

THE BEACON RAY

A quarterly newsletter from **NIT WARANGAL**

Vol No. 1, Issue No. 1, July 2020



This news letter brings you the latest achievements and updates happening at NIT Warangal



DIRECTOR'S MESSAGE



Dear colleagues,

Hope all of you are doing well and are safe during the COVID-19 lockdown.

I am very glad that the Institute Newsletter is being revived through this edition. The newsletter provides a means of communication about the Institute, its activities and achievements in the areas of Academics, Research and Infrastructure to all the stakeholders of the Institute including students, staff and faculty.

At the outset I would like to congratulate all the faculty, staff and students on the occasion of NIT Warangal being ranked in the top 20 Engineering Institutions in the recently announced NIRF 2019 rankings. It was possible because of the collective effort of all the stakeholders and with the same motivation let us rededicate ourselves to further improve the rank in the future.

I am proud to inform you that the Institute successfully conducted interviews for Faculty positions and a large number of research and academically oriented young faculty members with enviable credentials have been recruited. I have a lot of confidence in these young faculty members, and I am positive that they would take the institute to the pinnacle of academic glory through research, consultancy and teaching. It is heartening to note that some of our colleagues were sanctioned prestigious research projects involving national and international collaboration. It has brought laurels to the Institute.

I take this opportunity to extend my heartfelt appreciation for the efforts of the Dean (Faculty Welfare) in successfully conducting the "Induction Programme" to the newly joined faculty, and bringing them into the NITW ecosystem. It is heartening to note that a large number of our outgoing students have been selected in the campus placements. The Centre for Career Planning and Development needs special appreciation in this regard for its tireless efforts. I congratulate the Dean (Academic) for successfully conducting the SENATE meetings "Online", and resolving the pending academic issues. Even though COVID-19 has brought "Physical Distancing" into our lives, the Institute is working to the motto of "Learning should be continuous and without interruption". The Dean (P&D) and his team are making special efforts to put in place an LMS system so that it can supplement the Teaching-Learning process in these extraordinary circumstances. Efforts are also being made to equip all the faculty members with the required tools for online teaching so that the effect of COVID-19 lockdown doesn't affect the Teaching-Learning process.

The newsletter will be a vibrant channel for exchange of ideas and suggestions on improving the ranking of the institute and make it a fountainhead of research, teaching and innovation. This should help in fostering interdisciplinary research also. I request the faculty members, students and staff to send articles of common interest for the newsletter. The materials recommended for publication will be on research projects undertaken, Workshops/Seminars/FDP Programmes conducted, new equipment/infrastructure added, books and papers published, innovations and achievements reported, etc. I congratulate the editorial team for the initiative in bringing out this newsletter in a short time against all odds. As a closing note I would like to remind all our colleagues that research and teaching are the two important activities that are to be pursued in all seriousness for the progress of the individual faculty members as well as the Institute. Let us re-dedicate ourselves for the development of this great Institute with a glorious history.

Prof. N. V. Ramana Rao

NIT Warangal in news

Tetanus in Today NIT-W signs pact with IIT-Delhi

A memorandum of understanding (MoU) has been signed between the National Institute of Technology (NIT), Warangal and Indian Institute of Technology (IIT), Delhi through a virtual meeting. The objective of the MoU is to promote research projects and joint supervision of PhD students in the area of material processing and manufacturing technology. NIT Warangal has signed MoU with IIT Delhi. It is expected that this collaboration will help in the area of research projects and joint supervision of PhD students. The MoU is for a period of four years starting from the year 2020. The MoU is expected to be completed by the end of the year 2023.

NIT-Warangal inks pact with PSI, Inventaa

The NIT Warangal has signed MoU with the Prime Minister's Science Education and Research Council (PSI) and Inventaa. The MoU is for a period of four years starting from the year 2020. The MoU is expected to be completed by the end of the year 2023.

NIT idea makes it to White House venture

The NIT Warangal has been selected as one of the top 20 engineering institutes in the country in the NIRF rankings-2019. The institute has been recognized for its research and innovation in the field of material processing and manufacturing technology.

నల్.. నైపుణ్యం హెల్త్!

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NIT inks pact with Prime Textiles

The NIT Warangal has signed MoU with Prime Textiles. The MoU is for a period of four years starting from the year 2020. The MoU is expected to be completed by the end of the year 2023.

Amid virus gloom, 732 NIT students bag plum jobs

Majority of those who bagged jobs in the current season were NIT students. The NIT Warangal has signed MoU with the Prime Minister's Science Education and Research Council (PSI) and Inventaa. The MoU is for a period of four years starting from the year 2020. The MoU is expected to be completed by the end of the year 2023.

IIT-H, NIT-W climb NIRF rankings

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IIT-H, NIT-W set new benchmarks in rankings

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T universities slip in NIRF ranking, five engg institutions crash out of top 200

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'గేట్'లో మెరిసిన 'నల్'



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NIT Warangal has largest number of teachers

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నల్లో ఉద్యోగం పొందిన వారికి సత్కారం

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NIT Warangal among top 20 Engineering Institutes in the Country in the NIRF rankings-2019

NIT Warangal in social media

Tweet

Dr Ramesh Pokhriyal Nishank @DrRPNishank

I congratulate Director NIT Warangal for ensuring that placements happen without any hurdle during these tough times. Stay safe, stay well.

Let's fight this together.

State_SCA @State_SCA

#USIndia science collaboration at the White House: Kudos to Indian university @warangal_nit for its research project, 1 of 27 worldwide selected for @WHOSTP's High Performance Computing Consortium, which gives supercomputer access to promising research in the #COVID19 fight. AGW

10:23 PM · 27 Apr 20 · Twitter Web App

Sanjay Dhote @SanjayDh... · 10m

"Necessity is the mother of all inventions." @warangal_nit team prepares #handsanitizer in its lab as per the guidelines of @WHO and gives out a message - "Keep your hands clean & stay safe from #COVID"

#Coronavirusindia
#CoronaInMaharashtra
#StayAtHomeChallenge #Quarantine

Heroes of CORONA Prevention
NIT Warangal prepares Hand Sanitizer in its labs

Ministry of HRD and 9 others

Tweet

Joel Reifman @JoelReifman

#USIndia partnership is advancing key research in the fight against COVID-19. After visiting our friends at NIT Warangal just a few months ago, it's exciting to see NIT researchers join the @WhiteHouse-supported COVID-19 High Performance Computing Consortium. #DostiUnitesUs

37 105k

Dr Ramesh Pokhriyal Nishank @DrRPNishank

Glad to know that NIT Trichy, Suratkal, Warangal, Jaipur, Rourkela, and Goa have made good progress in NIRF rankings, and I heartily congratulate them.

Narendra Modi and 9 others
4:56 PM · 17 Jun 20 · Twitter for Android

Research Achievements

Studies on Severe Acute Respiratory Syndrome causing Coronavirus (SARS-COV2): **Dr. Soumya Lipsa Rath** (Department of Biotechnology) and **Dr. Kishant Kumar** (Department of Chemical Engineering) working in collaboration, were awarded with a project to study the effect of atmospheric condition on the structure of the Severe Acute Respiratory Syndrome causing Coronavirus (SARS-COV-2) that originated in 2019. The proposal was accepted on 11th of April, 2020 by the COVID-19 High Performance Computing (HPC) Consortium that was formed by an amalgam of White House Office of Science and Technology Policy, the U.S. Department of Energy, MIT, Rensselaer Polytechnic Institute, Lawrence Livermore National Lab, Argonne National Lab, Oak Ridge National Laboratory, Sandia National Laboratory, Los Alamos National Laboratory, NASA, the National Science Foundation, Microsoft, Google, Hewlett Packard Enterprise, Amazon and IBM. The selected teams would be allocated 16 systems with a combination of 775,000 processor cores and 34,000 GPUs, which can perform around 330 trillion floating-point operations per second (330 petaflops)



Dr. Soumya Lipsa Rath



Dr. Kishant Kumar

Hunt for Pan-CoV for the Coronaviruses of the past, present and future: **Dr Perugu Shyam**, Assistant Professor in the Department of Biotechnology, NIT Warangal, in collaboration with a team at the National Institute of Animal Biotechnology (NIAB), Translational Health Science and Technology Institute (THSTI) were sanctioned a project entitled "Hunt for Pan-CoV for the Coronaviruses of the past, present and future" by DBT-BIRAC COVID-19 Research Consortium with an estimated budget of Rs. 2.3 Crores.

Indigenous test bed for Industry 4.0 using Visible Light Communication with Industrial Internet of Things: **Dr. V. V. Mani**, Associate Professor ECE Department and **Dr. V. Vasu**, Associate Professor Mechanical Engineering Department were sanctioned an interdisciplinary project on "Indigenous test bed for Industry 4.0 using Visible Light Communication with Industrial Internet of Things" against the call for proposal by ASEAN-India Science, Technology & Innovation Cooperation (AISTIC) for an amount of Rs. 70.00 lakhs. The collaborators for this project are **Dr. Fadhlur Rahman Mohd Romlay**, Department of Mechanical Engineering at Universiti Malaysia Pahang, Malaysia, **Prof. Punnarumol Temdee**, School of Information Technology, Mae Fah Luang University, Chiang Rai, Thailand and **Prof. Hari Krishan Garg**, Electrical and Computer Engineering, National University of Singapore, Singapore.



Dr. VV Mani

Dr. V Vasu



Dr Perugu Shyam

Fund granted for improvement of S & T Infrastructure (FIST): The Department of Physics, NIT Warangal was sanctioned Rs. 2.75 Crore from Department of Science and Technology (DST) under "Fund for Improvement of S&T Infrastructure in Universities and Higher Educational Institutions (DST-FIST)" Scheme in January, 2020. The duration of the project is for five years (2020 – 2025). Advanced equipment including Powder X-ray Diffractometer (XRD) and Field Emission Scanning Electron Microscope (FE-SEM) will be acquired from the funds.

IMPRINT PROJECT: An IMPRINT project on "Design and Development of High Efficient Switched Reluctance Motor based Solar Photovoltaic (SPV) Water Pumping System (WPS)" was sanctioned to a team of Faculty from the Institute. Project File No.: IMP/2019/000295, IMPRINT-India, MHRD. Project Cost: Rs.78.954 Lakhs. Investigators: **Dr. B. L Narasimharaju**, PI, EED NIT Warangal. Co- Principal Investigators: Prof. D. M. Vinod Kumar, Prof. S. Srinivasa Rao, Dr. A.V. Giridhar, EED and Dr. V. V Mani, ECE.

Patent

The examination report was received on 24th Jan, 2020 for a patent filed by **Mr. Yadagiri Maralla**, and **Prof. Shirish Sonawane**, Department of Chemical Engineering for their work on "Particle Size Reduction of Pharmaceutical Material/Drugs Using Innovative Crystallization Process" Indian Patent Application No/ 201841033163.



Prof. Shirish Sonawane

AIR 3rd position for TEAM TEJAS

The electric 'go-kart' team of 19 members, consisting of B Tech 3rd and 2nd Year students of Electrical, Mechanical and ECE branches have participated in the 7th E-GKDC Electrical Go-Kart Design Challenge, organized by ISNEE (Indian Society of New Era Engineers) Motorsports India in Kari Motor Speedway Racetrack, Coimbatore from 11th to 14th of February. This Team Tejas secured AIR 3rd position in this national level competition.

ChEA and IChE in collaboration with IOCL organized CONSERVECKA, a student activity from 4th to 25th Feb, 2020, to promote Energy Conservation Awareness among the masses as part of the "Energy Conservation and Sustainability Week"



Workshop on chemical process simulator (DWSIM)

ChEA and IChE organized a four-day workshop during 27th Jan to 30th Jan, 2020 on DWSIM (Chemical Process Simulator), with an aim to hone important and relevant industrial skills among our budding engineers. It was coordinated by Dr. A. Sarath Babu, Professor, Chemical Engineering Department.



Student Activities



Cura'20 was organized during Feb 14th - 15th 2020. Participants from prestigious B-Schools participated in eight events, two workshops and three keynote sessions. Dr. K. Francis Sudhakar was the faculty coordinator.



Institution Activities

Faculty development programs and Workshops

STATISTICS FOR BUSINESS RESEARCH & SPSS APPLICATIONS: School of Management organized a faculty development programme on Statistics for Business Research & SPSS Applications in association with the E & ICT Academy, NITW, from 20th-25th, January, 2020. The six day workshop was coordinated by **Prof. M. Ravindar Reddy and Dr. P.R.C. Gopal.**



National Conference on New Management Paradigms in a Changing World: Innovations, Dynamics & Future Prospects (NMPCWIDF): School of Management, NIT Warangal organized a two day National Conference on New Management Paradigms in a Changing World: Innovations, Dynamics and Future Prospects (NMPCWIDF-2020) on 31st January, 2020 to 1st February, 2020. The six day workshop was coordinated by **Dr. P. Ramlal, Dr. G. Sunitha and Dr. S.L. Tulasi Devi.**

WOMEN EMPOWERMENT- INNOVATIVE METHODS & STRATEGIES IN HIGHER EDUCATION (WEIMSHE-2020): A Two-Day International Conference on "Women Empowerment: Innovative Methods and Strategies in Higher Education (WEIMSHE-2020)" was conducted during 6th to 7th of March, 2020 in association with the TEACHING LEARNING CENTRE (TLC) of the Institute. The conference focused on the challenges faced by women and the remarkable progress they have made.

FACULTY DEVELOPMENT PROGRAMME

A six day 'Faculty Development Programme' was conducted in association with the TEACHING LEARNING CENTRE (TLC) of the Institute, exclusively for Women Faculty in Universities, and Colleges of Higher Education titled 'Pedagogical Skills in Teaching Methods and Strategies in Higher Education (PSTMSHE 2020)', from March 9-14, 2020. This programme was coordinated by **Dr. K. Madhavi**, Associate Professor, Department of Humanities and Social Sciences, and **Dr. D. Bhargavi**, Assistant Professor Department of Mathematics.



A One day Teacher workshop was conducted on 9th March 2020 on "Pedagogic Use of Bilingual Teacher Talk in Low Resource" as part of ELTRMS project funded by the British Council. This workshop is specifically for school teachers of English who work in low resource contexts. **Dr. R. Vennela**, Assistant Professor Department of Humanities was the coordinator.



Awareness workshop for Academicians on Engineering Standards and Intellectual property rights: Departments of Mechanical Engineering and Civil Engineering in association with the Teaching Learning Center, NIT Warangal have organized a one week awareness programme to academicians on how to teach engineering standards and Intellectual property rights during 13th -18th February 2020. **Dr. Srikanth Korla**, **Dr. VV Vasu** and **Prof. L Krishnanand** of MED and **Dr. G V Ramana** of CED coordinated the programme.



A Six-Day Faculty Development Workshop on "Teaching and Learning Practices of Data Analysis through Hands-on Experiences" was organized during 09th - 14th March, 2020 by the Department of Biotechnology and Department of Computer Science & Engineering. It was coordinated by **Dr. Perugu Shyam** from Department of Biotechnology and **Dr. M Sandhya**, Department of Computer Science. A six day 'Faculty Development Programme' was conducted by the Department of Physics for Faculty in Universities and Colleges of Higher Education titled "Teaching and Learning of Functional Materials and Devices through Hands-on Experience" (TLFMD-2020)" from March 9-14, 2020. This six day hands-on workshop was coordinated by **Dr. V. Jayalakshmi**, **Dr. K. Thangaraju**, **Dr. D. Paul Joseph** and **Dr. Kusum Kumari**. Both these Programmes were conducted in Association with the TEACHING LEARNING CENTRE (TLC) of the Institute.

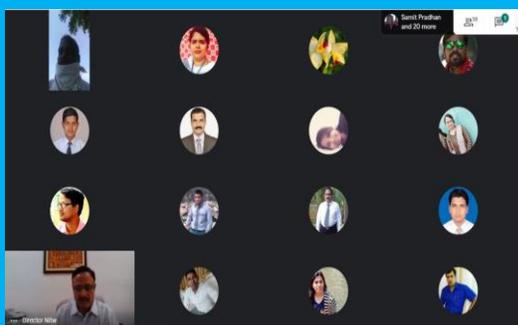
A one-week long Induction Programme was conducted for the newly recruited faculty from 10-02-2020 to 15-02-2020. The faculty were introduced to various aspects of the academic, research and professional perspectives by the Director, Deans, Advisors, Registrar, senior faculty of the Institute and external experts. **Prof D.V.S.S Siva Sarma**, Dean, Faculty Welfare and **Dr. S. Ravi Chandra**, Associate Dean Faculty Welfare of the Institute coordinated the programme.



NIT Warangal was sanctioned 11 ATAL -AICTE training Programmes. During the lockdown period, these Programmes are being conducted through ONLINE mode. **Dr. Raju Bhukya**, Assistant Professor, Department of CSE and Faculty-in-Charge, CEP is coordinating these Programmes.



Dr. Raju Bhukya



ATAL FDP on Education 4.0: A five-day AICTE sponsored 'AICTE Training and Learning Academy Programme (ATAL) on 'Education 4.0 for Industry 4.0' was organised by the Department of Humanities and Social Science (H&SS). **Dr. B. Spoorthi**, Assistant Professor, Dept., of Humanities and Social Sciences was the coordinator.



Faculty Achievements

Development of TMA sensor fabric using sequential molecular self-assembly technique: A research team lead by **Dr. S. Nagarajan**, National Institute of Technology Warangal in collaboration with Dr. John B. B. Rayappan, Sastra Deemed University and Dr. Apurba Das, Indian Institute of Technology Delhi have developed a TMA sensor fabric using sequential molecular self-assembly technique, which display a transient response for 1-500 ppm and stable response towards 100 ppm. This study is financially supported by the SERB (DST) and SPARC (MHRD), and has been published in journal ACS Omega.



Dr. S Nagarajan

Prof. T. Kishore Kumar, Professor, Department of ECE was nominated under the **sanction of the President of India for the Secondment of Indian Faculty to Asian Institute of Technology (AIT), Bangkok**, Thailand by MHRD, Govt. of India as a Visiting Professor during August - December, 2019 for the Masters 'course Digital Signal Processing (AT77.15).



Prof. T. Kishore Kumar



Dr.P.Madhumathi

Technology-Based Strategy Intervention to Enhance Communication Skills of Arts and Science College Students from Rural Telangana: A rural development project was granted to by Dr.P.Madhumathi, Assistant Professor, Dept., of Humanities and Social Sciences, funded by Impactful Policy Research in Social Science (IMPRESS), ICSSR for developing the communication skills of the rural students studying in Arts and Science colleges of Telangana.

Dr. V. P. Chandra Mohan, Associate Professor, and Department of Mechanical Engineering was **nominated as editorial board member of two Journals.**

- 1) Associate Editor, Agronomy Research, Estonia.
- 2) Regional Editor, Journal of Thermal Engineering, Turkey.



Dr. V.P. Chandra Mohan

3rd position in IEEE Hackathon challenge for developing simple low cost gloves

Dr. Mukul Pradhan, Assistant Professor, Department of Chemistry NIT Warangal along with research group of Dr. Rakesh Roy, Assistant Professor, Department of Electrical Engineering, NIT Meghalaya were awarded third position in the IEE India COVID Move Online Hackathon challenge organized by IEEE India Council in collaboration with IEEE Hyderabad Section and IEEE Bangalore Section on 30th March 2020 to 2nd April 2020 for developing simple low-cost gloves which not only protect us but also kill virus.



Dr. Mukul Pradhan



Dr. K. Hari Prasad

Dr. K. Hari Prasad, Assistant Professor, Department of Chemistry and a team of research scholars **prepared hand sanitizer** in the laboratory in line with all the standards set by WHO and CDC. This initiative is further supported by Prof. P. V. Srilakshmi, Head of Department of Chemistry.

MOUs Signed

MOU signed With Power Grid Corporation of India: Prof. N. V. Ramana Rao, Director NIT Warangal signing the MoU with Shri. Sanjay Garg, Executive Director, Power Grid Corporation of India, New Delhi. The MOU aims at advancing and implementing energy efficiency and sustainable energy projects at NIT Warangal campus.

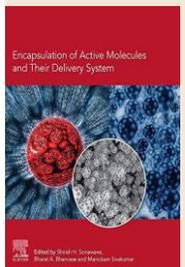


NIT Warangal and Prime Textiles Warangal entered into an MOU for waste water treatment using Hydrodynamic cavitation based hybrid process

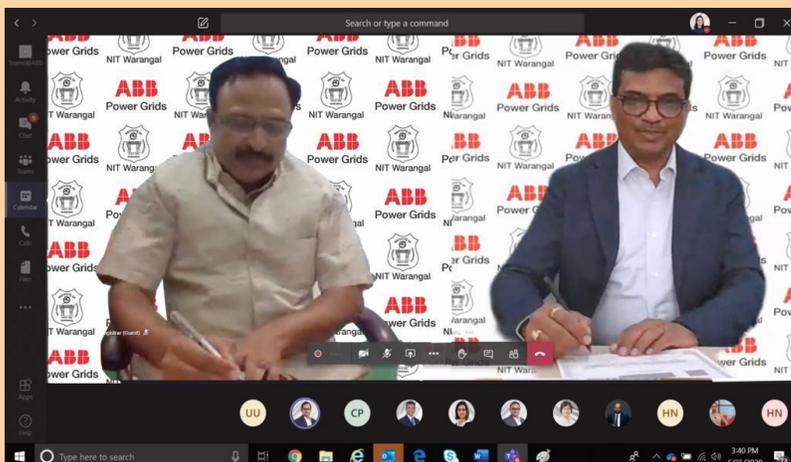


Books Published

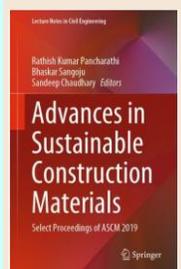
A book titled "**Encapsulation of Active Molecules and Their Delivery System**" was edited by **Prof. Shirish Hari Sonawane**, Bharat A. Bhanvase and, Manickam Sivakumar, published by Elsevier Science Publishing Co ISBN: 9780128193631



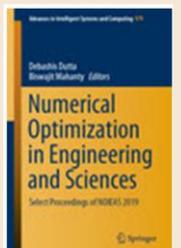
MOU with ABB Power Grids India: An MoU was signed between M/s. ABB Power Products and Systems India Limited (APPSIL), Bengaluru represented by its **Mr. Venu Nuguri, Managing Director** and NIT Warangal represented by its **Prof. N.V. Ramana Rao, Director NIT Warangal** on 25/6/2020. APPSIL will support NITW in defining and updating the course content for M.Tech (Smart Electric Grid) which is starting from Ay 2020-21, support in setting up of laboratory for Smart Electric Grid technology education, internships, experimentation and research activities including hardware, software, connectivity, Smart Electric Grid platform and applications.



A Book published on the Topic "**Advances in Sustainable Construction Materials**" by Prof P. Rathish Kumar of NIT Warangal, Dr. S. Bhaskar Senior Principal Scientist of SERC and Prof Sandeep Chaudhary of IIT Indore is brought out by Springer Publishers in May 2020.



Dr. Debashis Dutta, Department of Mathematics, was a joint editor of the book on "**Numerical Optimization in Engineering and Sciences**" (Volume 979) published by Springer. It is a Scopus indexed publication.



COVID 19 Relief activities

Distribution of sanitizers and masks to nonteaching staff and security personnel of NITW. Date: 15.5.2020. Number served: 400.



Distribution of food items to local municipal workers, outsourced labourers of NITW Hostels and local painting artists. Date 01.05.2020, Number served: 90.



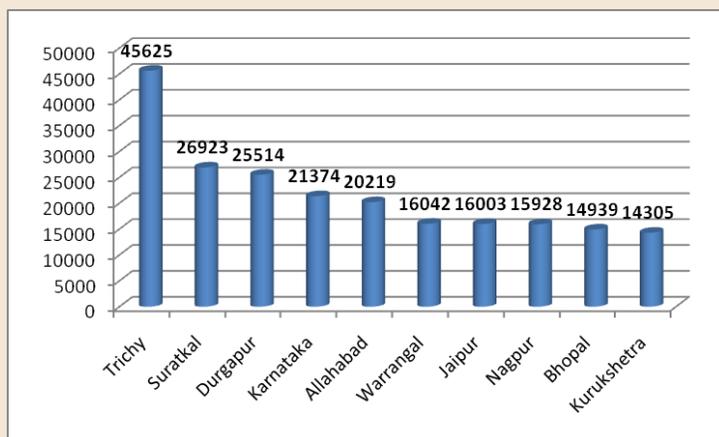
NITW Alumni Association - Warangal Chapter actively participated in the COVID-19 relief

The top 5 Papers from NITW that received more citations than other papers as per Web of Science data

S.No.	Author(s) / Title	Journal	Year	Citations
1.	Kumar, Santosh; Surendar, T.; Baruah, Arabinda; Shanker, Vishnu <i>Synthesis of a novel and stable g-C3N4-Ag3PO4 hybrid nanocomposite photocatalyst and study of the photocatalytic activity under visible light irradiation</i>	JOURNAL OF MATERIALS CHEMISTRY A Vol. 1 (17), pp.5333-5340	2013	448
2.	Kumar, Santosh; Baruah, Arabinda; Tonda, Surendar; Kumar, Bharat; Shanker, Vishnu; Sreedhar, B. <i>Cost-effective and eco-friendly synthesis of novel and stable N-doped ZnO/g-C3N4 core-shell nanoplates with excellent visible-light responsive photocatalysis</i>	NANOSCALE Vol. 6 (9), pp.4830-4842	2014	268
3.	Tonda, Surendar; Kumar, Santosh; Kandula, Syam; Shanker, Vishnu <i>Fe-doped and -mediated graphitic carbon nitride nano sheets for enhanced photocatalytic performance under natural sunlight</i>	JOURNAL OF MATERIALS CHEMISTRY A Vol. 2 (19), pp.6772-6780	2014	259
4.	Kumar, Santosh; Surendar, T.; Kumar, Bharat; Baruah, Arabinda; Shanker, Vishnu <i>Synthesis of Magnetically Separable and Recyclable g-C3N4-Fe3O4 Hybrid Nano composites with Enhanced Photocatalytic Performance under Visible-Light Irradiation</i>	JOURNAL OF PHYSICAL CHEMISTRY C Vol. 117(49), pp.26135-26143	2013	224
5.	Kannamba, B.; Reddy, K. Laxma; AppaRao, B. V. <i>Removal of Cu(II) from aqueous solutions using chemically modified chitosan</i>	JOURNAL OF HAZARDOUS MATERIALS Vol. 175 (1-3), pp.939-948	2010	176



Number of Publications



Number of Citations

Institute Library

NIT Warangal implemented OPAC (Online Public Access Catalogue) system: Central Library has implemented KOHA - Integrated Library Management Software for automation of Library Functions.

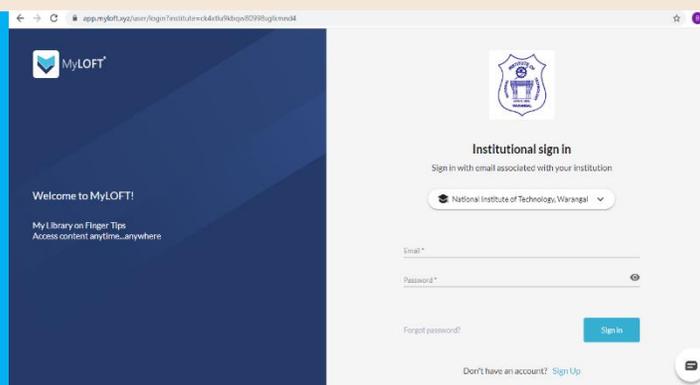
The OPAC (Online Public Access Catalogue) is Available on Intranet through the link <http://opac.library.nitw.ac.in:8081/>.

Through OPAC, users can browse print resources available in Central Library, NITW.



Remote Access Service – MyLOFT (My Library on Fingertips):

Central Library, NITW has introduced a new service called "Remote Access Services - MyLOFT (My Library on Fingertips)" for the benefit of Research Scholars and Faculty. MYLOFT is a mobile App. Through MyLOFT, research scholars and faculty members can access e-resources subscribed by NITW from anywhere anytime.



Activities from Department of Physical Education

Prof. P. Ravi Kumar produced **FOUR videos on Physical Fitness and Health for the health and well-being of NIT Warangal Community** in particular and the general welfare of the society at large during COVID-19 conditions and uploaded them on YOUTUBE channel. These are available on the URLs given below.

1. "Yogic Fitness Capsule"-Dr. P. Ravi Kumar, NIT Warangal

<https://www.youtube.com/watch?v=uP02QqWEO20>

2. "Physical Fitness Capsule"- Dr. P. Ravi Kumar, NIT WARANGAL

<https://www.youtube.com/watch?v=tIPGiTI1nqA&t=3s>

3. "Neck Pain Relief-Stretches & Exercises"- Dr. P. Ravi Kumar, NIT Warangal

<https://www.youtube.com/watch?v=UTA6iaAQEp4>

4. "Back Pain Relief - Stretches & Exercises"- Dr. P. Ravi Kumar, NIT Warangal

NIT Warangal Fraternity Contributes To PM-CARES Fund

Around 550 persons, including **faculty members, non-teaching staff and pensioners** together contributed **Rs. 17.10 lakhs** by way of donating one day's salary/pension even before the PM CARES Fund was constituted by the Government of India. Further the **alumni of the Institute** from various parts of the country directly contributed around **Rs. 6.5 lakhs** to the Fund. In a generous act, around 4,000 **students of National Institute of Technology, Warangal, (NITW)**, donated **Rs. 23, 76, 840** to the PM CARES Fund.

Institute of Electrical and Electronics Engineers (IEEE) Activities

The IEEE Student Branch of NIT Warangal has organized the following webinars during the COVID19 for the benefit of the students.

S.No.	Webinar Topic	Name of the Expert	Date(s) of the Event
1	<i>The Role of 3D printing in the COVID-19 Pandemic</i>	<i>Dr. Y. Ravi Kumar, Associate Professor in MED</i>	<i>May 21, 2020</i>
2	<i>Automation and Digitization in the Dairy and Beverage Industry</i>	<i>Mr. Rosh Vijayakumar, Team Leader, Asia Pacific & China, Tetra Pak</i>	<i>May 28, 2020</i>
3	<i>Designing of Control for Microgrids</i>	<i>Dr. Deepak Reddy Pullaguram, Assistant Professor in EED</i>	<i>June 01, 2020</i>
4	<i>Trainee Engineer to Team Manager: Myths, Realities and Insights</i>	<i>Mr. Vivek V Nair, District Account Manager, ECOLAB</i>	<i>June 02, 2020</i>
5	<i>Solid State Storage Memory</i>	<i>Mr. Meer Afroz, Systems Design Engineer, SanDisk, Western Digital</i>	<i>June 03, 2020</i>
6	<i>A Recipe to Learning Business Analytics</i>	<i>Dr. Rahul Thangeda, Assistant Professor in SOM</i>	<i>June 09, 2020</i>
7	<i>Insights on Data Science</i>	<i>Mr. Vijay Pravin Maharajan, Data Scientist, Siemens</i>	<i>June 10, 2020</i>
8	<i>LaTeX Scientific Documentation Tool</i>	<i>Mr. Madasthu Santhosh, Assistant Professor in EEED, KITS Warangal</i>	<i>June 11-12, 2020</i>
9	<i>Big Image Data Processing</i>	<i>Dr U S N Raju, Assistant Professor in CSED</i>	<i>June 16, 2020</i>
10	<i>The Recipe for Project Management</i>	<i>Mr. Chaitrananda Sindhu, Founder, Web Enable, Bangalore</i>	<i>June 30, 2020</i>

Superannuation of Prof. Y. PydiSetty

Prof. Y. Pydisetty, Department of Chemical Engineering attained superannuation on 31st march, 2020 after serving the Institute for a long period from 1996.



Newly appointed Faculty Members



Dr. Priya

Ph.D., Indian Institute of Technology Bombay (IIT-B)
Assistant Professor Grade II
Dept of Biotechnology
priyap@nitw.ac.in

Areas of Research

Epigenetics, cell biology, fungal genetics



Dr. Chockalingam S

Ph.D., Indian Institute of Technology Guwahati (IIT-G)
Assistant Professor Grade II
Dept of Biotechnology
chocks@nitw.ac.in

Areas of Research

Cancer biology, Cell signaling



Dr. Thyageshwar Chandran

Ph.D., Indian Institute of Science Bangalore (IISc)
Assistant Professor Grade II
Dept of Biotechnology
thyagesh@nitw.ac.in

Areas of Research

Structural Biology (Cryo-EM and X-ray crystallography); MD simulation and Biophysics



Dr. Ramya Araga

Ph.D., Indian Institute of Technology Hyderabad (IIT-H)
Assistant Professor Grade II
Dept of Chemical Engineering
ramyaaraga@nitw.ac.in

Areas of Research

Wastewater Treatment

Dr Surajbhan Sevda

Ph.D., Indian Institute of Technology Delhi (IIT-D)
Assistant Professor Grade II
Dept of Biotechnology
sevdasuraj@nitw.ac.in

Areas of Research

Water Reuse, Bioelectrochemical System, Biological Wastewater Treatment



Dr. Soumya Lipsa Rath

Ph.D., Indian Institute of Technology Madras (IIT-M)
Assistant Professor Grade II
Dept of Biotechnology
slrath@nitw.ac.in

Areas of Research

Molecular Modeling, drug designing and computational Biophysics



Dr. Naresh Thota

National University of Singapore (NUS, Singapore)
Assistant Professor Grade II
Dept of Chemical Engineering
naresh@nitw.ac.in

Areas of Research

Molecular dynamic simulations for energy and healthcare applications, materials screening, chemical process simulations

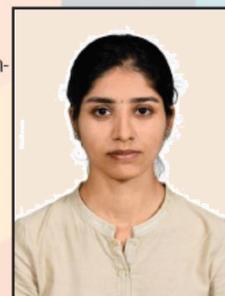


Dr. Anjana P A

Ph.D., National Institute of Technology Surathkal (NIT-K)
Assistant Professor Grade II
Dept of Chemical Engineering
anjanapa@nitw.ac.in

Areas of Research

Heterogenous catalysis, electrolysis cell, energy and environment



**Dr. Praveen Kumar Bommineni**

PhD, Indian Institute of Science Bangalore (IISc)
 Assistant Professor Grade II
 Dept of Chemical Engineering
 praveen@nitw.ac.in

Areas of Research

Self assembly of molecules, crystallization

Dr. P. Sampath Kumar

PhD, University of Hyderabad (UoH)
 Assistant Professor Grade II
 Dept of Chemical Engineering
 pskr@nitw.ac.in

Areas of Research

Nanotechnology, Energy Storage Devices

**Dr. V. Rajeshkumar**

Ph.D. National Chiao Tung University Taiwan
 Assistant Professor Grade II
 Dept of Chemistry
 rajeshv@nitw.ac.in

Areas of Research

Organic Synthesis and metal catalysis, Green chemistry, synthesis of bioactive molecules for biological applications.

Dr. Mukul Pradhan

Ph.D., Indian Institute of Technology Kharagpur (IIT-KGP)
 Assistant Professor Grade II
 Dept of Chemistry
 mukulchem@nitw.ac.in

Areas of Research

Nanomaterials for energy harvesting and storage application.

**Dr. Rajeshkhanna Gaddam**

Ph.D., Indian Institute of Technology Madras (IIT-M)
 Assistant Professor Grade II
 Dept of Chemistry
 grkhanna@nitw.ac.in

Areas of Research

Nanoscience and Nanotechnology, Nanomaterials, Energy Storage and Conversion Systems, Supercapacitors, Fuel Cells, Electrocatalysis, Electrochemical Water Splitting, Electrochemical Sensors

Dr B Raghuram Kadali

Ph.D., Indian Institute of Technology Bombay (IIT-B)
 Assistant Professor Grade II
 Dept of Civil Engineering
 brkadali@nitw.ac.in

Areas of Research

Traffic and Transportation Planning

**Dr. Sanjit Biswas**

Ph.D., Indian Institute of Technology Delhi (IIT-D)
 Assistant Professor Grade II
 Dept of Civil Engineering
 sbiswas@nitw.ac.in

Areas of Research

Soil Dynamics, Machine Foundation, Shallow and Deep Foundations, Field and Laboratory Testing, Finite Element Analysis, Continuum Approach Modeling

P. Ravi Prakash

Ph.D., Indian Institute of Technology Gandhinagar (IIT-GN)
 Assistant Professor Grade II
 Dept of Civil Engineering
 rprakash@nitw.ac.in

Areas of Research

Computational Mechanics, Structural Fire Engineering, Application of Artificial Intelligence in Structural Engineering

**Dr. Vema Vamsi Krishna**

Ph.D., Indian Institute of Technology Madras (IIT-M)
 Assistant Professor Grade II
 Dept of Civil Engineering
 vvamsikr@nitw.ac.in

Areas of Research

Hydrologic Modelling, Watershed Management, Parameterization of Watershed Models, Agricultural Water Management, Optimal Allocation of Resources, Decision Making Under Uncertainty, and Application of Soft Computing Tools for Water Resources Problems

Dr. Manish Pandey

Ph.D., Indian Institute of Technology Roorkee (IIT-R)
 Assistant Professor Grade II
 Dept of Civil Engineering
 mpandey@nitw.ac.in

Areas of Research

Experimental Hydraulics, Sediment Transport, Bridge Scour, River Training Works

**Dr. Litan Kumar Ray**

Ph.D., Indian Institute of Technology Roorkee (IIT-R)
 Assistant Professor Grade II
 Dept of Civil Engineering
 litan@nitw.ac.in

Areas of Research

Stochastic hydrology, Watershed management, Hydrological modelling, Climate change analysis, Analysis of extreme events

Dr. R. Ramesh Nayaka

Ph.D., University of Malaya Malaysia (UM, Malaysia)
 Assistant Professor Grade II
 Dept of Civil Engineering
 ramesh.n@nitw.ac.in

Areas of Research

Specialized in Building Technology and Construction Management (BTCM). Areas of research include Building Information Modelling (BIM), Modern Construction Techniques for Low-Cost Housing Scheme, Sustainable Construction Materials, Life Cycle Cost Assessment of Construction project and Application of GIS in Construction Safety Management.





Dr. Sudheer Kumar Yamsani

Ph.D., Indian Institute of Technology Guwahati (IITG)
Assistant Professor Grade II
Dept of Civil Engineering
skyamsani@nitw.ac.in

Areas of Research

Geo-environmental Engineering, Reinforced soil Structures



Dr. Balaprakasa Rao Killi

Ph.D., Indian Institute of Technology Guwahati (IIT-G)
Assistant Professor Grade II
Dept of Computer Science and Engineering
bprao@nitw.ac.in

Areas of Research

Software Defined Networking, Network Optimization, Game Theory



Dr. Venkateswara Rao Kagita

PhD, University of Hyderabad (UoH)
Assistant Professor Grade II
Dept of Computer Science and Engineering
venkat.kagita@nitw.ac.in

Areas of Research

Machine Learning, Data Mining



Dr. R. Jeyasenthil

Ph.D., Indian Institute of Technology Bombay (IIT-B)
Assistant Professor Grade II
Dept of Electrical Engineering
jey@nitw.ac.in

Areas of Research

Control System Design and Analysis



Dr. Debasmitta Panda

Ph.D., Indian Institute of Technology Kanpur (IIT-K)
Assistant Professor Grade II
Dept of Electrical Engineering
dpanda@nitw.ac.in

Areas of Research

Power systems optimization, Smart grid, Portfolio Optimisation in Electricity Market



Dr. Ekta Goel

Ph.D., Indian Institute of Technology Varanasi (IIT-BHU)
Assistant Professor Grade II
Dept of Electronics and Communication Engineering
ektagoel@nitw.ac.in

Areas of Research

Modeling and Simulation of Advanced MOS Devices

Dr. Sanjay Kumar Panda

Ph.D., Indian Institute of Technology Dhanbad (IIT-DHN)
Assistant Professor Grade II
Dept of Computer Science and Engineering
sanjaya@nitw.ac.in

Areas of Research

Cloud Computing



Dr. Ramalingaswamy Cheruku

Ph.D., National Institute of Technology Goa (NIT-G)
Assistant Professor Grade II
Dept of Computer Science and Engineering
rmlswamy@nitw.ac.in

Areas of Research

Deep Learning, Soft Computing, Data Mining, Machine Learning, Wireless Sensor Networks



Dr. Palash Mishra

Ph.D. (Indian Institute of Technology Madras, India)
Assistant Professor Grade II
Dept of Electrical Engineering
pmishra@nitw.ac.in

Areas of Research

High Voltage Engineering



Dr. Deepak Reddy Pullaguram

Ph.D., Indian Institute of Technology Delhi (IIT-D)
Assistant Professor Grade II
Dept of Electrical Engineering
drp@nitw.ac.in

Areas of Research

Microgrids operation and control, Renewable Integration, and Distributed control

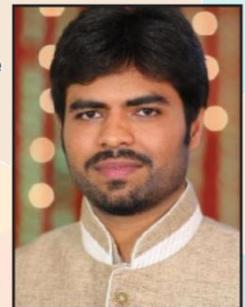


Dr. Kanasottu Anil Nalk

Ph.D., Indian Institute of Technology Roorkee (IIT-R)
Assistant Professor Grade II
Dept of Electrical Engineering
anilnalk205@nitw.ac.in

Areas of Research

Renewable energy grid Integration, AI application on power system, DSP techniques applications in power system and micro grid stability and control



Dr. Chayan Bhar

Ph.D., Indian Institute of Technology Kharagpur (IIT-KGP)
Assistant Professor Grade II
Dept of Electronics and Communication Engineering
cbhar@nitw.ac.in

Areas of Research

Optical networks and optical communication





Dr. Amarjit Kumar

Ph.D., Indian Institute of Technology Roorkee (IIT-R)
Assistant Professor Grade II
Dept of Electronics and Communication Engineering
amarjitk@nitw.ac.in

Areas of Research

Reconfigurable Multiband & Multifunctional
Radio-frequency Integrated Circuits



Dr. R. Vennela

Ph.D., University of Hyderabad (UoH)
Assistant Professor Grade II
Dept of Humanities and Social Science
rvennela@nitw.ac.in

Areas of Research

Bilingual Education, Language Policy and
Planning, Translingual Teacher Pedagogy



Dr. Jagannath Roy

Ph.D., National Institute of Technology
Durgapur (NIT-DGP)
Assistant Professor Grade II
Dept of Mathematics
jroy@nitw.ac.in

Areas of Research

Operations Research, Fuzzy optimization,
Decision Making



Dr. Chinige Sampath Kumar

Ph.D., Indian Institute of Technology Madras
(IIT-M)
Assistant Professor Grade II
Dept of Mechanical Engineering
drsam@nitw.ac.in

Areas of Research

Jet Impingement Cooling, Liquid Metal Cool-
ing, Porous Media, Lattice Boltzmann Method



Dr. Thamaral Selvan Vasu

Ph.D., Indian Institute of Technology Bombay
(IIT-B)
Assistant Professor Grade II
Dept of Mechanical Engineering
thamaral29@nitw.ac.in

Areas of Research

Computational solid mechanics, contact me-
chanics, FEM, FGM, layer substrate systems



Dr. Shivraman

Ph.D., Indian Institute of Technology Roorkee
(IIT-R)
Assistant Professor Grade II
Dept of Mechanical Engineering
shivraman@nitw.ac.in

Areas of Research

Welding, Wear, Surface engineering and
Welding metallurgy

Dr. Vasundhara

Ph.D., Indian Institute of Technology Bhubaneswar
(IIT-BBS)
Assistant Professor Grade II
Dept of Electronics and Communication Engineer-
ing
vasundhara@nitw.ac.in

Areas of Research

Adaptive Signal Processing, System Identifica-
tion, Feedback Cancellation In Hearing Aid



Dr. Deepika Neela

Ph.D., Indian Institute of Technology Hyder-
abad (IIT-H)
Assistant Professor Grade II
Dept of Mathematics
ndeepika@nitw.ac.in

Areas of Research

Hydrodynamic Stability, Heat convection In
Porous Media



Dr. Srinivas Janglil

Ph.D., National Institute of Technology Waran-
gal (NIT-W)
Assistant Professor Grade II
Dept of Mathematics
jsrinivas@nitw.ac.in

Areas of Research

Fluid Dynamics

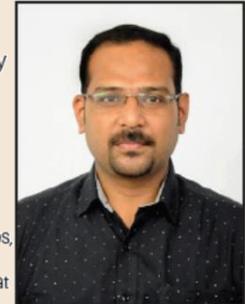


Dr. Satyanand Abraham

Ph.D - Indian Institute of Technology Bombay
Assistant Professor Grade II
Dept of Mechanical Engineering
abrahams@nitw.ac.in

Areas of Research

Heat transfer enhancement techniques and devices,
thermal management of electronic package, gas
turbine components and vehicle battery, waste heat
recovery, surface wettability



Dr. Prasanth Anand Kumar Lam

Ph.D., Indian Institute of Technology Madras
(IIT-M)
Assistant Professor Grade II
Dept of Mechanical Engineering
prasanth_anand@nitw.ac.in

Areas of Research

Computational Fluid Dynamics and Heat
Transfer, Refrigeration and Air-Conditioning



Dr. Manjalah M

Ph.D., National Institute of Technology Surath-
kal (NIT-K)
Assistant Professor Grade II
Dept of Mechanical Engineering
manjalah.m@nitw.ac.in

Areas of Research

Additive manufacturing, Non conventional
machining, surface engineering





Dr. Gangadharudu Talla

PhD., National Institute of Technology Rourkela (NIT-R)
Assistant Professor Grade II
Dept of Mechanical Engineering
gtalla@nitw.ac.in

Areas of Research

Unconventional machining, Metal cutting, Powder metallurgy



Dr. Surya K. Ghosh

Ph.D., Indian Institute of Technology Bombay (IIT-B)
Assistant Professor Grade II
Dept of Physics
skghosh@nitw.ac.in

Areas of Research

Statistical Physics, Biophysics, Soft Matter, Computational Physics



Dr. Vijay Kumar

Ph.D., University of Hyderabad (UoH)
Assistant Professor Grade II
Dept of Physics
vijay@nitw.ac.in

Areas of Research

Nano-Optics, Singular Optics, Structured Light-matter Interactions



Dr. K. Kaladhar

Ph.D., National Institute of Technology Warangal (NIT-W)
Assistant Professor Grade II
Dept of Mathematics
kaladhar@nitw.ac.in

Areas of Research

Fluid Dynamics, Computational Techniques and Inventory Management



Dr. Manali Pal

PhD, Indian Institute of Technology Kharagpur
Assistant Professor Grade II
Dept of Civil Engineering
manalipal@nitw.ac.in

Areas of Research

Hydrology, Climate Change, Soil Moisture, Remote Sensing, Stochastic Modelling, Machine Learning



Dr. Triveni Prasad Shukla

Ph.D. (Indian Institute of Technology Bombay)
Assistant Professor Grade II
Dept of Mathematics
tpshukla@nitw.ac.in

Areas of Research

Quasilinear Partial Differential Equations, Nonlinear Waves

Dr. Sukla Mondol

PhD., Indian Institute of Science Bangalore (IISc)
Assistant Professor Grade II
Dept of Metallurgical and Materials Engineering
suklam@nitw.ac.in

Areas of Research

Alloy development, Microstructural characterization, Transmission electron microscopy (TEM), Material processing and Mechanical properties of alloys and composites

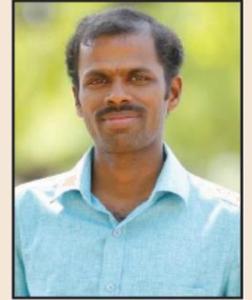


Dr. K Udaykumar

Ph.D., Indian Institute of Technology Madras (IIT-M)
Assistant Professor Grade II
Dept of Physics
kanapuram.udaykumar@nitw.ac.in

Areas of Research

Thin films and Devices



Dr.T.Rahul

Ph.D., National Institute of Technology Warangal (NIT-W)
Assistant Professor Grade II
Dept of School of Management
rahult@nitw.ac.in

Areas of Research

Consumer Behaviour, Marketing Analytics



Dr. Gaurav Kumar Sharma

PhD., Indian Institute of Science Bangalore (IISc)
Assistant Professor Grade II
Dept of Mechanical Engineering
gaurav@nitw.ac.in

Areas of Research

Computer Aided Design, Product Design, Digital Manufacturing

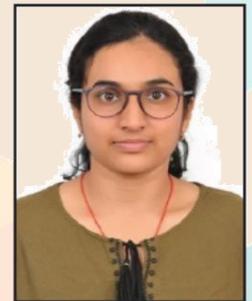


Dr. Tuhina Mukherjee

Ph.D. (Indian Institute of Technology Delhi)
Assistant Professor Grade II
Dept of Mathematics
tuhina@nitw.ac.in

Areas of Research

Analysis of Partial Differential Equations



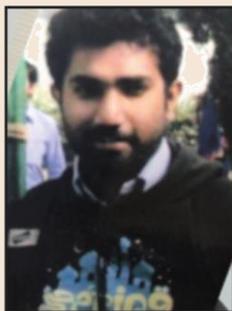
Dr. Hitesh Borkar

Ph.D. from AcSIR CSIR-NPL Delhi
Assistant Professor Grade II
Dept of Physics
bhitesh@nitw.ac.in

Areas of Research

Opto-electronics, Energy harvesting materials and devices





Dr. Vishnu R

Ph.D., Indian Institute of Technology Kharagpur (IIT-KGP)
Assistant Professor Grade II
Dept of CIVIL Engineering
vsr@nitw.ac.in

Areas of Research

Pavement Engineering

Dr. Y. Raghupathy

Ph.D., Indian Institute of Science Bangalore (IISc)
Assistant Professor Grade II
Dept of Metallurgical and Materials Engineering
yraghupathy@nitw.ac.in

Areas of Research

Applied Nanomaterials, Coatings, Corrosion Engineering



Dr. Aalu Boda

Ph. D from University of Hyderabad
Assistant Professor Grade II
Dept of Physics
abdop@nitw.ac.in

Areas of Research

Theoretical Condensed Matter Physics:
Low-Dimensional Systems (QDs), Spintronics and DFT.

Dr. Anant Kumar Rai

Ph.D., Indian Institute of Technology Roorkee (IIT-R)
Assistant Professor Grade II
Dept of Mechanical Engineering
anant@nitw.ac.in

Areas of Research

Fluid mechanics, Hydraulic turbines, Turbomachinery, Hydropower, Renewable Energy, Material wear testing, Sediment Transport



Dr. Ram Krishan

Ph. D, Indian Institute of Technology Delhi (IIT-D)
Assistant Professor Grade II
Dept of Electrical Engineering
rkrishan@nitw.ac.in

Areas of Research

Power System Stability and Optimization, Grid Integration of Renewable Energy Resources and Battery Energy Storage System

Dr. Kishant Kumar

Ph. D, Indian Institute of Technology Guwahati (IIT G)
Assistant Professor Grade II
Dept. of Chemical Engineering

Area of Research

Molecular Dynamics and Monte Carlo Simulation, DFT Calculation, Grand Canonical Monte Carlo Simulation and Gas Adsorption



Dr. Sangharatna Godbole

Postdoc, National University of Singapore (NUS)

Ph.D., National Institute of Technology Rourkela (NIT-R)

Assistant Professor Grade II
Dept. of Computer Science and Engineering

Area of Research

Program Analysis and Software Testing

