



UNIVERSITY

GWALIOR • MP • INDIA

“CELEBRATING DREAMS”



सत्यमेव जयते

Department of Science & Technology
Government of India

3rd INNOVATION IN SCIENCE PURSUIT FOR INSPIRED RESEARCH INSPIRE-2016 WINTER-SCIENCE CAMP

DECEMBER 12-16, 2016



INSPIRE-2015
WINTER-SCIENCE CAMP
DECEMBER 15-19, 2015



Organized by: Department of Physics, School of Sciences, ITM University Gwalior



3rd INNOVATION IN SCIENCE PURSUIT FOR INSPIRED RESEARCH INSPIRE-2016 WINTER-SCIENCE CAMP

DST INSPIRE CAMP

“Innovation in Science pursuit for Inspired Research (INSPIRE)” is an innovative programme sponsored and managed by the Department of Science & Technology for attraction of talent to Science. The basic objective of INSPIRE is to communicate to the youth of the country the excitement of creative pursuit of science, attract talent to the study of science at an early age and thus build the required critical human resource pool for strengthening and expanding the Science & Technology.

One of the components of “Scheme for Early Attraction of Talent for Science (SEATS)” is INSPIRE Internship in which annually about 50,000 students of top 1% performers in Class X board examinations and pursuing science at Higher Secondary level are being given an exposure with leaders in science in the Summer/Winter camps to experience the joy of innovations. These Science Camps essentially nourish the curiosity of children in science; help them to think out of the box and attract the students at an early age of 16-17 years (i.e. in XI standard) to enroll in science subjects.

ABOUT PROGRAM

ITM University, Gwalior has received grant-in-aid continuously for the third time to organize a Winter Science Camp during 12th -16th Dec. 2016. It is an opportunity to invite the students of all over M.P. of class XI who have secured A1 grade in CBSE or 84.5% in M.P. Board in class X to participate in the Science camp.

The camp is centred on the following objectives:

- To develop scientific temper in the young minds & make them aware about the current frontiers of science.
- To bring all areas of natural sciences on the same platform with emphasis on interdisciplinary aspects so as to explore the vast realm of science.
- To discuss contemporary issues related with Environment, Biomedical Sciences, Green Energy, Space Exploration and Conservation of Natural Resources.

In order to meet the objectives, following activities are planned:

Invited talks:

Expert lectures of the eminent scientists and academicians from all over the country in different fields of Science and Technology.

Practical Demonstrations:

To involve young minds into workshops/labs to get substantial experience through hands-on activities.

Expert Interaction:

An opportunity to interact with Experts of national and international repute. Students can interact individually to clear doubts / queries.

Competitions:

Debate, Quiz & Poster Competitions based on general Sciences and topics of general awareness will be organised.

Walk and Talk:

A platform to inspire participants to interact with University scholars to get acquainted with their projects of different areas.





ITM UNIVERSITY

ITM University Gwalior is a multidisciplinary University with an international reputation for the quality of its research and teaching across the academic spectrum. The University has received more than 20 awards & has been ranked in top category by a number of Government and other independent agencies. Recently the University is **Ranked 32nd in Management & 58th in Engineering** by National Institutional Ranking Framework, Ministry of HRD, Govt. of India.

The University is approved by the concerned regulatory bodies of Govt. of India & the state of M.P., required to run courses in Engineering, Management, Pharmacy, Commerce, Agriculture, Architecture, Computer Applications, Teacher Education, Art & Design, Physical Education, Sciences, Law, India & South Asia Studies, Nursing etc. It is at the forefront of learning, teaching & research and leader in many different fields. It seeks to sustain and enhance its excellence as an institution of higher learning through outstanding teaching and world-class societies they serve. The University is recognised by UGC and is a member of AIU.

SCHOOL OF SCIENCES

The School of Sciences is a premier school of ITM University offering education and research in Physics, Chemistry, Mathematics, Biotechnology, Food Technology and Microbiology. It is currently offering under graduate, post graduate and Ph.D programmes.

The curriculum is structured to provide a common, board-based foundation. A significant practical component also exists in the curriculum that trains students. Seminars and assignments are designed to pave way for bringing out their intellectual and interactive skills in analyzing scientific problems. To groom the students international/national conferences, workshops, millennium lecture series and co-curricular activities are conducted on regular basis. The School of Sciences has well equipped laboratories for Physics, Chemistry, Environment, Biotechnology, Food Technology and Microbiology. The School of Sciences has advanced Central instrumentation facility having sophisticated instruments.

GLIMPSES OF PREVIOUS INSPIRE WINTER SCIENCE CAMPS

INSPIRE-2014

The first INSPIRE winter science camp was organised from 9-13 Dec. 2014 in which 150 meritorious students participated from various schools. The eminent Scientists and Professors who unveiled the mysteries of Science in front of students included Dr. Arvind, Prof. & Dean (R&D) IISER, Mohali, Dr. Kavita Associate Prof. IISER, Mohali, Dr. D. V. Kamboj and Dr. M. Boopathi from DRDE Gwalior, Dr. R. K. Sharma Prof. of Mathematics IIT Delhi, Dr. Subra Anant Krishnan, Prof. of Radio astronomy, Pune University, Dr. K. K. Bhasin Prof. of Chemistry Punjab University and Dr. Dinesh Varshney, Prof. of Physics DAV Indore. Lectures were delivered on important topics like quantum world, NMR Spectroscopy, Biodegradation of human waste, Safety measures for chemical warfare, Radio astronomy and Mars expedition. Science quiz, Poster making, Debate and visit to DRDE laboratories were also organised during the camp.

INSPIRE-2015

The 2nd Inspire Winter Science Camp was organised from 15-19 Dec. 2015 and 157 meritorious students participated in it. The chief guest of the inaugural ceremony, Dr. Akhilesh Kumar Pandey, Chairman Private University Regulatory Commission, inspired students to develop scientific approach. Dr. Kapil Tripathi, Scientist E, Vigyan Prasar, DST, New Delhi discussed the role of DST in promoting Science throughout the country. Dr. Bhanu Pratap Singh Scientist E, NPL, New Delhi delivered talk on Carbon Nanotubes & Nanotechnology. Dr. Ishan Patro, Prof. Jiwaji University Gwalior highlighted the function and development of human brain. Dr. Sanio S. Zade, Prof. of Chemistry IISER Kolkata explained the working of solar cell. Dr. Ajay, Prof. IIT Roorke gave a presentation on the life span of Einstein and his discoveries. Dr. Sudeep Acharya, Prof. Kolkata University gave lecture on basic mathematical number system and Dr. H. M. Antia, Scientist TIFR Mumbai, shared his views on Solar system. Hon'ble Chancellor





of ITM University Shri Ramashankar Singh motivated and inspired the student for innovative learning.

The practical demonstration of Basics Principles of Science was done by Dr. Akhilesh Shrivastava, Principal HSS Rajasthan. Along with this the various practical sessions in different laboratories of ITM University were organised to give hand-on experience to the students. Students also enjoyed science fiction movie show. Quiz, poster making, Debate competitions and Industrial visit were important part of the INSPIRE camp 2015.



Chief Patron:

Shri Ramashankar Singh
Chancellor, ITM University Gwalior

Patrons:

Smt. Kanupriya Singh Rathore
Chairperson, ITM Universe Vadodara, Gujarat

Smt. Ruchi Singh
Vice President, ITM University Gwalior

Shri Ravindra Singh Rathore
Managing Director, ITM Universe, Vadodara, Gujarat

Dr. Daulat Singh Chauhan
Managing Director, ITM University Gwalior

Advisory Committee:

Prof. Dr. Kamal Kant Dwivedi, Vice Chancellor, ITM University

Prof. R. D. Gupta, Advisor to Chancellor, ITM University

Dr. Omveer Singh, Registrar, ITM University

Dr. Ranjeet S. Tomar, Dean SOET, ITM University

Dr. Vandana Kushwah, Dean SOS, ITM University

Coordinator:

Dr. Archana Kansal, Head, Dept. of Physics, ITM University

Co-Coordinator:

Dr. Y.C. Goswami, Professor, Dept. of Physics, ITM University

Organizing Members:

- Mr. Uday P. Gahlaut
- Dr. Santosh Sharma
- Dr. Shalabh Sharma
- Dr. Khursheed A. Wani
- Dr. Shivom Singh
- Dr. Prabha Dixit • Dr. Archana Sharma
- Dr. Rupali Rastogi
- Dr. Jyoti Tomar • Ms. Chanda Purswani
- Mr. G.N. Saxena
- Mr. Arun Kushwah • Dr. A.R. Mishra
- Mr. Alankar Shastri
- Mrs. Tripti Pathak • Dr. Raj Kumari



“ CELEBRATING DREAMS ”

INSPIRE - 2016 | WINTER - SCIENCE CAMP

School of Sciences, ITM University Campus, AH-43, Bypass Turari,
Jhansi Road, Gwalior (M.P.) – 474001 India.

M. 08120432665, 09425121044

Email: inspire@itmuniversity.ac.in, hodphysics@itmuniversity.ac.in

Website: www.itmuniversity.ac.in