# Committee on Energy (CE)



As energy engineers and scientists, we are responsible for identifying and implementing the most effective technologies for sustainable development. The strength of an international organization like WFEO lies in its global reach, providing access to a rich network of concrete experiences and innovations from around the world.

As Chair of the Committee on Energy of WFEO, I strongly believe that international cooperation and knowledge sharing —including best practices, effective energy policies, and technological innovations— are essential to achieving SDG 7 and SDG 13. This principle guides all our work within the Committee on Energy.

Marie-Line Vaiani, Chair of CE, Ingénieurs et Scientifiques de France

#### Main Themes covered in the past two years:

- Strengthening international cooperation on energy transition
- Relaunch of Task Groups on different energy thematics
- High-level participation in global conferences and forums (UNFCCC COP, World Energy Congress, UNIDO, Global Engineering Conference, World Engineering Day, EAGE)
- Launch of international webinar series on energy transition to increase knowledge sharing and outreach
- Promoting women's participation and engaging young in energy initiatives

#### 1. Relaunch of Task Groups

- The Committee relaunched thematic Task Groups to reinforce expertise and structure contributions:
- Electrification Task Group, chaired by Prof. Abubakar Sambo (Nigeria)
- Solar Task Group, chaired by Dr. Carsten Ahrens (Germany)
- Energy Efficiency Task Group, chaired by Dr. Ruomei Li (China)
- Hydrogen Task Group, chaired by Prof. Massimiliano Cappelazzi (Switzerland)
- Storage Task Group, chaired by Eng. Philipp Pascal (United-Kingdom)

These Task Groups now provide a structured framework for advancing the Committee's mission.



Participation at the UN Council of Engineers for the Energy Transition meetings during the COP 29 in Baku, 15 November 2024





Best engineering solutions for universal access and system resilience, advanced through Task Groups, webinars, participation in World Energy Council, GECO, World Engineering Day.



Participation at COP28 and COP29 with the WFEO Climate Change Committee, and contributions to the UNIDO Global Green Industrialization Dialogue.

#### 2. Key international high level events and partnerships

The Committee participated in major international gatherings:

#### UNFCC COP

COP28 (Dubai, UAE) and COP29 (Baku, Azerbaijan, 2024): WFEO Energy, together with the WFEO Climate Change Committee, co-organized an official UNFCCC side event with international partners including ICE (UK), IEEE (USA), and EIC (Canada). The events highlighted engineering solutions for sustainable energy and climate action

World Energy Congress 2024 (Rotterdam, The Netherlands): WFEO was invited to participate in this flagship event of the World Energy Council, strengthening its presence in global energy dialogues.

- World Engineering Day
- In 2024 (Lisbon), the Chair of the Committee Marie-Line Vaiani delivered a keynote titled "The Reinforcement of the Energy Interconnections and the Optimization of the Energy Markets in Europe".
- In 2025 (UNESCO Headquarters, Paris), Marie-Line Vaiani participated in a high-level panel on "Energy, Infrastructure and Effective Solutions to Implement Sustainable Development", alongside IEEE (USA), the China Institute of Building Standard Design and Research, and the Oyo Center of Excellence for Renewable Energy (Congo).
- UNIDO forums (Vienna, 2024 and 2025)
  Chair Marie-Line Vaiani represented WFEO at the UNIDO Industrial Development Board in 2024. In 2025, she was also invited to participate to the Global Green Industrialization Dialogue, supporting the Global Green Industrialization Pact structured around finance, innovation, people, and clean technology supply chains.



Participation of Marie-Line Vaiani at the 52nd UNIDO Board meeting, Vienna, 25 November 2024

- Global Engineering Conference 2024 (Kigali, Rwanda) Marie-Line Vaiani represented WFEO Committee on Energy and participated in a roundtable on SDG 7, during this global forum on engineering innovations for sustainability.
- EAGE Annual Conference 2025 (Toulouse, France)
  Marie-Line Vaiani participated in this international forum of the
  European Association of Geoscientists and Engineers, contributing
  to discussions on energy transition, geosciences, and engineering
  synergies.



Marie-Line Vaiani speaking at the World Engineering Day main event in Paris, 4 March 2025

## 3. Connecting International expertise and sharing knowledge through webinar series

- "Electricity Access Gaps and Policy Recommendations" With Prof. Abubakar Sambo (Nigeria), President of the Nigerian Academy of Science and Chair of the Electrification Task Group.
- "Why Nuclear Power is Making a Comeback" With Dr. Henri Paillere (France), Head of Planning and Economic Studies at the International Atomic Energy Agency (IAEA).
- "PV Module Recycling as a Necessity for Future PV Development"

Featuring experts from academia, industry, and public services, including Dr. Carsten Ahrens (Germany), Prof. Yogi Goswami (USA), Adrian Piani (Australia), and Ismail Jefferies (South Africa).

These webinars were widely open to members of the World Energy Council , the UN-Council of Engineers for the Energy Transition (CEET), UN agencies, and the WFEO community, fostering broad international participation.

### Key achievements

The Committee on Energy relaunched thematic Task Groups and organized international webinars, strengthening global cooperation through active participation in high-level international events such as COP, World Energy Congress, UNIDO forums, World Engineering Day, Global Engineering Conference and EAGE 2025. The Committee also promoted gender equality by increasing the participation of women within it.



In addition, members of the WFEO Energy Committee were also invited to participate in the webinar series organized by UN-CEET, reinforcing collaboration and knowledge sharing.

#### 4. Promotion of women in science and engineering

In February 2024, Chair Marie-Line Vaiani participated in UNESCO's Call to Action for Women in Science, which was then relayed to Energy Committee members to raise awareness and encourage engagement.

The Committee also advanced gender equality by collaborating with WFEO Women in Engineering Committee to increase the participation of women in the Energy Committee's Task Groups. These actions are in line with WFEO's commitment to promote women's role in science and engineering (SDG 5).

#### 5. Engagement with Young Professionals and Students

The Energy Committee has strengthened its engagement with young people, who play a pivotal role in advancing the energy transition:

- The Chair of the Energy Committee and the Executive Director of WFEO welcomed a delegation of young student interns from GIZ. The delegation received a presentation on WFEO, followed by an exchange on the challenges of the energy transition. The meeting concluded with a convivial session and informal discussions with young professionals from the World Energy Council network.
- The Energy Committee also received a presentation of an exemplary initiative led by young members of IESF:: the Student Scientific Convention on Hydrogen. This initiative gathered around fifty young participants over several weeks to produce a collective, high-quality analysis. It highlighted the importance of science and collaborative scientific dialogue as essential tools for informed decision-making.