

# ISTS 2014

2. ULUSLARARASI YÜZEY İŞLEMLERİ SEMPOZYUMU  
*2<sup>nd</sup> INTERNATIONAL SURFACE TREATMENT SYMPOSIUM*

**25-27 Haziran/June 2014**

*Istanbul Teknik Üniversitesi / Istanbul Technical University*

**\* 2<sup>nd</sup> Announcement**



TMMOB Metalurji Mühendisleri Odası  
UCTEA Chamber of Metallurgical Engineers



TMMOB Kimya Mühendisleri Odası  
UCTEA Chamber of Chemical Engineers

## »» 2<sup>nd</sup> INTERNATIONAL SURFACE TREATMENT SYMPOSIUM • 2014

The 2nd International Surface Treatment Symposium (ISTS) will be held on June 25-27, 2014 in Istanbul with the cooperation of UCTEA Chamber of Chemical Engineers and UCTEA Chamber of Metallurgical Engineers.

## »» TOPICS

- **Environment Sensitive Conversion Coatings and Anodization**

Alternatives of 6 Valent Chromium Conversion Coatings and Chromic Acid Anodization, Hot Sulfuric Acid and Phosphoric Acid Anodization, Micro Arc Oxidation, Alternatives to Phosphating

- **Vacuum Coating Techniques**

Physical Vapor Deposition, Chemical Vapor Deposition, Hard Coatings, Decorative Coatings, Coatings for Automotive Industry, Diamond Like Carbon Coatings, Diamond Coatings, Solid Lubricants, Nano Composite Coatings

- **Thermal Spray Techniques**

Thermal Spray, Plasma Spray, HVOF, Detonation Gun, Thermal Barrier Coatings, Coatings for Wear and Friction, Coatings for Biomaterials

- **Electrochemical, Chemical and Sol-gel Coatings**

Electrolytic Coatings, Electroless Coatings, Sol-Gel Coatings, Composite Coatings, Hybrid Deposition Techniques, Pre-treatments

- **Diffusion-based Surface Treatments and Hot-dip Coatings**

Surface Alloying, Intermetallics, Nitriding, Boriding, Carburizing, Electrochemical Boriding Hot-dip galvanizing, Aluminizing

- **Surface Technologies in Nano-bio Technological Applications**

Anodic Oxide Based Templates and Nanofunctional Surfaces, Catalytic Surfaces, Bio-Functional Surfaces, Sensors, Absorbers

## »» ABSTRACT GUIDELINES AND SUBMISSION

- The authors who would like to participate the 2nd International Surface Treatment Symposium should submit their abstracts including keywords to Symposium Executive Committee not later than **31<sup>st</sup> of January 2014**. Contact details; full postal and e-mail address, phone and fax numbers should also be given in the same page. Abstracts can also be submitted online from [www.metalurji.org.tr/ISTS2014](http://www.metalurji.org.tr/ISTS2014) website.
- After acceptance of their abstracts the authors are expected to submit their manuscripts for publishing in the Symposium Proceedings. The deadline for the submission of the full manuscripts is **31<sup>st</sup> of March, 2014**.

## » INVITED TALKS



**Prof. Dr. Allan MATTHEWS**

University of Sheffield, UK

**Optimising Surfaces to Meet The Needs of Different Tribological Contact Types**



**Prof. Dr. Ahmet T. ALPAS**

University of Windsor, Canada

**Novel Applications of Carbon based Coatings in Automotive Powertrains and Manufacturing Processes**



**Assoc. Prof. Dr. Caner DURUCAN**

Middle East Technical University, Turkey

**Sol-Gel Derived Functional Metal Oxide Thin Films on Glass**



**Prof. Dr. Takashi GOTO**

Tohoku University, Japan

**High-Speed Deposition of Thick Films by Laser Chemical Vapor Deposition**



**Prof. Dr. Dieter LANDOLT**

Swiss Federal Institute of Technology Lausanne, Switzerland

**Electrochemical Surface Treatment of Titanium at the Micro/Nano Scale:  
Fundamentals and Bio-Medical Applications**



**Prof. Dr. Sanjay MATHUR**

University of Cologne, Germany

**Title of the Talk will be Announced Later**



**Prof. Dr. Paul MAYRHOFER**

University of Wien, Austria

**Advances in Ti-Al-N and other Nanocomposite Coatings for  
Severe Applications**



**Prof. Dr. Evangelia (Litsa) PAVLATOU**

National Technical University of Athens, Greece

**Pulse Electrodeposition of Ni- Based Composite Coatings and  
Nanostructures-Structure, Mechanical and Photoinduced Properties**



**Dr. László PÉTER**

Hungarian Academy of Sciences

**Composition Depth Profile of Electrodeposited Alloy and  
Multilayer Films**



**Dr. Vladimir E. STREL'NITSKIJ**

Kharkov Institute of Physics and Technology, Ukraine

**Cathodic-Arc Plasma Sources for Composite Coating Deposition**



**Dr. Güldem KARTAL ŞİRELİ**

Istanbul Technical Universtiy, Turkey

**New Environmentally-Friendly Technologies in Coating of Metal Borides**



**Dr. Ayşe TURAK**

McMaster University, Canada

**Interface Engineering in Organic Optoelectronics**



**Assoc.Prof. Dr. Emrah ÜNALAN**

Middle East Technical University, Turkey

**Nanostructured Surfaces for Advanced Optoelectronic Devices**



**Prof. Dr. İskender YILGÖR**

Koç University, Turkey

**Controlled Wetting of Polymer Surfaces: From Superhydrophilic to Superhydrophobic**

## »» THE CONTRIBUTIONS FROM THE INDUSTRY INVITED



### **Aysun DOĞANGÜN AKIN**

TAI, TUSAŞ - Türk Havacılık ve Uzay Sanayii A.Ş., Turkey

**New Surface Treatment Trends for Aluminum Alloys in Aerospace Industry**



### **Dr. Beril ÇORLU**

ArcelorMittal Global R&D Gent, Belgium

**New Generation of Hot Dip Coatings**



### **Dr. Reinhard PİTONAK**

Böhlerit GmbH & Co, Austria

**Nanostructured TiAlN Coating by Moderate Temperature Low Pressure CVD**



### **Dr. Mustafa SEZER**

Arcelik A.S. Research & Development Center, Turkey

**Surface Treatment and Coating Applications for the Household Appliance Industry**



**Assoc. Prof. Dr. Özgür BİRER**

Koç University, Turkey

**Surface Analysis with Electron Spectroscopy**



**Prof. Dr. Ali Fuat ÇAKIR**

Istanbul Technical University, Turkey

**Electrolytic Metal Coatings: Principles, Technology and Control**



**Dr. Ali ERDEMİR**

Argonne National Laboratory, USA

**Principles of Surface Engineering and Tribology**



**Dr. Clewa W. OW-YANG**

Sabancı University, Turkey

**Introduction to Transmission Electron Microscopy**



**Prof. Dr. Fatih ÜSTEL**

Sakarya University, Turkey

**Introduction and Applications of Thermal Spray Technologies**