

UGC-Malaviya Mission Teacher Training Centre
Himachal Pradesh University, Shimla-5
2-Week Refresher Course on Physical, Chemical & Material Sciences (RC-351)

w.e.f.- 18.11.2024 to 30.11.2024

Programme Team:

Prof. D. R. Thakur, Director

Dr. Sandeep Chauhan, Course Coordinator

Dr. Ashwani Kumar, Assistant Director

Timing of Technical Sessions:

Warming-up Session: (i) 9.45 a.m. to 10.00 a.m. (Yoga & Meditation)

(ii) 10.00 a.m. to 10.30 a.m. (Reflection of previous day)

I 10.30 a.m. to 12:00 noon

II 12.00 noon to 01.30 p.m.

III 02.00 p.m. to 03.30 p.m.

IV 03.30 p.m. to 05.00 p.m.

Date & Day	Session	Topic	Resource Person
18.11.2024 (Monday)	I	Inauguration Session	Chief Guest: Prof. Mahavir Singh, Department of Physics, HPU Shimla
	II	Overview of the Refresher Course	Prof. D.R. Thakur, Director, UGC-HRDC, H.P. University Shimla
	III	Setting the Tone of the Course	Dr. Ashwani Kumar, Assistant Director, UGC-MMTTC, H.P. University, Shimla
	IV	Breaking the Ice & Formation of Committee	
19.11.2024 (Tuesday)	I	Functionalized Nanomaterials for wastewater treatment	Prof. G.R. Chaudhary, Department of Chemistry, PU Chandigarh Email: grc22@pu.ac.in
	II	Recent trends in Narcotics and psychotropic drugs	Dr. Kapil Sharma, Assistant Director, State State Forensic Lab Junga Email ID: sharmakapil78@gmail.com
	III	Materials of 21 st Century: Characterization and Applications study	Prof. Harish Kumar, Chairman Department of Chemistry, CU of Haryana, Mahendergarh Email ID: harishkumar@cuh.ac.in
	IV	Guidelines for individual Presentation / Sharing of Committee Decisions/Discussion and Instructions on committee	Dr. Ashwani Kumar, Assistant Director, UGC-MMTTC, H.P. University, Shimla
20.11.2024 (Wednesday)	I	Quantum Dots	Prof. PK Ahluwalia, Retd. Professor, Department of Physics, HP University Email ID: pk_ahluwalia7@yahoo.com
	II	Magnetism	Prof. Raman Sharma, Department of Physics, HPU Shimla Email ID: bramans70@yahoo.co.in
	III	Plastic Waste Management	Prof. Venkat Krishnan, Department of Chemistry, IIT Mandi, Email ID: vkn@iitmandi.ac.in
	IV	Distribution of Topics of Individual Presentations	Dr. Sandeep Chauhan, Course Coordinator
21.11.2024 (Thursday)	I	Scientific Mystry of the Century: The AntarcticaOzone Hole	Prof. Pawan Kumar Sharma, Department of Chemistry, CU Haryana Email ID: talk2pawan@gmail.com
	II	Innovative Skills in Teaching and Learning	Prof. Sudhir Syal, Deptt. of Biotechnology & Bioinformatics, JUIT Waknaghat Email ID: sudhir.syal@juitsolan.in
	III	Environmental Issues	Prof. D.R.Thakur, Director, UGC-MMTTC
	IV	Individual Presentations	Prof. G.S. Chauhan, Retired Professor, Department of Chemistry, HPU Shimla Email ID: ghanshyam_in2000@yahoo.com

22.11.2024 (Friday)	I	Photocatalytic H ₂ production, nitro-organic reduction, and toxic pollutant degradation by different nanocatalysts under visible/solar irradiation	Prof. Bonamali Pal, Department of Chemistry & Biochemistry, Thapar Institute of Engineering & Technology (Deemed to be university), Patiala, Punjab Email ID: bpal@thapar.edu
	II	Nanomaterials for wastewater treatment	Saif Ali Chaudhary, Department of Chemistry, Jamia Millia Islamia University Email: schaudhry@jmi.ac.in
	III	Development of Boron Basednanomaterials for Boron Neutron Capture Therapy	Dr. Akshay Sharma, Associate Professor, Department of Physics, SPU Mandi, HP Email ID: akshaykumar@spumandi.ac.in
	IV	Individual Presentations	Prof. D.K. Sharma, Retired Professor, Department of Chemistry, HPU Shimla Email ID: dksharma_dk@rediffmail.com
23.11.2024 (Saturday)	I	Spinel Ferrites and their applications	Prof. Pankaj Sharma, NITTTR Chandigarh Email ID: pankaj@nitttrchd.ac.in
	II	Energy storage devices	Prof. Atul Khanna, Dept. of Physics, GNDU Amritsar Email ID: atul.phy@gndu.ac.in
	III	Framework and Non framework materials as futuristic promising catalysts	Prof. (Dr.) A. Sakthivel, FRSC, FICS Dean, School of Physical Sciences Department of Chemistry, Central University of Kerala, Kasaragod,Tejaswini Hills Periya Kerala Email ID: sakthivelcuk@cukerala.ac.in
	IV	Yoga for Stress Management	Dr. Arpita Negi, Dept. of Yoga, HPU
25.11.2024 (Monday)	I	Science of nanomaterials; opportunity and challenges	Prof. M.S Chauhan (Retd.) Department of Chemistry, HP University Email ID:
	II	Novel nano structured materials and their applications	Prof. Ashok Sharma Department of Chemistry, DCRUST Murrthal, Haryana Email ID:draksharma.chem@dcrust.org
	III	Nanomaterials	Prof. Mahavir Singh, Department of Physics, HP University Email ID: mahavirhpu@gmail.com
	IV	Individual Presentations	Dr. Jasvir Singh Kanwar Associate Professor, Department of Chemistry, HP University Email ID: kanwar_js@yahoo.com
26.11.2024 (Tuesday)	I	Emerging solvents for energy storage devices	Dr. Ramesh Thakur Department of Chemistry, HP University Email ID: drthakurchem@gmail.com
	II	Phytochemical Investigation of Himalayan medicinal Plants	Dr. Upender Sharma, Principal Scientist, Chemical Technology Division, IHBT Palampur Email ID: upendra@ihbt.res.in
	III	Individual Presentations	Dr. Sunil Kumar, Associate Professor, Department of Chemistry, HPU Shimla Email ID:sunil.667788@gmail.com
	IV	Individual Presentations	Dr. Kiran Kumar, Associate Professor, Department of Chemistry, HPU Shimla Email ID: kgrewalcg@gmail.com
27.11.2024	I	Ferromagnetic materials for	Prof. N.S. Negi, Department of Physics, HP

(Wednesday)		multifunctional applications.	University Email ID: nsn_phy_hpu@yahoo.com, nainjeet12@gmail.com
	II	Pranayaam: A Scientific Approach	Prof. Suvarcha Chauhan (Retd.) Department of Chemistry, HPU Shimla Email ID:scschauhan19@gmail.com
	III	Individual Presentations	Dr. Yogesh Kumar Associate Professor in Chemistry GC Solan
	IV	Individual Presentations	Dr. Nisha Sharma, Associate Professor, Department of Chemistry, HPU Shimla Nishasharma581@gmail.com
28.11.2024 (Thursday)	I	The Alchemical Voyage: Drug molecules' Journey from lab to clinic	Prof. Vipin Kumar, Department of Chemistry, GNDU Amritsar Email ID:chvipanorg@gmail.com
	II	Development of Pilot Scale Bioelectrochemical Reactor for green E-fuel production	Dr. Lakhveer Singh, Chairman, Department of Chemistry, SPU Mandi, HP Email ID: lakhveer@spumandi.ac.in
	III	Lignocellulosic biomass derived adsorbents for wastewater treatment	Dr. Sandeep Chauhan, Course Coordinator
	IV	Emerging Materials of Energy Resources	Prof. Devender Singh Chairman Dept. of Chemistry, MDU Rohtak
29.11.2024 (Friday)	I	Dielectrics	Prof. Vineet Kumar, Deptt. of Biotechnology & Bioinformatics, JUIT Waknaghat Email ID: vineet.sharma@juitsolan.in
	II	Importance of Physicochemical studies in drug formulations	Dr. Poonam Sharma, Deptt. of Biotechnology & Bioinformatics, JUIT Waknaghat Email ID: poonam.sharma@juitsolan.in
	III	Overview of DRDO & Research Funding Opportunities for Academia	Dr. Gaurav Mittal, Member Secretary, Life Science Research Board (LSRB) DRDO, Civil Lines Delhi Email: lsrb.hqr@gov.in Gauravmittal23@gmail.com
	IV	Hidden Talent	Dr. Sandeep Chauhan, Course Coordinator
30.11.2024 (Saturday)	I	Discussion on MCQ Test	Dr. Ashwani Kumar, Assistant Director Dr. Sandeep Chauhan, Course Coordinator
	II	MCQ Test/ Multi Evaluation	Dr. Ashwani Kumar, Assistant Director Dr. Sandeep Chauhan, Course Coordinator
	III & IV	Valedictory Ceremony	Chief Guest: Prof. Nagesh Thakur, Department of Physics, HP University Email ID: ntb668@yahoo.co.in