



# Faculty Development Programme (FDP)

ON

## 'Mathematics for Engineering Research'

(18<sup>th</sup> June-23<sup>rd</sup> June, 2018)

Organized by

### G. Narayanamma Institute of Technology & Science

(For Women)

Shaikpet, Hyderabad.

in association with

### National Institute of Technology, Warangal.

Under the Scheme of Electronics & ICT Academy

(Sponsored by Ministry of Electronics and

Information Technology (MeitY), GOI

#### Background:

"Electronics & ICT Academy" was set up at NIT Warangal with financial assistance from MeitY, GoI. The jurisdiction of this academy is Telangana, Andhra Pradesh, Karnataka, Goa, Puducherry and Andaman & Nicobar Islands. This academy's role is to offer faculty development programmes in standardized courses and emerging areas of Electronics, Information Communication Technologies, training consultancy services for Industry, Curriculum development for Industry, CEP for working professionals, advice and support for technical incubation and entrepreneurial activities.

As part of this initiative, a Faculty Development Programme(FDP) on 'Mathematics for Engineering Research' is being conducted by G. Narayanamma Institute of Technology & Science, Shaikpet, Hyderabad at college campus to the members of Faculty of all Engineering streams and Mathematics Discipline teaching Mathematics to Engineering students.

Additionally 10 participants from industry are allowed to participate. The list of selected participants will be intimated through e-mail. In case a candidate is not selected, the DD will be sent back. Candidates will be issued certificates on successful completion of the course. Reservations are followed for selecting candidates as per GOI norms.

#### Important dates:

Last date(Application & DD)	08.06.2018
Selection List by E-mail	13.06.2018
Duration	18 <sup>th</sup> June -23 <sup>rd</sup> June, 2018

**About the Institutes: National Institute of Technology** (formerly Regional Engineering College), Warangal is an Institute of National Importance and fully funded by MHRD, Govt. of India. It offers various programmes B.Tech. In eight branches, PG and M.Tech. Programmes and also Ph.D. programmes. Further, the institute organizes FDPs, Workshops and Conferences on cutting-edge technologies regularly throughout the year. All B.Tech and M.Tech programmes of NIT Warangal are NBA accredited.

#### G. Narayanamma Institute of Technology & Science

Late Sri G. Pulla Reddy, an eminent businessman of integrity and impeccable reputation, started the G. Narayanamma Institute of Technology & Science (for women) in 1997. GNITS offer 5 B.Tech. programmes in CSE, ECE, EEE, ETM, and IT and M.Tech programmes. GNITS provides Hostel facility with modern amenities such as AC, Wi-Fi, and Library Resources catering the needs of 650 students. GNITS campus is enabled with Wi-Fi at 110mbps leased line internet. GNITS students got 543 placements for this academic year 2017-18 in Infosys, Accenture, Deloitte, Octum, L&T Infotech, DBS, JPMC, ADP etc., with maximum 15 Lakhs/annum package. It is accredited by NBA & NAAC.

G. Narayanamma  
Institute of Technology & Science  
Shaikpet, Hyderabad

Modified Schedule

# Mathematics for Engineering Research

jointly organized by Electronics & ICT Academy and  
**G. Narayanamma Institute of Technology & Science Shaikpet, Hyderabad.**  
 Tentative Schedule (18-23, June 2018)

Day & Date	9.00 - 10.00	10.00 - 11.00	11.15 - 13.15	14.15 - 15.45	16.00 - 17.30
18.6.2018 Monday	Registration & inauguration From 8.30 am	Key Note Address YN	Key Note Address YN	Probability & Statistics Hands on Session using R YVKRK	Probability & Statistics Hands on Session using R YVKRK
19.6.2018 Tuesday	Statistical modeling using R VRN		Statistical modeling using R VRN	Statistical modeling using R VRN	Statistical modeling using R VRN
20.6.2018 Wednesday	Numerical Techniques DSC		Numerical Techniques DSC	Numerical techniques Lab using C DSC	Numerical techniques Lab using C DSC
21.6.2018 Thursday	Optimization Techniques KNSK		Optimization Techniques KNSK	Linear Algebra Applications using R for Data Science Problems DVS	Case Study: Outlier Analysis Using R and Assessment Test DVS
22.6.2018 Friday	Fourier Transforms and Applications of Fourier Transforms JVVM		Linear Algebra and Numerical Methods using MATLAB DSC	Lab: Linear Algebra and Numerical Methods using MATLAB DSC/CHSS	Lab: Linear Algebra and Numerical Methods using MATLAB DSC/CHSS
23.6.2018 Saturday	Number Theory and Applications to Cryptography and Security BR		Number Theory and Applications to Cryptography and Security BR	Local Session GNITS Team	Valedictory Function

YVKRK: Dr Y V K Ravi Kumar, BITS, Hyderabad ; VRN: Prof V Ravindranath, JNTU, Kakinada; YN: Prof Y Narasimhulu, UoH  
 JVVM: Prof J V R Murthy, NIT, Warangal; DSC: Prof D Srinivasacharya, NIT, Warangal; NSK: Prof K N S K Viswanatham, NITW  
 DVS: Prof DVLN Somayajulu, NITW; BR: Dr B Purushottama, NIT, Goa; CHSS: Ch Satyanarayana, Mahindra Ecole, Hyderabad

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 Shaikpet, Hyderabad

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Report on  
One Week Faculty Development Programme on  
"Mathematics for Engineering Research"

27/6/2018

Brief report on FDP "Mathematics for Engineering Research" conducted from 18/6/2018 to 23/6/2018 organized by GNITS, HYD. in association with E & ICT Academy, NIT Warangal. During this workshop various resource persons shared their knowledge and hands-on expertise on Mathematics for Engineering research.

**Day-1: (18/6/2018)**

In the forenoon session, **Prof. Y. Narasimhulu, UoH** has given KeyNote address on the workshop.

In the afternoon session, **Dr. Y. V. K. Ravi Kumar, BITS, Hyderabad** has given session on Probability & Statistics Hands on Session using R and followed by the Hands on Session using R.

**Day-2: (19/6/2018)**

In the forenoon session, **Prof. V. Ravindranath, JNTU, Kakinada** has given session on Statistical modeling using R.

In the afternoon Session, hand-on session was conducted on Statistical modeling using R.

**Day-3: (20/6/2018)**

In the forenoon session, **Prof. D. Srinivasacharya, NIT, Warangal** has given session on Numerical Techniques.

In the afternoon Session, hand-on session was conducted on Numerical Techniques using C.

**Day-4: (21/6/2018)**

In the forenoon session, **Prof. K. N. S. K. Viswanatham, NITW** has given session on Optimization Techniques.

In the afternoon Session, **Prof. D. V. L. N. Somayajulu, NITW** has given session on Linear Algebra Applications using R for Data Science Problems.

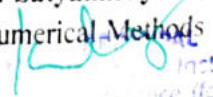
A practical session was conducted on A case study on Outlier Analysis Using R and Assessment Test.

**Day-5: (22/6/2018)**

In the forenoon session, **Prof. J. V. R. Murthy, NIT Warangal**, has given session on Fourier Transforms and Applications of Fourier Transforms.

Next session was given by **Prof. D. Srinivasacharya, NIT, Warangal** on Linear Algebra and Numerical Methods using MATLAB.

In the afternoon Session, **Prof. D. Srinivasacharya, NIT, Warangal** and **Mr. Ch. Satyanarayana, Mahindra Ecole, Hyderabad** conducted hand-on session on Linear Algebra and Numerical Methods using MATLAB.

  
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Day-6: (23/6/2018)

In the forenoon session, Dr. B. Purushottama, NIT, Goa, has given session on Number Theory and Applications to Cryptography and Security.

*M.M.*  
HOD CSE 27/6/18

Submitted by:

Mrs. M. Lalitha, Asst. Prof., CSE *M.L.*  
Mrs. Ch. Swathi, Asst. Prof., CSE *CS*  
Mrs. D. Naga Swetha, Asst. Prof., CSE *NS*  
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