



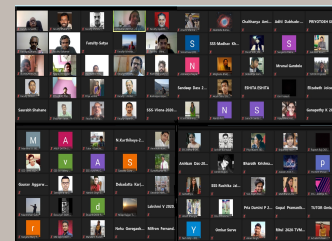
# Online Foundation Course in Mathematics

## OFCM2023 : An MTTs Online Training Programme

[Organized under the aegis of MTTs Trust]

20th August – 02 September, 2023

Funded by the National Board for Higher Mathematics



### THE PROGRAMME

**MTTS:** The Mathematics Training and Talent Search (MTTS) programme is one of the most popular and significant training programmes in India. This programme has been running since 1993 and has made an impressive impact on mathematical scene in the country. All programmes since 2018 are being organized by the MTTs Trust.

**OFCM:** The Online Foundation Course in Mathematics (OFCM) is an initiative of the MTTs Trust. The annual programme, being conducted since 2020, consists of six online regional camps on mathematical foundations, with second year undergraduate students in mathematics as participants. About five hundred students, drawn from among those who have just completed the second semester of their undergraduate education from different parts of the country, are trained following the interactive MTTs methodology through these camps.

**OFCM2023:** There will be six simultaneous regional camps each admitting about 80 participants. The programme will be organized online on the Zoom platform and will be supported by class communications through MTTs Classroom (Moodle).

PROGRAMME DIRECTOR: **Prof. S. Kumaresan**, Hyderabad

### THE FOUNDATION COURSE

This is a unique course taught in MTTs programmes to initiate the students to some fundamental concepts in mathematics.

After attending a two-week Foundation course in the MTTs summer camps, most participants have observed improved logical and analytical thinking, problem solving abilities, and experienced a change in their attitude. They also acquire a high level of confidence for self-study to undertake advanced courses in mathematics.

The objective of the OFCM regional camps is to transfer the positive changes that the Foundation course brings to MTTs participants, to many more students across the country. The aim is to expose more bright young minds to the excitement of doing mathematics, promoting independent mathematical thinking, and preparing them for more advanced material.

### ACADEMIC PLAN

This will be a short course with *Logic, Sets, Functions and Equivalence relations* as components. The content is based on the book *A Foundation Course in Mathematics* by Ajit Kumar, S. Kumaresan and B. K. Sarma.

In each camp, there will be twelve sessions, starting on Sunday, 20th August, 2023, and ending on Saturday, 2nd September, 2023. There will be one session each day, with breaks on Thursday, 24th August, and Tuesday, 29th August. All sessions will start at 5:00 p.m., so that the regular college schedule of the participants is not affected. Each session will consist of an interactive lecture (75 minutes) followed by a group discussion (45 minutes).

The faculty members will be active mathematicians from various leading institutions with a commitment to teaching. The aim of the instruction is not to give routine lectures but to stimulate the participants to think and discover mathematical ideas and results.

The faculty will be ably supported by a team of experienced mentors in each camp. These mentors are alumni of MTTs, or are experienced teachers and researchers, who will help the students during group discussion sessions.

### SELECTION

The selection will be on merit, based on consistent, and good academic records, and recommendations submitted by the teachers. *It is the applicant's responsibility to ensure that the teacher submits her/his recommendation in time.*

The list of selected candidates will be posted on the MTTs website along with further instructions and guidelines. Only selected candidates will be informed of their selection by email.

### ELIGIBILITY AND APPLICATION PROCEDURE

**ELIGIBILITY:** Undergraduate students, who have just completed their 1st year (or 2 semesters), or are currently in their 2nd year (or 3rd semester) of their B.Sc./B.A./Integrated M.Sc. programme, with Mathematics as one of their main subjects.

**APPLICATION PROCEDURE (ONLINE):** Please visit the programme webpage <https://mtts.org.in/programme/ofcm2023> to see the link to the application system.

- The applicant must give the details of a teacher in her/his application who will be ready to submit recommendations for the applicant.
- After submitting the application, the student must inform the teacher mentioned in the application, and ensure that the teacher submits her/his recommendation within the deadline by filling the online recommendation form. **Note:** *The link to submit the online recommendation will be sent to the email address of the teacher from the online application system.*

In case of any queries, or difficulty, please see the FAQ on the programme webpage. If the issue is still not resolved, please write to [foundations.mttts@gmail.com](mailto:foundations.mttts@gmail.com).

### IMPORTANT DATES

- Online application: Opens on **Friday, 23rd June, 2023**  
Closes on **Wednesday, 2nd Aug. 2023.**
- Last date for receiving online recommendation from teachers: **Friday, 4th Aug. 2023**
- Publishing of the list of selected students on the MTTs Website: **Wednesday, 9th Aug. 2023**
- Confirmation / Registration by the selected applicants: on or before **Wednesday, 16th Aug. 2023.**
- Preparatory meeting & Inauguration: **Saturday, 19th Aug. 2023.**
- Programme dates: **Sunday 20th August – Saturday, 2nd September, 2023.**

### ABOUT MTTs TRUST

The MTTs Trust is a non-profit educational trust primarily engaged in organizing all activities under the MTTs umbrella. If you wish to organize an MTTs programme or contribute to MTTs in any way (financial or otherwise), please get in touch with us by writing to [mttstrust@gmail.com](mailto:mttstrust@gmail.com).  
Website: <https://mtts.org.in/mtts-trust>

