

平成 20 年 7 月 29 日

日中科学技術交流協会
理事長 有山正孝殿

財団法人 日本数学会
関孝和三百年祭記念数学史国際会議
組織委員会 小松彦三郎

関孝和三百年祭記念数学史国際会議ポスター送付について

関孝和三百年祭記念数学史国際会議につきましては、多大なるご支援を賜り厚く御礼申し上げます。

この度、日本数学会及び日本数学史学会は江戸中期の和算家、関孝和の没後三百年を記念して数学史国際会議を8月25日～31日の予定で開催いたします。

この会議は、関孝和とその周辺の数学者たちの業績を辿りながら、同時代の中国をはじめ世界の数学を考察する、国際会議としては初めての試みであり、多くの方々のご参加を期待いたしております。

つきましては、同封のポスター及びプログラムを作成いたしましたので、貴社周辺の方々へお知らせいただければ誠に幸甚に存じます。



關孝和三百周年祭記念

数学史国際会議

International Conference on History of Mathematics
in Memory of Seki Takakazu (1642?–1708)

August 25 ~ 31, 2008

The Memorial Hall on the 17th floor, Kagurazaka 1st Bd.,
Tokyo University of Science,

Invited Speakers

Karine Chemla (CNRS France), Feng Lisheng 馮立昇 (Tsinghua Univ. Beijing), Guo Shirong 郭世榮 (Inner Mongolia Normal Univ.), Guo Shuchun 郭書春 (History of Natural Science CAS), Ha Huy Khoai (Inst. Math. Hanoi), Ikeyama Setsuro 池山説郎 (Kyoto Sangyou Univ.), Jochi Shigeru 城地茂 (National Kaohsiung First Univ. of Sci. & Tech. Taiwan), Kawahara Hideki 川原秀城 (Univ. of Kyoto), Kim Yong Woon 金容雲 (Hanyang Univ. Seoul), Eberhard Knobloch (Technische Univ. Berlin), Kobayashi Tatsuhiko 小林龍彦 (Maebashi Inst.

Tech.), Komatsu Hikosaburo 小松彦三郎 (Univ. Tokyo), Li Wenlin 李文林 (Math. & Systems Sci. CAS), Liu Dun 劉鈍 (History of Natural Science CAS), Luo Jianjin 羅見今 (Inner Mongolia Normal Univ.), Majima Hideyuki 真島秀行 (Ochanomizu Univ. Tokyo), Matumoto Takao 松本堯生 (Hiroshima Univ.), Morimoto Mitsuo 森本光生 (Tokyo), Muroi Kazuo 室井利夫 (Kawai Juku Sendai), Ogawa Tsukane 小川束 (Yokkaichi Univ.), Qu Anjing 曲安京 (Northwest Univ., Xi'an), Sato Ken'ichi 佐藤健一 (Wasan Inst. Tokyo), Sugimoto Toshio 杉本敏夫 (Tokyo), Takenouchi Osamu 竹之内脩 (Osaka), Tsuchikura Tamotsu 土倉保 (Sendai), Alexei K. Volkov (Tsinghua Univ. Taiwan), Xu Zelin 徐澤林 (Tianjin Normal Univ.)

There will be some additional 30 minutes lectures. All lectures are in English except for the Introductory Lectures, and Prof. Kim's lecture in Japanese on 25th, and some lectures in Japanese on 31st.

● Main Topics

Seki Takakazu, his life and bibliography. Chinese mathematics and calendrical science which may have influenced Seki. Main achievements by Seki Takakazu and his pupils Takebe brothers. Seki's surroundings and especially those who lived in Kyoto and Osaka. Contemporary mathematics in China and vicinities. Contemporary mathematics in Europe. Influence of European mathematics on China and Japan. Comparison with ancient mathematics. Raisons d'être of these mathematics.

● Organizers

Mathematical Society of Japan and the Society of History of Japanese Mathematics host the Conference under the sponsorship of the Inoue Foundation for Science, the Tokyo Club and the Japan-China Science and Technology Exchange Association. It is also supported in part by JSPS Grants-in-Aid for Scientific Research (C) No. 20540107.

Organizing Committee : Henk Bos (Utrecht), Karine Chemla, Annick Horriuchi (Paris), Kawahara Hideki, Eberhard Knobloch, Komatsu Hikosaburo, Liu Dun and Yano Michio (Kyoto).

Local Committee : Masuda Kazuhiko, Sato Ken'ichi, Sekine Keitaro and Shimizu Katsuhiko.

Registration is required to participate in all activities of the conference and to receive the Proceedings later. Please apply in advance on URL <http://i-wasan.jp/seki/> and pay the registration fee 20,000yen at the registration desk in the Hall. However, if a vacancy is available on site, one may attend lectures without registration.

Program

August 25, Monday

9:00–12:00, 12:30–17:00 **Registration**

Introductory Lectures in Japanese

13:00–13:50

佐藤健一 Sato Ken'ichi

吉田光由の『塵劫記』の紹介 (On Yoshida Mitsuyoshi's "Jinkoki")

14:00–14:50

川原秀城 Kawahara Hideki

九章算術 (The Nine Chapters of Mathematical Procedures)

15:00–15:50

森本光生 Morimoto Mitsuo

算学啓蒙について (On Zhu Shijie's "Suanxue Qimeng")

Lecture in Japanese

16:00–16:50

金容雲 Kim Yong Woon

韓日傳統数学の比較研究 (A comparative study on traditional mathematics of Korea and Japan)

18:00

Snack

August 26, Tuesday

9:00–12:00, 12:30–17:00 **Registration**

9:30–10:20

Opening Ceremony

10:30–11:20

Majima Hideyuki 真島秀行

Seki Takakazu, his life and bibliography

11:30–12:20

Jochi Shigeru 城地茂

Seki Takakazu's biography and "Kanjo-gata Wasan Era" (1674–1780)

14:00–14:50

Eberhard Knobloch

Leibniz' theory of elimination and determinants

15:00–15:50

Komatsu Hikosaburo 小松彦三郎

Algebra, elimination theory and "大成算經 Complete Books of Mathematics"

16:00–16:50

Matsumoto Takao 松本堯生

"Sanpo-Hakki 算法発揮", the first published book on determinants, and the related works by Seki and others

August 27, Wednesday

9:00–12:00, 12:30–17:00 **Registration**

9:30–10:20

Karine Chemla

Remarks on the polynomial algebra of the Song-Yuan dynasties and its continuation in Edo Japan

10:30–11:20

Guo Shuchun 郭書春

A study on “The Nine Chapters of Mathematical Procedures” and Liu Hui’s mathematical theory

11:30–12:20

Muroi Kazuo 室井和男

Babylonian number theory and trigonometric functions: Trigonometric table and Pythagorean triples in the mathematical tablet Plimpton 322

14:00–14:50

Guo Shirong 郭世榮

Mathematics in the Song and Yuan Dynasties, “Axis of Mathematical Methods”

15:00–15:50

Takenouchi Osamu 竹之内脩

“Katsuyo Sanpou 括要算法”, résumé of works on mathematics of Seki Takakazu

16:00–16:50

Sugimoto Toshio 杉本敏夫

Seki Takakazu’s measuring process of the volume of solids derived from spheres

August 28, Thursday

9:00–12:00, 12:30–17:00 **Registration**

9:30–10:20

Liu Dun 劉鈍

Archimedes in China — Archimedes and his works in Chinese literature of the Ming and Qing dynasties

10:30–11:20

Kobayashi Tatsuhiko 小林龍彦

Influence of European mathematics on pre-Meiji Japan

11:30–12:20

Feng Lisheng 馮立昇

Mathematics exchanges between China and Japan in modern times (1850’s–1920’s)

14:00–14:25

Kim Yong Woon 金容雲

Korean and Japanese creativity in traditional mathematics

14:30–14:55

Tsuchikura Tamotsu 土倉保

“Ruiyaku-Jutsu 累約術”, the method of successive divisions

15:30-17:00

Excursion

18:00-19:30

Banquet

August 29, Friday

9:00-12:00, 12:30-17:00 **Registration**

9:30-10:20

Li Wenlin 李文林

(Implications of mathematics in East Asia to the present mathematics and education)

10:30-11:20

Luo Jianjin 羅見今

Ming Antu and his power series expansions

11:30-12:20

Ikeyama Setsuro 池山説郎

Power series expansions in India around 1400

14:00-14:50

Ogawa Tsukane 小川束

Theories of circles originated by Seki and Takebe Katahiro

15:00-15:50

Morimoto Mitsuo 森本光生

Takebe Katahiro's algorithm in order to find the circular arc length

16:00-16:25

Yokotsuka Hiroyuki 横塚啓之

"Kohai-Setsuyaku-Shū 弧背截約集" regarded as a work of Takebe Katahiro

August 30, Saturday

9:00-12:00, 12:30-17:00 **Registration**

9:30-10:20

Qu Anjing 曲安京

How did Chinese deal with a scientific problem? — A case study of the solar eclipse theory

10:30-11:20

Ha Huy Khoai

On the history of mathematics in Vietnam

11:30-12:20

Alexei K. Volkov

(Vietnamese mathematics)

14:00-14:50

Xu Zelin 徐澤林

Standing on the shoulders of a giant — Influence of Seki Takakazu on Takebe Katahiro's mathematical achievement

15:00-15:25

Ozaki Humiaki 尾崎文秋

Takakazu Seki's calculation method of solids of revolution

15:30-15:55

Hujii Yasuo 藤井康生

16:00-16:25

Ohashi Yukio 大橋由紀夫

16:30-17:00

Closing Celemony

August 31, Sunday

9:00-12:30 Registration

Lectures in Japanese

9:30 - 9:55

西田知己 Nishida Tomomi

10:00-10:25

田辺寿美枝 Tanabe Sumie

"Senkan-jutsu 翦管術", the solution of simultaneous congruence equations

	25日	26日	27日	28日	29日	30日	31日
9:30		開会式	Chemla	劉鈍	李文林	曲安京	西田/田辺
10:30		真島	郭書春	小林	羅見今	Khoai	
11:30		城地	室井	馮立昇	池山	Volkov	
13:00	佐藤						
14:00	川原	Knobloch	郭世榮	金/土倉	小川	徐澤林	
15:00	森本	小松	竹之内	15:30	森本	尾崎/藤井	
16:00	金	松本	杉本	遠足	横塚/	大橋/閉会	
18:00	軽食			バンケ			