



The 20th SEFI Mathematics Working Group Seminar on Mathematics in Engineering Education

15 - 17 June 2020 in Kristiansand, Norway.

The [SEFI \(European Society for Engineering Education\) Mathematics Working Group \(MWG\)](#) was established in 1982. Its aims include providing a forum for the exchange of views and ideas amongst those interested in engineering mathematics, and promoting a broader understanding of the role of mathematics in the engineering curriculum, and its relevance to industrial needs. The Working Group issued the third edition of its [curriculum document](#) ("A Framework for Mathematics Curricula in Engineering Education") in September 2013. This edition is based on mathematical competencies in didactical research with emphasis on practise roles of researchers and practitioners and ideas for cooperation. How to assess competencies and the major aim of teaching mathematics as a tool to future engineers will also be discussed topics.

In summer 2020, the 20th SEFI MWG seminar will be organised by the [University of Agder](#) - Kristiansand, Norway. The main topics of the seminar will be the following ones:

Mathematical competencies in practice and didactical research

- Practise roles of researchers and practitioners and ideas for cooperation.
- Case studies as good examples.
- Situations from practical experience.
- New ideas.
- Theoretical basis and assumptions for competencies development.

How to assess competencies

- Good examples.
- Situations from practical experience.
- New ideas.

The goal of teaching

- "Service mathematics - mathematics for the non-specialist".
- In the education of future engineers: symbolic language of their discipline.
- General toolbox for solving application problems, or modelling instrument.

Other contributions related to the mathematical education of engineers are also welcome.
Note: Abstract submission deadline is extended to 31st January 2020.

Keynote speakers include:

- **Simon Goodchild**, MatRIC - University of Agder, Norway
- **Michael Rygaard Hansen**, University of Agder, Norway
- **Marco Bramanti**, University of Milano

Inspirational Keynote: “Visualizing Mathematical Spaces”

- **Roger Antonsen**, University of Oslo, Norway

