Teaching Mathematics with Technology

A course for teachers and teacher educators on the use of Geogebra for mathematics teaching and learning

Teaching Mathematics with Technology (TMT) course introduces mathematics teachers to the use of Geogebra, a Free and Open Source (FOSS) graphic software application, to create interactive lessons, student self-learning materials as well as other teaching resources.The use of ICT in Mathematics teaching has taken on a new urgency due to the global pandemic, as restrictions on physical contact have seen many schools adapt online and other forms of distance education. To ensure equitable access to meaningful learning during and beyond this period, it is critical for teachers to improve their skills in using various digital tools to develop resources that promote learner-centred pedagogy.

Learning Outcomes

After completing the course, you will be able to:
- Appreciate the role of ICT in educational processes
- Use Geogebra for creating mathematics resources
- Access and contribute to Open Educational Repositories of Geogebra
- Develop new teaching-learning practices using Geogebra

Course details

Week 1 : Introduction, Overview of ICT tools and Open Educational Resources

Week 2 : Introduction to Geogebra

Week 3 : Using Geogebra for logical reasoning and problem solving

Week 4 : Using Geogebra in teaching-learning

Course methodology

Demonstration by faculty through course webinars, videos, tutorials and readings and discussions with peers and course mentors

Level: Intermediate
Cost: Free
Duration: 4 weeks
Effort: 8 – 10 hours per week
Language: English
Requirements: Functional working knowledge of computers and internet use
Target audience: Mathematics teachers for grades 6-10, teacher educators and teachers teaching technical subjects which involve Mathematics

Know your faculty

Lead facilitator:
Sriranjani Ranganathan
Co-facilitator:
Gurumurthy Kasinathan
Technical support:
Yogesh KS
Faculty are from IT for Change (https://itforchange.net)

Enrolment

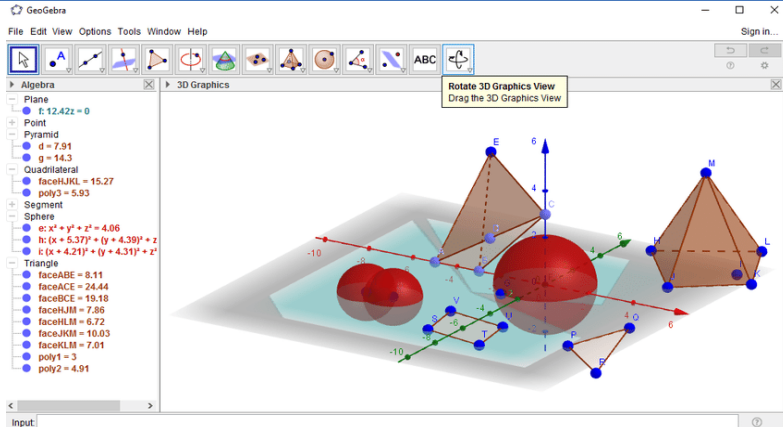Registration is now open. Please click here to enrol - https://www.mooc4dev.org/TMT

Certificate of Completion will be awarded on fulfilment of all the course requirements

For more information
Visit the course home page at:
https://www.mooc4dev.org/TMT
Email: tmt@colfinder.org
Visit us at: www.col.org/teachereducation

Recommended short course: Understanding Open Educational Resources (OER) - https://learnoer.col.org/

This is a self-paced 3-hour course suggested as a prerequisite for those registered for the Teaching Mathematics with Technology (TMT) course. If you wish to know more about OER, then you can take this short course at your own time before the start of the TMT course. A certificate is issued once you complete the OER course.