"Engineering in Women" Moderator: Dr. Biljana Stojkovska National Grid, UK **CIGRE SESSION 2018 Women in Engineering Forum** 30th August 2018, Paris



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Why "Engineering in Women"?

- 1. Women's Network UK
 - Established supporting network offering coaching, mentoring and a space to talk about career challenges
 - Skill building & inspiring others
 - Peer mentoring
 - Exposure to role models and interaction with senior leaders
- 2. Next steps
 - Need a clear vision for overall goals for women engineers
 - How individuals and organizations will work together to achieve the overall goals for women engineers





Panelists

- 1. Amanda Olson, "Be the best of you", Burns & McDonnell, USA
- 2. Louise Preedy, "Advancement and Empowerment of women engineers", OMNETRIC, France
- 3. Tara-lee Macarthur, "Unity & Diversity", ERGON, Australia
- 4. Veronique Beghin & Claire Chevalier, "Challenges & Opportunities for Women in the new paradigm: Perspectives from Belgium", Tractebel & Siemens





"Be the Best of You **Future Challenges of Engineering Organizations**" Amanda Olson **Burns & McDonnell, United States CIGRE SESSION 2018 Women in Engineering Forum** 30th August 2018, Paris



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Challenges in our Industry



Projected capital spend shifting from transmission to communication & advanced analytics

Integration of distributed generation



Aging workforce





Rising to the Challenges

87% 2X 60%

58%/**73**%

95%



Source: https://bit.ly/2LdFYxN

Be the Best You!

"The one who follows the crowd will usually go no further than the crowd" – Author unknown





Agile content generation @CIGRE Advancement and Empowerment of women engineers Louise Preedy OMNETRIC, France CIGRE SESSION 2018 Women in Engineering Forum 30th August 2018, Paris



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Digitalization is changing the game

How we operate and manage our businesses is transforming; likewise, it changes how CIGRE should operate and fulfill its mission

How is that relevant to the empowerment of women in engineering?

Develop differently

• Speed is essential



Collaboration is inclusive
 and virtual



Relevant content areas are

Disseminate differently

 Relevant content areas are expanding





 Audiences consume information differently than before



More agility: an opportunity for CIGRE and for women in engineering



Dynamic development process

- Combination of desk research and subject matter expertise
- Sprint-type development cycles* Scoping; hypothesis definition; chapter creation; QA; publication (4 6 months)
- Promotes diverse co-development (e.g. with corporate members, with academia, with non-engineering resources) to leverage the full range of CIGRE ecosystem
- Outcome is a **Reference Paper** or point of view which tests a hypothesis and shares relevant insights.

Benefits for CIGRE

- Build upon the core foundation of what CIGRE is good at
- Renewable source of industry content for members and the market
- Opportunity to share perspectives with a broader public (e.g. thru media) to raise visibility of CIGRE and industry
- Possibility to extend to topics that are emerging
- Tighter collaboration with corporate members
- Faster time-to-market positions CIGRE as timely and relevant

Diversity and Inclusion Strategy Tara-lee MacArthur Queensland Energy, Australia CIGRE SESSION 2018 Women in Engineering Forum 30th August 2018, Paris



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"I want Energy Queensland to be an organisation where every employee feels valued, respected and has a voice."

- CEO, David Smales at the inaugural meeting of the Energy Queensland Council for Diversity and Inclusion, 2016



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Ergon Energy Graduate Program

2012-2015



CIGRE A2 Krakow, Poland

2017



IEC General Meeting Vladivostok, Russia

2017

Substation Design Standards Engineer

CIGRE AP A2

Advocate for NGN & Women in CIGRE





EA CHAIR CPEng & RPEQ

2017-2018



Graduate Electrical Power Engineer of the Year 2018

ES Cornwall Scholarship Winner

EQL Strategic Goals 2017-2022





Women, Aboriginal and Torres Strait Islander peoples, people from non-English speaking backgrounds are under-represented in Energy Queensland in comparison with our communities.



Important factors to consider in achieving gender diversity



An opportunity for everyone



Women in Non-Traditional Roles - Working Group

Contribute to the research, recommendations and delivery of the diversity and inclusion program of work.



Encourage young members and women to join work groups Opportunity to prepare contributions and to present



- Capturing the number of NGN and Women participating in CIGRE activities
- Remove gendered language in documents

My experience in engineering in Belgium and how **CIGRE** is actively supporting the technical development of women members. What have been the key challenges that I have seen Veronique Beghin, Tractebel, Belgium **CIGRE SESSION 2018 Women in Engineering Forum** 30th August 2018, Paris



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My experience in engineering in Belgium

- 1. My Engineering profession:
 - Role models my parents/family
 - Engineering profession is diverse, interesting and it leads to a varied and challenging career
 - Managers perceive me as an engineer rather than a gender person (female)
 - My moto: I'm who I'm and I've never changed that
 - Respect comes from work





How CIGRE is actively supporting the technical development of women members

- 1. Implication as young engineer early in my career (directly or indirectly) e.g. by participation in a technical brochure (1998)
- First presentation given in Cigre 2004 as the only woman on B1 session
- 3. Redaction of different articles in 2004 and 2014
- 4. Participation to the Belgian Committee Mirror since 2008





What have been the key challenges that I have seen

- 1. Avoiding stereotypes and erase the gender gap. Women can do anything, just the same as men
- 2. Choosing Engineering studies: such profession has a social impact and makes a difference in people's lives" Promotion during secondary education
- **3.** Changing old ideas regarding Engineering: no need to be Hercules or to work in a dirty environment
- 4. Balancing career and family





My first experiences in engineering in Belgium as a young woman engineer: what CIGRE could actively do to support my technical development. Key challenges for my generation Claire Chevalier, Siemens BEL CIGRE SESSION 2018 Women in Engineering Forum 30th August 2018, Paris



Experience as a Sales Engineer in Belgium

- 1. Interesting career opportunities for young engineers in our industry
- 2. "Stereotypes" in different technical environments (technical offices, workshops, construction sites)
- 3. More openness in office situation (engineering or commercial departments) to women
- 4. Don't highlight the differences between genders; accept the differences and use the strengths on all sides





CIGRE's support for technical development

- 1. More **communication** on actions/activities
- 2. Energy/climate change vision in Europe ... help me understand the future
- 3. Organize events, workshops for young engineers focused on critical topics (e.g. digitalization) ... help me integrate
- 4. Regular communication on best practices/achievements of member countries ... help me network





Key Challenges for my generation

- 1. Keep engineering attractive for curious and ambitious people
- 2. Globalization bringing new and other stereotypes
- 3. Climate change
- 4. Energy transition challenges





Summary "Engineering in Women"

- 1. Future engineering problems are different (E.g. around digital) ... need a more diverse approach
- 2. Need the help of Men to unleash the latent Engineering capabilities of Women
- 3. CIGRE to help build the WiE into global network
- 4. CIGRE needs to quickly embrace a new, more diverse, more agile paradigm ... need to engineer more Women into the organisation leadership





Q&A

