

# 16th Uttarakhand State Science and Technology Congress 2021-22

22-24 June, 2022

Venue : Graphic Era University, Clement Town, Dehradun

## Selected Abstracts

### Agricultural Sciences

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Agricultural Sciences	AGR-01	I	O	A STUDY OF STUDENTS' ATTITUDE TOWARDS ONLINE EDUCATION DURING CORONA PANDEMIC	Ankita Bhatt*	Department of Agricultural Extension and Communication, College of Agriculture, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:bhattankita271@gmail.com">bhattankita271@gmail.com</a>
2	Agricultural Sciences	AGR-02	I	O	NEW SOURCE OF RESISTANCE TO ANGULAR LEAF SPOT IN FRENCH BEAN GERMPLASM FROM GARHWAL HIMALAYAS	Navneeti Chamoli <sup>1*</sup> , Deepti Prabha <sup>1</sup> , Jai Singh Chauhan <sup>1</sup>	Dept. of Seed Science & Technology, School of Agriculture and Allied Sciences, HNB Garhwal University, Srinagar, Pauri Garhwal	<a href="mailto:navneetichamoli@gmail.com">navneetichamoli@gmail.com</a>
3	Agricultural Sciences	AGR-03	I	O	UTILIZATION OF WILD APRICOT KERNELS FOR PREPARATION OF PROTIEN RICH EXTRUDED SNACK	Neha Rawat*, Satish Kumar Sharma, Deepa Saini, Riya Barthwal	Department of Food Science and Technology, College of Agriculture, G.B. Pant University of Agriculture & Technology, Pantnagar, U.S. Nagar	<a href="mailto:rawatneha1225@gmail.com">rawatneha1225@gmail.com</a>
4	Agricultural Sciences	AGR-04	I	O	EFFECT OF DIFFERENT WHEAT ESTABLISHMENT METHOD AND RICE RESIDUE LEVELS ON EMERGENCE GROWTH AND YIELD OF WHEAT UNDER DSR -WHEAT CROPPING SYSTEM	Sanyogita Chaudhary*, V. Prataph Singh, Subhas Chandra, T.P Singh, S.P Singh	Department of Agronomy, College of Agriculture, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:sanyogita65@gmail.com">sanyogita65@gmail.com</a>
5	Agricultural Sciences	AGR-05	I	O	WHEAT ( <i>Triticum aestivum</i> L.) GROWTH AND YIELD UNDER DIFFERENT ESTABLISHMENT METHODS AND INTER-CULTURE PRACTICES	Suhita Pyne <sup>*1</sup> , Gurvinder Singh <sup>1</sup> , M.S. Negi <sup>1</sup> , Subhash Chandra <sup>1</sup> , Amit Bhatnagar <sup>1</sup> , Arkaprava Roy <sup>2</sup>	<sup>1</sup> G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar <sup>2</sup> Indian Agricultural Research Institute	<a href="mailto:suhitapyne.31@gmail.com">suhitapyne.31@gmail.com</a>

6	Agricultural Sciences	AGR-06	I	O	STUDIES ON FLORAL BIOLOGY AND POLLINATION BEHAVIOUR OF GIANT HIMALAYAN LILY ( <i>CARDIOCRINUM GIGANTEUM</i> WALL.) IN TEMPERATE REGION OF UTTARAKHAND	Surendra Lal*, Mamta Bohra, B.P. Nautiyal, A.S. Bisht,	College of Horticulture, VCSG, UUHF, Bharsar, Pauri Garhwal	<a href="mailto:surisingh1235@gmail.com">surisingh1235@gmail.com</a>
7	Agricultural Sciences	AGR-07	I	O	STUDY ON METHANOL EXTRACTS FROM <i>VITEX SPECIES</i> FOR THEIR QUANTITATIVE AND QUALITATIVE ESTIMATION OF PHENOLICS, WITH BIOLOGICAL ACTIVITIES	Sushila Arya*, Ravendra Kumar, Om Prakash	Department of Biological Sciences, College of Basic Sciences and Humanities, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:sushilaarya.sa2626@gmail.com">sushilaarya.sa2626@gmail.com</a>
8	Agricultural Sciences	AGR-08	II	O	VALIDATION ON THE EFFICACY OF SUBHASH PALEKAR'S NATURAL FORMULATIONS AGAINST MUSTARD APHID, <i>LIPAPHIS ERYSIMI</i> (KALT.) AT PANTNAGAR, UTTARAKHAND	Anju Yadav*, Ruchira Tiwari	G.B. Pant University of Agriculture & Technology, Pantnagar, U.S. Nagar	<a href="mailto:anjuy2707@gmail.com">anjuy2707@gmail.com</a>
9	Agricultural Sciences	AGR-09	II	O	UTILIZATION OF WILD APRICOT KERNELS FOR PREPARATION OF TRADITIONAL INDIAN SWEETS	Deepa Saini*, Satish Kumar Sharma, Neha Rawat, Riya Barthwal	Department of Food Science and Technology, College of Agriculture, G.B. Pant University of Agriculture & Technology, Pantnagar, U.S. Nagar	<a href="mailto:deepasaini344@gmail.com">deepasaini344@gmail.com</a>
10	Agricultural Sciences	AGR-10	II	O	POSSIBILITIES OF FARAN CULTIVATION IN CHAMOLI DISTRICT OF UTTARAKHAND	Tanuja*, D.K. Rana	Department of Horticulture, School of Agriculture and Allied Science, H.N.B. Garhwal University, Srinagar, Pauri Garhwal	<a href="mailto:dimritanuja.18@gmail.com">dimritanuja.18@gmail.com</a>
11	Agricultural Sciences	AGR-11	II	O	ISOLATION, IDENTIFICATION AND CHARACTERIZATION OF PROBIOTIC BACILLUS SPECIES FROM UTTARAKHAND	Vishakha Bisht* <sup>1</sup> , Ruchir Gupta <sup>1</sup> , Sanjay Shrivastav <sup>1</sup> , Naveen Kumar Navani <sup>2</sup>	<sup>1</sup> AXA Parentals Limited, Roorkee, Haridwar <sup>2</sup> Chemical Biology Laboratory, Department of Biosciences and Bioengineering, Indian Institute of Technology Roorkee, Roorkee, Haridwar	<a href="mailto:vishakha.bisht27@gmail.com">vishakha.bisht27@gmail.com</a>

12	Agricultural Sciences	AGR-12	III	O	COMBINED INFLUENCE OF CHEMICAL FERTILIZERS AND BIO-INOCULANTS ON DIFFERENT HORTICULTURAL PARAMETERS OF COWPEA [ <i>VIGNA UNGUICULATA</i> (L.) WILCZEK] CV. PANT LOBIA-1 UNDER SRINAGAR GARHWAL HILLS	D.K. Rana*	Department of Horticulture School of Agriculture and Allied Science, H.N.B. Garhwal University, Srinagar, Pauri Garhwal	<a href="mailto:drdkrana@gmail.com">drdkrana@gmail.com</a>
13	Agricultural Sciences	AGR-13	I	P	SCHEDULING OF FERTIGATION LEVELS IN CUCUMBER ( <i>Cucumis sativus</i> L.) UNDER POLYHOUSE	Abhilash Singh <sup>*1</sup> , Dhirendra Singh <sup>1</sup> , Lalit Bhatt <sup>1</sup> , P.K. Singh <sup>2</sup> , Poonam Gautam <sup>3</sup>	<sup>1</sup> Department of Vegetable Science, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar <sup>2</sup> Department of Irrigation & Drainage Engineering, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar <sup>3</sup> Department of Soil Science, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:abhilashsinghabhi4@gmail.com">abhilashsinghabhi4@gmail.com</a>
14	Agricultural Sciences	AGR-14	I	P	PLANT GROWTH PROMOTING ROLE OF UREA-HYDROXYAPATITE (HA) NANOCOMPOSITE IN FINGER MILLET ( <i>ELEUSINE CORACANA</i> (L.) GAERTN.) DURING WELL WATERED AS WELL AS DROUGHT STRESS CONDITIONS : AN EMERGING FERTILIZATION TECHNIQUE UNDER CLIMATE CHANGING SCENARIOS	Dhruv Mishra*, Preeti Chaturvedi	Department of Biological Sciences, College of Basic Sciences and Humanities, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:shivads594@gmail.com">shivads594@gmail.com</a>
15	Agricultural Sciences	AGR-15	I	P	FOLIAR EFFICACY OF DIFFERENT ESSENTIAL OILS FOR YIELD ATTRIBUTES AND PEST MANAGEMENT IN <i>MENTHA ARVENSIS</i>	Divya <sup>*1</sup> , Preeti Chaturvedi <sup>2</sup> , K.T. Venkatesha <sup>2</sup>	<sup>1</sup> Department of Biological Science, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar <sup>2</sup> Central Institute of Medicinal and Aromatic Plants (CSIR- CIMAP), Research Centre, Pantnagar, U.S. Nagar	<a href="mailto:divya1708.dp@gmail.com">divya1708.dp@gmail.com</a>

16	Agricultural Sciences	AGR-16	I	P	NUTRIENT STATUS OF DIFFERENT SOIL SAMPLES OF DEHRADUN DISTRICT OF UTTARAKHAND AND THEIR CORRELATION WITH SOIL PROPERTIES	Komal Rawat*, Shishir Tandon	Department of Chemistry, G.B. Pant University of Agriculture & Technology, Pantnagar, U.S. Nagar	<a href="mailto:komalrawat0911@gmail.com">komalrawat0911@gmail.com</a>
17	Agricultural Sciences	AGR-17	II	P	DISPOSAL PATTERNS AND CONSTRAINTS OF AGRO-FORESTRY SYSTEM IN U. S .NAGAR DISTRICT OF UTTARAKHAND	Anuj Kumar Yadav*, S.K. Srivastava	G.B. Pant University of Agriculture & Technology, Pantnagar, U.S.Nagar	<a href="mailto:anuj2800@gmail.com">anuj2800@gmail.com</a>
18	Agricultural Sciences	AGR-18	II	P	CLIMATE CHANGE IMPACT ON POTENTIAL DISTRIBUTION OF <i>Spodoptera litura</i> (Fabricius) IN NORTH-WESTERN HIMALAYAN REGION, UTTARAKHAND	Rashmi Joshi* <sup>1</sup> , Neeta Gaur <sup>2</sup> , Sudha Mathpal <sup>2</sup>	<sup>1</sup> Department of Horticulture & Food Processing, Uttarakhand <sup>2</sup> G.B. Pant University of Agriculture & Technology, Pantnagar, U.S. Nagar	<a href="mailto:rashmipandey.hdw@gmail.com">rashmipandey.hdw@gmail.com</a>

## Biotechnology, Biochemistry and Microbiology

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Biotechnology, Biochemistry and Microbiology	BIO-01	I	O	A GLOBAL CATABOLIC REGULATOR IMPARTS RESISTANCE AGAINST CARBAPENEMS IN <i>ACIENTOBACTER BAUMANNII</i> ATCC17978	Abhiroop Sett*, Ranjana Pathania	Department of Biosciences and Bioengineering, IIT Roorkee, Haridwar	<a href="mailto:asett@bt.iitr.ac.in">asett@bt.iitr.ac.in</a>
2	Biotechnology, Biochemistry and Microbiology	BIO-02	I	O	GC-MS ANALYSIS OF <i>DALBEGIA SISSOO</i> 'S EXCEPTIONAL RHIZOPHERE RESERVE AND FINDING ANY MARQUEE BIOMOLECULE	Amit Singh Rana*, Himanshu Pathak, Ashish Mamgain, Ashutosh Dubey, Ashok Kumar Verma	Department of Biochemistry Govind Ballabh Pant University of Agriculture and Technology, Pantnagar, Udham Singh Nagar	<a href="mailto:44547asrana@gmail.com">44547asrana@gmail.com</a>
3	Biotechnology, Biochemistry and Microbiology	BIO-03	I	O	PHYTOCHEMICAL INVESTIGATION AND EVALUATION OF ANTIOXIDANT AND ANTI-INFLAMMATORY POTENTIAL OF ACCESSIONS DERIVED FROM <i>Anaphalis busua</i> GROWN IN HILLY REGIONS OF UTTARAKHAND	Ananya Bahuguna*, Kanchan Gairola, S.K. Dubey	Department of Biochemistry, Govind Ballabh Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:ananyabahuguna95@gmail.com">ananyabahuguna95@gmail.com</a>

4	Biotechnology, Biochemistry and Microbiology	BIO-04	I	O	BIOLOGICAL PRETREATMENT USING SILICASE AND LACCASE PRODUCING MICROBIAL CONSORTIA OF PADDY BIOMASS AS AN EFFECTIVE ECOFRIENDLY TOOL FOR BIOCONVERSION INTO FERMENTABLE SUGARS	Anjali Solanki*, Lakshmi Tiwari	G.B. Pant University of Agriculture and Technology Pantnagar, U.S. Nagar	<a href="mailto:annisolanki448@gmail.com">annisolanki448@gmail.com</a>
5	Biotechnology, Biochemistry and Microbiology	BIO-05	I	O	<i>VIBRIO NATRIEGENS</i> : AN EMERGING REPLACEMENT OF MOLECULAR WORKHORSE, <i>E.COLI</i> FOR BIOSENSING PURPOSES	Ankita Bhatt*, Shubham Jain, Sourik Dey	Chemical Biology lab, IIT Roorkee, Haridwar	<a href="mailto:abhatter@bt.iitr.ac.in">abhatter@bt.iitr.ac.in</a>
6	Biotechnology, Biochemistry and Microbiology	BIO-06	I	O	IMPLICATION OF AGAR PLUG IMMOBILIZED <i>Penicillium crustosum</i> PWWS 6 FOR CARCINOGENIC CONGO RED DYE CONTAINING WASTE WATER BIOREMEDIATION	Barkha Sharma*, Shalini Tiwari, Lakshmi Tewari	G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:barkhajb3sharma@gmail.com">barkhajb3sharma@gmail.com</a>
7	Biotechnology, Biochemistry and Microbiology	BIO-07	I	O	IDENTIFICATION AND BIOLOGICAL CONTROL OF <i>ALTERNARIA</i> SP., CAUSING LEAF SPOT IN <i>PTERYGOTA ALATA</i>	Garima*, Pooja Kapoor, Ranjana Juwantha	Forest Pathology Discipline, Forest Research Institute, Dehradun	<a href="mailto:garima45.1@gmail.com">garima45.1@gmail.com</a>
8	Biotechnology, Biochemistry and Microbiology	BIO-08	I	O	ZINC OXIDE NANOPARTICLES RESPONSE IN CALLUS CULTURES OF <i>Picrorhiza kurroa</i> Royle ex Benth. FOR PICROSIDE I PRODUCTION AND EXPRESSION ANALYSIS APPLYING REAL TIME PCR.	Geeta Rawat*, A.K. Gaur	Govind Ballabh Pant University of Agriculture and Technology, Pantnagar, Udham Singh Nagar	<a href="mailto:mgeetarawat@gmail.com">mgeetarawat@gmail.com</a>
9	Biotechnology, Biochemistry and Microbiology	BIO-09	I	O	OPTIMIZATION OF BACTERIAL BIOSURFACTANT PRODUCTION FROM OIL CONTAMINATED SOIL OF UTTARAKHAND	Geeta Rawat*, Vijay Kumar, Vivek Kumar	Department of Biosciences, Swami Rama Himalayan University, Jolly Grant, Dehradun	<a href="mailto:geetarawat171@gmail.com">geetarawat171@gmail.com</a>
10	Biotechnology, Biochemistry and Microbiology	BIO-10	I	O	PHYTOCHEMICAL COMPOSITION AND <i>IN VITRO</i> ANTIOXIDANT AND ANTI-INFLAMMATORY POTENTIAL OF ESSENTIAL OIL OF <i>ACMELLA ULIGINOSA</i> (AKARKARA), FROM UTTARAKHAND	Kanchan Gairola*, Ananya Bahuguna, S.K. Dubey	Department of Biochemistry Govind Ballabh Pant University of Agriculture and Technology, Pantnagar	<a href="mailto:kgairola0122@gmail.com">kgairola0122@gmail.com</a>

11	Biotechnology, Biochemistry and Microbiology	BIO-11	I	O	EXPLOITATION OF MICROORGANISMS ASSOCIATED WITH LEAF CUTTER ANTS OF UTTARAKHAND FOR THEIR ANTIFUNGAL ACTIVITY	Megha Choudhary* <sup>1</sup> , Vijay Kumar <sup>1</sup> , Bindu Naik <sup>2</sup> , Vivek Kumar <sup>1</sup> , Akhilesh Kumar <sup>1</sup>	<sup>1</sup> Department of Biosciences, Swami Rama Himalayan University, Jolly Grant, Dehradun <sup>2</sup> Department of Life Sciences, Graphic Era University, Dehradun	<a href="mailto:meghach99625@gmail.com">meghach99625@gmail.com</a>
12	Biotechnology, Biochemistry and Microbiology	BIO-12	I	O	PROXIMATE ANALYSIS OF PEA NUTRIENT ENHANCEMENT BY <i>ENSIFER ADHAERENS</i> KS23 IN <i>PISUM SATIVUM</i> L. CULTIVATED IN GARHWAL HIMALAYAS	Prashant Katiyar*, Dinesh Kumar Maheshwari	Gurukula Kangri (Deemed to be) University, Haridwar	<a href="mailto:rs.prashantkatiyar@gkv.ac.in">rs.prashantkatiyar@gkv.ac.in</a>
13	Biotechnology, Biochemistry and Microbiology	BIO-13	I	O	EVALUATION OF ANTIBACTERIAL AND ANTIOXIDANT ACTIVITY OF AN AYURVEDIC FORMULATION: A COMPARATIVE ANALYSIS	Rajesh Juyal* <sup>1</sup> , Piyush Kumar <sup>1</sup> , Rakesh Aggarwal <sup>2</sup> , Neelam Aggarwal <sup>2</sup> , Amit Raj <sup>2</sup> , Arjun Raj <sup>2</sup> , Naveen Kumar Navani <sup>1</sup>	<sup>1</sup> Chemical Biology Lab, Department of Biosciences and Bioengineering, Indian Institute of Technology Roorkee, Roorkee, Haridwar <sup>2</sup> Arogya Dham Global Aids Research Foundation, Mujaffarnagar, U.P. and Arogyadham Ayurveda Treatment Centre, Rishikesh	<a href="mailto:juyalrajesh43@gmail.com">juyalrajesh43@gmail.com</a>
14	Biotechnology, Biochemistry and Microbiology	BIO-14	I	O	REPURPOSING OF DRUG BANK COMPOUNDS AGAINST METALLOPROTEINASES 9 (MMP-9) ENZYME THROUGH <i>IN SILICO</i> TECHNIQUES	Shalini Mathpal <sup>1*</sup> , Priyanka Sharma <sup>2</sup> , Tushar Joshi <sup>3</sup> , Veena Pande <sup>4</sup> , Subhash Chandra <sup>5</sup>	<sup>1</sup> Department of Biotechnology, Bhimtal Campus, Bhimtal, Kumaun University, Nainital <sup>2</sup> Department of Botany, Kumaun University, D.S.B Campus, Nainital <sup>3</sup> Department of Biotechnology, Bhimtal Campus, Bhimtal, Nainital <sup>4</sup> Department of Biotechnology, Bhimtal Campus, Bhimtal, Nainital <sup>5</sup> Computational Biology & Biotechnology Laboratory, Department of Botany, Soban Singh Jeena University, Almora	<a href="mailto:shalinimathpal.121@gmail.com">shalinimathpal.121@gmail.com</a>

15	Biotechnology, Biochemistry and Microbiology	BIO-15	I	O	SMALL RNA ABSR28 REGULATES THE MOLECULAR SWITCH BETWEEN T6SS- TO T6SS+ IN <i>ACINETOBACTER BAUMANNII</i> AND HELPS IN PATHOGENESIS	Somok Bhowmik*, Ranjana Pathania	Department of Biosciences and Bioengineering, Indian Institute of Technology Roorkee, Haridwar	<a href="mailto:sbhowmik@bt.iitr.ac.in">sbhowmik@bt.iitr.ac.in</a>
16	Biotechnology, Biochemistry and Microbiology	BIO-16	I	O	AMBIGUOUS ROLE OF PHYTOHORMONE ETHYLENE IN PLANT-PATHOGEN INTERACTIONS	Sushant Sharma*, Santan Barthwal, Ajay Thakur	Genetics & Tree Improvement Division, Forest Research Institute Dehradun	<a href="mailto:sharma.sushant2511@gmail.com">sharma.sushant2511@gmail.com</a>
17	Biotechnology, Biochemistry and Microbiology	BIO-17	I	O	DEVELOPMENT OF ANTI-BACTERIAL DISINFECTANT FORMULATION FROM PYROLYZED BIO-OILS	Vaibhav Badoni* <sup>1</sup> , A.K. Verma <sup>1</sup> , Ashutosh Dubey <sup>1</sup> , B.R. Singh <sup>2</sup>	<sup>1</sup> Department of Biochemistry, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar <sup>2</sup> Department of Molecular Biology and Genetic Engineering, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:vaibhavbadoni0@gmail.com">vaibhavbadoni0@gmail.com</a>
18	Biotechnology, Biochemistry and Microbiology	BIO-18	II	O	A BOTTOM-UP SYNTHETIC BIOLOGICAL APPROACH TO MIMIC THE BACTERIAL DIVISOME TERNARY COMPLEX; <i>FTSZ-FTSA-PROTEIN AND MEMBRANE</i> ON SUPPORTED LIPID BILAYER (SLB)	Manoj Kumar Pal* <sup>1</sup> , Itzhak Fishov <sup>2</sup> , Mario-Feingold <sup>3</sup>	<sup>1</sup> Department of Life Sciences, Graphic Era (Deemed to be University) Dehradun <sup>2</sup> Department of Life Sciences, Ben Gurion University of the Negev, Israel <sup>3</sup> Department of Physics, Ben Gurion University of the Negev, Israel	<a href="mailto:manoj19823@gmail.com">manoj19823@gmail.com</a>
19	Biotechnology, Biochemistry and Microbiology	BIO-19	II	O	RECENT ADVANCES IN HYDROPONICS SYSTEM IN UTTARAKHAND	Meena* <sup>1</sup> , Prashant Singh <sup>1</sup> , Ashutosh Mishra <sup>2</sup> , V.S.P. Sinha <sup>3</sup> , S.B. Tripathi <sup>3</sup>	<sup>1</sup> Department of Chemistry, DAV (PG) College, Dehradun <sup>2</sup> Uttarakhand State Council for Science and Technology, Dehradun <sup>3</sup> Department of Natural Resources, TERI, SAS, New Delhi	<a href="mailto:chamolameena@gmail.com">chamolameena@gmail.com</a>
20	Biotechnology, Biochemistry and Microbiology	BIO-20	II	O	FINGER MILLET ( <i>Eleusine coracana</i> ) ENDOPHYTIC BACTERIA FOR MICRONUTRIENTS SOLUBILIZATION AND PLANT GROWTH PROMOTION	Renu Chaudhary*, Vijay Kumar, Sanjay Gupta, Vivek Kumar	Department of Biosciences, Swami Rama Himalayan University, Jolly Grant, Dehradun	<a href="mailto:renuchoudhary2512@gmail.com">renuchoudhary2512@gmail.com</a>



21	Biotechnology, Biochemistry and Microbiology	BIO-21	II	O	CROSS SECTIONAL STUDY OF PREVALENCE OF REPRODUCTIVE TRACT INFECTIONS (RTIs) AND SEXUALLY TRANSMITTED INFECTIONS (STIs) IN A TRTIARY CARE HOSPITAL OF DEHRADUN	Sangeeta Rawat*, Garima Mittal, Rajender Singh, Rahul Pal, Balakram Newly, Manish Thapliyal	Department of Microbiology, Himalayan Institute of Medical Sciences (HIMS, SRHU), Jolly Grant, Dehradun	<a href="mailto:sangu_rawat@yahoo.com">sangu_rawat@yahoo.com</a>
22	Biotechnology, Biochemistry and Microbiology	BIO-22	III	O	METABOLIC DIVERSITY OF MICROBES ASSOCIATED WITH LEAF CUTTER ANTS OF UTTARAKHAND	Vijay Kumar* <sup>1</sup> , Bindu Naik <sup>2</sup> , Megha Choudhary <sup>1</sup> , Akhilesh Kumar <sup>1</sup> , Vivek Kumar <sup>1</sup> , Sanjay Gupta <sup>1</sup>	<sup>1</sup> Department of Biosciences, Swami Rama Himalayan University, Dehradun <sup>2</sup> Department of Life Sciences, Graphic Era University, Dehradun	<a href="mailto:vijaygkp@gmail.com">vijaygkp@gmail.com</a>
23	Biotechnology, Biochemistry and Microbiology	BIO-23	III	O	MOLECULAR EVALUATION OF MYCOBACTERIUM TUBERCULOSIS DNA ISOLATES FROM EXTRA-PULMONARY SPECIMENS	Vikram Sethi* <sup>1</sup> , Aarti Kotwal <sup>1</sup> , Shailendra Raghuvanshi <sup>2</sup> , Rakhee Khanduri <sup>3</sup> , Varuna Jethani <sup>3</sup>	<sup>1</sup> Departments of Microbiology, Himalayan Institute of Medical Sciences, Swami Rama Himalayan University, Dehradun <sup>2</sup> Department of Radiodiagnosis, Himalayan Institute of Medical Sciences, Swami Rama Himalayan University, Dehradun <sup>3</sup> Department of Pulmonary Medicine, Himalayan Institute of Medical Sciences, Swami Rama Himalayan University, Dehradun	<a href="mailto:sethivikram11@gmail.com">sethivikram11@gmail.com</a>
24	Biotechnology, Biochemistry and Microbiology	BIO-24	I	P	DECIPHERING THE ROLE OF SMALL RNA ABSR25 in <i>ACINETOBACTER BAUMANNII</i> PHYSIOLOGY AND METABOLISM	Avik Pathak*, Abhiroop Sett, Nishant Jyoti, Ranjana Pathania	Department of Biosciences and Bioengineering, Indian Institute of Technology Roorkee, Roorkee, Haridwar	<a href="mailto:a_pathak@bt.iitr.ac.in">a_pathak@bt.iitr.ac.in</a>
25	Biotechnology, Biochemistry and Microbiology	BIO-25	I	P	<i>IN- SILICO</i> SCREENING OF POTENTIAL ANTILEISHMANIAL COMPOUNDS FROM FUNGAL METABOLITES	Disha Tewari* <sup>1</sup> , Shalini Mathpal <sup>1</sup> , Veena Pande <sup>1</sup> , Subhash Chandra <sup>2</sup>	<sup>1</sup> Department of Biotechnology, Bhimtal Campus, Bhimtal, Kumaun University, Nainital <sup>2</sup> Computational Biology & Biotechnology Laboratory, Department of Botany, Soban Singh Jeena University, Almora	<a href="mailto:tdisha.24@gmail.com">tdisha.24@gmail.com</a>



26	Biotechnology, Biochemistry and Microbiology	BIO-26	I	P	UNDERSTANDING THE EFFECT OF ABSR28 MEDIATED REGULATION OF <i>PNTB</i> IN <i>ACINETOBACTER BAUMANNII</i> PHYSIOLOGY AND VIRULENCE	Esha Sircar*, Somok Bhowmik, Ranjana Pathania	Department of Biosciences and Bioengineering, Indian Institute of Technology Roorkee, Roorkee, Haridwar	<a href="mailto:e_sircar@bt.iitr.ac.in">e_sircar@bt.iitr.ac.in</a>
27	Biotechnology, Biochemistry and Microbiology	BIO-27	I	P	SIMUTANEOUS DEGRADATION OF CYPERMETHRIN AND PROFENOFOS IN VIVO USING <i>Staphylococcus gallinarum</i> AND ANALYSIS OF ITS TOXICITY	Harshita Singh*, Anita Sharma, Damini Maithani	Department of Microbiology, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:harshitasg@gmail.com">harshitasg@gmail.com</a>
28	Biotechnology, Biochemistry and Microbiology	BIO-28	I	P	META-QTLS, ORTHO-MQTLS AND CANDIDATE GENES FOR THE TRAITS CONTRIBUTING TO SALINITY STRESS TOLERANCE IN COMMON WHEAT ( <i>TRITICUM AESTIVUM</i> L.)	Neeraj Pal* <sup>1</sup> , Dinesh Kumar Saini <sup>2</sup> , Sundip Kumar <sup>1</sup>	<sup>1</sup> Department of Molecular Biology and Genetic Engineering, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar <sup>2</sup> Department of Plant Breeding and Genetics, Punjab Agricultural University, Ludhiana, Punjab	<a href="mailto:neeru.kcmt@mail.com">neeru.kcmt@mail.com</a>
29	Biotechnology, Biochemistry and Microbiology	BIO-29	I	P	ISOLATION, IDENTIFICATION AND ANTIBIOTIC SUSCEPTIBILITY TEST OF LACTOBACILLUS GENUS FROM MILK AND MILK PRODUCTS IN DEHRADUN	Rashmi Negi* <sup>1</sup> , Akhilesh Kumar <sup>1</sup> , Vijay Kumar <sup>1</sup> , Naresh Khanduri <sup>1</sup> , Bindu Naik <sup>2</sup> , Megha Choudhary* <sup>1</sup> , Sanjay Gupta <sup>1</sup>	<sup>1</sup> Department of Biosciences, Swami Rama Himalayan University, Jolly Grant, Dehradun <sup>2</sup> Department of Life Sciences, Graphic Era University, Dehradun	<a href="mailto:rashminegi997@gmail.com">rashminegi997@gmail.com</a>
30	Biotechnology, Biochemistry and Microbiology	BIO-30	I	P	INFLUENCE OF MULTIDRUG RESISTANCE BACTERIA IN RIVER GANGES IN THE STRETCH OF RISHIKESH TO HARIDWAR	Saif Ali* <sup>1</sup> , Badali <sup>1</sup> , Sandeep Singh <sup>2</sup> , Rajesh Singh <sup>2</sup> , Manjusha Tyagi <sup>1</sup> , R.P. Pandey <sup>2</sup>	<sup>1</sup> Shri Guru Ram Rai University, Dehradun <sup>2</sup> National Institute of Hydrology, Roorkee	<a href="mailto:samar7617@gmail.com">samar7617@gmail.com</a>
31	Biotechnology, Biochemistry and Microbiology	BIO-31	I	P	PLANT GROWTH PROMOTION AND BIOCONTROL OF <i>Fusarium</i> sp. By Halotolerant <i>Trichoderma</i> isolates	Shalini Tiwari*, Barkha Sharma, Lakshmi Tewari	G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:shalinitiwari295@gmail.com">shalinitiwari295@gmail.com</a>

32	Biotechnology, Biochemistry and Microbiology	BIO-32	I	P	COMPARATIVE NUTRITIONAL PROFILE OF HIMALAYAN BLACK SOYBEAN (GLYCINE MAX L.) AND ITS BY-PRODUCT OKARA	Sofiya Anjum* <sup>1</sup> , Smita Rana <sup>2</sup> , Anita Pandey <sup>3</sup> , Veena Pande <sup>1</sup> , Vasudha Agnihotri <sup>4</sup>	<sup>1</sup> Department of Biotechnology, Bhimtal Campus, Kumaun University, Nainital / G.B.P.N.I.H.E Almora, Kosi-Katarmal, Almora <sup>2</sup> Department of Chemistry, S.S.J Campus, Kumaun University, Almora / G.B.P.N.I.H.E, Almora <sup>3</sup> Graphic Era Deemed To Be University, Dehradun <sup>4</sup> G.B.P.N.I.H.E, Almora	<a href="mailto:sofiyasiddiquee@gmail.com">sofiyasiddiquee@gmail.com</a>
33	Biotechnology, Biochemistry and Microbiology	BIO-33	I	P	INVITRO SHOOT REGENERATION FROM RHIZOME EXPLANTS OF <i>Rheum</i> Sp. – AN ENDANGERED MEDICINAL PLANT OF UTTARAKHAND	Sweta Upadhyay*, Anjali Uniyal, Sanjay Gupta, Vijay Kumar	Department of Biosciences, Swami Rama Himalayan University, Jolly Grant, Dehradun	<a href="mailto:swetaupadhyay630@gmail.com">swetaupadhyay630@gmail.com</a>
34	Biotechnology, Biochemistry and Microbiology	BIO-34	I	P	HYDROPONICS: A SUSTAINABLE APPROACH TO IMPROVE CROP PRODUCTIVITY AS WELL AS FARMER'S ECONOMY	Vaishali Sharma* <sup>1</sup> , Ashutosh Mishra <sup>1</sup> , Jagbir Aswal <sup>1</sup> , Kanchan Dobhal <sup>1</sup> , Divya Thapa <sup>1</sup> , Prashant Singh <sup>2</sup> , 7- V.S.P. Sinha <sup>3</sup> , S.B. Tripathi <sup>3</sup> , Rajendra Dobhal <sup>1</sup>	<sup>1</sup> Uttarakhand State Council for Science and Technology (UCOST), Dehradun <sup>2</sup> Department of Chemistry, DAV (PG) College, Dehradun <sup>3</sup> Department of Natural Resources, TERI SAS, New Delhi	<a href="mailto:attrivaishali15@gmail.com">attrivaishali15@gmail.com</a>
35	Biotechnology, Biochemistry and Microbiology	BIO-35	II	P	AN EFFECTIVE AND LOW-COST METHOD FOR DNA EXTRACTION FROM THE LEAVES OF <i>Rheum sp</i> (AN ENDANGERED MEDICINAL HERB OF INDIAN HIMALAYAN REGION)	Anjali Uniyal*, Sweta Upadhyay, Akhilesh Kumar, Sanjay Gupta	Department of Biosciences, Swami Rama Himalayan University, Jolly Grant, Dehradun	<a href="mailto:anjali.dhaundiyal90@gmail.com">anjali.dhaundiyal90@gmail.com</a>

# Botany

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Botany	BOT-01	I	O	EFFECT OF <i>AGERATINA ADENOPHORA</i> INVASION ON HERBACEOUS COMMUNITY IN DIFFERENT FOREST TYPES OF KUMAUN HIMALAYA	Bhawna Negi*, Kavita Khatri, Kiran Bargali, Surendra S. Bargali	Department of Botany, D.S.B. Campus, Kumaun University, Nainital	<a href="mailto:negibhawna20@gmail.com">negibhawna20@gmail.com</a>
2	Botany	BOT-02	I	O	FLORISTIC DIVERSITY OF DRONA SAGAR, KASHIPUR, UDHAM SINGH NAGAR, UTTARAKHAND	Chitra Maurya*, Sneha Lata	Department of Botany, R.H. Govt. P.G. College, Kashipur, U. S. Nagar	<a href="mailto:chitramauryars@gmail.com">chitramauryars@gmail.com</a>
3	Botany	BOT-03	I	O	STATUS AND DISTRIBUTION OF MEDICINALLY EXPLOITED PLANTS IN CHAKRATA FOREST OF WESTERN HIMALAYA	Dixit Kumar Pathak*, Kiran Bargali, Surendra S. Bargali	Department of Botany, D.S.B. Campus, Kumaun University, Nainital	<a href="mailto:dixitpathak113@gmail.com">dixitpathak113@gmail.com</a>
4	Botany	BOT-04	I	O	ISOLATION AND CHARACTERIZATION OF PLANT GROWTH PROMOTING RHIZOBACTERIA FROM <i>TEPHROSIA PURPUREA</i> (L.) PERS	Harshita Vashistha*, Pashant Kumar, Sandeep Kumar	Department of Botany and Microbiology, Gurukula Kangri (Deemed to be University), Haridwar	<a href="mailto:20526003@gkv.ac.in">20526003@gkv.ac.in</a>
5	Botany	BOT-05	I	O	PLASTIC PHENOTYPIC RESPONSE OF <i>AGERATINA ADENOPHORA</i> TO DIFFERENT FOREST TYPES IN KUMAUN HIMALAYA	Kavita Khatri*, Bhawna Negi, Kiran Bargali, Surendra S. Bargali	Department of Botany, D.S.B. Campus, Kumaun University, Nainital	<a href="mailto:kabitaKhatri000@gmail.com">kabitaKhatri000@gmail.com</a>
6	Botany	BOT-06	I	O	PROPAGATION OF <i>WITHANIA SOMNIFERA</i> (L.) DUNAL THROUGH SEEDS	Riya Gupta* <sup>1</sup> , Neelu Lodhiyal <sup>1</sup> , L.S Lodhiyal <sup>2</sup>	<sup>1</sup> Department of Botany, D.S.B Campus Kumaun University, Nainital <sup>2</sup> Department of Forestry and Environmental Science, D.S.B Campus Kumaun University, Nainital	<a href="mailto:riyagupta15june@gmail.com">riyagupta15june@gmail.com</a>
7	Botany	BOT-07	I	O	MICROMORPHOLOGY AND DISTRIBUTION OF TRICHOMES IN THE GENUS <i>CROTALARIA</i> L. (FABACEAE)	Sangeeta Joshi*, Dharmendra Singh Rawat	Department of Biological Sciences, College of Basic sciences and Humanities G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:sangeetajoshi680@gmail.com">sangeetajoshi680@gmail.com</a>

8	Botany	BOT-08	I	O	THE DIVERSITY OF AEROMYCOFLORA IN THE ATMOSPHERE OF SRINAGAR VALLEY, GARHWAL HIMALAYA (UTTARAKHAND)	Shikha Arya*	Department of Botany, HNB Garhwal University, Srinagar, Pauri Garhwal	<a href="mailto:shikhaarya147@gmail.com">shikhaarya147@gmail.com</a>
9	Botany	BOT-09	II	O	REGENERATION STATUS AND SPECIES DIVERSITY OF BANJ-OAK ( <i>QUERCUS LEUCOTRICHOPHORA</i> A. CAMUS) COMMUNITY FORESTS AT NAINITAL DISTRICT, CENTRAL HIMALAYA	Pratibha Gwal*, Neelu Lodhiyal	Department of Botany, D.S.B. Campus, Kumaun University, Nainital	<a href="mailto:pratibhagwal@gmail.com">pratibhagwal@gmail.com</a>
10	Botany	BOT-10	II	O	NEW ROOT ENDOPHYTIC AQUATIC HYPHOMYCETES FROM NANDHAUR RIVER, UTTARAKHAND (INDIA)	Saima Altaf*, Saraswati Bisht, Ruchi Jalal	Department of Botany, I.P.G.G. (PG) College of Commerce, Haldwani Kumaun University, Nainital	<a href="mailto:syedsaima143.ss@gmail.com">syedsaima143.ss@gmail.com</a>
11	Botany	BOT-11	I	P	EFFECT OF SLOPE ASPECT ON FLORISTIC COMPOSITION AND SOIL CHARACTERISTICS IN TEMPERATE GRASSLAND COMMUNITY OF KUMAUN HIMALAYA	Archana Fartyal*, S.S. Bargali, Kiran Bargali	Department of Botany, D.S.B. Campus, Kumaun University, Nainital	<a href="mailto:archanafartyal2008@gmail.com">archanafartyal2008@gmail.com</a>
12	Botany	BOT-12	I	P	NODULE SECTION AND ISOLATION OF PLANT GROWTH PROMOTING BACTERIA FROM <i>SESBAINA SESBAN</i> (L.) MERR	Prashant Kumar*, Harshita Vashistha, Sandeep Kumar	Department of Botany and Microbiology, Gurukula Kangri (Deemed to be University), Haridwar	<a href="mailto:20526004@gkv.ac.in">20526004@gkv.ac.in</a>
13	Botany	BOT-13	I	P	PHYTOCHEMICAL ANALYSIS AND ANTIMICROBIAL ACTIVITY OF <i>SIDA CORDIFOLIA</i> L. AGAINST <i>LISTERIA MONOCYTOGENES</i>	Sachin Kumar*, Sandeep Kumar	Department of Botany and Microbiology, Gurukula Kangri (Deemed to be University), Haridwar	<a href="mailto:sachinkm4359@gmail.com">sachinkm4359@gmail.com</a>
14	Botany	BOT-14	I	P	<i>IN VITRO</i> SEED CULTURE AND SEEDLING DEVELOPMENT OF <i>ARNEBIA BENTHAMII</i> (WALL. EX G. DON) JOHNSTON – A CRITICALLY ENDANGERED MEDICINAL PLANT	Sugandha Pant*, P. Chaturvedi,	Department of Biological Sciences, College of Basic Sciences and Humanities, Govind Ballabh Pant University of Agriculture and Technology, Pantnagar	<a href="mailto:sugandhapant15@gmail.com">sugandhapant15@gmail.com</a>
15	Botany	BOT-15	I	P	AGROBIODIVERSITY IN AGROFORESTRY SYSTEMS AND ITS IMPACT ON LIVELIHOOD, INCOME AND CLIMATE CHANGE IN UTTARAKHAND	Vasundhra Lodhiyal*, L.M. Tewari	Department of Botany, D.S.B. Campus, Kumaun University Nainital	<a href="mailto:vasundhralodhiyal@gmail.com">vasundhralodhiyal@gmail.com</a>

16	Botany	BOT-16	II	P	INVENTORIZATION OF FLORISTIC DIVERSITY ALONG THE ALTITUDINAL GRADIENT IN NAYAR VALLEY, DISTRICT PAURI, UTTARAKHAND, INDIA	Kuldeep Singh*, S.P. Joshi	Department of Botany, D.A.V. (Post Graduate) College, Dehradun	<a href="mailto:kpd2356@gmail.com">kpd2356@gmail.com</a>
17	Botany	BOT-17	III	P	PHYTOCHEMICALS ANALYSIS AND ANTIMICROBIAL ACTIVITY OF <i>BACOPA MONNIERI</i> (L.) PENNELL EXTRACT AGAINST <i>LISTERIA MONOCYTOGENES</i>	Sandeep Kumar*, Sachin Kumar	Department of Botany and Microbiology, Gurukula Kangri (Deemed to be University), Haridwar	<a href="mailto:sandeep.kumar@gkv.ac.in">sandeep.kumar@gkv.ac.in</a>

## Chemistry

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Chemistry	CHE-01	I	O	EXTRACTION OF NATURAL DYE FROM FRUIT PEELS OF <i>PUNICA GRANATUM</i> L.: PROTOCOL OPTIMIZATION USING RESPONSE SURFACE METHODOLOGY	Anjali Bhatt* <sup>1</sup> , Yogesh Chandra Tripathi <sup>1</sup> , Raman Nautiyal <sup>2</sup> , Vinay Kumar Varshney <sup>1</sup>	<sup>1</sup> Chemistry and Bioprospecting Division, Forest Research Institute, Dehradun <sup>2</sup> 156, Canal Road, Kaulagarh, Dehradun	<a href="mailto:bhattanjali346@gmail.com">bhattanjali346@gmail.com</a>
2	Chemistry	CHE-02	I	O	A MINIATURIZED BIOSORPTION-DESORPTION PROCESS FOR REMOVAL OF CD (II) IONS FROM WASTEWATER USING BIOSORBENT OF <i>TECTONA GRANDIS</i> LEAVES	Ankita Negi*, Sushil Kumar Joshi, Narendra Singh Bhandari	Department of Chemistry, S.S. Jeena Campus, Kumaun University, Nainital, Almora	<a href="mailto:ankitanegi701@gmail.com">ankitanegi701@gmail.com</a>
3	Chemistry	CHE-03	I	O	WATER QUALITY ASSESSMENT OF SAHASTRADHARA, DEHRADUN, UTTARAKHAND	Archit Pandey* <sup>1</sup> , Prashant Singh <sup>2</sup> , Dwarika Prasad <sup>1</sup> , V.S.P. Sinha <sup>3</sup> , Vikash Kandari <sup>2</sup>	<sup>1</sup> Department of Chemistry, SGRR University, Dehradun <sup>2</sup> Department of Chemistry, DAV (PG) College, Dehradun <sup>3</sup> Department of Natural Resources, TERI SAS, New Delhi	<a href="mailto:architpandey096@gmail.com">architpandey096@gmail.com</a>
4	Chemistry	CHE-04	I	O	EVALUATION OF DIFFERENT DECONTAMINANTS FOR EFFECTIVE REMOVAL OF COMMONLY APPLIED PESTICIDE RESIDUES FROM OKRA	Devesh Bhatt*, Anjana Srivastava, Gajanpal Singh	G.B. Pant University of Agriculture and Technology Pantnagar, U.S. Nagar	<a href="mailto:shwetachand5742@gmail.com">shwetachand5742@gmail.com</a>

5	Chemistry	CHE-05	I	O	SYNTHESIS, CHARACTERISATION AND BIOLOGICAL EVALUATION OF NOVEL 4,7 -DICHLOROQUINOLINE ANALOGUES	Garima Chand* <sup>1</sup> , Deepa Kholia <sup>1</sup> , Ankita H Tripathi <sup>2</sup> , Santosh K. Upadhyay <sup>2</sup> , Penny Joshi <sup>1</sup>	<sup>1</sup> Department of Chemistry, D.S.B. Campus, Kumaun University, Nainital <sup>2</sup> Department of Biotechnology, Kumaun University, Nainital, Bhimtal Campus, Bhimtal	<a href="mailto:chandgarima77@gmail.com">chandgarima77@gmail.com</a>
6	Chemistry	CHE-06	I	O	CHEMICAL EXAMINATION AND VALUE ADDITION OF SEED OIL OF <i>PRINSEPIA UTILIS</i> ROYLE FROM UTTARAKHAND	Kiran Chauhan*, Yogesh Chandra Tripathi, Amit Kumar Singh, Vinay Kumar Varshney	Chemistry and Bio-prospecting Division, Forest Research Institute, Dehradun	<a href="mailto:kiranchauhan316@gmail.com">kiranchauhan316@gmail.com</a>
7	Chemistry	CHE-07	I	O	BIO-EVALUATION OF <i>MICROMERIA BIFLORA</i> (BUCH.- HAM. EX D. DON) BENTH. ESSENTIAL OIL WITH ITS CHEMICAL CHARACTERIZATION	Kirti Nagarkoti*, Ravendra Kumar, Mahesh Chandra, Om Prakash	Department of Chemistry, College of Basic Sciences and Humanities, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:kirti.nagarkoti121@gmail.com">kirti.nagarkoti121@gmail.com</a>
8	Chemistry	CHE-08	I	O	ALTERNATIVE RESOURCE FROM WASTE MATERIAL IN CONTEXT TO UTTARAKHAND	Manish Pant*, Naveen Singhal	Department of Chemistry, School of Physical Science , DIT University (Deemed to be University), Dehradun	<a href="mailto:manishpant66@gmail.com">manishpant66@gmail.com</a>
9	Chemistry	CHE-09	I	O	CHEMICAL COMPOSITION OF ESSENTIAL OIL OF AERIAL PART OF <i>CRASOCEPHALUMCREPIDIIDS</i> (BENTH.) S. MOORE COLLECTED FROM KUMAUN REGION OF UTTARAKHAND, INDIA.	Manoj Karakoti*, Prasoon Kumar Joshi	Department of Chemistry, M.B.G.P.G. College, Haldwani	<a href="mailto:mnjkarakoti@gmail.com">mnjkarakoti@gmail.com</a>
10	Chemistry	CHE-10	I	O	PHYTOCHEMICAL DIVERSITY IN <i>CUPRESSUS TORULOSA</i> D. DON NEEDLES ESSENTIAL OIL FROM UTTARAKHAND AND ITS BIOLOGICAL ACTIVITIES	Piyush Bhalla, Yogesh, Chandra Tripathi, Amit Kumar Singh, Vinay Kumar Varshney	Chemistry and Bio-prospecting Division, Forest Research Institute, Dehradun	<a href="mailto:piyush.imf@gmail.com">piyush.imf@gmail.com</a>
11	Chemistry	CHE-11	I	O	COMPARATIVE STUDY OF GRAPHENE OXIDE PREPARED BY DIFFERENT STARTING MATERIALS FOR NON-ENZYMATIC GLUCOSE SENSOR	Richa Pandey* <sup>1</sup> , Naveen Singhal <sup>2</sup> , Parveen Kumar <sup>1</sup>	<sup>1</sup> Materials and Nano Engineering Research Laboratory, Department of Physics, DIT University, Dehradun <sup>2</sup> Department of Chemistry, DIT University, Dehradun	<a href="mailto:richapandey1223@gmail.com">richapandey1223@gmail.com</a>

12	Chemistry	CHE-12	I	O	GREEN APPROACH FOR THE REMOVAL OF CADMIUM FROM SYNTHETIC WASTE WATER USING <i>Cassia fistula</i> L. LEAVES	Shweta Chand Thakuri*, Viveka Nand	Department of Chemistry, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:shwetachand5742@gmail.com">shwetachand5742@gmail.com</a>
13	Chemistry	CHE-13	I	O	CHEMICAL COMPOSITION OF MELALEUCA LINARIIFOLIA Sm. COLLECTED FROM KUMAON REGION OF UTTARAKHAND	Sushma Kholiya*, Ameeta Tiwari	Department of Chemistry, M.B.P.G College Haldwani, Nainital	<a href="mailto:sushmakholiya01@gmail.com">sushmakholiya01@gmail.com</a>
14	Chemistry	CHE-14	II	O	STUDIES OF TOXIC DYES AND PHENOLS ON TO ACTIVATED CARBON DEVELOPED BY LIGNIN	Alka Harit*, Suhas	Harsh Vidhya Mandir (P.G.), Raisi, Haridwar	<a href="mailto:haritalka8783@gmail.com">haritalka8783@gmail.com</a>
15	Chemistry	CHE-15	II	O	A GREEN APPROACH TO PLANT MEDIATED SYNTHESIS OF SILVER NANOPARTICLES USING <i>RUMEX HASTATUS</i> LEAF EXTRACT AND THEIR ANTIMICROBIAL AND <i>IN VITRO</i> ANTIOXIDANT ACTIVITY	Anuj Kandwal* <sup>1</sup> , M.C. Purohit <sup>2</sup> , Arun K. Khajuria <sup>3</sup>	<sup>1</sup> Department of Chemistry, Harsh Vidya Mandir (PG) College, Raisi, Haridwar <sup>2</sup> Department of Chemistry, Hemvati Nandan Bahuguna Garhwal University, BGR Campus Pauri, Pauri Garhwal <sup>3</sup> Department of Botany, Cluster University of Jammu, Jammu and Kashmir	<a href="mailto:anujkandwal4@gmail.com">anujkandwal4@gmail.com</a>
16	Chemistry	CHE-16	II	O	COMPERATIVE PHYTOCHEMICAL ANALYSIS OF TWO SPECIES OF VITEX GENUS, VITEX AGNUS-CASTUS AND VITEX TRIFOLIA FROM THE PANTNAGAR REGION OF UTTARAKHAND, INDIA	Sonu Kumar*, Monika Tewari, Om. Prakash, Ravendra Kumar, A.K. Pant	Department of Chemistry, College of Basic Sciences and Humanities, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:sonummahawer@gmail.com">sonummahawer@gmail.com</a>
17	Chemistry	CHE-17	III	O	HYDRO- CHEMICAL CLUSTERING OF RIVER DRINKING WATER SOURCES OF UTTARKAHND USING MULTIVARIATE ANALYSIS	Kajal Sinha*, Prashant Singh, Jaya Dwivedi	Department of Chemistry, DAV (PG) College, Dehradun	<a href="mailto:kajaal.sinha@gmail.com">kajaal.sinha@gmail.com</a>
18	Chemistry	CHE-18	I	P	IMPACT OF DIFFERENT DRYING ON THE COMPOSITION, OIL CONTENT AND BIOACTIVITY OF ESSENTIAL OIL OF <i>Cinnamomum camphora</i> L.	Bhawana Kanyal*	Department of Chemistry, D.S.B. Campus, Kumaun University, Nainital	<a href="mailto:bhawanakanyal42@gmail.com">bhawanakanyal42@gmail.com</a>



19	Chemistry	CHE-19	I	P	SYNTHESIS OF NOVEL TRIAZOLE-SULFOCOUMARIN HYBRIDS AND THEIR SCOPE AS THERAPEUTIC AGENTS	Deepa Kholia* <sup>1</sup> , Kamlesh Yadav <sup>1</sup> , Garima Chand <sup>1</sup> , Amrita Kumari <sup>2</sup> , Santosh K. Upadhyay <sup>2</sup> , Penny Joshi <sup>1</sup>	<sup>1</sup> Department of Chemistry, D.S.B. Campus, Kumaun University, Nainital <sup>2</sup> Department of Biotechnology, Kumaun University, Nainital, Bhimtal Campus, Bhimtal	<a href="mailto:kholiadeepa.dk@gmail.com">kholiadeepa.dk@gmail.com</a>
20	Chemistry	CHE-20	I	P	GREEN SYNTHESIS OF ZINC OXIDE NANOPARTICLES USING PLANT EXTRACT OF PYRANCANTHA CRENULATE OF KUMAUN REGION, UTTARAKHAND AND EVOLUTION OF THEIR BIOLOGICAL PROPERTIES	Himani Joshi* <sup>1</sup> , Sushil Kumar Joshi <sup>1</sup> , Mahesh Viswkarma <sup>2</sup> , Mukesh Shamant <sup>2</sup>	<sup>1</sup> Department of Chemistry, S.S. Jeena University, Almora <sup>2</sup> Department of Chemistry, Bageshwer, S.S. Jeena University, Almora	<a href="mailto:heena1050@gmail.com">heena1050@gmail.com</a>
21	Chemistry	CHE-21	I	P	CHEMICAL COMPOSITION AND ANTIMICROBIAL ACTIVITY OF THE ESSENTIAL OIL FROM <i>THALICTRUM PUNDUANUM</i> WALL	Leelawati Nitwal*, Manisha Palni, Lalit Singh Bisht, Rajendra Prasad, Anand B. Melkani	Department of Chemistry, Kumaun University, Nainital	<a href="mailto:lilynital1995@gmail.com">lilynital1995@gmail.com</a>
22	Chemistry	CHE-22	I	P	DEVELOPING NATURAL DYES UTILIZING INVASIVE SPECIES <i>EUPATORIUM ADENOPHORUM</i>	Madhav Badoni*, Praveen Onial, Vineet Kumar	Chemistry And Bioprospecting Division, Forest Research Institute, Dehradun	<a href="mailto:badonimadhav085@gmail.com">badonimadhav085@gmail.com</a>
23	Chemistry	CHE-23	I	P	STEAM VOLATILE CONSTITUENTS FROM THE WHOLE AERIAL PARTS OF <i>PLECTRANTHUS STRIATUS</i> AND ANTIBACTERIAL ASSAY	Manisha Palni*, Leelawati Nitwal, Lalit Singh Bisht, Rajendra Prasad, Anand B. Melkani	Chemistry Department, Kumaun University, Nainital	<a href="mailto:manisha.palni2611@gmail.com">manisha.palni2611@gmail.com</a>
24	Chemistry	CHE-24	I	P	PRESERVATION OF MANGO WOOD AGAINST GLEOPHYLLUM STRAITUM THROUGH IMPREGNATION POLYMERIZATION OF METHYL METHACRYLATE	Mohammad Aziz*, M.G.H. Zaidi, Sameena Mehtab	Department of Chemistry, College of Basic Sciences and Humanities, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:mohammadaziz04@gmail.com">mohammadaziz04@gmail.com</a>
25	Chemistry	CHE-25	I	P	HORSEGRAM (MACROTYLOMA UNIFLORUM) BASED TRADITIONAL CUISINES OF UTTARAKHAND: A NUTRITIONAL EVALUATION	Smita Rana* <sup>1</sup> , Sofiya Anjum <sup>1</sup> , N.S. Bhandari <sup>2</sup> , Vasudha Agnihotri <sup>1</sup>	<sup>1</sup> G.B.P.N.I.H.E., Kosi-Katarmal, Almora <sup>2</sup> N.S. Bhandari, Vice Chancellor S.S.J Campus, Kumaun University Almora	<a href="mailto:smitarana2@gmail.com">smitarana2@gmail.com</a>

## Earth Sciences including Geology, Geomorphology, Geophysics, Glaciology and Geography

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Earth Sciences including Geology, Geomorphology, Geophysics, Glaciology and Geography	EAR-01	I	O	RESPONSE OF GLACIERS OF UPPER ALAKNANDA BASIN (UAB), CENTRAL HIMALAYA (UTTARAKHAND) UNDER CHANGING CLIMATE	Aditya Mishra* <sup>1</sup> , H.C. Nainwal <sup>1</sup> , D.P. Dobhal <sup>2</sup> , R. Shankar <sup>3</sup> ,	<sup>1</sup> Department of Geology, HNB Garhwal University, Srinagar Garhwal, Pauri Garhwal <sup>2</sup> Retd. Scientist, Wadia Institute of Himalayan Geology, Dehradun <sup>3</sup> Retd. Professor, Institute of Mathematical Sciences, Chennai	<a href="mailto:mishraaditya557@gmail.com">mishraaditya557@gmail.com</a>
2	Earth Sciences including Geology, Geomorphology, Geophysics, Glaciology and Geography	EAR-02	I	O	EVALUATION AND COMPARISON OF DIFFERENT MODELS FOR LAND USE/LAND COVER MAPPING: A CASE STUDY FROM KUMAUN LESSER HIMALAYAN LAKES	Kalpana Gururani* <sup>1</sup> , Bahadur Singh Kotlia <sup>1</sup> , Champati Ray <sup>2</sup> , Arvind Pandey <sup>3</sup> , Ajit Partap Singh <sup>4</sup>	<sup>1</sup> Centre of Advanced Study in Geology, Kumaun University, Nainital <sup>2</sup> Indian Institute of Remote Sensing, Indian Space Research Organization, Dehradun <sup>3</sup> Department of Remote Sensing, SSJ Campus, Kumaun University, Almora <sup>4</sup> Department of Civil Engineering, Birla Institute of Technology and Science, Pilani, Rajasthan	<a href="mailto:kalpana.gururani2009@gmail.com">kalpana.gururani2009@gmail.com</a>
3	Earth Sciences including Geology, Geomorphology, Geophysics, Glaciology and Geography	EAR-03	I	O	RECONSTRUCTION OF THE PALAEOHYDROLOGY OF LOWER SIWALIK SUBGROUP OF THE SOUTH-CENTRAL KUMAUN HIMALAYA, UTTARAKHAND, INDIA	Karuna Singh*, Pradeep Kumar Goswami	Centre of Advanced Study in Geology, Kumaun University, Nainital	<a href="mailto:singhkaruna2610@gmail.com">singhkaruna2610@gmail.com</a>

4	Earth Sciences including Geology, Geomorphology, Geophysics, Glaciology and Geography	EAR-04	I	O	SNOW AVALANCHE MOUNTAIN REGION IN HIMALAYAN ENVIRONMENT UTTARAKHAND	Ram Lakhan Yadav*, Nabeen Singal	Centre for Environment Assessment & Climate Change (CEA &CC) G. B. Pant National Institute of Himalayan Environment, Almora	<a href="mailto:ramlakhan4609@gmail.com">ramlakhan4609@gmail.com</a>
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## Engineering Science and Technology

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Engineering Science and Technology	ENG-01	I	O	TEMPORAL VARIATION OF RAINFALL FOR THE SOUTHERN REGION OF UTTARAKHAND BASED ON ENTROPY THEORY	Shekhar Singh*; Anil Kumar	Department of SWCE, G.B. Pant University of Agriculture and Technology, Pantnagar	<a href="mailto:shekharsingh861@gmail.com">shekharsingh861@gmail.com</a>
2	Engineering Science and Technology	ENG-02	I	O	SPRING WATER AND IT'S QUALITY ASSESSMENT FOR DRINKING PURPOSE IN THREE DISTRICTS OF KUMAUN REGION: A REVIEW	Surabhi Chand*, H.J. Shiva Prasad, Jyothi Prasad	Civil Engineering Department, G.B. Pant University of Agriculture and Technology, Pantnagar	<a href="mailto:surabhichand2293@mail.com">surabhichand2293@mail.com</a>
3	Engineering Science and Technology	ENG-03	II	O	ENHANCEMENT OF POSITIONAL ACCURACY OF NAVIGATION WITH INDIAN CONSTELLATION (NavIC) SATELLITE SYSTEM IN UTTARAKHAND REGION	Raj Gusain*, Anurag Vidyarthi, Rishi Prakash	Department of Electronics and Communication Engineering, Graphic Era Deemed to be University, Dehradun	<a href="mailto:rajgusain@gmail.com">rajgusain@gmail.com</a>
4	Engineering Science and Technology	ENG-04	I	P	STUDY THE EFFECT OF BACTERIA IN MICROBIAL CONCRETE	Kunwar Dipendraditya*	DIT University, Dehradun	<a href="mailto:kunwar.dipendraditya45@gmail.com">kunwar.dipendraditya45@gmail.com</a>

## Environmental Science and Forestry

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Environmental Science and Forestry	ENV-01	I	O	UNRAVELLING THE DYNAMICS OF PRE - MONSOON THUNDERSTORM USING ARIES STRATOSPHERE TROPOSPHERE RADAR	Aditya Jaiswal*, Manish Naja, Samaresh Bhattacharjee	Aryabhatta Research Institute of Observational Sciences Nainital	<a href="mailto:aditya@aries.res.in">aditya@aries.res.in</a>

2	Environmental Science and Forestry	ENV-02	I	O	SPECIES COMPOSITION AND DIVERSITY OF SAL AND SHISHAM DOMINATED FOREST IN CENTRAL HIMALAYA	Falak Siddiqui*, L.S Lodhiyal	Department of Forestry and Environmental Science, D.S.B Campus, Kumaun University, Nainital	<a href="mailto:falak0806@gmail.com">falak0806@gmail.com</a>
3	Environmental Science and Forestry	ENV-03	I	O	GROUND BASED OBSERVATIONS OF RADIATIONS FLUXES UNDER VARIOUS SKY CONDITIONS IN COMPLEX TERRAIN HIMALAYA	Mayank Kumar Chauhan*, Jaydeep Singh, Narendra Singh	Aryabhatta Research Institute of Observational Sciences, Nainital	<a href="mailto:mayankchauhan2521994@gmail.com">mayankchauhan2521994@gmail.com</a>
4	Environmental Science and Forestry	ENV-04	I	O	TREE VEGETATION ANALYSIS OF CHHAKATA FOREST AND SOCIO-ECONOMIC ASSESSMENT OF ADJOINING VILLAGES IN TARAI REGION OF UTTARAKHAND	Mohd. Arif Ansari*, Ashish Tewari	Department of Forestry and Environmental Science, D.S.B. Campus, Kumaun University, Nainital	<a href="mailto:mdansarif07@gmail.com">mdansarif07@gmail.com</a>
5	Environmental Science and Forestry	ENV-05	I	O	IMMOBILIZATION OF <i>TRICHODERMA</i> FUNGUS IN ZAKHIYA AND DIATOMACEOUS EARTH-BASED FORMULATION FOR WASTEWATER TREATMENT	Monika Chhimwal*, R.K. Srivastava	CBSH, G.B. Pant University of Agriculture and Technology, Pantnagr, U.S. Nagar	<a href="mailto:monikachhimwal292@gmail.com">monikachhimwal292@gmail.com</a>
6	Environmental Science and Forestry	ENV-06	I	O	FRUIT WASTE DERIVED AEROGELS: HIGHLY EFFICIENT AND SUSTAINABLE MATERIALS FOR WASTEWATER REMEDIATION TO REMOVE ORGANIC POLLUTANTS	Pratiksha Joshi <sup>1*</sup> , Om P Sharma <sup>1</sup> , Sudip K Ganguly <sup>1,2</sup> , Manoj Srivastava <sup>1,2</sup> , Om P Khatri <sup>1,2</sup>	<sup>1</sup> CSIR-Indian Institute of Petroleum, Dehradun <sup>2</sup> Academy of Scientific and Innovative Research, Ghaziabad	<a href="mailto:pratiksha.joshi@iip.res.in">pratiksha.joshi@iip.res.in</a>
7	Environmental Science and Forestry	ENV-07	I	O	UNVEILING THE ADVERSE IMPACT OF CARBONACEOUS AEROSOLS AND TRACE GAS POLLUTANTS OVER THE CENTRAL HIMALAYAS – INSIGHTS FROM 17 YEARS OF GROUND BASED OBSERVATIONS	Priyanka Srivastava <sup>*1</sup> , Manish Naja <sup>1</sup> , Hema Joshi <sup>2</sup> , Mukunda M Gogoi <sup>3</sup> , S Suresh Babu <sup>3</sup>	<sup>1</sup> Aryabhatta Research Institute of Observational Sciences (ARIES), Nainital <sup>2</sup> Indian Institute of Technology, Kanpur, Uttar Pradesh <sup>3</sup> Space Physics Laboratory, Vikram Sarabhai Space Centre, Thiruvananthapuram	<a href="mailto:psrivastava@aries.res.in">psrivastava@aries.res.in</a>

8	Environmental Science and Forestry	ENV-08	I	O	ANTIOXIDANT, ANTI-DIABETIC AND ANTI-INFLAMMATORY ACTIVITIES OF <i>CUPRESSUS TORULOSA</i> (D. DON EX LAMB) LEAVES	Radhika Khanna* <sup>1</sup> , Y.C. Tripathi <sup>1</sup> , H.R. Chitme <sup>2</sup> , V.K. Varshney <sup>1</sup> ,	<sup>1</sup> Chemistry and Bioprospecting Division, Forest Research Institute, Dehradun <sup>2</sup> Faculty of Pharmacy, Dehradun Institute of Technology University, Dehradun	<a href="mailto:khannaradhika113@gmail.com">khannaradhika113@gmail.com</a>
9	Environmental Science and Forestry	ENV-09	I	O	<i>ALNUS NEPALENSIS</i> D. DON IN SLOPE STABILITY OF LANDSLIDE PRONE AREAS OF PITHORAGARH DISTRICT, UTTARAKHAND	Sanjay Kumar Dwivedi*, Naveen Chandra, Sonam Bahuguna, Shashank Lingwal, Gajendra Singh	Uttarakhand Space Application Centre, Dehradun	<a href="mailto:sanjaydwivedi0007@gmail.com">sanjaydwivedi0007@gmail.com</a>
10	Environmental Science and Forestry	ENV-10	I	O	A SEEK & DESTROY NANO-BIOTECHNOLOGICAL APPROACH FOR ANTIBIOTIC POLLUTION IN WATER BODIES	Shubham Jain*, Ankita Bhatt, Shah Nawaz Ahmad Baba, Rajat Dhyani, Naveen Kumar Navani	Chemical Biology Lab, Department of Biosciences and Bioengineering, Indian Institute of Technology Roorkee, Roorkee, Haridwar	<a href="mailto:sjain@bt.iitr.ac.in">sjain@bt.iitr.ac.in</a>
11	Environmental Science and Forestry	ENV-11	I	O	PM2.5 MEASUREMENTS FROM CENTRAL HIMALAYA: SOURCES AND THE ROLE OF MOUNTAIN METEOROLOGY	Vikas Rawat* <sup>1</sup> , Narendra Singh <sup>1</sup> , Jaydeep Singh <sup>1</sup> , S.K. Dhaka <sup>2</sup> , Sachiko Hayashida <sup>3</sup> , Rajendra Dhobhal <sup>4</sup>	<sup>1</sup> Aries, Manora Peak, Nainital <sup>2</sup> Department of Physics and Astrophysics, University of Delhi, Delhi <sup>3</sup> Nara Women's University, Japan <sup>4</sup> Uttarakhand State Council for Science and Technology, Dehradun	<a href="mailto:vikasrawat2175@gmail.com">vikasrawat2175@gmail.com</a>
12	Environmental Science and Forestry	ENV-12	II	O	NOVEL GREEN SYNTHESIS OF ZINC OXIDE NANOPARTICLES USING VARIOUS BIOMASS RESIDUES AND THEIR CHARACTERIZATION	Gaurav Pandey* <sup>1</sup> , Rajeev Gupta <sup>2</sup> , V.K. Varshney <sup>1</sup>	<sup>1</sup> Chemistry and Bioprospecting Division, Forest Research Institute, Dehradun <sup>2</sup> Department of Physics, School of Engineering Studies, University of Petroleum & Energy Studies, Dehradun	<a href="mailto:gauravpandeyfri@gmail.com">gauravpandeyfri@gmail.com</a>
13	Environmental Science and Forestry	ENV-13	III	O	BIOSORPTIVE REMOVAL OF TOXIC HEAVY METAL ION USING BLUE-GREEN ALGAL BIOMASS: KINETICS AND EQUILIBRIUM STUDIES	Arshi Rastogi	Chemistry Department, KLDV (PG) College, Roorkee	<a href="mailto:arshirastogi@gmail.com">arshirastogi@gmail.com</a>

14	Environmental Science and Forestry	ENV-14	I	P	EFFECT OF AM FUNGI ON GROWTH OF MPTs IN RICH ARSENIC SOIL	Anupama Raj*, B.P. Chamola	H.N.B. Garhwal University, Srinagar, Pauri Garhwal	<a href="mailto:anupamaraj573@gmail.com">anupamaraj573@gmail.com</a>
15	Environmental Science and Forestry	ENV-15	I	P	FARMER'S PERCEPTION ABOUT AGROFORESTRY SYSTEM'S IN DIFFERENT VILLAGE'S OF BAGESWAR DISTRICT IN KUMAUN HIMALAYA	Inder Singh Rautela*, L.S. Lodhiyal	Department of forestry and Environmental Science, D.S.B. Campus, Kumaun University Nainital	<a href="mailto:inderrautela333@gmail.com">inderrautela333@gmail.com</a>
16	Environmental Science and Forestry	ENV-16	I	P	STUDY ON INSECT/PESTS OF SAL DOMINATED FOREST OF THANO RANGE	Laxman Singh*, B.P. Chamola	H.N.B. Garhwal University, Srinagar, Pauri Garhwal	<a href="mailto:laxmansingh757@gmail.com">laxmansingh757@gmail.com</a>
17	Environmental Science and Forestry	ENV-17	I	P	THE EFFECTS OF NATURAL DESICCATION ON GERMINATION OF <i>BUCHANANIA LANZAN</i> SPRENG	Nandita Negi*, Ajeet Kumar Negi	Department of Forestry and NR, H.N.B. Garhwal University, Srinagar, Pauri Garhwal	<a href="mailto:nnegi786@gmail.com">nnegi786@gmail.com</a>
18	Environmental Science and Forestry	ENV-18	I	P	ETHNOBOTANICAL USE OF CERTAIN MEDICINAL PLANT SPECIES OF KUMAUN HIMALAYA	Neelam Bisht*, L. S. Lodhiyal	Department of Forestry and Environmental Science, D.S.B Campus, Kumaun University, Nainital	<a href="mailto:bneelam97@gmail.com">bneelam97@gmail.com</a>
19	Environmental Science and Forestry	ENV-19	I	P	ASSESSMENT OF ECONOMIC USE OF RINGAL BAMBOO IN KUMAUN HIMALAYA	Nirmala*, L. S. Lodhiyal	Department of Forestry and Environmental Science, D.S.B Campus, Kumaun University, Nainital	<a href="mailto:nirmalagauni189@gmail.com">nirmalagauni189@gmail.com</a>
20	Environmental Science and Forestry	ENV-20	I	P	EFFECTS OF BIOCHAR, CROP RESIDUES AND SLOW RELEASE NITROGEN FERTILIZER ON CO <sub>2</sub> EMISSIONS FROM RICE-WHEAT CROPPING SYSTEM	Prayasi Nayak*, Sumit Chaturvedi	Department of Agronomy, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:prayasinayak12@gmail.com">prayasinayak12@gmail.com</a>
21	Environmental Science and Forestry	ENV-21	I	P	DDPH FREE RADICAL SCAVENGING ACTIVITY OF DIFFERENT EXTRACTIONS OF <i>TINOSPORA CORDIFOLIA</i>	Ritu Rani* <sup>1</sup> , Neha Kukreti <sup>1</sup> , A.K. Sharma <sup>2</sup> , Havagiray R. Chitme <sup>1</sup> ,	<sup>1</sup> Faculty of Pharmacy, DIT University, Dehradun <sup>2</sup> Non-Wood Forest Product, FRI, Dehradun	<a href="mailto:rituyadav581995@gmail.com">rituyadav581995@gmail.com</a>
22	Environmental Science and Forestry	ENV-22	I	P	ASSESSMENT OF SLUDGE AND HELMINTHES EGGS REMOVAL EFFICIENCY OF SLUDGE DRYING BED FOR THE MANAGEMENT OF SEPTAGE	Swati Singh* <sup>1</sup> , Pradeep Kumar Sharma <sup>1</sup> , Anuj Rani <sup>2</sup>	<sup>1</sup> Department of Environmental Science, Graphic Era (Deemed to be University) Dehradun <sup>2</sup> Department of Life Sciences, Science, Graphic Era (Deemed to be University) Dehradun	<a href="mailto:ss86302727@gmail.com">ss86302727@gmail.com</a>

23	Environmental Science and Forestry	ENV-23	II	P	EFFECT OF SMOKE WATER ON SEED GERMINATION BEHAVIOUR OF <i>ZANTHOXYLUM ARMATUM</i> DC.	Amreen*, A.K. Negi	Department of Forestry and Natural Resources, H.N.B. Garhwal University, Srinagar, Pauri Garhwal	<a href="mailto:amreenansari1990@gmail.com">amreenansari1990@gmail.com</a>
24	Environmental Science and Forestry	ENV-24	III	P	STUDIES ON WATER RESOURCE MANAGEMENT THROUGH SPRING REJUVENATION IN UTTARAKHAND	Prashant Singh <sup>1*</sup> , V.S.P. Sinha <sup>2</sup> , S.K Sharma <sup>3</sup> , Saurabh Bhardwaj <sup>4</sup> , Chandrashekhar Azad <sup>2</sup> , Vikash Kandari <sup>1</sup>	<sup>1</sup> Department of Chemistry, DAV (PG) College, Dehradun <sup>2</sup> Department of Natural Resources, TERI SAS, New Delhi <sup>3</sup> Uttarakhand Jal Sansthan, Dehradun <sup>4</sup> TERI, New Delhi	<a href="mailto:prashantraj86@yahoo.com">prashantraj86@yahoo.com</a>
25	Environmental Science and Forestry	ENV-25	III	P	WATER SAFETY PLANNING OF PHYSICO-CHEMICAL AND BIOLOGICAL CONTAMINATIONS FOR IMPROVED PUBLIC DRINKING WATER SOURCES	Rakesh Singh <sup>*1</sup> , Ajay Kumar <sup>1</sup> , Manisha Uniyal <sup>1</sup> , Manju <sup>2</sup> , Prashant Singh <sup>3</sup>	<sup>1</sup> Chemistry Department, DBS (PG) College, Dehradun <sup>2</sup> Botany Department, HVM (PG) College, Raisi, Haridwar <sup>3</sup> Chemistry Department, DAV (PG) College, Dehradun	<a href="mailto:rakesh72chem@gmail.com">rakesh72chem@gmail.com</a>

### Home Science

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Home Science	HOM-01	I	O	UTILIZATION OF SUPER FOOD GRAINS, FINGER MILLET AND QUINOA FOR DEVELOPMENT OF NUTRITIOUS EGGLESS DOUGHNUTS AND ITS QUALITY EVALUATION	Ayushi Joshi*, Sarita Srivastava	G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:ayushijoshi7895@gmail.com">ayushijoshi7895@gmail.com</a>
2	Home Science	HOM-02	I	O	VALUE ADDITION OF PURPLE RADISH FOR INCOME ARGUMENTATION OF HILL FARMERS OF UTTARAKHAND	Bhumika Kabdal*, Pushpa Shukla, Anuradha Dutta, Pratima Awasthi	Department of Foods and Nutrition, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:bhumikabdwal@gmail.com">bhumikabdwal@gmail.com</a>
3	Home Science	HOM-03	I	O	GILOY ( <i>TINOSPORA CORDIFOLIA</i> ): UTILIZATION AND EVALUATION IN FOOD PRODUCT	Himani Joshi*, Pratima Awasthi	Department of Foods and Nutrition, College of Home Science, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:joshi.himanijoshi@gmail.com">joshi.himanijoshi@gmail.com</a>



4	Home Science	HOM-04	I	O	FORMULATION OF QUINOA INCORPORATED PROTEIN-RICH BISCUITS AND NUMERICAL OPTIMIZATION OF ITS PROCESS PARAMETERS	Rushda Anam Malik*, Sarita Srivastava, N.C. Shahi	<sup>1</sup> Department of Foods and Nutrition, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar <sup>2</sup> Department of Post Harvest Process and Food Engineering, College of Technology, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:anam.malik02@gmail.com">anam.malik02@gmail.com</a>
5	Home Science	HOM-05	I	O	STINGING NETTLE: A POTENT FOOD SOURCE TO ALLEVIATE MICRONUTRIENT DEFICIENCIES	Sandhya Dhyani*, Rita Singh Raghuvanshi	Department of Foods and Nutrition, College of Home Science, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:sun19961015@gmail.com">sun19961015@gmail.com</a>
6	Home Science	HOM-06	I	O	NUTRITIONAL POTENTIAL OF TOBACCO LEAVES ( <i>Nicotiana tabacum</i> )	Shayani Bose* <sup>1</sup> , Rushda Anam Malik <sup>1</sup> , Anuradha Dutta <sup>1</sup> , Raman Manoharlal <sup>2</sup> , G.V.S. Saiprasad <sup>2</sup>	<sup>1</sup> Department of Foods and Nutrition, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar <sup>2</sup> ITC Limited, ITC Life Sciences and Technology Centre (LSTC), Peenya Industrial Area, Bengaluru, Karnataka	<a href="mailto:shayanibose28@gmail.com">shayanibose28@gmail.com</a>
7	Home Science	HOM-07	II	O	PREVALENCE OF FUNCTIONAL CONSTIPATION AND FACTORS ASSOCIATED WITH BOWEL SYMPTOMS IN ADULTS	Akanksha Singh*, Rita Singh Raghuvanshi	Department of Foods and Nutrition, College of Home Science, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:akanksha513510@gmail.com">akanksha513510@gmail.com</a>
8	Home Science	HOM-08	II	O	THERAPEUTIC AND NUTRITIONAL POTENTIAL OF WONDER HERBS OF UTTARAKHAND: <i>VERNONIA CINEREA</i> (SAHADEVI) AND <i>CICHORIUM INTYBUS</i> (CHICORY)	Nalini Trivedi*, Anuradha Dutta	G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:n4nalinitrivedi@gmail.com">n4nalinitrivedi@gmail.com</a>
9	Home Science	HOM-09	I	P	SUITABILITY OF INCORPORATION OF CHIA SEED FLOUR IN BISCUITS	Kanchan Goswami*, Pratima Awasthi	Department of Foods and Nutrition, College of Home Science, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:kanchan.pntngr.89@gmail.com">kanchan.pntngr.89@gmail.com</a>

# Material Science and Nano Technology

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Material Science and Nano Technology	MAT-01	I	O	AN APPROACH TO DELIVER PROBIOTIC: FROM CO-ENCAPSULATION TO MITIGATION OF GUT PATHOGENS	Ajmal Hussain*, Arun Beniwal, Rekha Sharma	Chemical Biology Lab, IIT Roorkee, Roorkee, Haridwar	<a href="mailto:ahussain@bt.iitr.ac.in">ahussain@bt.iitr.ac.in</a>
2	Material Science and Nano Technology	MAT-02	I	O	IMPORTANCE OF GREEN SYNTHESIS IN THE PREPARATION OF IRON NANOPARTICLES	Debanjali Barman Roy*, T.K. Mandal	The ICFAI University, Dehradun	<a href="mailto:barmanroy.debanjali@gmail.com">barmanroy.debanjali@gmail.com</a>
3	Material Science and Nano Technology	MAT-03	I	O	DENDRIMER FUNCTIONALIZED GRAPHENE OXIDE FOR ANTICANCER DRUG DELIVERY AND ENERGY APPLICATIONS: A DUAL APPROACH	Monika Matiyani*, Manoj Karakoti, Nanda Gopal Sahoo	Prof. Rajendra Singh Nanoscience and Nanotechnology Centre, Department of Chemistry, D.S.B., Campus, Kumaun University, Nainital	<a href="mailto:monikamatiyani95@gmail.com">monikamatiyani95@gmail.com</a>
4	Material Science and Nano Technology	MAT-04	I	O	SPECTROSCOPIC AND DFT BASED COMPUTATIONAL INVESTIGATION OF NONLINEAR OPTICAL RESPONSES OF PYRROLIDINE DERIVATIVE	Vivek Dhuliya* <sup>1</sup> , Devendra Singh Chauhan <sup>1</sup> , Shradha Lakhera <sup>2</sup>	<sup>1</sup> Department of Physics, Dr. P.D.B.H. Govt. P.G. College, Kotdwara, Pauri Garhwal <sup>2</sup> Department of Physics, School of Sciences, Uttarakhand Open University, Haldwani	<a href="mailto:vivekdhuliya@gmail.com">vivekdhuliya@gmail.com</a>
5	Material Science and Nano Technology	MAT-05	II	O	CARBON NANOFIBER-POLYELECTROLYTE TRIGGERED PIEZOELECTRIC POLYMER-BASED NANOCOMPOSITE TOWARDS WEARABLE SENSOR	Lokesh Singh Panwar*, Varij Panwar	Graphic Era Deemed to be University, Dehradun	<a href="mailto:lokesh31j@gmail.com">lokesh31j@gmail.com</a>
6	Material Science and Nano Technology	MAT-06	II	O	IMAGING OF HUMAN BREAST CANCER CELL LINE USING L-GLUTATHIONE CAPPED CdSeS/ZnS QUANTUM DOTS	Meenakshi Rana <sup>1</sup> , Papia Chowdhury <sup>2</sup> , Vibha Rani <sup>3</sup> , Kamal Devlal <sup>4</sup>	<sup>1</sup> Department of Physics, Uttarakhand Open University, Haldwani, Nainital <sup>2</sup> Department of PMSE, IIIT, Noida, Uttar Pradesh <sup>3</sup> Department of Biotechnology, IIIT, Noida, Uttar Pradesh <sup>4</sup> Department of Physics, Uttarakhand Open University, Haldwani, Nainital	<a href="mailto:mrana@uou.ac.in">mrana@uou.ac.in</a>

7	Material Science and Nano Technology	MAT-07	II	O	DECORATION OF A GRAS STATUS ANTIMICROBIAL PEPTIDE ON NANO-SILVER DISPLAYS REMARKABLE SYNERGISTIC ANTIBACTERIAL ACTIVITY WITH PROTEAN FUNCTIONALITY	Piyush Kumar* <sup>1</sup> , Arshad Ali Shaikh <sup>1</sup> , Pradeep Kumar <sup>1</sup> , Vivek Kumar Gupta <sup>1</sup> , Rajat Dhyani <sup>1</sup> , Tarun Kumar Sharma <sup>1</sup> , Ajmal Hussain <sup>1</sup> , Korasapati Nageswara Rao <sup>2</sup> , Ravinder Kumar Malik <sup>3</sup> , Krishnakant Gangele <sup>1</sup> , Krishna Mohan Poluri <sup>1</sup> , Ranjana Pathania <sup>1</sup> , Naveen Kumar Navani <sup>1</sup>	<sup>1</sup> Indian Institute of Technology Roorkee, Roorkee, Haridwar <sup>2</sup> Sri Venkateswara Veterinary University, Tirupati <sup>3</sup> National Dairy Research Institute, Karnal	<a href="mailto:piyush.bt@srict.iitr.ac.in">piyush.bt@srict.iitr.ac.in</a>
8	Material Science and Nano Technology	MAT-08	I	P	SYNTHESIS OF SILICA NANOPARTICLES FROM RICE HUSK, ITS CHARACTERIZATION AND ROLE IN DROUGHT TOLERANCE IN <i>Eleusine coracana</i>	Komal Bisht*, Shikha Snehal, Pushpa Lohani	Department of Molecular Biology & Genetic Engineering, College of Basic Science & Humanities, G.B. Pant University of Agriculture & Technology, Pantnagar, U.S. Nagar	<a href="mailto:komalplantbiotechnology@gmail.com">komalplantbiotechnology@gmail.com</a>
9	Material Science and Nano Technology	MAT-09	I	P	BACTERIA DERIVED LUMINESCENT CARBON QUANTUM DOTS AND THEIR APPLICATIONS	Megha Pant* <sup>1</sup> , Suresh Kumar <sup>1</sup> , Veena Pande <sup>1</sup> , Anirban Dandapat <sup>2</sup>	<sup>1</sup> Department of Biotechnology, Bhimtal Campus, Kumaun University, Nainital <sup>2</sup> Department of Chemistry, D.S.B. Campus, Kumaun University, Nainital	<a href="mailto:pantmegha642@gmail.com">pantmegha642@gmail.com</a>
10	Material Science and Nano Technology	MAT-10	I	P	MODIFICATION IN MANGO WOOD THROUGH IMPREGNATION POLYMERIZATION OF METHYL METHACRYLATE	Minakshi Pandey*, M.G.H. Zaidi, Sameena Mehtab	College of Basic Science and Humanities, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:minakshipandey2912@gmail.com">minakshipandey2912@gmail.com</a>
11	Material Science and Nano Technology	MAT-11	I	P	SUPERCRTICALLY SYNTHESIZED c-MWCNT/h-BN POLYMER NANOCOMPOSITES BASED ELECTROCHEMICAL SENSOR FOR DETECTION OF ORGANOPHOSPHATES PESTICIDES	Shubham Sharma*, Sameena Mehtab, M.G.H. Zaidi	Department of Chemistry, College of Basic Science and Humanities, GBPUA&T Pantnagar, U.S. Nagar	<a href="mailto:shubhamsharma7149@gmail.com">shubhamsharma7149@gmail.com</a>

12	Material Science and Nano Technology	MAT-12	II	P	A HARMONIOUS APPROACH TO SYNTHESIZED BIOCOMPATIBLE NANOCUBOIDS STRUCTURE BY USING ENDOPHYTIC FUNGI FROM <i>Citrus pseudolimon</i> PLANT	Suresh Kumar* <sup>1</sup> , Aman Kumar <sup>1</sup> , Megha Pant <sup>1</sup> , Kiran Kumari <sup>1</sup> , Sabyasachi Banerjee <sup>1</sup> , Veena Pande <sup>1</sup> , Anirban Dandapat <sup>2</sup>	Department of Biotechnology, Bhimtal Campus, Kumaun University, Nainital <sup>2</sup> Department of Chemistry, D.S.B. Campus, Kumaun University, Nainital	<a href="mailto:sunny.sharma092@gmail.com">sunny.sharma092@gmail.com</a>
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## Mathematics, Statistics and Computer Science

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Mathematics, Statistics and Computer Science	MATH-01	I	O	PERSONAL DATA COMMERCIALIZATION	Abhinav Agarwal*	H.N.B. Garhwal University, A Central University, Srinagar, Pauri Garhwal	<a href="mailto:abhi35kv@gmail.com">abhi35kv@gmail.com</a>
2	Mathematics, Statistics and Computer Science	MATH-02	I	O	ANEMIA PREVALENCE BASED ON SOCIO-DEMOGRAPHIC FACTORS DURING THE PREGNANCY: (A CASE STUDY OF SRINAGAR GARHWAL UTTARAKHAND)	Nidhi Gairola*, Richa Sharma, O.K. Belwal	Department of Statistics, H.N.B. Garhwal University Srinagar, Pauri Garhwal	<a href="mailto:nidi123gairola@gmail.com">nidi123gairola@gmail.com</a>
3	Mathematics, Statistics and Computer Science	MATH-03	I	O	TWO EFFICIENT CLASS OF RATIO ESTIMATORS FOR ESTIMATING POPULATION MEAN USING AUXILIARY INFORMATION IN SIMPLE RANDOM SAMPLING	Richa Sharma*, Lakhan Singh	Department of Statistics, H.N.B. Garhwal University, A Central University, Srinagar, Pauri Garhwal	<a href="mailto:richasharmaktd.22@gmail.com">richasharmaktd.22@gmail.com</a>
4	Mathematics, Statistics and Computer Science	MATH-04	I	O	INVENTORY MANAGEMENT OF COVID-19 CASES IN INDIA	Tanuja Adhikari*, Pawan Tamta	Department of Mathematics, Government Post Graduate College, Berinag, Pithoragrah	<a href="mailto:tanuja.taniya1@gmail.com">tanuja.taniya1@gmail.com</a>
5	Mathematics, Statistics and Computer Science	MATH-05	I	O	MULTI-OBJECTIVE MATHEMATICAL APPROACH IN THE TEXTILE PRODUCTION SECTOR- A GOAL PROGRAMMING TECHNIQUE	Zahid Amin Malik*	Department of Mathematics, M.B. Govt. PG College, Haldwani, Nainital	<a href="mailto:mlkzahidamin926@gmail.com">mlkzahidamin926@gmail.com</a>

6	Mathematics, Statistics and Computer Science	MATH-06	I	P	A STUDY ON EFFECT OF VARIOUS TRAITS ON MILK YIELD AND PREDICTION OF MILK YIELD USING MULTIPLE LINEAR REGRESSION AND ARTIFICIAL NEURAL NETWORK	Anita Yadav*, A. K. Shukla	G.B. Pant University of Agriculture & Technology, Pantnagar, U.S. Nagar	<a href="mailto:anitay255@gmail.com">anitay255@gmail.com</a>
7	Mathematics, Statistics and Computer Science	MATH-07	I	P	AN AUTONOMATION INSPECTION STRATEGY FOR SUSTAINABLE SUPPLY CHAIN PRODUCTION MODEL IN INDUSTRY 4.0	Manisha Pant* <sup>1</sup> , Anand Chauhan <sup>2</sup> , Seema Sharma <sup>1</sup>	<sup>1</sup> Department of Mathematics & Statistics, Gurukul Kangri Deemed to be University, Haridwar <sup>2</sup> Department of Allied Sciences (Mathematics), Graphic Era Deemed to be University, Dehradun	<a href="mailto:manishapant06@gmail.com">manishapant06@gmail.com</a>

### Medical Science Including Pharmaceutical Science

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Medical Science Including Pharmaceutical Science	MED-01	I	O	HERBAL-BASED TRADITIONAL MEDICINAL KNOWLEDGE OF LOCAL INHABITANTS FOR JAUNDICE IN WESTERN HIMALAYAN REGION UTTARAKHAND, INDIA	Ankit Kumar* <sup>1</sup> , Nagma Parveen <sup>2</sup> , Rashi Miglani <sup>2</sup> , Mahendra Rana <sup>1</sup> , Satpal Singh Bisht <sup>2</sup>	<sup>1</sup> Department of Pharmaceutical Sciences, Sir J. C. Bose Technical Campus, Bhimtal, Nainital <sup>2</sup> Department of Zoology, D.S.B Campus, Kumaun University, Nainital	<a href="mailto:ankitkumar412.ak@gmail.com">ankitkumar412.ak@gmail.com</a>
2	Medical Science Including Pharmaceutical Science	MED-02	I	O	TREATMENT OF ARTHRITIC PAIN WITH THE STING OF URTICA DIOICIA AND THEIR PHARMACOLOGICAL EFFECTS: A CURRENT VIEW OF AN ANCIENT HEALING PLANT	Himanshi Rathaur* <sup>1</sup> , Deepika Joshi <sup>1</sup> , Sayantan Mukhopadhyay <sup>2</sup>	<sup>1</sup> Shri Guru Ram Rai University, Dehradun <sup>2</sup> College of Pharmacy Roorkee, Haridwar	<a href="mailto:himanshiratarathaur@gmail.com">himanshiratarathaur@gmail.com</a>
3	Medical Science Including Pharmaceutical Science	MED-03	I	O	ANTIOXIDANT ACTIVITY AND PHYTOCHEMICAL SCREENING OF <i>SONCHUS ARVENSIS</i>	Neeraj Singh Rawat*, Pradyumna Ghosal, Subhash Chandra, Sarla Saklani, Ritik Kotiyal	Department of Pharmaceutical Chemistry, HNBGU, Srinagar, Pauri Garhwal	<a href="mailto:neerajrawat1226@gmail.com">neerajrawat1226@gmail.com</a>
4	Medical Science Including Pharmaceutical Science	MED-04	I	O	GENE ONTOLOGY AND PROTEOMICS IN POLYCYSTIC OVARY SYNDROME	Pankaj Pant* <sup>1</sup> , Nidhi Garirola <sup>2</sup> , Havagiray R. Chitme <sup>1</sup>	<sup>1</sup> Faculty of Pharmacy, DIT University, Dehradun <sup>2</sup> Uttaranchal Institute of Pharmaceutical Sciences, Uttaranchal University, Dehradun	<a href="mailto:pankajpant9412@gmail.com">pankajpant9412@gmail.com</a>

5	Medical Science Including Pharmaceutical Science	MED-05	I	O	ADSORPTIVE REMOVAL OF PHENOL FROM WASTE- H <sub>2</sub> O BY CRUSHED BRICK POWDER	Pradyumna Ghosal* <sup>1</sup> , Mehdi Al Kausor <sup>2</sup> , Sarla Saklani <sup>1</sup> , Subhash Chandra <sup>1</sup> , Ritik Kotiyal <sup>1</sup> , Shivani <sup>1</sup>	<sup>1</sup> Department of Pharmaceutical Chemistry, HNBGU, Srinagar, Pauri Garhwal <sup>2</sup> Department of Chemistry, Science College, Kokrajhar, Assam	<a href="mailto:pradyumnaghosal@gmail.com">pradyumnaghosal@gmail.com</a>
6	Medical Science Including Pharmaceutical Science	MED-06	I	O	ALTERING GENE EXPRESSION PATTERN ASSOCIATED WITH ENDOMETRIAL CANCER BY HISTONE METHYLATION AND INHIBITION OF MATRIX METALLOPROTEINASES	Tushar Singhal* <sup>1</sup> , Deepak Goel <sup>2</sup> , N.V. Satheesh Madhav <sup>3</sup> , Vineeta Gupta <sup>4</sup>	<sup>1</sup> Department of Clinical Research, DIT University (ICRI), Dehradun <sup>2</sup> Associate Director, MAX Institute of Neurosciences, Dehradun <sup>3</sup> Faculty of Pharmacy, DIT University, Dehradun <sup>4</sup> Head of the Department of Obstetrics and Gynecology, Faculty of Medicine, Shri Guru Ram Rai Institute of Medical & Health Sciences, Dehradun	<a href="mailto:tushaar.singhal@outlook.com">tushaar.singhal@outlook.com</a>
7	Medical Science Including Pharmaceutical Science	MED-07	I	O	UNRAVELLING THE FATE OF CHOLESTEROL IN PROBIOTIC LIMOSILACTOBACILLUS STRAIN NKN51	Urmila Netter*, Rekha Sharma, Avik Ghosh, Naveen Kumar Navani,	Chemical Biology Laboratory, Department of Biosciences and Bioengineering, Indian Institute of Technology Roorkee, Roorkee, Haridwar	<a href="mailto:u_netter@bt.iitr.ac.in">u_netter@bt.iitr.ac.in</a>
8	Medical Science Including Pharmaceutical Science	MED-08	II	O	ISOLATION AND SCREENING OF ACETAMIDE DERIVATIVE AS A POTENT ANTIOXIDANT AGENT FROM <i>SATYRIUM NEPALENSE</i>	Monika Kawra*, Sarla Saklani	Department of Pharmaceutical Chemistry, HNBGU, Srinagar, Pauri Garhwal	<a href="mailto:kawra.monika8@gmail.com">kawra.monika8@gmail.com</a>
9	Medical Science Including Pharmaceutical Science	MED-09	II	O	TARGETED NANO FORMULATION: AN APPROACH ON ORAL CAVITY DISEASE	Nidhi Semwal*, Deepika Joshi, Bhavana Singh, Archana Rautela	Shri Guru Ram Rai University, Dehradun	<a href="mailto:nidhiisemwal3@gmail.com">nidhiisemwal3@gmail.com</a>
10	Medical Science Including Pharmaceutical Science	MED-10	II	O	FORMULATION OF ANTI-DIABETIC HERBAL TABLET FROM DIFFERENT MEDICINAL PLANTS OF GARHWAL HIMALAYA	Subhash Chandra*, Sarla Saklani	Department of Pharmaceutical Chemistry, HNBGU, Srinagar, Pauri Garhwal	<a href="mailto:subhashkothiyal@gmail.com">subhashkothiyal@gmail.com</a>

11	Medical Science Including Pharmaceutical Science	MED-11	I	P	PREPARATION OF PHYTOCONSTITUENT LOADED SOLID LIPID NANOPARTICLE FOR BRAIN DISORDERS	Arpita Sahoo*, Bhavna Kumar, Mansi Varshney, Manmohan Singhal, Neeraj Kumar Sethia	Faculty of Pharmacy, DIT University, Dehradun	<a href="mailto:arpitasahoopharma@gmail.com">arpitasahoopharma@gmail.com</a>
12	Medical Science Including Pharmaceutical Science	MED-12	I	P	AN APPROACH FOR ENHANCING BIOAVAILABILITY: SELF NANOEMULSIFYING DRUG DELIVERY SYSTEM	Jyotsana Suyal* <sup>1</sup> , Bhavana Kumar <sup>1</sup> , Vikash Jakhmola <sup>2</sup> , Priya <sup>2</sup>	<sup>1</sup> DIT University, Dehradun <sup>2</sup> Uttaranchal University, Dehradun	<a href="mailto:jyotsanasuyal7@gmail.com">jyotsanasuyal7@gmail.com</a>
13	Medical Science Including Pharmaceutical Science	MED-13	I	P	CHARACTERIZATION OF MICROWAVE ASSESTED GREEN SYNTHESIZED NANOPARTICLES PREPARED USING FUNGUS CORDYCEPS MILITARIS	Khyati Saini* <sup>1</sup> , Jagnnath Sahoo <sup>2</sup> , Kumud Joshi <sup>1</sup>	<sup>1</sup> Faculty of Pharmacy, DIT University, Dehradun <sup>2</sup> SoPPHI, DIT University, Dehradun	<a href="mailto:sainikhyati09@gmail.com">sainikhyati09@gmail.com</a>
14	Medical Science Including Pharmaceutical Science	MED-14	I	P	TARGETING EFFLUX PUMPS IN MULTIDRUG RESISTANT CLINICAL ISOLATES OF <i>Pseudomonas aeruginosa</i>	Komal Preet Kaur*, Mahak Saini, Ranjana Pathania	Department of Biosciences and Bioengineering, Indian Institute of Technology Roorkee, Roorkee, Haridwar	<a href="mailto:kp_kaur@bt.iitr.ac.in">kp_kaur@bt.iitr.ac.in</a>
15	Medical Science Including Pharmaceutical Science	MED-15	I	P	DEVELOPMENT OF TRANSUNGUAL DRUG DELIVERY GEL FOR ONYCHOMYCOSIS	Mayuri Gupta*, Jagannath Sahoo, Samir Bhargava	Faculty of Pharmacy, DIT University, Dehradun	<a href="mailto:guptamayuri156@gmail.com">guptamayuri156@gmail.com</a>
16	Medical Science Including Pharmaceutical Science	MED-16	I	P	TO ASSESS THE QUALITY CONTROL OF INDEGENOUSLY DEVELOPED <sup>99m</sup> Tc- METHIONINE DURING CLINICAL STUDIES	Meena Negi*, Leesa Thakur, Vandana Kumar Dhingra	Department of Nuclear Medicine, AIIMS, Rishikesh, Dehradun	<a href="mailto:negimeena10@gmail.com">negimeena10@gmail.com</a>
17	Medical Science Including Pharmaceutical Science	MED-17	I	P	DEVELOPMENT & INVITRO-EXVIVO CHARACTRIZATION OF DULOXETINE HYDROCHLORIDE BUCCOADHESIVE BILAYER TABLET	Navraj Upreti*, Jagannath Sahoo, Samir Bhargava	Faculty of Pharmacy, DIT University, Dehradun	<a href="mailto:navraj.upreti2679@gmail.com">navraj.upreti2679@gmail.com</a>
18	Medical Science Including Pharmaceutical Science	MED-18	I	P	<i>IN-VITRO</i> ANTIOXIDANT ACTIVITY OF <i>SKIMMIA LAUREOLA</i> ESSENTIAL OIL	Neha Kukreti* <sup>1</sup> , Ritu Rani <sup>1</sup> , V.K. Varshney <sup>2</sup> , Havagiray R. Chitme <sup>1</sup>	<sup>1</sup> Faculty of Pharmacy, DIT University, Dehradun <sup>2</sup> Department of Chemistry, FRI, Dehradun	<a href="mailto:nehakukreti11@gmail.com">nehakukreti11@gmail.com</a>



19	Medical Science Including Pharmaceutical Science	MED-19	I	P	NUTRITIONAL ESTIMATION AND PHYTOCHEMICAL SCREENING OF <i>MOMORDICA DIOICA</i>	Nikita Khali*, Pradyumna Ghosal, Subhash Chandra, Sarla Saklani	Department of Pharmaceutical Chemistry, HNBGU, Srinagar, Pauri Garhwal	<a href="mailto:nikitakhali1234@gmail.com">nikitakhali1234@gmail.com</a>
20	Medical Science Including Pharmaceutical Science	MED-20	I	P	A NOVEL NITROFURAN ANALOGUE, IITR01324 POTENTIATES VANCOMYCIN EFFICACY AGAINST VANCOMYCIN INTERMEDIATE <i>STAPHYLOCOCCUS AUREUS</i> (VISA) AND HETEROGENOUS VISA	Poushali Mitra*, Vineet Dubey, Mahak Saini, Ranjana Pathania	Department of Biosciences and Bioengineering, Indian Institute of Technology Roorkee, Roorkee, Haridwar	<a href="mailto:p_mitra@bt.iitr.ac.in">p_mitra@bt.iitr.ac.in</a>
21	Medical Science Including Pharmaceutical Science	MED-21	I	P	CURCUMIN NANOGELS A THERAPEUTIC APPROCH FOR SKIN DISEASES	Pragati Singh*, Bhavna, Harish Kothari, Samir Bhargava	Faculty of Pharmacy, DIT University, Dehradun	<a href="mailto:pragatisingh961657@gmail.com">pragatisingh961657@gmail.com</a>
22	Medical Science Including Pharmaceutical Science	MED-22	I	P	A REVIEW ON NATUROPATHY	Pragati Tripathi*, Yogendr Bahuguna, Shelly Raghav	School of Pharmaceutical Sciences, Shri Guru Ram Rai University, Dehradun	<a href="mailto:tripathi00pragati@gmail.com">tripathi00pragati@gmail.com</a>
23	Medical Science Including Pharmaceutical Science	MED-23	I	P	ANTI-INFERTILITY ACTIVITY OF GARHWAL HIMALAYA MEDICINAL PLANTS	Ritik Kotiyal*, Pradyumna Ghosal, Subhash Chandra, Sarla Saklani	Department of Pharmaceutical Chemistry, HNBGU, Srinagar, Pauri Garhwal	<a href="mailto:ritikkotiyal555@gmail.com">ritikkotiyal555@gmail.com</a>
24	Medical Science Including Pharmaceutical Science	MED-24	I	P	DDPH FREE RADICAL SCAVENGING ACTIVITY OF DIFFERENT EXTRACTIONS OF <i>TINOSPORA CORDIFOLIA</i>	Ritu Rani* <sup>1</sup> , Neha Kukreti <sup>1</sup> , A.K. Sharma <sup>2</sup> , Havagiray R. Chitme <sup>1</sup>	<sup>1</sup> Faculty of Pharmacy, DIT University, Dehradun <sup>2</sup> NWFP, FRI, Dehradun	<a href="mailto:rituyadav581995@gmail.com">rituyadav581995@gmail.com</a>
25	Medical Science Including Pharmaceutical Science	MED-25	I	P	PHARMACOGNOSTIC STUDY, FORMULATION DEVELOPMENT & EVALUATION OF THE SAME OF <i>ARTEMISIA NILAGIRICA</i> (CLARKE) PAMP PLANT SPECIES FROM GARHWAL REGION	Shivani Bhardwaj*, Chandra Shekhar Tailor, Yogendra M. Bahuguna, Bhawana Bhatt Kaushik	School of Pharmaceutical Sciences, Shri Guru Ram Rai University, Dehradun	<a href="mailto:shivaani.bhardwaj97@gmail.com">shivaani.bhardwaj97@gmail.com</a>
26	Medical Science Including Pharmaceutical Science	MED-26	I	P	EVALUATION OF GARHWAL HIMALAYA MEDICINAL PLANT <i>SOLANUM XANTHOCARPUM</i>	Shivani*, Pradyumna Ghosal, Ritik Kotiyal, Subhash Chandra, Sarla Saklani	Department of Pharmaceutical Chemistry, HNBGU, Srinagar, Pauri Garhwal	<a href="mailto:shivani783373@gmail.com">shivani783373@gmail.com</a>

27	Medical Science Including Pharmaceutical Science	MED-27	I	P	A REVIEW ON ELAEOCARPUS GANITRUS	Tina Negi*, Bhawana Bhatt, Yogendra M. Bahuguna, Chandra Shekhar Tailor	School of Pharmaceutical Sciences, Shri Guru Ram Rai University, Dehradun	<a href="mailto:negitina223@gmail.com">negitina223@gmail.com</a>
28	Medical Science Including Pharmaceutical Science	MED-28	II	P	INFERTILITY, PROTEOMICS AND ASSISTED REPRODUCTIVE TECHNOLOGIES	Nidhi Gairola* <sup>1</sup> , Pankaj Pant <sup>2</sup> , Havagiray Chitme <sup>2</sup>	<sup>1</sup> Uttanchal institute of Pharmaceutical Sciences Dehradun, Uttarakhand <sup>2</sup> DIT University, Dehradun	<a href="mailto:nidhithapliyal28@gmail.com">nidhithapliyal28@gmail.com</a>

### Physics

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Physics	PHY-01	I	O	PREPARATION AND PERFORMANCE ANALYSIS OF PARAFFIN/SEBS/GRAPHITE ADDITIVE BASED SHAPE STABILIZED COMPOSITE PHASE CHANGE MATERIAL	Jaspreet Singh Aulakh*, Deepika P Joshi	Department of Physics, G.B. Pant University of Agriculture & Technology, Pantnagar, U.S. Nagar	<a href="mailto:aulakh.jaspreet94@gmail.com">aulakh.jaspreet94@gmail.com</a>
2	Physics	PHY-02	I	O	ASSESSMENT OF SURFACE OZONE AT DEHRADUN: A VALLEY SITE IN HIMALAYAN AND ITS COMPARISON WITH OTHER CENTRAL HIMALAYAN AND ASSOCIATED SITES	Mahendar Rajwar* <sup>1</sup> , Manish Naja <sup>1</sup> , Yogesh Kant <sup>2</sup> , Rakesh K.Tiwari <sup>3</sup>	<sup>1</sup> Aryabhata Research Institute of Observational Sciences (ARIES), Nainital <sup>2</sup> Indian Institute of Remote Sensing, ISRO, Department of Space, Govt. of India, Dehradun <sup>3</sup> Deen Dayal Upadhyaya Gorakhpur University, Gorakhpur	<a href="mailto:mahendar@aries.res.in">mahendar@aries.res.in</a>

3	Physics	PHY-03	II	O	PHOTOPHYSICS OF AMINOQUINOLINE DERRIVATIVES: AN EXPERIMENTAL AND THEORETICAL INVESTIGATION	Nupur Pandey <sup>*1</sup> , Sanjay Pant <sup>1</sup> , Neeraj Tewari <sup>2</sup> , Mohan Singh Mehata <sup>3</sup>	<sup>1</sup> Photophysics Laboratory, Department of Physics, D.S.B. Campus, Kumaun University, Nainital <sup>2</sup> Physics Department, Lajpat Rai College, Sahibabad, Ghaziabad <sup>3</sup> Laser Spectroscopy Laboratory, Department of Applied Physics, Delhi Technological University, Bawana Road, Delhi	<a href="mailto:mahipndey@gmail.com">mahipndey@gmail.com</a>
4	Physics	PHY-04	I	P	DESIGN AND IMPLEMENTATION OF AREA & DELAY EFFICIENT VEDIC MULTIPLIER	Rajesh Bisht*, Priyanka Nautiyal, Aasheesh Raturi	Department of Physics, Dolphin (PG) Institute of Biomedical and Natural Sciences, Dehradun	<a href="mailto:bishtrajesh00@gmail.com">bishtrajesh00@gmail.com</a>

### Rural Technology

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Rural Technology	RUR-01	I	O	TURNING WASTE TO WEALTH: PINE NEEDLE BASED ACTIVE PAPER WITH ZEOLITE FOR FRUITS AND VEGETABLES PACKAGING	Dakuri Ramakanth*, Avinash Kumar, Kirtiraj K. Gaikwad	Indian Institute of Technology Roorkee, Roorkee, Haridwar	<a href="mailto:dakuri_r@pe.iitr.ac.in">dakuri_r@pe.iitr.ac.in</a>
2	Rural Technology	RUR-02	I	O	NOVEL GALLIC ACID COATED PAPER AS AN OXYGEN INDICATOR FOR FOOD SAFETY AND SECURITY	Konala Akhila*, Dakuri Ramakanth, Kirtiraj K. Gaikwad	Indian Institute of Technology Roorkee, Roorkee, Haridwar	<a href="mailto:k_akhila@pt.iitr.ac.in">k_akhila@pt.iitr.ac.in</a>
3	Rural Technology	RUR-03	I	O	NOVEL GELATIN/PLANT POLYSACCHARIDES BASED BIODEGRADABLE PLASTIC FOR FOOD PACKAGING APPLICATIONS	Lokesh Kumar*, Kirtiraj K. Gaikwad	Indian Institute of Technology Roorkee, Roorkee, Haridwar	<a href="mailto:l_kumar@pt.iitr.ac.in">l_kumar@pt.iitr.ac.in</a>
4	Rural Technology	RUR-04	I	O	TOWARDS SUSTAINABLE PACKAGING: MINIMALISTIC APPROACH IN PACKAGE DESIGN AS BRANDING TOOL	Pragya Srivastava*, Dakuri Ramakanth*, Kirtiraj K. Gaikwad	Indian Institute of Technology Roorkee, Roorkee, Haridwar	<a href="mailto:p_srivastava@pt.iitr.ac.in">p_srivastava@pt.iitr.ac.in</a>

5	Rural Technology	RUR-05	I	O	AN EXPLORATORY STUDY ON IMPACT ASSESSMENT OF UNIVERSAL HEALTH COVERAGE IN UDHAM SINGH NAGAR DISTRICT OF UTTARAKHAND STATE	Pratibha Pandey*, Aditi Vats	Deptt. of Family Resource Management, College of Home Science), G.B. Pant University of Agriculture & Technology, Pantnagar, U.S. Nagar	<a href="mailto:pratihema2803@gmail.com">pratihema2803@gmail.com</a>
6	Rural Technology	RUR-06	I	O	GUAR GUM/CARBOXYMETHYL CELLULOSE-BASED ANTIOXIDANT FILM INCORPORATED WITH HALLOYSITE NANOTUBES AND LITCHI SHELL WASTE EXTRACT FOR ACTIVE PACKAGING	Ram Kumar Deshmukh*, Konala Akhila, Kirtiraj K. Gaikwad	Indian Institute of Technology Roorkee, Roorkee, Haridwar	<a href="mailto:rkdeshmukh9421@gmail.com">rkdeshmukh9421@gmail.com</a>
7	Rural Technology	RUR-07	II	O	THE USE OF <i>LANTANA CAMARA</i> AND ITS SIGNIFICANT ECONOMIC BENEFIT FOR RURAL LIVELIHOOD	Abhishek Kumar*	Forest Research Institute, Dehradun	<a href="mailto:abhishek259kumar@gmail.com">abhishek259kumar@gmail.com</a>
8	Rural Technology	RUR-08	II	O	CULTIVATION TECHNOLOGY OF SOME IMPORTANT MEDICINAL & EDIBLE MUSHROOM AND ITS MARKETING PROBLEMS IN PRESENT SCENARIO	Pramod Kumar Chourasia*	Forest Extension, Forest Research Institute, Dehradun	<a href="mailto:prcforestry@gmail.com">prcforestry@gmail.com</a>
9	Rural Technology	RUR-09	III	O	MANAGEMENT OF INVASIVE SPECIES <i>STEVIA OVATA</i> FOR THE DEVELOPMENT OF USEFUL NATURAL DYES.	Praveen Onial*, Vineet Kumar, Madhav Badoni	Chemistry And Bioprospecting Division, Forest Research Institute, Dehradun	<a href="mailto:onialp@icfre.org">onialp@icfre.org</a>
10	Rural Technology	RUR-10	I	P	ATTITUDE OF FARMERS TOWARDS DRIP IRRIGATION: A STUDY IN KUMAON HILLS OF UTTARAKHAND	Pooja Karki*, Amardeep	Department of Agricultural Communication, College of Agriculture, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:poojakarki182017@gmail.com">poojakarki182017@gmail.com</a>

## Science and Society/ Science Communication

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Science and Society/ Science Communication	SCI-01	I	O	ASSESSMENT OF MUSCULOSKELETAL DISCOMFORT AMONG GARAGE WORKERS	Alka Chadrakanta*, Deepa Vinay	Department of Family Resource Management, College of Home Science), G.B. Pant University of Agriculture & Technology, Pantnagar, U.S. Nagar	<a href="mailto:alkachandrakanta@gmail.com">alkachandrakanta@gmail.com</a>

2	Science and Society/ Science Communication	SCI-02	I	O	IN SILICO INVESTIGATION OF PHYTOCONSTITUENTS OF MEDICINAL HERB 'PIPER LONGUM' AGAINST SARS-COV-2 BY MOLECULAR DOCKING AND MOLECULAR DYNAMICS ANALYSIS	Shradha Lakhera* <sup>1</sup> , Kamal Devlal <sup>1</sup> , Meenakshi Rana <sup>1</sup> , Arabinda Ghosh <sup>2</sup>	<sup>1</sup> Department of Physics, Uttarakhand Open University, Haldwani <sup>2</sup> Microbiology division, Department of Botany, Guwahati University, Guwahati, Assam	<a href="mailto:shradhalakhera11@gmail.com">shradhalakhera11@gmail.com</a>
3	Science and Society/ Science Communication	SCI-03	III	O	IMPACT ANALYSIS OF COVID-19 AND MIGRATION IN THE HILLY REGION OF UTTARAKHAND	Naveen Singhal* <sup>1</sup> , Shailey Singhal <sup>2</sup> , Shilpi Aggarwal <sup>2</sup> , Tarumay Ghosal <sup>1</sup> , Jabrinder Singh <sup>1</sup>	<sup>1</sup> DIT University, Dehradun <sup>2</sup> University of Petroleum and Energy Studies, Dehradun	<a href="mailto:drnaveen.singhal@dituniversity.edu.in">drnaveen.singhal@dituniversity.edu.in</a>
4	Science and Society/ Science Communication	SCI-04	III	O	SCIENCE COMMUNICATION THROUGH SOCIO-CULTURAL ACTION (STORYTELLING): IMPORTANCE IN TEACHING-LEARNING PROCESS AND POPULARIZATION OF SCIENCE	Nirmal Kumar Neoliya* <sup>1</sup> , Shobha Neoliya <sup>2</sup> ,	<sup>1</sup> Rajeev Gandhi Navodaya Vidyalaya, Khatima, Udham Singh Nagar <sup>2</sup> Beersheba Senior Secondary School, Haldwani, Nainital	<a href="mailto:nirmalneoliya@gmail.com">nirmalneoliya@gmail.com</a>
5	Science and Society/ Science Communication	SCI-05	I	P	PERCEIVED UTILITY OF AGRICULTURAL INFORMATION PUBLISHED IN NEWSPAPER BY FARMER READERS OF KUMAON DIVISION OF UTTARAKHAND	Abhishek Pathak*, Arpita Sharma	Department of Agricultural Communication, G.B. Pant University of Agriculture & Technology, Pantnagar, U.S. Nagar	<a href="mailto:abhi.01.pathak@gmail.com">abhi.01.pathak@gmail.com</a>

## Veterinary Sciences and Animal Husbandry

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Veterinary Sciences and Animal Husbandry	VET-01	I	O	CHARACTERIZATION AND DETERMINATION OF SPECIFICITY OF EGG DERIVED ANTIBODIES (IgY) AGAINST OMPs OF MDR <i>Salmonella</i> Typhimurium	Aakanksha Tiwari*, Rajesh Kumar, Garima Pandey	Deptt. of Veterinary Microbiology, College of Veterinary and Animal Sciences, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:aakanksha2191@yahoo.in">aakanksha2191@yahoo.in</a>
2	Veterinary Sciences and Animal Husbandry	VET-02	I	O	EVALUATION OF ANTIOXIDANT AND HYPOLIPIDEMIC POTENTIAL OF <i>CICHORIUM INTYBUS</i> LEAF POWDER IN IMIDACLOPRID INTOXICATED WHITE LEGHORN COCKERELS	Deeksha Maletha*, S.P. Singh, A.H. Ahmad, Disha Pant	Department of Veterinary Pharmacology and Toxicology, College of Veterinary and Animal Sciences, G.B. Pant University of Agriculture and Technology, Pantnagar, Udham Singh Nagar	<a href="mailto:maletha.deeksha94@gmail.com">maletha.deeksha94@gmail.com</a>

3	Veterinary Sciences and Animal Husbandry	VET-03	I	O	EFFECT OF DIETARY INCORPORATION OF BADRI COW URINE ON HEMATOLOGICAL AND WELL-BEING PARAMETERS OF GROWING BADRI CATTLE	Deepikesh Joshi* <sup>1</sup> , D.V. Singh <sup>1</sup> , Sanjay Kumar <sup>1</sup> , Disha Pant <sup>2</sup>	<sup>1</sup> Department of Livestock Production Management, College of Veterinary and Animal Sciences, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar <sup>2</sup> Department of Veterinary Pharmacology and Toxicology, College of Veterinary and Animal Sciences, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:deepikeshjoshi@gmail.com">deepikeshjoshi@gmail.com</a>
4	Veterinary Sciences and Animal Husbandry	VET-04	I	O	HEMATOLOGICAL AND BIOCHEMICAL ENTITIES OF INDIGENOUS BADRI CATTLE OF UTTARAKHAND	Mayank Kr. Patel*, Swati Thakur, Ruokuobeinuo Huozha, Sunil Kr. Rastogi	Department of Veterinary Physiology and Biochemistry, College of Veterinary and Animal Sciences, G. B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:mayankpatel5015@gmail.com">mayankpatel5015@gmail.com</a>
5	Veterinary Sciences and Animal Husbandry	VET-05	II	O	EFFICACY OF DIETARY SUPPLEMENTATION OF <i>WITHANIA SOMNIFERA</i> ROOT POWDER ON STEROID HORMONE LEVEL AND GONADO-SOMATIC INDEX OF MALE BROOD STOCK OF JAYANTI ROHU ( <i>LABEO ROHITA</i> )	Priyanka Arya* <sup>1</sup> , R.S. Chauhan <sup>2</sup>	<sup>1</sup> Department of Fishery Science, Doon (PG) College of Agriculture & Allied Science, Dehradun <sup>2</sup> Department of Aquaculture, College of Fisheries, G.B. Pant University of Agriculture & Technology, Pantnagar, U.S. Nagar	<a href="mailto:priyankaarya445@gmail.com">priyankaarya445@gmail.com</a>

## Zoology

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Zoology	ZOO-01	I	O	OBSERVATIONS ON THE AVIFAUNA OF THREE DIFFERENT HABITATS IN OUTSKIRTS OF DEHRADUN, UTTARAKHAND	Iqbal Ali Khan*, Anil Kumar	Zoological Survey of India, Northern Regional Centre, Dehradun	<a href="mailto:khanbbt555@gmail.com">khanbbt555@gmail.com</a>

2	Zoology	ZOO-02	I	O	INVESTIGATIONS ON VARIOUS FACTORS AFFECTING HONEY BEE POPULATION IN WESTERN HIMALAYA OF UTTARAKHAND, INDIA	Nagma Parveen* <sup>1</sup> , Rashi Miglani <sup>1</sup> , Ankit Kumar <sup>2</sup> , Satpal Singh Bisht <sup>1</sup>	<sup>1</sup> Department of Zoology, D.S.B. Campus, Kumaun University, Nainital <sup>2</sup> Sir J.C Bose Technical Campus, Bhimtal, Nainital	<a href="mailto:nagmaparveen.parveen99@gmail.com">nagmaparveen.parveen99@gmail.com</a>
3	Zoology	ZOO-03	I	O	VOCAL REPERTOIRE IN INDIAN ROBIN: ACOUSTICAL CHARACTERISTICS AND FUNCTIONAL SIGNIFICANCE OF SIGNALS	Prakhar Rawal*, Anil Kumar	Zoological Survey of India, Northern Regional Centre, Dehradun	<a href="mailto:prakharrawal95@gmail.com">prakharrawal95@gmail.com</a>
4	Zoology	ZOO-04	I	O	SPECIES OF GENUS BOOTANOMYIA (CHALCIDOIDEA: MEGASTIGMIDAE) DISCOVERED FROM UTTARAKHAND	Sangeeta Rawat*, Sandeep Kumar	Department of Zoology, Kumaun University, S.S.J Campus, Almora	<a href="mailto:sangeetaices@gmail.com">sangeetaices@gmail.com</a>
5	Zoology	ZOO-05	I	O	SEXUAL DIMORPHISM IN THE KASHMIR ROCK AGAMA <i>LAUDAKIA TUBERCULATA</i> (GRAY, 1827)	Smita Dangwal*, D.K. Sharma	Department of Zoology, H.N.B. Garhwal Central University, SRT Campus, Badshahithaul, Tehri Garhwal	<a href="mailto:smitadangwal.99@gmail.com">smitadangwal.99@gmail.com</a>
6	Zoology	ZOO-06	II	O	INVESTIGATIONS ON EFFECT OF COMMONLY USED INSECTICIDES ON EARTHWORM <i>AMYNTHAS ALEXANDRI</i> UNDER LABORATORY CONDITIONS	Rashi Miglani <sup>1*</sup> , Nagma Parveen* <sup>1</sup> , Ankit Kumar <sup>2</sup> , Satpal Singh Bisht <sup>1</sup>	<sup>1</sup> Department of Zoology, D.S.B. Campus, Kumaun University, Nainital <sup>2</sup> Sir J.C Bose Technical Campus, Bhimtal, Nainital	<a href="mailto:miglani.r5094@gmail.com">miglani.r5094@gmail.com</a>
7	Zoology	ZOO-07	III	O	DISCRIMINATION IN SONG CHARACTERISTICS OF INDIAN ROBIN WITH SPECIAL REFERENCE TO LOCAL ADAPTATION HYPOTHESIS	Anil Kumar*	Zoological Survey of India, Northern Regional Centre, Dehradun	<a href="mailto:anilsonta@gmail.com">anilsonta@gmail.com</a>
8	Zoology	ZOO-08	III	O	DIVERSITY OF ODNATES IN ASAN CONSERVATION RESERVE (RAMSAR SITE), DOON VALLEY, UTTARAKHAND, INDIA	Sarika Bhatt* <sup>1</sup> , Kritesh De <sup>2</sup> , Virendra Prasad Uniyal <sup>3</sup> , Manisha Uniyal <sup>4</sup>	<sup>1</sup> Department of Zoology, Shri Guru Ram Rai University, Dehradun <sup>2</sup> Department of Bio Sciences, Sri Sathya Sai University for Human Excellence, Navanihal, Karnataka <sup>3</sup> Wildlife Institute of India, Dehradun <sup>4</sup> Department of Zoology, Dayanand Bijendra Swaroop PG College, Dehradun	<a href="mailto:sarika.r.bo4@gmail.com">sarika.r.bo4@gmail.com</a>



9	Zoology	ZOO-09	I	P	OBSERVATION ON FORAGING BEHAVIOUR OF INDIAN ROBIN IN DEHRADUN, INDIA	Garima Singh*, Anil Kumar	Zoological Survey of India, Dehradun	<a href="mailto:garimasinghzoology@gmail.com">garimasinghzoology@gmail.com</a>
10	Zoology	ZOO-10	I	P	PHYTOCHEMICAL ANALYSIS OF SAFED MUSLI ( <i>CHLOROPHYTUM BORIVILIANUM</i> ) ROOT POWDER AND ITS DIETARY EFFECT ON GONADOSOMATIC INDEX OF JAYANTI ROHU	Mahendra Kumar Yadav*, R.S Chauhan	College of Fisheries, G.B. Pant University of Agriculture and Technology, Pantnagar, U.S. Nagar	<a href="mailto:mahendray459@gmail.com">mahendray459@gmail.com</a>
11	Zoology	ZOO-11	I	P	NUTRITIONAL EVALUATION OF MILK FROM LIVESTOCK REARED IN THE HILLS OF KUMAUN REGION OF UTTARAKHAND	Mansi Arya*, Satpal Singh Bisht	Department of Zoology Kumaun University, Nainital	<a href="mailto:mansiarya654@gmail.com">mansiarya654@gmail.com</a>
12	Zoology	ZOO-12	I	P	SPECIES COMPOSITION OF LADY BIRD BEETLE ( COLEOPTERA : COCCINELLIDAE ) IN BALAWALA, DEHRADUN (UTTARAKHAND) INDIA.	Pramod Chandra Khanduri*, PushpendraK. Sharma	Department of Zoology, D.A.V. (P.G.) College Dehradun	<a href="mailto:pramodckhanduri@gmail.com">pramodckhanduri@gmail.com</a>
13	Zoology	ZOO-13	I	P	ECOLOGICAL STUDIES OF SOME SPRING – FED STREAMS IN THE GARHWAL HIMALAYA	Prashansha Bachhwan*, Ravindra Singh	Department of Zoology, H.N.B. Garhwal Central University, SRT Campus, Badshahithaul, Tehri Garhwal	<a href="mailto:prashanshabachhwan782@gmail.com">prashanshabachhwan782@gmail.com</a>
14	Zoology	ZOO-14	I	P	IMPACT OF PHYSICO- CHEMICAL PARAMETERS ON EARTHWORM DIVERSITY IN TWO ECOTYPES OF KUMAUN HIMALAYA, UTTARAKHAND	Shikha Bora*, Satpal Singh Bisht	D.S.B. Campus, Kumaun University, Nainital	<a href="mailto:borashikha94@gmail.com">borashikha94@gmail.com</a>
15	Zoology	ZOO-15	II	P	SPATIAL DISTRIBUTION AND INSECTICIDE SUSCEPTIBILITY STATUS OF <i>Aedes aegypti</i> IN SELECTED DENGUE PRONE AREAS OF DEHRADUN	Iftikhar Ul Haq*, Sundar Singh	Department of Zoology, D.A.V. PG College, Dehradun	<a href="mailto:iftikharulhaq41@gmail.com">iftikharulhaq41@gmail.com</a>
16	Zoology	ZOO-16	II	P	DETECTION OF TWO SPOTTED STINK BUG, <i>PERILLUS BIOCULATUS</i> (FAB.) ON <i>ZYGOGRAMMA BICOLORATA</i> PALLISTER IN SUB-TROPICAL REGION OF TEHRI GARHWAL HIMALAYA, (UTTARAKHAND), INDIA	Vivek Kumar*, B.S. Bisht, Prashansha Bachhwan, Jagbir Singh	Department of Zoology, H.N.B. Garhwal Central University, SRT Campus, Badshahithaul, Tehri Garhwal	<a href="mailto:vk819100@gmail.com">vk819100@gmail.com</a>

## Innovator of the Year

Sr. No.	Discipline	Roll No.	CT.	O/P	Title of Abstract	Name of Author(S)	Organizational Affiliation	Email Address
1	Innovator	INN-01	IV	O	IN SITU REMOVAL OF NITROGEN AND PHOSPHORUS by BACILLUS SP. AND ASPERGILLUS SP.	Anne Bhambri*, Santosh Kumar Karn	Department of Biochemistry and Biotechnology, Sardar Bhagwan Singh University, Dehradun	<a href="mailto:anne.bhambri26@gmail.com">anne.bhambri26@gmail.com</a>
2	Innovator	INN-02	IV	O	OCULAR TO BRAIN DELIVERY: AN APPROCH TO TARGET GLIPTINS FOR NEURODEGENRATIVE DISORDERS	Bhavna* <sup>1</sup> , Deepika Sharma <sup>1</sup> , Manmohan Singhal <sup>2</sup>	<sup>1</sup> Faculty of Pharmacy, DIT Universty, Dehradun <sup>2</sup> SGRR University, Dehradun	<a href="mailto:bhavan@dituniversity.edu">bhavan@dituniversity.edu</a>
3	Innovator	INN-03	IV	O	OPTIMIZED MANAGED PRESSURE DRILLING PERFORMANCE IN INCLINED WELLS	Gurav Richhariya*, Naveen Singhal	DIT University, Dehradun	<a href="mailto:gaurav.richhariya@dituniversity.edu.in">gaurav.richhariya@dituniversity.edu.in</a>
4	Innovator	INN-04	IV	O	DESIGNING, SYNTHESIS, CHARACTERIZATION AND PHARMACOLOGY OF SEVERAL NOVEL SUBSTITUTED QUINOLINE DERIVATIVES	Hament Panwar*	Department of Chemistry, H.V.M. PG College, Raisi, Haridwar	<a href="mailto:drhp.ngi@gmail.com">drhp.ngi@gmail.com</a>
5	Innovator	INN-05	IV	O	DEVELOPMENT OF SOLAR CELL USING PERC TECHNOLOGY TO MAXIMISE SOLAR CELL EFFICIENCY	Monika Gairola*, A.K. Swami	Department of Electrical Engineering, G.B. Pant University of Agriculture and Technology, Pantnagar	<a href="mailto:monikagairola19@gmail.com">monikagairola19@gmail.com</a>
6	Innovator	INN-06	IV	O	FORECASTING OF ENERGY DEMAND FOR IMPLEMENTATION OF ELECTRIC VEHICLES IN DEHRADUN SMART CITY	Rakesh Kumar*	Assistant General Manager (IT & e-Governance), Dehradun Smart City Limited, Saatvik Tower, Rajender Nagar, Dehradun	<a href="mailto:ra77kesh@gmail.com">ra77kesh@gmail.com</a>
7	Innovator	INN-07	IV	O	NAVIGATION WITH INDIAN CONSTELLATION (NAVIC) BASED LOCATION INDEPENDENT SOIL MOISTURE INVERSION MODEL	Sushant Shekhar*, Rishi Praksh, Anurag Vidyarthi	Department of Electronics & Communication Engineering, Graphic Era Deemed to be University, Dehradun	<a href="mailto:sushantshekhar09@gmail.com">sushantshekhar09@gmail.com</a>
8	Innovator	INN-08	IV	O	INSTANTLY FINDING WEEK DAYS (MON, TUE, WED, ETC.) ON ANY DATE IN A SPAN OF 400 YEARS	Vijay Mehra*	N.No. 863, Indira Nagar, Dehradun	<a href="mailto:vijaymehrageu@gmail.com">vijaymehrageu@gmail.com</a>

9	Innovator	INN-09	IV	O	EXPLORATION OF MODIFIED MANDUA STARCH IN DEVELOPMENT OF COLON TARGETED MATRIX TABLET	Vipin Kumar* <sup>1</sup> , Mayank Kumar Malik <sup>2</sup> , Jaspal Singh <sup>2</sup> , Pawan Kumar <sup>3</sup> , Prince Prashant Sharma <sup>1</sup>	<sup>1</sup> Department of Pharmaceutical Sciences, Faculty of Medical Science & Health, Gurukul Kangri (Deemed to be University), Haridwar <sup>2</sup> Department of Chemistry, Faculty of Science, Gurukul Kangri (Deemed to be University), Haridwar <sup>3</sup> Department of Physics, Faculty of Science, Gurukul Kangri (Deemed to be University), Haridwar	<a href="mailto:vipin@gkv.ac.in">vipin@gkv.ac.in</a>
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