Serbian Ceramic Society Conference ADVANCED CERAMICS AND APPLICATION IX New Frontiers in Multifunctional Material Science and Processing

Serbian Ceramic Society Institute of Technical Science of SASA

Institute for Testing of Materials Institute of Chemistry Technology and Metallurgy Institute for Technology of Nuclear and Other Raw Mineral Materials

PROGRAM AND THE BOOK OF ABSTRACTS

Serbian Academy of Sciences and Arts, Knez Mihailova 35 Serbia, Belgrade, 20-21. September 2021

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Dear colleagues and friends,

We have great pleasure to welcome you to the Advanced Ceramic and Application IX Conference organized by the Serbian Ceramic Society in cooperation with the Institute of Technical Sciences of SASA, Institute of Chemistry Technology and Metallurgy, Institute for Technology of Nuclear and Other Raw Mineral Materials and Institute for Testing of Materials.

It is nice to host you here in Belgrade in person. As you probably know, Serbia launched a vaccination campaign at the beginning of this year, so up to date more than 50 percent of the adult population has been vaccinated. Since there is no one statistic to compare the COVID19 outbreaks and fears for loved ones in different countries, we believe that we all suffer similarly during this pandemic. That is why we appreciate even more your positive attitude and readiness to travel in this uncertain time. We understand that some of you had to cancel your lectures in the last minute due to the travel limitation in your countries, but we hope that you will come next year. We deeply hope that the ACA IX Conference will be worth remembering, that you will respect all COVID-19 safety measures at SASA building, that you will have a nice time here and that ultimately you will return to your home safely. We are very proud that we succeeded in bringing the scientific community together again and fostering the networking and social interactions around an interesting program on emerging advanced ceramic topics. The chosen topics cover contributions from fundamental theoretical research in advanced ceramics, developing of multifunctional ceramic processing routes, etc.

Traditionally, ACA Conferences gather leading researchers, engineers, specialists, professors and PhD students trying to emphasize the key achievements which will enable the widespread use of the advanced ceramics products in the High-Tech industry, renewable energy utilization, environmental efficiency, security, space technology, cultural heritage, etc.

Serbian Ceramic Society was initiated in 1995/1996 and fully registered in 1997 as Yugoslav Ceramic Society, being strongly supported by American Ceramic Society. Since 2009, it has continued as the Serbian

Ceramic Society in accordance with Serbian law procedure. Serbian Ceramic Society is almost the only one Ceramic Society in South-East Europe, with members from more than 20 Institutes and Universities, active in 16 sessions. Part of our members are also members of the Serbian Chapter of ACerS since 2019. Their activities in the organization of this conference is highly recognized. To them and all of you thanks for being with us here at ACA IX.

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Prof. Dr Vojislav Mitić

President of the Serbian Ceramic Society World Academy Ceramics Member European Academy of Sciences & Arts Member Prof. Dr Olivera Milošević,

President of the General Assembly of the Serbian Ceramic Society Academy of Engineering Sciences of Serbia Member

Conference Topics

- Basic Ceramic Science & Sintering
- Nano-, Opto- & Bio-ceramics
- Modeling & Simulation
- Glass and Electro Ceramics
- Electrochemistry & Catalysis

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- Amorphous & Magnetic Ceramics
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Posters	

The Ninth Serbian Ceramic Conference Advanced ceramics and Application

September 20-21, 2021 Serbian Academy of Sciences and Arts, Knez Mihailova 35, Belgrade, Serbia

Conference Information:

Conference location: Belgrade (Beograd) – the capital of Serbia, Serbian culture, education, science and economy, having about 2 million habitants. Belgrade is situated in South-Eastern Europe, on the Balkan Peninsula, at the confluence of the Sava and Danube Rivers in north central Serbia. The official language is Serbian, while foreigners can use English.

Conference venue: Serbian Academy of Sciences and Arts - SASA, Great Hall (2nd floor) and Halls 1, 2 (1st floor), Knez Mihailova 35, Belgrade, Serbia

Dress code: Serbian Academy of Science and Arts is a distinguished institution of supreme national importance. We kindly ask you to respect a dress code and not to wear short skirts and pants (above the knee); tank top and sleeveless shirts; flip-flops and open-toed sandals.

Covid-19 outbreak - information for conference participants:

Prevention and general precautions:

- avoid close contact (within 1 m) with people who are ill with fever, cough or respiratory symptoms;
- wear a face covering in enclosed environments;
- wash or sanitize your hands frequently after coughing, before preparing food or eating, after toilet use, after contact with ill persons, and during exposure to high traffic public areas;
- cover your mouth and nose with a disposable tissue when coughing or sneezing and use the nearest waste receptacle to dispose of it after use. If you do not have a disposable tissue, cough or sneeze in your elbow;
- strictly do not attend the conference if you are unwell. Stay at home or your accommodation if you become unwell, develop a fever or respiratory symptoms;
- if you or other participants in the conference hall are unwell, inform the conference organizers and arrange to get an assessment from a healthcare provider.

Conference fee: Standard fee for foreign participants: 200 EUR; Standard fee for domestic

participants: 10000 RSD; **Discounts**: Members of SCS, Keynote lecturers and PhD Students: 50%; Invited lecturers 40%; Plenary lecturers & the last year winners (oral and poster presentations): Free of charge.

Invoice and bank details for Conference fee payment: Banka Intesa ad Beograd, Account

THE SEM/EDS ANALYSIS OF ZEOLITE MINERALS

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The SEM/EDS analysis is one of the most important methods for characterizing and determining the morphology of minerals. In scanning electron microscopy (SEM), a highly energetic and focused electron beam scans the sample and normally provides an extremely enlarged image of the morphology of the sample, as well as information on its chemical composition using an energy dispersive spectrometer (EDS) detector. In this paper are presented the SEM/EDS investigation of natural zeolit deposit Igros and Zlatokop.