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INTERVIEW

Sister and Related Societies: Reaching Out to a Global Community of Communications Professionals

Interview with Octavia A. Dobre, Director of Sister and Related Societies

By Stefano Bregni, Global Communications Newsletter Editor in Chief, Vice-President for Conferences, and Octavia A. Dobre, Director of Sister and Related Societies

This is the second article in the series of nine, started in May 2018 and published monthly in the IEEE ComSoc *Global Communications Newsletter*, which covers all areas of IEEE ComSoc Member and Global Activities. In this series of articles, I introduce the Vice-President and six Directors on the Member and Global Activities Council (namely: Sister and Related Societies; Membership Services; AP, NA, LA, EMEA Regions) and the two Chairs of the Women in Communications Engineering (WICE) and Young Professionals (YP) Standing Committees. In each article, one by one they present their sector activities and plans.

In this issue, I interview Octavia A. Dobre, Director of Sister and Related Societies.

Octavia is a Professor and Research Chair at Memorial University, Canada. She is the Editor-in-Chief of *IEEE Communications Letters*, and has served as an editor and senior editor for other prestigious journals. She also chairs the IEEE ComSoc Signal Processing for Communications and Electronics Technical Committee, and has served as an officer for other technical committees, as well as technical co-chair of symposia at various conferences.

Bregni: Octavia, we should begin by reminding readers what are the Sister and Related Societies of ComSoc.

Dobre: The Communications Society (ComSoc), as one of the most prominent units of the IEEE, and has a long tradition of global outreach. ComSoc's Sister and Related Societies program represents one of the vehicles for strengthening the globalization of our membership.

Sister Societies are national or international professional associations with status and technical scope similar to ComSoc. On the other hand, Related Societies are complementary in technical scope, but do not overlap ComSoc's technical orientation.

Bregni: How many are they?

Dobre: There are currently 26 Sister Societies and 10 Related Societies around the world, with which ComSoc has agreements. These include national organizations from 23 countries, along with international bodies like the International Telecommunication Union (ITU).

Details about these societies are available at <https://www.comsoc.org/about/sistersocieties>. Such a network certainly supports our globalization!

Bregni: How are relationships between ComSoc and other Societies regulated? What kinds of activities are addressed?

Dobre: The formal relationship between ComSoc and its Sister and Related Societies is established through cooperation agreements, or Memoranda of Understanding (MOUs), which typically span four years. They are signed by the ComSoc President and a corresponding Sister or Related Society President.

MoUs may include various elements, such as: technical co-sponsorship of conferences; submission of papers to ComSoc conferences, journals and magazines; discounted participation at ComSoc conferences; promotion of publications; and affiliate membership in ComSoc.

The ComSoc's Sister and Related Societies program is led by the Director, together with a board consisting of both members of the ComSoc's Board of Directors and representatives of the Sisters and Related Societies. The Director reports to the ComSoc VP, Member & Global Activities (MGA), as well as to the MGA Board.

Bregni: In conclusion, would you share with us your plans going forward as Director of Sister and Related Societies?

Dobre: This year, there are 16 cooperation agreements that are expiring. Consequently, as a next step, we will be focusing on their renewal, while identifying elements that can make them more meaningful to both ComSoc and its Sister and Related Societies.

I am of the opinion that it is important to further strengthen the relationships with our Sister and Related Societies through organizing joint events, for example at ComSoc's conferences. This will provide the opportunity for in-person discussions, potentially leading to join initiatives and closer collaborations.

Additionally, other societies are aimed to be identified, and contacts initiated. I would like to take this opportunity to invite our members to email me (odobre@mun.ca) with their recommendations for potential societies with which ComSoc can connect.

We celebrate our relations with similar societies worldwide, to build a global community of communications professionals!



Stefano Bregni



Octavia A. Dobre

25th SoftCOM Conference: Academy and Industry Meeting at the Adriatic Coast

By Dinko Begusic, Nikola Rozic, Pascal Lorenz, Josko Radic, and Katarina Rados, University of Split, FESB, Croatia; University of Haute Alsace, France

The city of Split is the largest academic and industrial center as well as the famous tourist destination at the Croatian Adriatic coast. It provides a perfect environment to organize a conference in the area of ICT. The SoftCOM conference started in 1993 as a joint project of the University of Split, Faculty of Electrical Engineering, Mechanical Engineering and Naval Architecture, Croatian Telecom and World Trade Center Split. It has grown to be the major Adriatic area ICT event. Using an innovative approach, SoftCOM has been organized aboard a cruise ship. The sailing conference connected the main cities on the Adriatic coast including Split, Rijeka, and Dubrovnik on the Croatian coast and Trieste, Venice, Ancona and Bari on the Italian coast. Since 1998 SoftCOM has been technically co-sponsored by IEEE ComSoc. Since 2002 the Croatian Communications and Information Society (CCIS), as a ComSoc Sister Society, has been an active participant in the organization of SoftCOM.

The silver jubilee 25th International Conference on Software, Telecommunications and Computer Networks, SoftCOM 2017, was held in the attractive ambience of the Radisson Blu Resort hotel, Split, September 21–23, 2017. The Conference was organized by the University of Split, Faculty of Electrical Engineering, Mechanical Engineering and Naval Architecture (FESB) and Croatian Communications and Information Society (CCIS) under the auspices of the Ministry of Science, Education and Sports, Croatian Academy of Engineering and Croatian Regulatory Agency for Network Industries. The Conference was technically co-sponsored by the IEEE Communications Society (ComSoc).

Researchers and experts from industry, research institutes and

universities from 47 countries all around the world submitted in total 211 papers for presentation at SoftCOM 2017. Submitted papers were reviewed by more than 250 scientists from universities, institutes and ICT companies all over the world. A total of 104 papers were accepted for presentation within the technical program based on their contribution, relevance, conceptual clearness and overall quality.

At the opening ceremony the participants were welcomed on behalf of the organizers by Prof. Dinko Begusic, SoftCOM 2017 General Co-Chair; Prof. Sven Gotovac, the Dean of the Faculty of Electrical Engineering, Mechanical Engineering and Naval Architecture in Split; Prof. Simun Andelinovic, the Rector of the University of Split; Blazenko Boban, Prefect of the County of Split and Dalmatia; Prof. Pascal Lorenz, chair of the IEEE ComSoc France Chapter; Prof. Maja Matijasevic, Chair of the IEEE Croatia Section; Drzen Lucic, Ph.D., President of the Council of HAKOM; and Milan Zivkovic, Director Business and Strategy Development, Ericsson Nikola Tesla, Zagreb. A plenary talk titled “Smart Contract: An Important Building Block of Adaptable and Dynamic Networks,” was presented by Sandor Albrecht, Ph.D., Director of Research Area Digital Services Design, Ericsson Research, Stockholm, Ericsson AB, Sweden.

The technical conference program featured 20 conference sessions, including two special sessions and six symposia: the Symposium on Ad Hoc and Sensor Networks; the Symposium on Green Networking and Computing; the Symposium on Smart Environment and IoT Technologies; the Symposium on Security and Digital Forensics; the Symposium on Information Security and Intellectual Property; and the Symposium on Environmental Electromagnetic Compatibility. The special sessions were focused on specific topics, including a Special Session on QoS in Wired and Wireless Networks and a Special Session on Advanced Educational Technologies. The Workshop on IoT and Elderly Friendly Cities and Healthy Ageing Services was organized by the research groups from the University of Salento, the Fondazione Politecnico di Milan, and the University of Turin, Italy. The General conference featured eight technical sessions, including Software Based Systems and Services; Optical Systems; Signal Processing; Wireless Communications (three sessions); Virtualization and Software Defined Networks; and Coding.

The conference program featured four invited talks by recognized researchers and institutional representatives as follows: Designing Resource-Aware Applications for the Cloud using Formal Methods, Einar Broch Johnsen, Ph.D., Department of Informatics, University of Oslo, Norway; IoT-Based WSN: Softwarization and Virtualization Towards CPS Intelligence, Adnan Al-Anbaky, Ph.D., AUT University, Auckland, New Zealand; Computational Methods for Fitting Statistical Models to Spatial Data, Murali Haran, Ph.D., Pennsylvania State University, Pennsylvania, USA; and Regulatory Challenges Due to Security and Privacy Requirements for Internet of Things, Drzen Lucic, Ph.D., Croatian Regulatory Authority for Network Industries HAKOM, Croatia.

In conjunction with the SoftCOM 2017 conference, a Business Forum was organized featuring two workshops and two panel sessions and a round table with participation of managers, executives, experts, government and institutional representatives.

A professional workshop dedicated to the wide spectra of topics in ICT was organized. A total of 18 professional papers were presented in three sessions and published in a workshop proceedings. (Continued on Newsletter page 4)



A plenary talk titled “Smart Contract, an important building block of adaptable and dynamic networks” has been presented by Sandor Albrecht, PhD, Director of Research Area Digital Services Design, Ericsson Research, Stockholm, Ericsson AB, Sweden.. At the beginning of the plenary session the participants have been welcomed on behalf of the organizers by prof. Dinko Begusic (left), SoftCOM 2017 General Co-Chair, prof. Sven Gotovac (right), the Dean of the Faculty of Electrical Engineering, Mechanical Engineering and Naval Architecture of the University of Split.

SpliTech2017: Growing and Being Different

By Toni Perkovic, Petar Solic, Sandro Nizetic, Katarina Vukojevic, University of Split, Croatia; Luigi Patrono, University of Salento, Italy; and Joel J. P. C. Rodrigues, Inatel/UNIFOR, Brazil, Instituto de Telecomunicações, Portugal

During the popular tourist season and time of a famous music festival, from 12–14 July 2017, the Faculty of Electrical Engineering, Mechanical Engineering and Naval Architecture (FESB) hosted the SpliTech2017 conference that was technically co-sponsored by IEEE ComSoc. A total of 10 scientific sessions were held, four professional sessions, a tutorial on “Interaction of Humans with Electromagnetics Fields,” and a one-day Workshop on Internet of Things (IoT) organized with partners from industry in collaboration with the University of Salento, Italy. As part of the IoT Workshop, companies such as Amplifico, #InCLude, Plurato, Ericsson Nikola Tesla, SIEMENS, STMicroelectronics, SensorID, SofThings, Selmet, and CAENRFID presented the main challenges and results they encountered on the way to implementation (and standardization) of their products. This event offered the opportunity to students and all other conference participants both to get acquainted with the newest products characterized by a high technological level and to explore very interesting opportunities for collaboration, practice and employment.

In addition, the conference hosted 10 invited lecturers. Within the conference, a Smart City round table was organized, discussing the guidelines for the development of the city of Split, Split-Dalmatia County, and the Republic of Croatia, with the aim of developing or deepening cooperation between academia and industry and encouraging public-private partnerships. The round table moderator was Toni Perkovic, assistant professor at the University of Forensic Sciences in Split.

At the opening ceremony the participants was welcomed on behalf of the organizers of the conference by Prof. Sven Gotovac, the Dean of the Faculty of Electrical Engineering, Mechanical Engineering and Naval Architecture; Prof. Zoran Dogas, the Dean of the Faculty of Medicine; Prof. Simun Anđelinović, the Rector of the University of Split; Deputy Mayor Jelena Hrgović, Damir Brcić as a representative of the Split-Dalmatia County; and Prof. Maja Matijević from the University of Zagreb, FER. Finally, general chair Prof. Sandro Nizetic thanked the sponsors and pointed out that this year SpliTech had an increase of 35 percent more papers compared to the previous year. More than 100 papers were submitted to the conference, out of which 49 percent were accepted for publication, which also guarantees the high quality of scientific publications. After the opening ceremony, a plenary talk was held by prominent world scientists: Petar Popovski from Aalborg University in Denmark on the topic “Wireless Communication Challenges in 5G towards Transforming Vertical Industries” and Jiri Jaromir Klemes from Brno University of Technology in the Czech Republic on the topic “Energy and Process Integration Research: Present Situation and Development Trends in Future Research.”

The technical conference program featured 10 conference sessions related to Smart Cities: Hardware, Systems and Applications, Engineering Modeling for Computational and Applied Electromagnetics, Energy, Power Electronics, Smart Grid, E-health, Internet of Things, Internet of Things–Architectures.

The conference program featured five invited talks by recognized researchers and institutional representatives as follows: Challenges

Development of Energy Services in the Digital Technology Era, Vlasta Zanki, HEP ESCO d.o.o., Croatia; Computational Modelling of Fuel Cell Electrodes, Ned Djilali, University of Victoria, Canada; Status of Fuel Cell Technologies and Their Applications, Frano Barbir, University of Split, Croatia; Multiscale Computational Fluid Dynamics Modeling as an Aid to Surgical Planning–Some Applications to Palliative Treatment of Congenital Heart Disease, Alain J. Kassab University of Central Florida, Canada; Architectures of Next Generation Wireless Networks, Pascal Lorenz, University of Haute Alsace, France; Understanding Hydraulic Fracturing and Associate Seismicity–Advanced 3D and 4D FDEM Micromechanical Modelling, Giovanni Grasselli, University of Toronto, Canada; Smart POIs: A New Way to Interact and Live in Smart Cities, Antonio Jara, University of Applied Sciences Western Switzerland (HEVS- HES-SO) & HOP Ubiquitous, Switzerland.

The round table was attended by employees from Ericsson Nikola Tesla, Split-Dalmatia County, Split City, Parks and Plantations, Marjan Park Forest, Split Parking, Amplifico, SELMET, Soft-Things, and employees of the Faculty of Electrical Engineering, Mechanical Engineering and Naval Architecture. Discussions noted that by 2030, two-thirds of the world’s population will live in cities that occupy 2 percent of the planet’s surface. This will increase the number of megacities (cities with more than 20 million people), which now number 28 and by 2030 could be 41. This trend is leading to very important challenges focused on the management of cities in terms of services, livability and quality of life. A consolidated and common approach to face them is to invest a lot in “smart cities,” which is a comprehensive tool for solving goals of sustainable development.

On the other hand, the United Nations adopted the Sustainable Development Program by 2030, which contains 17 sustainable development goals with a view to eradicating poverty, tackling inequality and injustice, and addressing climate change issues by 2030. Implementing the concept of “smart city” means smart economy, smart environment, smart state policy, smart mobility, smart people, and smart living. The roundtable began with a lecture by Nuno Lopes, a researcher from the University of Minho, Portugal, who delivered a lecture on “Smart Cities for Sustainable Development.”

After a presentation from Nuno Lopes, the moderator of the roundtable, Toni Perkovic, invited the audience to present their thoughts, suggestions and questions related to the topic. The roundtable participants referred to the following:

- As part of a “smart city,” greater attention should be placed on industry that presents a very important segment of the development and security of every city, since smart cities must contribute to the safety of its people. Nuno Lopes stressed that the industry should definitely be involved as it provides answers to the question of the city’s needs and people in it, while security is exclusively related to the quality of life, which is one of the cornerstones of a smart city since without security residents cannot achieve quality of life.

- Participants have also expressed doubts whether it is better to develop megacities or a larger number of smaller cities, but practice shows that the trends are going toward an increasing number of megacities.

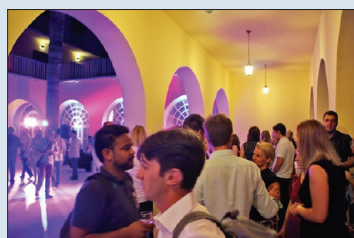
- It was emphasized that the “smart city” must primarily meet the needs of the people living in it.

- A city representative of Parks and Plantations stated that there is an economic barrier to the development of a smart city, that is, a lack of investments. Politics does not recognize the problem and does not invest in smart people without which a smart city cannot exist nor develop.

(Continued on Newsletter page 4)



Scenes from SpliTech2017.



SOFTCOM/Continued from page 2

ings. The contribution by young professionals from Ericsson Nikola Tesla, Croatia and Lepida Spa, Italy was particularly appreciated by the audience. In addition seven half-day tutorials were held by worldwide recognized experts.

A Dynamic Innovation Panel Discussion was organized by Marko Bervanakis (Ericsson Global Innovation Facilitator), Ericsson Nikola Tesla, Croatia. The subtitle of the discussion was How Innovative Companies Remove Innovative Barriers–Small to Large? The participants discussed the challenges faced by small start-ups, small, mid-size and large companies in innovation development. The Sixth Workshop on Software Engineering in Practice, organized by dr.sc. Darko Huljenic, Ericsson Nikola Tesla, Croatia, gathered researchers from academia and professionals from industry to discuss challenges and new developments in the area of communications software production.

A panel discussion titled “Telco Meets ICT” was organized by dr. sc. Toni Mastelic, Ericsson Nikola Tesla, Split. Experts from renowned institutions took part in the discussion, including: Univ. Prof. Dr. Ivona Brandic, Vienna University of Technology; Dr. David de Oliveira Costa, NewMotion; Dr. Sandor Albrecht, Ericsson Research, Sweden; Ms. Hrvoje Sukic, VIPnet d.o.o.; and Danijel Soldo, IBM Research and Development, Stuttgart, Germany. The participants discussed the topic of the evolution of telecommunications services with emphasis on their convergence aimed at the provision of sophisticated services to users. The focus was on the need for a variety of Cloud services. It was pointed out that high performance, low latency and efficiency requires moving services toward the network Edge.

A roundtable on “Smart Cities, Information Security and IoT Challenges” was organized in collaboration with the Croatian Regulatory Authority for Network Industries HAKOM. It was moderated by Prof. Marija Boban, University of Split, Faculty of Law, and MSc. Mario Weber, Director of HAKOM. The development of smart cities in Croatia has been discussed. The round table was particularly interesting for the representatives of local communities preparing projects for development of the broadband access infrastructure of the next generation. The examples of the towns of Solin and Knin were put forward. Marko Jelic, mayor of the town of Knin, and Ivica Rakusic, deputy mayor of the town of Solin, took part in the discussions. Tomislav Mihotic, secretary of the Ministry of Sea, Transport and Infrastructure, expressed the support for the development of broadband Internet access as the fundamental infrastructure. Nina Gumzej, Ph.D., University of Zagreb, Faculty of Law, discussed the state of the art in the area of privacy protection, particularly regarding the new GDPR regulations.

The workshop on doctoral education in ICT was organized by Maria del Carmen Calatrava Moreno, Vienna Office of Technopolis Group, Austria. The focus of the discussion was on the efficient connections between academia and industry to support doctoral students

from industry. In addition, the Workshop on Digital Marketing was organized by Igor Jurcic and Ivan Radoc, HT Mostar, Bosnia and Herzegovina. The focus of the workshop was the marketing for the new era based on the Vision 2020 in ICT segment.

The Business forum featured a series of industrial presentations: Reinventing the Mainframe with Open Source and Pervasive Encryption, Danijel Soldo, IBM Research and Development (Stuttgart, Germany); Nokia Solutions for Improving Base Stations Energy Efficiency, Darko Giljevic, Nokia Networks (Zagreb, Croatia); CAN-IO Functionality, Development and Production of an Automotive Electronics Device, Nikola Moric, MRS Electronic (Germany); and Collaborative Innovation Myth on Micro Scale Test, Goran Pavlov, IRI centar d.o.o. (Kastela). The expo included exhibits from Groupation for IT–Croatian Chambre of Commerce (Split); INFOKOM (Split), Design Flow, a startup established by the students of the University of Split, FESB (semi-finalists of the Ericsson Innovation Awards 2017.), Mjerne Tehnologije (Zagreb), Amplifico (Split), Split and Dalmatia County.

The presentations of the student projects, following the framework of the Ericsson Nikola Tesla Summer Camp 2017, were held within a special workshop session that was coorganized by Sasa Decic, M.Sc. and Goran Gasparovic (Ericsson Nikola Tesla).

The welcome reception by the Mayor of Split was organized in the attractive ambience of the Villa Dalmatia in Split. The participants also had an opportunity to enjoy the conference boat trip to the picturesque town of Trogir which is listed in the UNESCO World Heritage Sites list.

More information about the SoftCOM 2017 conference may be found at <http://www.fesb.hr/softcom>

SPLITTECH2017/Continued from page 3

Nuno Lopes concluded his intervention, taking into account some requests about useful suggestions focused on the City of Split, asserting that it is necessary to detect the needs of the inhabitants of Split. Then it is necessary to recognize the risks and challenges and we need to have a vision. According to these factors, a plan needs to be developed. The solution should involve the local population, not entities from the outside, because if the local population develops then the city develops itself. Support at the national level is also very important. At the end of the discussion at the roundtable, the moderator Toni Perkovic thanked the participants for active participation and, as a conclusion, stated that there was a need for an independent national strategy to be implemented in cities through the local population, since the local population knows their needs and can respond to them, by setting up startup companies, the collaboration of the University with industry and in general, viable and active communication of all stakeholders.

The complete conference program included a total of 67 scientific/professional papers published in the conference proceedings, of which 50 papers were sent for publication in IEEE Xplore, the most influential global database in the field of electrical engineering and computing, which the conference encompasses and which are the source knowledge for future research. The conference was attended by approximately 250 participants from 15 countries.

Published papers were submitted and accepted in important international journal such as *Thermal Science*, *JMIS*, *RACNT*, *IEEE Access*, *JCOMSS*, etc.

The Multidisciplinary Conference of SplitTech 2017 covered challenging areas related to the extremely topical issues of the development of society such as electronics, computing, IT technology, medicine and energy management, and represents one of the most important advances in the functional integration of the University of Split, where all components work together on common problems. The idea of the conference was to link the University of Split on a high level with the profession in order to achieve long-term cooperation with concrete results, that is, to make life easier and more enjoyable for everyone. As result, next year, in addition to the Faculty of Electrical Engineering, Mechanical Engineering and Naval Architecture, the Faculty of Medicine and the Faculty of Civil Engineering, Architecture and Geodesy, we plan to actively involve other Faculties and departments from the University in the organization of the SplitTech conference.

More information about the SplitTech 2017 conference may be found at <http://splitech2017.fesb.unist.hr/>

 **GLOBAL COMMUNICATIONS NEWSLETTER**

STEFANO BREGNI
Editor-in-Chief
Politecnico di Milano, Italy
Email: bregni@elet.polimi.it, s.bregni@ieee.org

FABRIZIO GRANELLI
Associate Editor
University of Trento, Italy
Email: fabrizio.granelli@unitn.it

IEEE COMMUNICATIONS SOCIETY – MEMBER AND GLOBAL ACTIVITIES
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