

## ◆ Technical Exhibition

The WTC IV Technical Exhibition will be held throughout the Congress period in Kyoto International Conference Center Event Hall. It provides opportunities for industries and institutions to demonstrate excellent performance of their products and up-to-date information on their technologies and future developments. WTC IV welcomes the manufacturers of automobiles, electronics, machinery, lubricants and chemicals, testing and measurement equipments, as well as those from other relevant fields.

The exhibition is open to public; people from industry as well as local people may visit the Event Hall. It is going to be a great show case for industries as well as the place where people from all over the world discuss the latest technologies in tribology. Those companies and public offices interested in the exhibition, please contact to Dr. Jinichi IGARASHI (Nippon Oil Corporation) of the WTC IV Exhibition Committee:

E-mail: jinichi.igarashi@eneos.co.jp

Fax: +81-45-625-7292

## ◆ Technical Tours

Technical Tours will take you to factories and institutions in Kyoto and Osaka area, where you will find the Japanese unique styles of manufacturing.

## ◆ Social Programme

**Welcome Reception** Welcome Reception will be held for all participants in the evening of the 6th, September. We look forward to seeing you there.

**Opening Ceremony** Opening Ceremony will take place in the morning of the 7th, September. The invited guests will give speeches and presentations.

**Accompanying Persons' Programme** Accompanying persons are all welcome to this Programme in Kyoto International Conference Center, which include the Japanese tradition "Shodou – the art of calligraphy" and "Sadou – the tea ceremony".

**Banquet** Banquet will be held in the evening of the 9th, September, at Grand Prince Hotel Kyoto. Japanese traditional attractions are planned in the Banquet.

**Closure** All participants are invited to join this farewell event in the afternoon of the 11th, September.

## ◆ Satellite Forum

**Tribochemistry Kyoto 2009** will be held on Thursday 3rd to Friday 4th, September, 2009 at the Kanbaikan in Doshisha University by Tribochemistry Technical Committee, JAST (Chair: Keiji NAKAYAMA, AIST). Abstract (approx. 250 words) should be submitted to the secretariat of the forum by **5th December, 2008**.

Further information: <http://www.nanoworld.jp/tribochem09/>

Other satellite forums may be held before or after WTC IV.

## ◆ Kyoto

THE HEART OF JAPANESE CULTURE

Kyoto, the old capital of Japan for 1200 years, is the cultural heart of Japan. The history and heritage live on in the modern city; seventeen UNESCO World Cultural Heritage Sites are situated in a cityscape dominated by 2000 temples and shrines. The city offers you endless opportunities to enjoy Japan.

Kyoto is located almost exactly in the geographical center of Japan. It takes 2 hours and 15 minutes from Tokyo, and 2 hours and 30 minutes from Fukuoka, by the Shinkansen bullet train. Kansai International Airport is the gateway to Kyoto from the world. It takes about 75 minutes to Kyoto by Haruka express train.

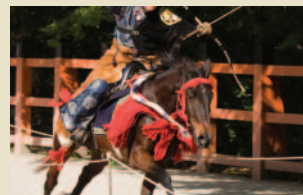


## ◆ Registration Fees

The registration fee will include access to all presentations and technical exhibition, printed bound volume, CD-ROM, welcome reception, luncheon seminar and refreshments.

The banquet is not included.

Advance registration (Before 30th, April, 2009)	JPY60,000
Regular registration	JPY70,000
One day registration	JPY50,000
Student registration	JPY35,000
Banquet	JPY10,000



WTC IV IN KYOTO

# WORLD TRIBOLOGY CONGRESS 2009

KYOTO, JAPAN

Sunday 6th to Friday 11th, September, 2009

First Circular and Call for Papers



For further information, please go to the Congress website

<http://www.wtc2009.jp/>

Organized by

Japanese Society of Tribologists and  
Science Council of Japan

Congress Secretariat c/o Congress Corporation

Phone:+81-3-5216-5551 Fax:+81-3-5216-5552 E-mail:congre@wtc2009.jp

## ◆ Invitation

The 4th World Tribology Congress (WTC IV) will be held in Kyoto International Conference Center. The organizing committee would like to invite you from all over the world to the thousand-year old capital of Japan in the early autumn of 2009.

As science and technology are required to contribute towards achieving sustainable developments in the planet Earth, it has a great meaning to bring together top tribology researchers and engineers from around the world at the venue where the important international meeting of the Climate Summit was held in 1997.

**Yoshitsugu KIMURA** *Chair, Organizing Committee*

## ◆ Scope and Outline

Harmonized coexistence of human being with nature is now recognized as a global issue. To achieve this goal, innovation is needed in various fields of technology. In particular, conservation of energy and resources through improving efficiency and increasing durability of machinery and equipment is of critical importance.

The scope of the Congress focuses on Tribology as the key discipline for technological innovation in the 21st Century. Tribologists from all over the world are welcome to Kyoto to exchange research findings and to discuss new developments for tomorrow in all aspects of Tribology.

Interesting and stimulating presentations on every aspect of tribology for tomorrow will be welcome.

## ◆ Committees for Organization

### Organizing Committee

#### Chair

Yoshitsugu KIMURA, *Professor Emeritus*  
*The University of Tokyo and Kagawa University*

#### Secretary general

Toshiaki WAKABAYASHI, *Kagawa University*

#### Vice-secretary general

Atsushi SUZUKI, *Toyota Motor Corporation*

#### Committee chairs

Takahisa KIMIJIMA, *IHI Corporation*

Joichi SUGIMURA, *Kyushu University*

Yoshio KUMADA, *Taiho Kogyo Co. Ltd.*

Norio TAGAWA, *Kansai University*

Takahisa KATO, *The University of Tokyo*

### Executive Advisory Committee

#### Chair

Masatami TAKIMOTO, *Executive Vice President*  
*Toyota Motor Corporation*

## ◆ Organizers

WTC IV is co-organized by Japanese Society of Tribologists and Science Council of Japan, and also held under the auspices of:

The Japan Society of Mechanical Engineers

The Society of Automotive Engineers of Japan

Storage Research Consortium

## ◆ Venue

KYOTO INTERNATIONAL CONFERENCE CENTER

The venue for WTC IV is Kyoto International Conference Center, the hall well known for a number of important international meetings. The Conference Center, Event Hall, Annex Hall and hotel form part of a vast complex that was designed exclusively for conferences and conventions, and spreads over 156,000m<sup>2</sup>. Inside the Conference Hall, the Main Hall and 70 meeting rooms, of which eight are large, multipurpose conference rooms are ideal for the arrangement of all kinds of gatherings and events.



## ◆ Technical Sessions

Oral and poster presentations are being planned in the following fields:

- 1. Tribology Fundamentals**  
Contact mechanics/ Friction/ Wear
- 2. Materials and Surface Engineering**  
Tribomaterials/ Coatings/ Surface modifications
- 3. Manufacturing and Mechanical Components**  
Manufacturing processes/ Bearings/ Gears/ Seals
- 4. Lubrication and Lubricants**  
Hydrodynamic lubrication/ Elastohydrodynamic lubrication/  
Boundary lubrication/ Lubricating oil/ Grease/  
Solid lubricants/ Additives
- 5. Micro-, Nano- and Molecular Tribology**  
Molecular tribology/ Superlubricity/ Molecular simulations
- 6. Tribosystems**  
Automobiles/ Railways/ Aerospace/ Hard disk drives/  
Heavy machinery/ Manufacturing equipment/ Maintenance/  
Biotribology.

## ◆ Symposia

In consideration of the scope of the first WTC to be held in Asia-Pacific region as well as the recent interesting progress in the rapidly growing fields of tribology research, the following four symposia will be organized in WTC IV.

1. Environmentally friendly tribology (Eco-tribology)
2. Large scale simulations in the field of tribology
3. Human-related tribology
4. Industrial tribology issues in the Asia-Pacific region

In addition, a collection of topical minisymposia forms the backbone of the Congress' technical programme. Therefore, proposals for organized minisymposia are welcome.

## ◆ Schedule

SEPTEMBER, 2009

### Sunday 6th

Registration, Welcome Reception

### Monday 7th

Opening Ceremony, Plenary Talks, Exhibition

### Tuesday 8th

Technical Sessions, Poster Sessions, Symposia, Exhibition,  
Luncheon Seminar, Technical Tour

### Wednesday 9th

Technical Sessions, Poster Sessions, Symposia, Exhibition,  
Luncheon Seminar, Banquet

### Thursday 10th

Technical Sessions, Poster Sessions, Symposia, Exhibition,  
Luncheon Seminar, Technical Tour

### Friday 11th

Technical Sessions, Exhibition  
Closure



## ◆ Plenary Talks and Lectures

WTC IV is proud to announce the following speaker of plenary lecture as part of the technical programme;

Distinguished University Professor **Masatoshi KOSHIBA**

The University of Tokyo

Nobel Laureate in Physics, 2002

In addition to this plenary lecture, the program features plenary talks by top leaders of science and industry as well as the keynote speakers in the technical sessions.

## ◆ Abstract Submission

An abstract of approximately 400 words should be submitted on the WTC IV website <<http://www.wtc2009.jp/>> by **5th December, 2008**. Authors of accepted papers will be asked to submit an extended abstract of one page, which will be included in a bound volume of the Congress.

## ◆ Important Dates (tentative)

5th December, 2008	Submission of abstracts
5th January, 2009	Notification of acceptance
3rd April, 2009	Submission of extended abstracts