

## **Slovenia Section**

## Jože Guna, IEEE Slovenia chair

# **Section Vitality**

Please provide information about the date of last Section elections, date of next elections, and do you have the practice of Vice-Chair becoming the next Section Chair. Section ExCom meetings (list them and provide brief summary if appropriate). List the activities carried out to retain and recruit members and the results obtained.

The last Section elections have been carried out on November 29<sup>th</sup> through December 13<sup>th</sup>, 2021, for the term 2022-2023. The next elections will be organized by the end of the year 2023. The chair candidates are nominated by the member petition. The ExCom meetings are held two times per year, usually in the beginning of each year when the yearly section assembly is held and in fall (September) as part of the IEEE International Electrotechnical and Computer Science Conference.

In order to recruit members and retain the current ones we actively promote various activities:

- Encourage and support chapters and affinity groups
- Encourage student members and young professionals
- Encourage membership development and support the senior member and the fellow elevation
- Organize technical and professional workshops, promotion events (e.g. Ieee Day, IEEE activities presentations as part of academic curricula)
- Encourage cooperation with the academia, invited lectures with distinguished lecturers (e.g. IEEE Fellows)
- Encourage cooperation with the industry (e.g. student competitions, hackatons)
- Promote science and engineering to elementary and high school students (e.g. Bober computer&informatics competition)
- Organize and promote IEEE at co-sponsored conferences (e.g. the 30<sup>th</sup> IEEE International Electrotechnical and Computer Science Conference, IEEE PES EEM22, IEEE Slovenia GRSS, CIS, SB MB, and WiE: CEEPUS Summer School on Remote Sensing and Computer Intelligence)
- Recognize the commitment of volunteers by awarding them
- Organize stands dedicated to membership during sponsored conferences

Currently, the Slovenia Section counts 293 active members, compared to 249 active members in 2020-2021. The membership retention is very high.

# **Students**

List of Student Branches (SB) in your Section, the newly formed or dissolved SBs, if any since the last meeting reporting (Oct 2020). List the student meetings held and Section activities addressed to Students and Young Professionals.

There are two Student Branches (Ljubljana and Maribor). The number of groups remains unchanged. All groups hold regular meetings and organize technical, professional and promotional events. All groups are very active and involved in IEEE promotion and membership development activities.

Most notable events in 2021/2022 were:

Student Branch Ljubljana:

- NVIDIA workshop: Accelerated Computing Tutorial/Workshop
- NVIDIA workshop: Deep Learning Tutorial/Workshop
- Promotional events: IEEE Extracurricular activities day
- Regular meetings/elections





## Student Branch Maribor:

- NVIDIA workshop: Accelerated Computing Tutorial/Workshop
- NVIDIA workshop: Deep Learning Tutorial/Workshop
- Technically sponsored event by IEEE Slovenia GRSS, CIS, SB MB, and WiE: CEEPUS Summer School on Remote Sensing and Computer Intelligence
- IEEEXtreme 15.0 competition, for the first time in Slovenia, achieved 25th place in R8 and 81th place worldwide
- Regular meetings/elections

## **Affinity Groups**

List of Affinity Groups (YP, LM, WiE, SIGHT, etc.), list of SB AGs, newly formed or dissolved AGs/SB AGs, if any since the last meeting reporting (Oct 2020). List the activities intended to support affinity groups.

There are WIE, YP and LM active affinity groups. The number of groups remains unchanged. All groups hold regular meetings and organize technical, professional and promotional events. There is a strong cooperation with younger members, students and student branches. All groups are very active and involved in IEEE promotion and membership development activities.

#### Most notable events in 2021/22 were:

## WIE:

- NVIDIA workshop: Accelerated Computing Tutorial/Workshop
- NVIDIA workshop: Deep Learning Tutorial/Workshop
- CEEPUS Summer School on Remote Sensing and Computer Intelligence
- Workshop: Programming for women
- FERI Academy: Everyday cybersecurity
- WIE science/engineering promotion: International Women's Day in Science
- Regular meetings/elections

## YP:

- NVIDIA workshop: Accelerated Computing Tutorial/Workshop
- NVIDIA workshop: Deep Learning Tutorial/Workshop
- Student paper competition contributions
- Technical&scientific paper contributions at the IEEE International Electrotechnical and Computer Science Conference
- Regular meetings/elections

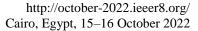
# Chapters

List of Chapters and SB Chapters in your Section, the newly formed or dissolved Chapters, if any since the last meeting reporting (Oct 2020). Indicate how many have reported on time and received rebate. Highlight some of the activities.

The section has 8 active chapters: Industrial Electronics / Industrial Applications, Signal Proc. (SP-01)/Circ. and Syst. (CAS-23), Computer (C-16), Communications (COM-19), Education (E-25), Power Engineering (PE-031), Computational Intelligence, Geoscience and Remote Sensing. As of February 2022 there has been established and approved a completely new chapter, the Biometrics Council Chapter, bringing the total number of active chapters to 9.

All chapters are active and are organizing technical, professional, promotional events and workshops. They are cooperating with the academia, industry and other interested parties. In 2021 there have been 64 different events reported according to the VTOOLS. In 2022 the number of events reported so far is 34.

# The 119<sup>th</sup> IEEE Region 8 Committee Meeting





# **Industry**

List the activities carried out to foster relations with Industry and the results obtained.

The role of IEEE, as the interlink between the industry and academia, is important in IEEE Slovenia section, and is evident from numerous various activities:

- The yearly IEEE International Electrotechnical and Computer Science Conference
- technical events, e.g. Workshop Smart EV charging stations of IEEE SP/CAS chapter in cooperation with MegaTel and EBV Elektronik companies
- invited lecture Research trends in automotive industry of Industrial electronics/ industry applications company chapter in cooperation with Mahle Electric Drives company
- 25<sup>th</sup> Seminar on Optical Communications technical conference
- Project cooperation, e.g. Impact of the Erasmus+ project "BENEFIT" on the ICT engineers education

In 2022 we plan to further strengthen the cooperation with the industry.

# **Diversity, Equity and Inclusion**

Highlight any diversity metrics (gender, age, religion, geographical, employment, etc.), new initiatives, best practices and progress around diversity and inclusion happening in your Section. Link to IEEE DEI statement <a href="elink">< elink</a>>.

The values of Diversity, Equity and Inclusion are highly important and included in planning future activities ad well as carrying out current activities of the Slovenia Section. This is evident form the active WIE section as well as from activities from other chapters and student branches. The IEEE Slovenia section tightly cooperates with the academia, especially with the Universities, where these values have been recognized and are formalized by specific formal documents, e.g. the Gender Equality Plan Of The University Of Ljubljana, 2022-2027 (<a href="https://kakovost.uni-lj.si/wp-content/uploads/2022/04/Gender-Equality-plan-of-the-University-of-Ljubljana-2022-2027.pdf">https://kakovost.uni-lj.si/wp-content/uploads/2022/04/Gender-Equality-plan-of-the-University-of-Ljubljana-2022-2027.pdf</a>) and the Ethical codex (<a href="https://www.uni-lj.si/raziskovalno">https://www.uni-lj.si/raziskovalno</a> in razvojno delo/etika in integriteta v raziskovanju/).

#### Activities since the last report

Highlight some of the activities in your Section, with special attention to the things that work well, and things that don't, so that your acquired know-how can be used by other Sections.

Due to the Covid-19 crisis, the possible activities in 2021 were somewhat limited. Nevertheless, our member in the chapters and affinity groups were still very active. We are especially proud of organizing the yearly IEEE International Electrotechnical and Computer Science Conference, which was held on-site, and of the 50 years anniversary of the IEEE Slovenia section celebration.

Some of the most notable activities and achievements in 2021/22 were:

- Full on-site and online organization of the yearly 30th IEEE International Electrotechnical and Computer Science Conference, which is the premium such professional conference in Slovenia
- The 50 years anniversary of the IEEE Slovenia section celebration
- The founding of a new Biometrics Council Chapter
- MELECON 2022 student competition for the best paper nomination: "Optimization of cold rolling process recipes based on historical data" has been selected as one of the best five papers in the first part of the IEEE R8 Student Paper Contest – SPC 2022
- Conference organization: 30<sup>th</sup> IEEE International Electrotechnical and Computer Science Conference, IEEE PES EEM22, IEEE Slovenia GRSS, CIS, SB MB, and WiE: CEEPUS Summer School on Remote Sensing and Computer Intelligence
- 25th Seminar on Optical Communications technical conference
- Invited lecture: Applications of 5G and 6G Mobile Networks, IEEE Fellow prof. dr. Min Chen
- WIE science/engineering promotion: International Women's Day in Science
- IEEEXtreme 15.0 competition, for the first time in Slovenia, achieved 25th place in R8 and 81th place worldwide
- Onsite IEEE Slovenia Section assembly (with keynote, award ceremony and discussion on future IEEE SI activities)



#### Planned activities

Highlight some of the future activities and initiatives in your Section.

In 2022 we plan to further strengthen the academia and industry cooperation, as well as promotion of IEEE, science and engineering to students and younger colleagues.

We plan the following activities:

- The organization of the 31th IEEE International Electrotechnical and Computer Science Conference
- On-site IEEE assembly technical/professional event organization
- Organization of workshops, invited lectures and promotion events

We are especially proud of the forthcoming 31th IEEE International Electrotechnical and Computer Science Conference (https://erk.fe.uni-lj.si/erk22.html), which is the premier conference in Slovenia for the field. This year the conference will be additionally enriched by the accompanying events, such as distinguished keynotes, industry panels, student paper competition and practical workshops. The cooperation between IEEE, Academia and the Industry is further strengthened by our invited lecturers and guests from the industry, as well as the cooperation between the IEEE and ACM.

We are especially proud of the following ERK 2022 activities:

- Keynote: Battery Monitoring and Energy Management (industry: Robotina d.o.o.)
- Keynote: Using the Red Pitaya STEMlab Board in Education: Practical Experience and Use-Cases (academia: Budapest University of Technology and Economics, Hungary)
- Panel: The Benefit of the Profession for a Digital Society (ACM and IEEE)
- Panel: The future and development of artificial intelligence in Slovenia
- Workshop: On supercomputers and HPC
- Student paper competition (IEEE SB)

# How Region 8 can be of help to your Section, members, and activities

List any challenges you Section is facing and what support is required from the Region 8. Please, also, give us your suggestions for agenda items that you want to be discussed during the R8 Committee meeting.

The Covid-19 crisis effects are still felt, as most activities transformed form person-person to online medium. At the time, this was the only way to organize events. As the situation calms and conditions allows, we strongly wish to re-establish onsite and in-person communication as well as technical, professional and promotion events organization. The R8 can extend support by initiatives, such as distinguished lecturer programme, connection to other academic and industry partners and other promotional support activities.

# Any other issues of interest