



Foundation Course in Mathematics

MTTS Online Training Programme

[Organized under the aegis of MTTT Trust]

October 4th-24th, 2020

Funded by NBHM

MTTS

Improving myself.

THE PROGRAMME

The MTTT Trust brings to you six online regional camps on mathematical foundations for second year undergraduate students in Mathematics. About five hundred students are expected to be trained following the interactive MTTT methodology through these camps on online platforms.

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. Due to the unprecedented situation created by the pandemic, the MTTT Trust has added a new dimension by conducting its programmes in an online platform since May 2020. In spite of some initial apprehensions, these programmes were held successfully without compromising the methodology and interactive nature of MTTT. The success of this venture is evident from the student's efforts and feedback. The decision of MTTT Trust to organize more online camps is encouraged by this experience.

BACKGROUND

"Foundation" is a unique course taught in MTTT Programmes to initiate the students to some fundamental topics of Mathematics.

After attending a 2-week course on Foundations in the MTTT/mini-MTTT camps, almost all participants so far have experienced a change in their attitude, problem solving abilities and logical and analytical thinking. They also acquire a high level of confidence for self-study to undertake courses in higher mathematics.

The objective of the regional camps is to transfer the positive changes that the Foundation course brings to MTTT participants, to many more students across the country.

ELIGIBILITY AND APPLICATION PROCEDURE

ELIGIBILITY: Second year undergraduate students, who have completed one year (two semesters) of their B.Sc./B.A. programme, with Mathematics as one of their main subjects.

APPLICATION PROCEDURE:

- Apply online using the form available on the website for the regional camps: <https://mtts.org.in/programme/ofcm2020/>
- For details, please visit the MTTT website: <http://mtts.org.in/>

Students from all regions and areas, including rural and remote ones, are encouraged to apply. The selection will be on merit, based on consistent good academic records.

SELECTION

The list of selected candidates will be posted on MTTT webpage by **22nd September 2020**. Only selected candidates will be informed of their selection by email.

Other instructions and guidelines will be published on the website for the regional camps:

<https://mtts.org.in/programme/ofcm2020/>

ACADEMIC PLAN

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

There will be six simultaneous regional camps from October 4th to 24th, 2020, each containing about 80 participants. In each camp, there will be four sessions each week, with three on alternate weekdays (Monday-Saturday), and one on Sunday. All sessions, except possibly on Sunday, will be in the afternoon. Each session will consist of a lecture (75 minutes), followed by group discussions (40 minutes).

The aim of the programme is to expose bright young students to the excitement of doing mathematics, to promote independent mathematical thinking and to prepare them for higher aspects of mathematics.

The resource persons in each camp will include three faculty members and fifteen tutors/mentors. The faculty will be active mathematicians with a commitment to teaching and from various leading institutions. The tutors are students and faculty who have had the experience, and understand the spirit, of the MTTT teaching methodology. The aim of the instructions is not to give routine lectures but to stimulate the participants to think and discover mathematical results.

IMPORTANT DATES

- Online application:
Opens from **24th August, 2020** and
Ends on **8th September, 2020**.
- Date of publishing selection list: **22nd September, 2020**.
- Programme dates : **4th – 24th October, 2020**.

ORGANIZING COMMITTEE

- **Programme Director:** Prof. S. Kumaresan, IIT Kanpur
- **Coordinator:** Prof. Bhaba Kumar Sarma, IIT Guwahati
- **Members:**
Dr. Ajit Kumar, ICT, Mumbai
Dr. Ananthnarayan H., IIT Bombay
Dr. A. Chandrashekar, Central University of Tamil Nadu
Prof. Dhiren Kumar Basnet, Tezpur University
Dr. Satyanarayana Reddy, Shiv Nadar University
Dr. P.S. Srinivasan, Bharathidasan University
Dr. D. Sukumar, IIT Hyderabad
Dr. Vishnu Namboothiri K., Dept. of College Education., Govt. of Kerala

ABOUT MTTT TRUST

MTTS-TRUST is a non-profit educational trust. The primary objective of the trust is to organise all activities under the MTTT umbrella and any other training camps as deemed necessary or important for the country to keep its eminence in higher mathematics. If you wish to contribute to MTTT in any way (financial or otherwise), please get in touch with us by writing to mttstrust@gmail.com. For more details on the MTTT Trust, visit www.mtts.org.in/mtts-trust