Empower Through Biochemistry: Celebrating Women in Science

Event Overview

On Saturday, October 26, 2024, the "Empower Through Biochemistry" event was held at the School of Life and Health Sciences, University of Nicosia in Nicosia, Cyprus. This educational initiative aimed to inspire young girls and women to explore biochemistry by showcasing the field's impact and the achievements of female scientists. Designed to encourage women's participation in STEM, the event offered interactive sessions to highlight the importance of biochemistry and provide role models for young women considering a scientific career. Additionally, the project worked to address cultural and societal challenges that women face in STEM through active engagement and outreach in collaboration with local women's groups and educational institutions.

Program Summary

The day commenced at 10:00 a.m. with a registration and welcome session. Graduates in Biochemistry organized "ice-breaker" activites to kick off the event! This was followed by a brief overview of the event and an introduction to the speakers. Following this, the attendees listened to a talk on "The History of Women in Biochemistry," featuring stories of notable figures like Jennifer Doudna and other pioneering women in biochemistry by Dr Myrtani Pieri. At 10:45 a.m., participants were introduced to the main hands-on workshop with a theoretical overview of DNA extraction and electrophoresis by Dr Vicky Nicolaidou, ensuring everyone understood the upcoming activities.

The core practical activity involved extracting DNA from buccal cells and preparing agarose gels for DNA electrophoresis. Attendees worked closely with local female scientists and educators who guided them through each step, explaining both the methods and their significance. This hands-on experience aimed to not only teach foundational biochemistry techniques but also emphasize the critical role of women in scientific discovery.

The event concluded with a networking session where participants could connect with the mentors, followed by a closing summary and feedback session. Overall, the event provided a holistic experience, combining scientific knowledge, practical learning, and community building.

Outcomes and Feedback

Feedback was overwhelmingly positive, with participants expressing that the event was both inspiring and informative. Many attendees, especially younger girls, shared that they now felt more confident considering a career in biochemistry and the sciences. Several participants highlighted the value of meeting real-life role models and seeing the diversity of careers within biochemistry. Post-event surveys indicated increased awareness of the contributions of female scientists and a strong interest in future similar events.

Future Plans

Given the success of this event, plans are underway to make "Empower Through Biochemistry" an annual initiative. Future sessions will aim to expand outreach efforts to involve more schools and community centers, with particular focus on underserved areas. Additional collaborations with universities and industry partners will help provide more specialized workshops, such as

gene editing and biotechnological applications, to sustain engagement and inspire the next generation of female biochemists.

Photos documenting the event and participants in action are included with this report. We have secured all necessary permissions for their use, as requested.

We thank the Biochemical Society for their support in making this initiative possible and look forward to sharing further successes as we work to empower future scientists.

Attachments: Event photos with permissions