

विज्ञान एवं प्रौद्योगिकी विभाग
DEPARTMENT OF
SCIENCE & TECHNOLOGY

NATIONAL INSTITUTE OF TECHNOLOGY WARANGAL

Warangal - 506 004, Telangana

Synergistic Training Program Utilizing the Scientific and Technological Infrastructure (STUTI)

Call for Registration and Participation

Training Program on R&D Equipment in collaboration with Mangalore University

Theme: Sophisticated Instruments for Characterization of Materials

Program Dates: 04th – 10th January 2023

Venue: Mangalore University



Register before: 15th Dec 2022



Scan to Register

No Registration Fee

Click to Register: <https://forms.gle/RAfnrz1VeVwkSa2PA>

Objectives of the Program:

To enable the participants to understand the principles, applications, and hands-on experience on sophisticated analytical instruments.

To gain knowledge about the in-depth analysis of the characterization techniques using high-end analytical instruments.

To interact with eminent professors/scientists/ industrial research personnel and discuss real-time research and make collaborations.

To encourage the participants to utilize the facilities and enhance the research temper.

To create a research-friendly atmosphere by letting the creative minds of the country exchange ideas and share their knowledge among their fellow participants.

Eligibility Criteria:

Persons of Indian origin.

Faculty / Scientists / Post-Doc Fellows / Ph.D. Fellows / Industry Persons / M.Sc. students/ MTech. Students who are actively involved in research and development (R&D) in the fields of Chemical Sciences, or any relevant area.

Important Instruction:

Fill in the prescribed bio-data form attached with this brochure and get it endorsed by the head of the institution. And keep the scanned copy ready, which needs to be uploaded during registration.

Organized by

Mangalore University (Spoke)

&

NIT Warangal, Telangana (Hub)

Funded by

DST, Govt of India

About Mangalore University:

Mangalore University (MU) was established in 1980. The main campus called as, 'Mangalagangothri' is located about 20km to the south east of the port city of Mangaluru. The main campus at Mangalagangothri has 27 academic departments offering 40 Masters Programmes and 31 Doctoral Programmes. DST-PURSE lab in the campus houses sophisticated instruments viz., FESEM, Confocal Microscope, Single Crystal XRD, LCMS, GCMS, Amino Acid Analyzer etc. NMR lab is set up under the MHRD-RUSA grant. In addition, MU has also been able to establish several research centres viz., Microtron Centre, CARRT, CARER, OSTC etc. in collaboration with various government agencies.

About NIT Warangal:

National Institute of Technology Warangal, formerly known as Regional Engineering College, was established in 1959. Over the years it has developed into a premier institute of higher learning and is ranked among the top technical education institutions in India. There are 14 Departments offering eight undergraduate, 35 post-graduate programs and guiding 952 PhD scholars besides post-doctoral programs. About 6864 students across the country including international students' study on the campus. It is a fully residential campus spread across 250 acres with excellent infrastructure in the form of state-of-the-art library, seminar halls, guest houses and research laboratories.

STUTI Team:

Patron

Prof. P. Subrahmanya Yadapadithaya,
Vice-Chancellor, Mangalore University.

Prof. Kishore Kumar C. K.,

Registrar, Mangalore University.

Chairman

Prof. N. V. Ramana Rao,

Director, NIT Warangal

Co-Chairman

Prof. Somasekhar V.T.,

Dean (R&C), NIT Warangal

Convener

Prof. Vishalakshi B.

Coordinator, DST-PURSE Instrumentation Centre, Mangalore University

Principal Investigator

Prof. N. Narasaiah,

Dept. of Metallurgy and Material Engineering, NIT Warangal

Coordinators

Prof. Boja Poojary

Deputy Coordinator, DST-PURSE Instrumentation Centre and NMR Lab Faculty in-charge, Mangalore University

Dr. T K Sai,

Principal Scientific Officer, CRIF, NITW & Co-PI, STUTI

Program Coordinators

Dr. Murari M. S.,

Scientific Officer - II, DST-PURSE Instrumentation Centre, MU

Dr. Mahesh K. K.,

Scientific Officer - II, DST-PURSE Instrumentation Centre, MU

Sri D. Ravikumar

Technical Officer, CRIF, NIT Warangal

Note:

The shortlisted candidates will be intimated through mail. All the selected participants have to submit the uploaded bio-data form physically for the confirmation of participation.

Non-local participants are eligible for boarding/ lodging at Mangalore University on double sharing basis.

For domestic travel of participants, the reimbursement for train/bus tickets is allowed as per actual up to 3AC fare (for outstation participants only).

Contact Us:

Dr. Murari M. S.,
Scientific Officer - II, DST-PURSE
Instrumentation Centre,
Mangalore University

Email: <mupurseevents@gmail.com>

Sri D Ravikumar,
Technical Officer, NIT Warangal

Email: <office_stuti@nitw.ac.in>

About STUTI:

The Scheme 'Synergistic Training program Utilizing the Scientific and Technological Infrastructure' (STUTI) is intended to build human resource and its knowledge capacity through open access S&T Infrastructure across the country. As a complement to the various schemes of DST funding for expansion of R&D Infrastructure at academic institutions, STUTI scheme envisions a hands-on training program and sensitization of the state-of-the-art equipment as well as towards sharing while ensuring transparent access of S&T facilities.

Instruments covered for training:

Single Crystal XRD

NMR

FESEM

Amino acid analyser

LCMS

TGA

Confocal microscope

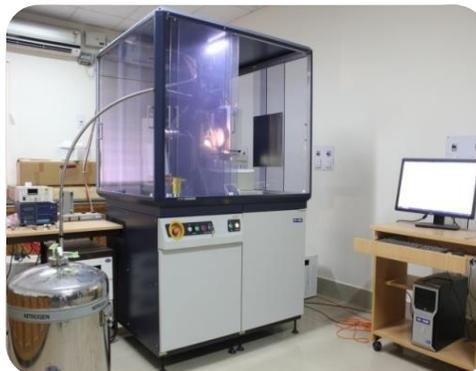
GC

Single Crystal XRD

Make: Rigaku, Japan

Model: Saturn 724+ HG CCD area detector.

Applications: Cell parameters, Structure collection and refinement



NMR

Make: JEOL, Japan

Model: JNM-ECZ400S/L1

Applications: Identification of unknown materials, determination of chemical structures and quantification of components in a mixture and analysis of conformational and molecular dynamics by 1D and 2D NMR.



FESEM

Make: CARL ZEISS, Germany

Model: Sigma

Applications: to study the surface morphology of nanomaterials, polymers, metal samples and other conducting samples. The surface can be scanned in the range of 100 μm to 20 nm.



Amino acid analyser

Make: Hitachi, Japan

Model: L-8900

Applications: Determination and estimation of free amino acids in Plant, Food Materials, Urine and Blood Samples.



LCMS

Make: Shimadzu, Japan

Model: LCMS-8030, Triple quadrupole

Applications: Qualitative and quantitative analysis of trace amounts of chemicals.



TGA

Make: TA Instruments, USA

Model: SDTQ600

Applications: It is a Simultaneous Thermal Analyzer to measure both heat flow & weight changes in a material as a function of temperature or time.

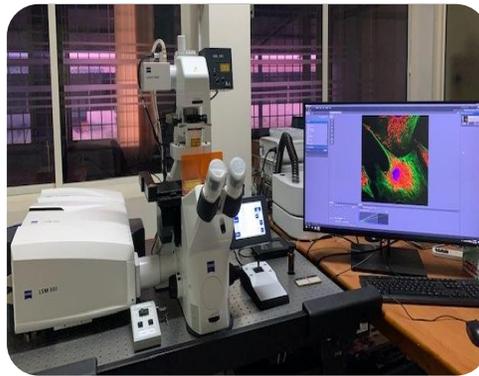


Confocal Microscope

Make: CARL ZEISS, Germany

Model: Zeiss LSM 880

Applications: It can be used for whole tissue scanning and Cell line scanning. Both inverted and upright option is available.



GCMS

Make: Shimadzu, Japan

Model: GCMS-TQ8040NX (Triple quadrupole),

Applications: It can be used for the bio analysis of body fluids to detect narcotics, barbiturates, alcohols, and drugs such as anticonvulsants, anesthetics, antihistamines, sedative hypnotics, and anti-epileptic drugs. It is also useful in detecting pollutants and metabolites.



BIODATA FOR STUTI-21 DST TRAINING PROGRAM

Organized by

Mangalore University (Spoke) & NIT Warangal, Telangana (Hub)

04th – 10th January 2023

NAME Prof./Dr./Mr./Ms.																				

DESIGNATION																				
-------------	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

ORGANIZATION																				

DATE OF ENTRY IN SERVICE																				
--------------------------	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

CATEGORY (GENERAL / SC / ST / OBC)																				
------------------------------------	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

DATE OF BIRTH																				
---------------	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

SEX (M/ F)		
------------	--	--

COMPLETE ADDRESS (OFFICE)																				

COMPLETE ADDRESS (RESIDENCE)																				

CONTACT DETAILS	PHONE (O)	PHONE (R)	MOBILE No.	E-MAIL

EDUCATIONAL / PROFESSIONAL QUALIFICATIONS (GRADUATION ONWARDS)					
Sr. No.	EXAMINATION/ DEGREE	UNIVERSITY/ INSTITUTE	YEAR	SUBJECT	DIVISION/PERCENTAGE OF MARKS

EXPERIENCE					
Sr. No.	NAME OF THE ORGANISATION	DESIGNATION	FROM	TO	DUTY PERFORMED

TRAINING ATTENDED				
Sr. No.	YEAR	NAME OF THE TRAINING PROGRAMME	NAME OF THE INSTITUTE	DURATION

RESEARCH EXPERIENCE				
Sr. No.	YEAR	TOPIC OF RESEARCH	SPONSORING AGENCY	GIST OF RESEARCH

PAPER PUBLISHED / PATENT FILED/OBTAINED				
Sr. No.	YEAR	TOPIC OF PAPER/ BOOK	GIST OF PAPER	NAME OF JOURNAL/ MAGZINE/ PUBLISHER

Briefly give details of significant contribution made by you in the field of Science & Technology during your career. (100 words)

Date:
Place:

(Signature of the Participant)

(Head of the Institution)