KEYNOTE TALK 6

INCORPORATION OF SDGS INTO ENGINEERING EDUCATION IN BANGLADESH

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ABSTRACT

The United Nations in its 2015 general assembly adopted an outcome document for the adoption of its post-2015 development agenda. This document provided a plan of action with 17 sustainable development goals (SDGs) and 169 targets aimed to end poverty and hunger, protect the planet from degradation, and to ensure that human beings are able to enjoy a prosperous and fulfilling life and that economic, social and technological progress is achieved in harmony with nature. Bangladesh in one of the 193 countries adopting and implementing SDGs since 2016. Bangladesh is currently ranked 104th in the SDG index rank with an overall score of 64.2. The recent progress report showed that Bangladesh is on track to achieve SDG achievement in four goals, while various levels of challenges remain in the rest. The contributions of engineering professionals are crucial to ensure for the advancement of each of the goals in a developing economy with limited resources, e.g., Bangladesh. The Country needs engineers with skills, able to contribute in each of the 17 goals, in sufficient numbers. One way of upskilling of the practicing engineers is through continuous professional development. However, it has become imperative that the engineering education can provide engineering competencies required for solving multidisciplinary complex problems contributing to sustainable development. This presentation focuses on an overview of how engineering professional can contribute to each SDGs and how the engineering programs can incorporate SDGs in their curriculum and teaching-learning process.

Kazi Bayzid Kabir is a Professor of Chemical Engineering at Bangladesh University of Engineering and Technology. Dr. Kabir completed his PhD from Monash University in 2014. Before that, he completed his MSc in Chemical Engineering in 2009 and BSc in Chemical Engineering in 2004 from BUET. Dr. Kabir has been involved in energy research with emphasis on solid fuel conversion (pyrolysis and gasification), syngas conversion to liquid and gaseous fuels via heterogeneous catalysis, waste-to-energy through hydrothermal treatment, and life-cycle assessment and techno-economic assessment of energy conversion processes. Apart from teaching and research, Dr. Kabir also has keen interest in academic quality assurance. He is currently the Additional Director of BUET's Institutional Quality Assurance Cell and works closely with the Strategic Planning and Quality Assurance Division of UGC. Dr. Kabir is also the Member Secretary of the Board of Accreditation for Engineering and Technical Education since March 2021.

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