Report Region 8 Meeting 2022 October

R8 Professional and Educational Activities

According to R8 Operations Manual (OpMan) the mission of the Professional and Education Subcommittee is to develop non-technical skills programs (such as "Leadership Skills Training" or "Project Management") in order to provide additional value to members, in particular to young engineers and students. To coordinate educational activities programs in Region 8 including pre-university education, university-level education, post-university (continuing) education and the promotion of public awareness of engineering, technology and other topics within IEEE's Field of Interest.

The committee members are the following 2022.

Media and Promotional material

To make all the PEASc's program's logos and promotional material easily and centrally accessible, we created a dedicated section of our website section.

This now makes it possible to find all the official and high-resolution logos of our programs before creating any content. Thus, this avoids the use of incorrect or bad-quality resources while making promotional or any other kind of event support materials.

The logos and respective guidelines are available [here](#).

Local Language Program

As part of the Local Language program, we proposed an Ambassadors program. A general logo was created, which was adapted to each one of the supported (or so far planned) languages. Those will be used in the program's events—the initiatives to be taken by the nominated ambassadors.

Further information, nomination/volunteer for the Ambassadors program, and guidelines can be found [here](#). The ambassadors will be selected after the 15th of October 2022.
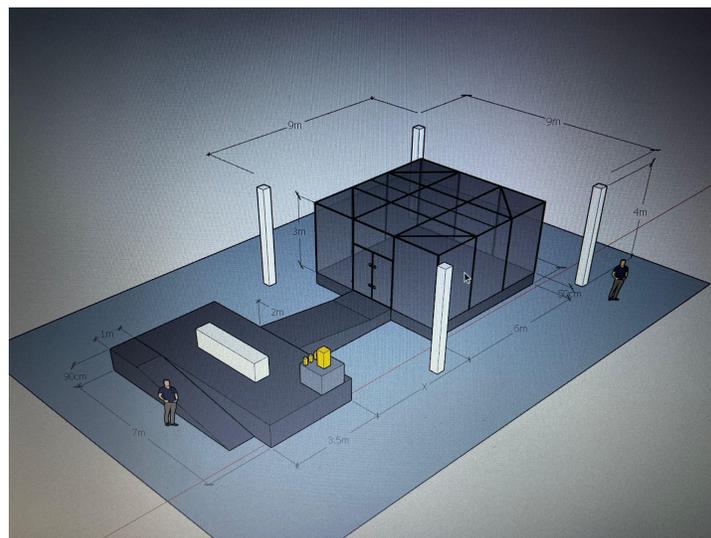

Over 16 applications from different parts of the region have already applied.

IEEE R8 Robot Championship 2022

The event will happen in Malta in Autumn 2022 over 1 and half days on the 3rd and 5th December 2022. The event will be held at MonteKristo Estate. The main competitions will be held on the second day. Applications were available on April 1st 2022 till June 28th 2022 end of day CET time. Student branches are supporting some of the teams of three to apply and compete in Malta in 4 games. More information will be available here: www.ieeemalta.org/robotchampionship. An arean is being constructed according to our design for the planned games. This ie being done on colloboration with cassar marine shipyards.

Sketchup Design of proposed arena

Key points about the championship.

- Malta 3rd and 4th December
- Streaming Live
- 6m by 6m arena
- 20kg max weight of robot at anytime
- 80cm by 80cm max size
- Three (3) members (plus one mentor)
- Member of Student branch
- Or Past students having finished their studies in the previous scholastic year
- One and a half day of competitions

There are 40 participants, 13 teams from 7 countries that have applied. Currently we are helping them obtain their visas. Four judges have been appointed for the robot championship event. These are Filippo Sanfilippo , Sohaib Qamar Sheikh, Lawrence Chetcuti , Daniel Camilleri.

There are four awards related to various areas apart from the main 4 games which will be awarded 8 other categories given to the competitors.

There are the awards

- STEM Award 3 Categories (Through the IEEE R8 PEA STEM Robot Championship program)
- Entrepreneurship Award– Best Business Plan Best in this category
- Team Work – Best in this category (On the days of the championship)
- Best Looking Robot and branding – Voted online and judges. Two Awards

These are the awards related to the games held on the 3rd and 4th December. Regulations are available on our website.

•Most effective Add on

•Best Tactics

•Best Design

•Best Challenger

•Best Pushing Power

•Best Maneuverability

•**2nd Runner Up**

•**Overall Winner**

A Google form was created to allow students to apply for the championship (until 28th June 2022, as stated above). This form is publicly available at https://forms.gle/C3mU7n4rK4bH2mK19 and will be announced in the coming days.

Negotiations have been taking place regarding the venue of the physical event in Malta.

The design and conception of the arena for the championship have also been worked on and are reaching the final stages in the coming weeks.

Finally, the regulations and documentation for the championship have been updated. This document includes all the requirements, obligations, and rights of each team of roboteers. It also features instructions on how the championship will be done, including the selection process and elimination of teams. Four games are also introduced and described in this document to allow a clear definition of the rules and full transparency on what is and what is not permitted during each one of them.

During the event **large spaces** have been allocated around the areas where different local **STEM exhibits** will set up areas that will allow attendees to interact with various fun and modern ways related to STEM and **robotics education**. A number of **talks** are planned where various IEEE members have been invited to join this event. Attendees will have the opportunity to learn about IEEE and various initiatives we offer both in person and online in the area of specialisation. A program is currently being planned and will be available on our app which will be currently designed.

A number of **STEM activitie**s will be organised by robot team members. In Malta we are also creating awareness locally that the event will be held in Malta and attract the public to attend the event live. There are limited places and those who cannot attend can enjoy following the competition online and through the mobile app that will be available at the end of September.

Workshops and Information Sessions

6 workshops and a number of information sessions have been organised related to the robot champions. Click here to know about our speakers. These workshops are available online on PEAsC facebook page.

Workshop 1 - An introduction to building a functional and enduring robot for the IEEE R8 Robot Championship. - Dr Ing. Marvin Bugeja

Workshop 2 - Workshop on budgeting for the IEEE R8 Robot Championship. Gaining support from industry. Rawan El Jamal

Workshop 3 - Start with a good brand - Vildana Hrnjic

Workshop 4 - Workshop on how to prepare a STEM activities for Robot Championship - Dr Conrad Attard

Workshop 5 - Managing Teams - Leading with impact - (part of the distinguish speak program) Sohaib Sheikh

Workshop 6 - Rule and Regulations IEEE R8 Robot CHampionship.

Two information sessions were held for the Tunis student branch and one organised by SAC for student organisations.

IEEE R8 SAC organized an information session about the IEEE R8 ROBOT CHAMPIONSHIP 2022, which focused on presenting the main ideas behind this competition. Guests speakers were Conrad Attard and Lawrence L. Chetcuti The session focused ont planning, rules, scripts, and other information, held on Saturday May 21 at 6.00 pm (CET) on the IEEE R8 SAC YouTube channel 👉 https://youtube.com/channel/UCNefoZG97LMxU5lKYcoEUVQ

IEEE Student and Young Professional Congress congress 2022 Tunis.

Getting to know more about the IEEE R8 Robot Championship at the IEEE Student and Young Professional Congress congress 2022 Tunis. Keynote at IEEE SYP congress Tunis Where can STEM take your career delivered by Conrad Attard Chair of IEEE R 8 PEAsC

We set up a boot at the SYP IEEE Student and Young Professional Congress congress 2022 Tunis.

PEAsC collaborated with Entrepreneurship committee where we were one of the judges for Pitch day 5 startups at the IEEE Student and Young Professional Congress congress 2022 Tunis

IEEE R8 Robot Championship 2022 STEM program

After being accepted in the Robot Championship 2022, using the Google form stated in the previous point, each team of roboteers needs to apply for at least two STEM activities. These two activities must be performed before the physical event in Malta and promote STEM in the student and non-student community.

The program's introduction, registration form, awards description, and funding opportunities are available here.

IEEE R8 Robot Championship 2022 Online Workshop in preparation for the championships.

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Accelerator Contest 2022 report

This will be updated during the Region 8 meeting held in Egypt. Currently we are processing the applications and we will be announcing the winners later on in October. The dates have extended due to various requests.

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Speaker program

We have organised twp events, one will be held SYP Invitation by the Tunis section and second one with the Malta Section. Another one is planned forUganda section .

Session Report - IEEE Region 8 PEASC Distinguished Speaker program

Session Title: Smart Buildings – Forging the foundations of Smart Cities
Session Type: Keynote
Date: 04 Aug 2022
Event: IEEE Region 8 Student and Young Professional Congress
Location: Tunis, Tunisia

Event Overview:

The IEEE R8 Student and Young Professional Congress is the largest event in all Region 8. It occurs every two years and gathers both students and young professionals members from all Sections in this Region. SYP's main goal is to enhance and foster the engineering sense and capabilities through different activities both technically and culturally. It also provides an opportunity to network.

![PEA IEEE Region 8 Professional and Educational Activities logo]

Session Abstract:

Digital transformation and the utilization of technology is increasingly at the forefront of the construction and commercial real estate industry to help resolve some of the most pressing issues facing the built environment and our cities. This session provides an overview of a structured approach encompassing foundational technology infrastructure, data usage and outcome based techniques which are helping buildings optimize energy usage and improve user experience, and helping cities become more self-sufficient.

Session Details:

The session was attended by 35 students and young professionals, and comprised of a keynote lecture followed by a team-based challenge where teams were tasked to develop a high level technical architecture for footfall monitoring and measurement in cities to improve services to the public.

PEAsC Distinguished Speaker PROF. SAURABH SINHA TO PRESENT DURING THE UPCOMING IEEE

UGANDA SECTION RESEARCH METHODOLOGY AND DATA ANALYTICS SYMPOSIUM
By the IEEE Uganda Section, scheduled to take place from 14th - 15th October, 2022 at ISBAT University Kampala aimed at Engineering and ICT Students, Young Professionals from Universities, Industries and Government Organizations who will get acquainted with the basics of research methodology, statistical techniques in data analysis, procedures for writing research reports, and research paper publication.

Entrepreneurship week and pitch competition

- Entrepreneurship week:
    - We had ~80 submissions from 22 countries for ambassadors
    - So far, ~40 submitted the event form from 14 countries
    - We are reaching out to the ambassadors from remaining countries to check if they need support
    - Deadline for event form is september 15 and event should take place between October and December
- Update on pitch competition awards
    - We hosted a workshop on pitching best practices with Founders Institute
    - Pitch competition went great, we had judges from IEEE, Founder Institute, Cisco, Meta, OxFam, RedStart Tunisia Accelerator
    - The first place winner was Greeners from Palestine, received 800 USD
    - Runner up was team FeelMe from Greece, received 500 USD
    - Team FeelMe and EFert (from UAE) received scholarships for pre-incubation program from Founders Institute
    - Team LangSmart from Palestine received consultancy support from RedStart Tunisia

Education Conferences supported by PEASC

German Education Conference (GeCon 2022)

The current proceedings resulted from 28 contributions to the German Education Conference (GeCon 2022). At GeCon 2022, researchers presented their most updated work related to teaching concepts in online teaching, new teaching methodologies, evaluation tools, and new approaches at technical universities. Presenters updated recent research and practices, aiming to support our daily work in classrooms along topics like trends in education, analysis, and

discussion on the impact of teaching methodologies, remote labs design, online tools for grading and teaching, and contributions in the fields of Education 4.0, K-12, among others.

The conference also organized networking sessions with the German community and a round table discussing online teaching strategies. We also had the opportunity to invite very informative keynote sessions related to critical topics for German researchers: Gamification strategies and Online Teaching tools. We want to thank all the authors, participants, reviewers, and our sponsors, Inpixon and PEA IEEE Region 8, for making this event valuable to all the participants.

IEEE Turkey Section The Undergraduate Academic Conference

IEEE TUAC is an academic conference, which aims to encourage undergraduate students in engineering and natural sciences to document their projects in the form of an academic paper and obtain exceptional learning experience as well as career building opportunities. THis was held on July 2nd and 3rd , 2022. You can know more about this conference here https://tuac.ieee.org.tr/

Education Conference region 9.

We participated by delivering a keynote and sharing our particates and programs at Region 8. We encourage collaboration and learn from other Regions on education and professional development through our committee programs and initiatives.

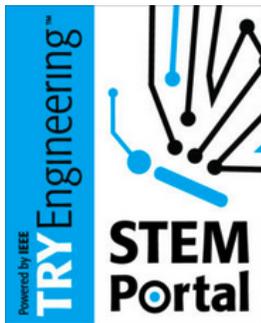**Dakhla International Education Forum**

Dakhla International Education Forum will happen at Morocco in the first week of november 31st till 6th November. More information can be found here. https://www.dakhla-ief.org/. We are inviting all educational officers and those that contribute to the IEEE Education to attend some of the sessions organised by PEAsC for this forum online.

Other initiatives related to PEAsC organised by EAB committees.

There are various programs that PEAsC supports

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STEM Grants

TryEngineering.org launched a new IEEE Pre-University Volunteer STEM Portal in January 2021 to support IEEE volunteers in their STEM outreach initiatives, as well as build local STEM communities. To further support volunteer efforts, IEEE STEM Outreach Grants were offered in 2021 for the first time with 18 programs awarded totaling $35,500, with a good number of recipients from R8 (See the complete list of all our 2021 IEEE Pre-University STEM Portal Grant Recipients).

Grant recipients were announced on 31 March 2022. Funding awarded was disseminated in April 2022 to the grant recipient's Section.

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2022 IEEE STEM Ambassador Program Application Now Available

As you may recall, the IEEE STEM Ambassador Program was launched in June 2021 to recognize IEEE volunteers who are conducting STEM outreach programs for pre-university students and teachers in their local community on behalf of IEEE and to build a community of IEEE STEM outreach volunteers.

All active IEEE Members where invited to submit an application by 4 April, 2022 to be considered as an IEEE STEM Ambassador. Applications will be reviewed in mid-April and selections will be announced on or before 15 April 2022.

What are the Benefits of Being Selected as an Ambassador?

- Recognition for your contributions to pre-university STEM education
- Opportunity to be involved in a community of IEEE STEM outreach volunteers
- Funding opportunities
- Opportunity to build Region and Section awareness of your work
- Ability to support IEEE pre-university education by sharing your event and event results
- Access to Ambassador-specific education resources
- Submit an application no later than 4 April, 2022
- For detailed information: IEEE STEM Ambassador Program
- Questions? Contact Lynn Bowlby (l.bowlby@ieee.org)

The following are **Region 8 STEM Champions 2022**

STEM Champion Name	Email	Section	Country
Adeyemi Abel Ajibesin	ajibesin@ieee.org	Nigeria	Nigeria
Dan Ahimbisibwe	heartdan66@gmail.com	Uganda	Uganda
Francisco Bellas	francisco.bellas@udc.es	Spain	Spain
Rihab Chahed	chahedryhab@gmail.com	Tunisia	Tunisia
Stamatis Dragoumanos	sdragou@gmail.com	Greece	Greece
Chigozie Enemoh	enemohchigozie@ieee.org	Nigeria	Nigeria
Nibel Ben Ezzine	nibelbenezzine@ieee.org	Tunisia	Tunisia
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Emmanuel Innocent	sherlockhudep7@gmail.com	Nigeria	Nigeria
Wael Jaballah	wael.jaballah@gmail.com	Tunisia	Tunisia
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Shabana Urooj	shabanabilal@gmail.com	Saudi Arabia	Saudi Arabia

Well done STEM Champions 2022.

CONRAD ATTARD PHD

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