawing Method in Mathematics Education. Kyeonghye Han: The Historico-Genetic Principle and the Hermeneutical Methode as the Theoretical Background of Using History of Mathematics in Lesson.
	Session 3 [Frederic Metin] David Guillemette: Bridging Theoretical and Empirical Account of the Use of History in Mathematics Education? A Case Study. Rene Guitart: Misuses of Statistics in a Historical Perspective: Reflexions for a Course on Probability and Statistics.
	Session 4 [Maria del Carmen Bonilla] Patricia Baggett* & Andrzej Ehrenfeucht: The "Ladder and Box" Problem: From Curves to Calculators. David Pengelley: Teaching Number Theory from Sophie Germain's Manuscripts: A Guided Discovery Pedagogy.
	Korean Traditional Music Performance 12:30 PM - 13:00 PM
14:30 PM - 16:00 PM	**Oral Presentation** (Theme 4)
	Session 1 [Mustafa Alpaslan] Oscar Joao Abdounur: The Division of the Tone and the Introduction of Geometry in Theoretical Music in the Renaissance: a Historic-Didactical Approach. Sunam Cho: The Formation of Mathematics Curriculum Characteristics by Augustus de Morgan in University College, London: On the Boundary between Mathematics and Natural Philosophy. George Heine: The Flattening of the Earth: Its Effect on Eighteenth Century Mathematics.

	Session 2 [Youngmee Koh] Woosik Hyun: Mathematical Foundations of Cognitive Science. Taewan Kim & H. K. Pak: On Teaching the Concept of Continuous Functions in Calculus. Ho-Joong Lee: On the Eigenvalues of Three Body Problem in the Early 20th Century.
	Session 3 [Renaud Chorlay] Leonardo Venegas: The Topological Intuition of Leonardo da Vinci. Maria del Carmen Bonilla: Visualization of the Mechanical Demonstration to Find the Volume of the Sphere Using Dynamic Geometry.
16:30 PM - 17:30 PM	**Workshop** (Theme 3)
	Bjørn Smestad: Teaching History of Mathematics to Teacher Students: Examples from a Short Intervention.
	Man-Keung Siu* & Yip-Cheung Chan: Chinese Arithmetic in the Eyes of a British Missionary and Calculus in the Eyes of a Chinese Mathematician: Collaboration between Alexander Wylie (1815-1887) and LI Shan-Lan (1811-1882).
	Anne Michel-Pajus: Historical Algorithms in the Classroom and in Teacher-Training.
17:30 PM - 18:30 PM	**Poster Session**
	Moonja Jeong: The Trends on Mathematics in Novels. Sung Sook Kim: Orthogonal Latin Squares of Choi Seok-Jeong Sang-Gu Lee, Kyung-Won Kim & Jyoung jenny Lee: Teaching History of Mathematics by Creating Your Own Deck of Card and Poster of World Mathematicians (Including Your Fellow Countrymen). Alejandro Rosas & Leticia Pardo: Arithmetical and Geometrical Progressions, and Numerical Series in China before 14th Century. Hye-Soon Yun: Chosun Mathematician Lee Sang Hyuk's Genealogy.
18:00 PM - 19:00 PM	**Preparatory Session 2 for Asian HPM**
	Opening Remark [Chang Kyoon Park] TBA. Anjing Qu (China): HPM in China
	[DAY 3] MONDAY, JULY 18
08:00 AM - 12:00	**Registration & Information**

Time	Session
PM	
09:00 AM - 10:00 AM	**Plenary Lecture (Theme 4) [Janet Barnett]**
	Dominique Tournè's (France): Mathematics of the 19th Century Engineers: Methods and Instruments.
10:30 AM - 12:30 PM	**Panel Discussion 1 [Kathleen Clark]**
	Theme 1: Why Do We Require a "History of Mathematics" Course for Mathematics Teacher Candidates? (And What Might Such a Course Look Like?). **Panelists:** Mustafa Alpaslan (Turkey), Sang Sook Choi-Koh (Korea), Kathleen Clark (USA), Frederic Metin (France).
12:00 PM - 18:30 PM	**Excursion**
	[DAY 4] MONDAY, JULY 19
08:00 AM - 18:30 PM	**Registration & Information**
09:00 AM - 10:00 AM	**Plenary Lecture (Theme 5) [Tinne Hoff Kjeldsen]**
	Anne Michel-Pajus (France): A Voyage into the Litterary-Mathematical Universe.
10:00 AM - 11:00 AM	**Plenary Lecture (Theme 6) [Tinne Hoff Kjeldsen]**
	Johan Prytz (Sweden): Social Structures in Mathematics Education. Researching the History of Mathematics Education with Theories and Methods from Sociology of Education.
11:30 AM - 12:30 PM	**Oral Presentation (Theme 6)**
	Session 1 [David Guillemette] Evelyne Barbin: The Role of the French Association of Mathematics Teachers APMEP in the Introduction of Modern Mathematics in France (1956-1972). Michael N. Fried: Book XIII of the Elements: Its Role in the World's Most Famous Mathematics Textbooks.
	Session 2 [Sanwook Ree] Chun Chor Litwin Cheng: The Mathematics

Time	Session
	Development of the Book Sea Mirror of Circle Measurements (Ceyuan Haijing). Guo-qiang Li* & Li-hua Xu: On Mathematics Teachers' Quality and Its' Advance in Mathematical History.
	Session 3 [Dominique Tournes] Hoyun Cho: Common Core State Standards Movement in U.S Mathematics Curriculum. Lorena Jimenez Sandoval & Gustavo Martinez Sierra: Social Construction of the Algebraic Structures. A Model for Its Analysis.
14:30 PM - 16:00 PM	**Panel Discussion 2 [Uffe Thomas Jankvist]**
	Theme 2: Empirical Research on History in Mathematics Education: Current and Future Challenges for Our Field. **Panelists:** Uffe Thomas Jankvist (Denmark), Yi-Wen Su (Taiwan), Isoda Masami (Japan), David Pengelley (USA).
16:30 PM - 17:30 PM	**Oral Presentation (Theme 6)**
	Session 1 [Chun Chor Litwin Cheng] Toshimitsu Miyamoto: History of Arithmetic Textbook and Composition of Content Based on Count Principle Method . Osamu Kota: Teaching and Learning of Functions in Modern Japan.
	Session 2 [Kathleen Clark] Kristin Bjarnadottir: 18th Century Mathematics Education: Effects of Enlightenment in Iceland. Andreas Christiansen: Geometry Textbooks in Norway in the First Half of the 19th Century.
	Session 3 [Bjorn Smestad] Nicla Palladino: The Issue of Mathematics Textbooks in the Correspondence of Giovanni Novi to Enrico Betti during the Unification of Italy. Francois Plantade: After the Gosta Mittag-Leffler & Jules Houel Correspondence, Their General and Particular Thoughts on Mathematical Teaching.
17:30 PM - 18:30 PM	**HPM Session**
	Opening Remarks [Evelyne Barbin] Introducing New Chair of the HPM Group. Announcement of HPM 2016.
	[DAY 5] MONDAY, JULY 20
08:00 AM - 15:00 PM	**Registration & Information**
09:00	**Plenary Lecture (Theme 7)**

Time	
AM - 10:00 AM	[Tsang-Yi Lin]
	Sung Sa Hong (Korea): Theory of Equations in the History of Chosun Mathematics.
10:30 AM - 12:30 PM	**Oral Presentation** (Theme 5)
	Session 1 [Jinho Kim] Chun-yue Stanley Lee & Mei-yue Christine Tang: A Comparative Study on Finding Volume of Spheres by LIU Hui (劉徽) and Archimedes: An Educational Perspective to Secondary School Students. Chang K. Park & Sun Bok Bae: Cultural Prime Numbers: 2, 3 and 5. Young Hee Kye: Math and Art in View Point of Perspective Drawing of the West and East.
	Session 2 [Anne Michel-Pajus] Andre Cauty: Invitation to Revisit the Mesoamerican Calendars. The Count That is Called Real Calendar. Gregg De Young: A Colorful Case of Mistaken Identities. Albrecht Heeffer: Dutch Arithmetic, Samurai and Warships: The Teaching of Western Mathematics in Pre-Meiji Japan.
	Session 3 [Evelyne Barbin] Yoichi Hirano: Remark on the Notion of Golden Ratio - Concerning "Divine Proportion" in the Renaissance. Leo Corry: Euclid's Proposition II.5: A View through the Centuries-Geometry, Algebra and Teaching. Qing-jian Wang: The New "Curriculum Standard" and the New Mathematics - the Union of History of Mathematics and Mathematics Education
14:30 PM - 16:00 PM	**Oral Presentation** (Theme 7)
	Session 1 [David Pengelley] Sung Sa Hong, Young Hee Hong & Chang Il Kim: Chosun Mathematician Hong Jung Ha's Least Common Multiples. Sung Sa Hong, Young Hee Hong & Young Wook Kim: Liu Yi and Hong Jung Ha's KaiFangShu. Sung Sa Hong, Young Hee Hong & Seung On Lee: Yang Hui's NaYin QiLi.
	Session 2 [Sang-Gu Lee] Shu Chun Guo: A Discussion on the Meaning of the Discovery of Mathematics in the Worriers and the Han Dinasty. Youngmee Koh: Educational Meaning of the Theory of Rectangular Array in the Nine Chapters on the Mathematical Art. Sangwook Ree: Meaning of the Method of Excess and Deficit.
	Session 3 [Sangki Choi] Yuzi Jin & Young Wook Kim: Research on the Muk

Time	
	Sa Jib San Beob. Hae Nam Jung: A Study on "GuSuRyak" of Choi Seok Jung. Toshimitsu Miyamoto: Historic Investigation of Legendre's Proof about the 5th Postulate of "Elements".
16:00 PM - 16:30 PM	**Closing Ceremony**
	Closing Remarks [Jinho Kim] Evelyne Barbin: Chair of the HPM Group. Sunwook Hwang: Chair of HPM 2012 LOC. Luis Radford: New Chair of the HPM Group.

This schedule is subject to change, so please check for announcements.

Notes:

Name in the bracket [ ] is chair or moderator of the assigned program or session.

Name with the asterisk (*) denotes the presenter of the article.

Main Themes:

Theme 1: Theoretical and/or conceptual frameworks for integrating history in mathematics education.

Theme 2: History and epistemology implemented in mathematics education: classroom experiments & teaching materials.

Theme 3: Original sources in the classroom, and their educational effects.

Theme 4: Mathematics and its relation to science, technology and the arts: historical issues and educational implications.

Theme 5: Cultures and mathematics.

Theme 6: Topics in the history of mathematics education.

Theme 7: Mathematics from Eastern Asia.

Oral presentations, except for the last one of each session, are 20-22 minutes long, with 3-5 minutes allowed for questions and 5 minutes for the switch.

All Exhibitions are located at the center lobby of the Conference Room, and will continue during the conference.

All Posters are located at the center lobby of the Conference Room., and the presenters will be at their posters during 17:30 PM - 18:30 PM on Monday and Tuesday. All posters must be smaller than 120cm*155cm.

All rooms are equipped with a data projector and a computer with Internet, PowerPoint, CD drive, and USB port. Presenters can bring a Powerpoint file or CD or USB memory stick, or can use their own laptop to give talks.

Registration & Information Desk is open in Toyoko-Inn only on Sunday, July 16 right after arrival of the buses from COEX in Seoul, and is open in DCC from 08:00 AM during the conference. Pick up your name-tag, Abstract, and Proceedings.

All refreshments such as coffee, tea, bottled water, and snacks are free of charge.

For meals, participants are on their own to explore local restaurants. Information for meals and restaurants can be found at the registration desk.

There is a shuttle service between Toyoko-Inn and DCC during the conference. Please check the bus schedule when necessary.

Please do not miss:
Opening Ceremony at Room 107 during 09:00 AM - 10:00 AM on Monday, July 16.
Official Photographing at the entrance of DCC on 12:30 PM Monday, July 16. The photo can be picked up at the registration desk from Thursday, July 19.
Welcoming Banquet given by Mayor of Daejeon City at Room 107 during 19:10 PM - 20:30 PM on Monday, July 16.
Korean Traditional Music Performance at Room 107 during 12:30 PM - 13:00 PM on Tuesday, July 17.

Excursion to Kongju City departing on 12:00 PM at the entrance of DCC.
HPM Session at Room 107 during 17:30 PM - 18:30 PM on Thurday, July 19.
Closing Ceremony at Room 107 during 16:00 PM - 16:30 PM on Friday, July 20.

Contact
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HPM SESSIONS IN ICME 2012 SEOUL

WEDNESDAY, 11 JULY, 5-6.30 PM

« Presentation of the HPM Group »
Evelyne Barbin, University of Nantes (France)
Chair of HPM 2008-2012

« Presentation of the HPM Newsletter: why and how to contribute ? »
Bjorn Smestad, Oslo University College (Norway)
Member of the Newsletter Team

« The National and International Conferences on HPM »
Fulvia Furinghetti, University of Genova (Italy)

« Presentation of the PRIMUS Special issue »
Kathleen Clark, Florida State University
(USA)

THURSDAY, 12 JULY, 5-6.30 PM

« Reflection and action in teacher education:
what history tells us »
Fulvia Furinghetti, University of Genova
(Italy)

« On understanding historical conceptual
developments of mathematics:
problems, challenges, and hopes »
Luis Radford, Université Laurentienne
(Canada)

« The 'dépaysement' and the reading of
ancient texts: from the teachers to the
classroom »
Evelyne Barbin, IREM, Université de Nantes
(France)

Discussion

Evelyne Barbin (Dir.): Les mathématiques éclairées par l'histoire: des arpenteurs aux ingénieurs

[Mathematics enlightened by its history: from
surveyors to engineers]

Evelyne Barbin (ed.), Paris: Vuibert; Adapt-Snes,
2012, 194pp, ISBN 9782311008616;
978235656292

This collection of nine reports by collaborators of IREM is a companion volume to *De grands défis mathématiques: d'Euclide à Condorcet* (2010), also under the editorship and guidance of Evelyne Barbin, and reported here in Newsletter HPM 74 (October 2010). As with the previous volume we have examples of the influence or use of history of mathematics in the mathematics classroom. It is worth listing the contents to give an idea of the breadth of coverage:

1. Ratio and proportion in Greek and Egyptian mathematics (Barbin)
2. The rule of three in Indian medieval arithmetic (Morice-Singh)
3. The *Arithmétique* of Juan de Ortega (Métin)
4. Partition of the triangle in the Middle Ages (Moyon)
5. The volume of the pyramid according to Euclid, Liu Hui, Cavalieri and Legendre (Mercier)
6. The normal curve using the original text by Gauss (Lefort)
7. Calculation aids using parabolas and hyperbolas (Tournès)
8. Doing and talking in the foundation of magnitudes (Bénard)
9. The congruence machine of the Carrisan brothers (Bühler)

The authors all work with students at different ages, from late secondary school to tertiary, including teacher training. In almost all accounts, the authors show how their own reading and reflection has led to direct use of historical material in the classroom, either through the use of original texts or by devising tasks based on the methods or examples of their subjects.

Two examples will illustrate the way the authors approach the use of history. Catherine Morice-Singh gives a brief account of the 'rule

of three' as it appears in Indian texts from the 5th century. The algorithm is not taught today but the problems it solves are still there and analogous methods are taught, such as the unitary method (*le passage à l'unité* in the French curriculum) or the use of cross product to find a fourth proportional. The account here is enlivened by drawing on direct translations of Sanskrit manuscripts (new to us) and the usual amusingly unrealistic 'real' problems. From the 9th century we have: A drunken man walks a distance of one-eighth of a *yojana* in one-third of a day. If he needs to walk a distance of one hundred *yojanas*, in the same condition, how long will it take him? (The answer is a time of more than 8 months!) Morice-Singh explains the extension to the rule of five, seven, nine, etc. and gives problems of this sort. She also gives us examples of work given to her students. The link between modern school work and these ancient texts provides a rich cultural context to enliven and enrich the mathematics lessons.
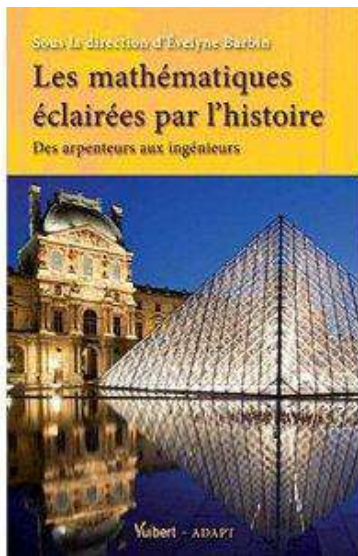
Dominique Bénard uses history in a different way. The French mathematics curriculum stresses the role of science in understanding the world and of mathematics in providing the necessary tools. But, says Bénard, while the students apply science and mathematics to real or simplified 'real'

problems nothing is said about how the tools themselves were a product of human activity. In reading Euclid's explanation and use of congruency in Book I of *The Elements* it is clear that 'superposition' requires the movement of one triangle to be placed upon another. In other words, behind the written definitions and proofs lie physical acts, doing and talking (*le geste et la parole*). It is this physical activity that Bénard uses in the classroom. Faced with a class of future teachers he uses paper folding geometry to recapture, or relearn, the geometry they need. In doing so, questions of the meaning of congruence and equality of lengths and areas arise in the same way as would they have done to early users of geometry before the subject was codified by Euclid. Bénard also writes about early understanding of other measures. As he says, mathematics did not come down from on high.

The main purpose of the book must be to show others what can be done using history, how the use of unfamiliar material may inspire students and to emphasise the point that mathematics is a creation of human endeavour. But the main value to the mathematics teacher should be to show how the pursuit of study for its own interest will provide opportunities for livelier lessons. The examples here are from history but the same would apply to any other mathematically related area of investigation. Following the mathematics programme as laid down by the state or by the examination authorities is pretty boring for the teacher as well as for the student. This book shows how the teacher can become excited (again) about teaching.

Chris Weeks, Devon, UK

Have you read these?

(May, 2012)

Burn, R. P. (2012). Another theorem of Cauchy which 'admits exceptions'. *Historia Mathematica,* 39(2), 206-210.

Craik, A. D. D. (2012). A forgotten British analyst: Nicolas Vilant (1737–1807). *Historia Mathematica,* 39(2), 174-205.

Ferraro, G.; Panza, M. (2012). Lagrange's theory of analytical functions and his ideal of purity of method. *Archive for History of Exact Sciences*, Vol. 66 (1), 95-197.

Mann, T. (2012). From prehistoric balls to contemporary fiction: what the history of mathematics has done for me. *BSHM Bulletin: Journal of the British Society for the History of Mathematics*, Vol. 27 (2), 73-81.

Muntersbjorn, M. (2012). On the intellectual heritage of Henri Poincaré. *BSHM Bulletin: Journal of the British Society for the History of Mathematics*, Vol. 27 (2), 107-118.

Neumann, P. M. (2012). The editors and editions of the writings of Évariste Galois. *Historia Mathematica,* 39(2), 211-221.

Siegmund-Schultze, R. (2012). Hans Wußing (1927–2011) and the blooming of the history of mathematics and sciences in the German Democratic Republic – A biographical essay. *Historia Mathematica,* 39(2), 143-173.

Wess, J. (2012). Avoiding arithmetic, or the material culture of not learning mathematics. *BSHM Bulletin: Journal of the British Society for the History of Mathematics*, Vol. 27 (2), 82-106.

Wong, N. Y.; Tang, K. C. (2012). Mathematics education in Hong Kong under colonial rule. *BSHM Bulletin: Journal of the British Society for the History of Mathematics*, Vol. 27 (2), 119-125.

(July, 2012)

Achilles, R.; Bonfiglioli, A. (2012). The early proofs of the theorem of Campbell, Baker, Hausdorff, and Dynkin. *Archive for History of Exact Sciences*, Vol. 66 (3), 295-358.

Baba, T.; Iwasaky, H.; Ueda, A.; Date, F. (2012). Values in Japanese mathematics education: their historical development. *ZDM* Volume 44, Number 1/May, 21-32.

Beery, J.; Clark, K. M. (2012). HOM SIGMAA 2012 Student Paper Contest Winners. *Loci Convergence* (June 2012).

Crannel, A.; Douglas, S. (2012). Drawing on Desargues. *The Mathematical Intelligencer* 34(2), 7-14.

Fernandez, J. M. L.; Rodriguez, O. A. H. (2012). Teaching the Fundamental Theorem of Calculus: A Historical Reflection. *Loci Convergence* (January 2012).

Grunbaum, B. (2012). Is *Napoleon's Theorem* Really *Napoleon's Theorem*?. *The American Mathematical Monthly,* June/July.

Kieldsen, T. H.; Blomhoj, M. (2012). Beyond motivation: history as a method for learning meta-discursive rules in mathematics. *Educational Studies in Mathematics,* 80 (3), 327-349.

Petrilli, Jr.; Salvatore, J. (2012). Servois' 1813 Perpetual Calendar, with an English Translation. *Loci Convergence* (June 2012).

Rowe, D. E. (2012). Otto Neugebauer and Richard Courant: On Exporting the Göttingen Approach to the History of Mathematics. *The Mathematical Intelligencer* 34(2), 29-37.

Scoville, N. (2012). Georg Cantor at the Dawn of Point-Set Topology. *Loci Convergence* (March 2012).

Shell-Gellash, A.; Freitas, P. J. (2012). When a Number System Loses Uniqueness: The Case of the Maya. *Loci Convergence* (May 2012).

Stammbach, U. (2012). A Letter of Hermann Amandus Schwarz on Isoperimetric Problems. *The Mathematical Intelligencer* 34(1), 44-51.

Young, G. De (2012). Further adventures of the Rome 1594 Arabic redaction of Euclid's *Elements*. *Archive for History of Exact Sciences*, Vol. 66 (3), 265-294.

Work in progress

We encourage young researchers in fields related to *HPM* to send us a brief description of their work in progress or a brief description of their dissertation.

Announcements of events

ICME 12

July 8–15, 2012
Seoul, South Korea
http://www.icme12.org/

Participants will find useful information about every aspect of the Congress in this site. The web page is being constantly updated in order to keep participants and interested people informed.

Congress Period and Venue
The Congress is to be held on July 8th to 15th in 2012. All of the Congress activities will take place at the COEX (Convention & Exhibition Center) in Seoul, Korea. COEX, World Trade Center, 159 Samsung-dong,Gangnam-gu, Seoul 135-731, Korea

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What is ICME?

The International Congress on Mathematical Education (ICME) is held every four years under the auspices of the International Commission on Mathematical Instruction (ICMI). It is, however, planned and organized by separate committees, which operate independently of the ICMI: The International Program Committee (IPC), The Local Organizing Committee (LOC), and National Advisory Committee (NAC).

The aim of the Congress is to present the current state of and trends in mathematics education research and in the practice of mathematics teaching at all levels. The Congress will gather a broad spectrum of participants such as researchers in mathematics education, teacher trainers, practicing teachers, mathematicians and others interested in mathematics education.

The objectives of the ICME are:

- to show what is happening in mathematics education worldwide, in terms of research as well as teaching practices,

- to inform about the problems of mathematics education around the world,

- to learn and benefit from recent advances in mathematics education as a discipline,

- to exchange information on the problems of mathematics education around the world,

- to introduce exemplary cases of domestic classrooms (teaching) in mathematics education, which contributes to improvement of mathematics education around the world or vice versa,

- to improve the quality and professionalism of domestic mathematics teachers through introduction of exemplary cases in mathematics education worldwide.

The themes

(...)

TSG 20: The role of history of mathematics in mathematics education

(...)

TSG 35: The history of the teaching and learning of mathematics

(...)

For the others TSG's, please, see the previous HPM Newsletter.

TSG 20: The role of history of mathematics in mathematics education

The aim of TSG 20 is to provide a forum for participants to analyse issues related to the introduction of a historical dimension in mathematics education. The introduction of such a dimension involves three different areas: mathematics, history and didactics. This TSG aims to find and elaborate on a harmonious, balanced and effective interrelationship among these three scientific areas in a way that is enlightening and fruitful in mathematics education. It is expected that participants will share their ideas and classroom experience in connection with the following main issues:

- Theoretical and/or conceptual frameworks for including history in mathematics education

- The role of the history of mathematics in pre- and in-service teacher education

- The role of the history of mathematics at school

- Original sources in the classroom, and their educational effects

- Design and/or assessment of teaching/learning materials on using history in mathematics education

TSG 35: The history of the teaching and learning of mathematics

History of mathematics teaching and learning is relatively new as a subject of international attention and research, but it is developing actively and dynamically. It became the first time visible at ICME 10, in 2004, at Copenhagen, as the TSG 29. The success and dynamics of these activities lead to the launching of the first international journal devoted to this field of study, the International Journal for the History of Mathematics Education,

published since 2006. History of mathematics education became then a subject in various international meetings, for instance at the ESU 5 in Prague, in 2007, and at the CERME meetings. As TSG 38 at ICME 11, in Monterrey, research into this subject proved its productivity again, with papers presented on the history of the reform movements, on the analysis of classical textbooks and of historical practice. Recently, the first specialized international research symposium took place, in Iceland, featuring in particular methodological issues.

On the occasion of ICME 10, a first international bibliography of research in the field was prepared. The bibliography is now retrievable at the following address:

http://www.icme-organisers.dk/tsg29/BiblTSG.pdf.

This bibliography outlined streams in research: transmission and socio-cultural reform movements; aspects of teaching practice (textbooks, methods, teacher professionalizations); cultural, social and political functions of mathematics instruction; and comparative studies.

Discussion Groups

DG 1: Current problems and challenges in Non-university Tertiary Mathematics Education (NTME)
DG 2: Creativity in Mathematics Education
DG 3: Issues Surrounding Teaching Linear Algebra
DG 4: The Evolvement of Mathematics Teachers' Community-of-Practice
DG 5: Uses of History of Mathematics in School (pupils aged 6 - 13)
DG 6: Postmodern Mathematics
DG 7: Improving Teacher Professional Development Through Lesson Study
DG 8: Theory and Perspective of Mathematics Learning and Teaching from the Asian Regions
DG 9: Using Technology to Integrate Geometry and Algebra in the Study of Functions
DG 10: New Challenges in Developing Dynamic Software for Teaching and Learning Mathematics
DG 11: Mathematics Teacher Retention

DG 12: Mathematics Teacher Educators' Knowledge for Teaching
DG 13: The Role of Mathematics Education in Helping to Produce a Data Literate Society
DG 14: Mathematical Modeling in Connecting Concepts to Real World Application
G 15: Mathematics and Culture in Micronesia: An exploration of the mathematical aspects of indigenous practices
DG 16: Can art save mathematics?
DG 17: Teaching of Problem Solving in School Mathematics Classrooms

DG 5: Uses of History of Mathematics in School (pupils aged 6 - 13)

Aim and Rationale

For more than twenty years, the number of people studying relationships between history of mathematics and pedagogy of mathematics has been steadily increasing. One landmark work was the 2000 ICMI Study, History in Mathematics Education, which gave a comprehensive overview of the field at the time. (Fauvel & van Maanen, 2000)

The publication of the 2000 ICMI study raised awareness that history of mathematics in teaching mathematics:

- allows pupils to experience the process of mathematics - problem solving, proof construction (e.g., Lakatos, 1976; Ernest, 1998);
- provides the landscape of Guided reinvention (Freudenthal, 1991);
- expands understanding of nature of mathematics; that is, mathematics is not "finished" and continues to evolve and some ideas are subject to change (Ernest, 1998); and
- often relies on not taking the end results of mathematicians' works as starting points (Freudenthal, 1973) aimed at progressive mathematization (Gravemeijer & Doorman, 1999, p. 116).

The International Study Group on the Relations Between the History and Pedagogy of Mathematics (HPM Group) has been active since 1976. In addition to numerous publications and participation in several conferences (e.g., European Summer University; CERME), the HPM

Group hosts an ICME satellite meeting every four years. Although a number of papers resulting from these conferences concerns the inclusion of history in primary and secondary school (pupils aged 6 – 16), the result is still that there are not many resources available for teachers who teach mathematics to students aged 6 – 13. An analysis of 130 papers from the HPM satellite conferences in 2000 and 2008, published in HPM Newsletter No. 77, shows that there are far more papers for pupils aged 14 – 19 than for 6 – 13. (Smestad 2011)

The inclusion of history of mathematics in primary and secondary school often does not go further than storytelling and the purpose of the use of historical content is more to increase student motivation instead of deepening student learning. (Smestad 2003, 2004) However, in the general literature there are several other examples, including:

- working with original sources (that can include historical pictures or historical texts from textbooks or other sources);
- using old techniques or algorithms;
- using concrete materials in ways they were used in history, such as clay tablets or counting boards;
- performing plays on the history of mathematics;
- exercises based on the history of mathematics, either implicitly or explicitly;
- incorporating cross-curricular approaches;
- completing projects on mathematicians; and
- producing exhibitions.

There is a need for discussions on which methods of working with history of mathematics are suitable for younger children and which are aligned with their particular topics of study. Furthermore, there is need for discussion on which of the goals outlined above are of particular interest when working with younger children.

Key Questions

1. Which ideas from HPM can be used with children (aged 6-13) in such a way that produces a god result (e.g. improved student engagement, positively impacted student learning)?

2. What would be criteria for finding, developing and selecting materials to be used with children (aged 6-13)?

3. How does the HPM community in particular (and mathematics education community more broadly) assure that high quality material that cover a variety of topic are produced and shared?

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5th International Conference of the European Society of History of Science

November 1-3, 2012
Athens, Greece

The *5th International Conference of the European Society of History of Science* is organized in Athens, 1-3 November 2012, by the Institute of Neohellenic Research of the National Hellenic Research Foundation (Dr. E. Nicolaidis) and the Faculty of Education of the National and Kapodistrian University of Athens

(Prof. C. Skordoulis). The theme of the conference is "Scientific cosmopolitanism and local cultures: religions, ideologies, societies".

The list of accepted symposia:
(http://5eshs.hpdst.gr/symposia)

1. Ancient Astronomy and its Later Reception
2. Around Henri Poincaré's Centenary: physics, mathematics and philosophy.
3. Byzantine and post-Byzantine alchemy: principles, influences and effects
4. Cartesian Physics and its reception: between local and universal
5. Cultural Identity and Trans-Nationality in the History of Science
6. Engineers, Circulation of Knowledge, and the Construction of Imperial and Post-Imperial Spaces (18th- 20th century)
7. Exact sciences in Habsburg Monarchy in 18th century (on 300th anniversary of Boscovich's birthday)
8. From cameralism and natural philosophy to applied biology: agriculture and science in the 19th-20th centuries
9. Gender and the cosmopolitan character of science
10. Global phenomena and local specificities: conduits between scientifically minded elites and holders of artisanal knowledge between the East and the West.
11. Historical Narratives of Cold War Science
12. History and Historical Epistemology Of Science. Conceptual Streams and Mathematical Physical Objects in the Emergency Of Newton's Science
13. History and Philosophy of Science in EU Secondary Curricula? New Proposals Wanted
14. History of Slavic Science – Cultural Interferences, Historical Perspectives and Personal Contributions
15. Humanities, mathematics and technics at Renaissance courts
16. Mathematical Courses in engineering education in the seventeenth and eighteenth century in the Iberian Peninsula
17. Mechanism, embodiment and life: iatromechanism and chemistry in debate in early modern natural philosophy
18. Physical sciences between Europe and the USA before WWII
19. Prefaces as correspondences in the context of Ancient Greek, Arabic and Latin mathematics texts
20. Science and Scandal: Scientific Controversy in the Public Space
21. Scientific archives, unpublished manuscripts in private or public corpuses: historiographical and methodological approaches.
22. Scientific Cosmopolitanism
23. Scientific Expeditions: Local Practices and Cosmopolitan Discourses
24. The Exact Sciences in the Eastern Mediterranean in the Modern and Contemporary Ages
25. The next science of humankind. Myths and histories of the Neurosciences
26. The Origins of Experimental Philosophy: Experimental Procedures and Empirical Methods in Early Modern Europe
27. The reception of the `synthetic evolutionary theory' in Europe: from Great Britain to Germany and Russia
28. The scientific cosmopolitanism as traced by astronomical instruments
29. The scientific culture of medieval Jews: facts and questions
30. The Tools of Research and the Craft of History: On the Interaction between Historians, Their Tools, and the Creators of Those Tools
31. Transnational Economic Science after WWII
32. Women in the Laboratory from the early modern times to the 20th century

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The views expressed in this Newsletter may not necessarily be those of the HPM Advisory Board.

Please pass on news of the existence of this newsletter to any interested parties.

This and previous newsletters can be downloaded from our website:
http://www.clab.edc.uoc.gr/hpm/

These and other news of the HPM group are also available on the website
http://grouphpm.wordpress.com/
(the online and on time version of this newsletter).

Items for the Newsletter should be sent to the editors, preferably by email (see addresses below).

The Newsletter appears three times a year with the following deadlines for next year.

No.	Deadline for material	Sent to distributors
81	**12 October 2012**	**1 November 2012**
82	12 February 2013	1 March 2013
83	12 June 2013	1 July 2013

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A note from the Editors

The Newsletter of HPM is primarily a tool for passing on information about forthcoming events, recent activities and publications, and current work and research in the broad field of history and pedagogy of mathematics. The Newsletter also publishes brief articles which they think may be of interest. Contributions from readers are welcome on the understanding that they may be shortened and edited to suit the compass of this publication.