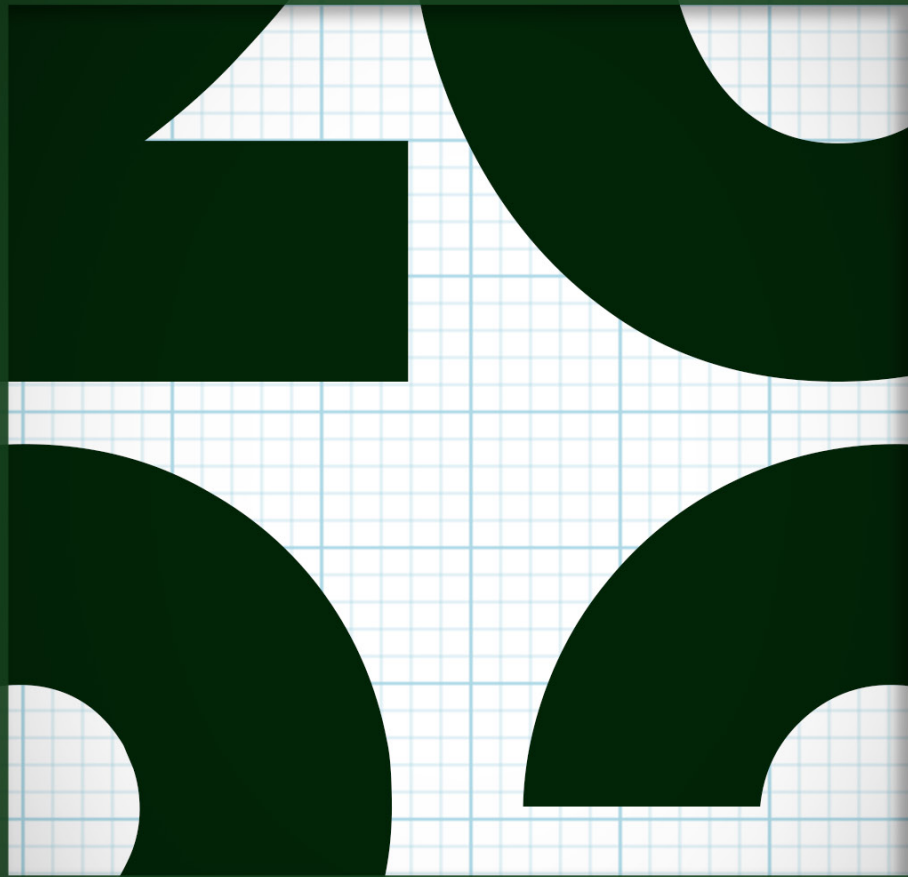




ACHARYA NARENDRA DEV COLLEGE

U N I V E R S I T Y O F D E L H I

A N N U A L R E P O R T



Y E A R I N R E V I E W

Our Motto: "Preparing for the future" by exploring and
innovating 'Beyond the classroom'.



ACHARYA NARENDRA DEV COLLEGE

UNIVERSITY OF DELHI

DBT STAR STATUS COLLEGE

All India NIRF 2022 Ranking-18, NAAC Score-3.31

Govindpuri, Kalkaji, New Delhi 110019



1. Introduction

- 2.1** Research Initiatives at the UG Level: Interdisciplinary Projects under DBT STAR College Scheme / ELITE
- 2.2** Research Projects
- 2.3** Research Supervision
 - 2.3.1** Post-Doctoral Fellows under the Supervision of College Faculty
 - 2.3.2** Ph.D. Students Enrolled under the Supervision of College Faculty
 - 2.3.3** Ph.D. Thesis Submitted under the Supervision of College Faculty
 - 2.3.4** Ph.D. Degree Awarded under the Supervision of College Faculty
 - 2.3.5** External Students Trained under ANDC Faculty



CONTENTS



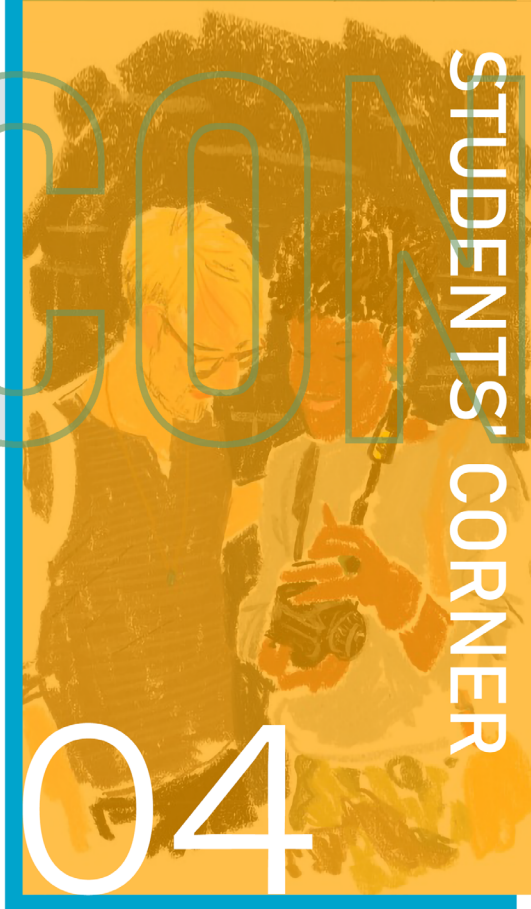
COLLABORATIONS WITH
NATIONAL AND
INTERNATIONAL
ORGANIZATIONS

03

- 3.1** MoU with Auburn University of Montgomery, Alabama, USA (International)
- 3.2** Skill Hub @ ANDC
- 3.3** Science-Setu Programme: Memorandum of Understanding (MoU) between ANDC and NII
- 3.4** Science-Setu Programme: Memorandum of Understanding (MoU) between ANDC and THSTI
- 3.5** Collaboration with IIT, Delhi for Creation of Virtual Labs
- 3.6** MoU with Entrepreneurship Cell, School of open learning, University of Delhi
- 3.7** Th!nk Lab– Collaboration with CUBE
- 3.8** University of Delhi @ ANDC SPIE Student Chapter
- 3.9** NPTEL-SWAYAM Local Chapter @ ANDC
- 3.10** OPEN Initiative – Creative Commons Network @ ANDC



CONTENTS



4.1 Students' Achievements, Scholarships and Aid

4.1.1 Merit Positions in the University of Delhi (2020-2021)

4.1.2 Merit Positions in the University of Delhi South Campus (UDSC) (2020-2021)

4.1.3 Merit Positions in the College (2020-2021)

4.1.3.1 Merit Positions in the College (Non-Cumulative)

4.1.3.2 Merit Positions in the College (Cumulative)

4.1.4 Scholarships and Awards

4.1.4.1 Best Student Silver Jubilee Award

4.1.4.2 Abhinav Halen Scholarship

4.1.4.3 Krishna Toteja Memorial Scholarship

4.1.4.4 Urmil Gupta Scholarship

4.1.4.5 Asha Walia Scholarship

4.1.4.6 Smt. Snehlata Gupta Fellowship

4.1.4.7 D. C. Arora Scholarship

4.1.4.8 Dr Saumya Saxena Memorial Scholarship

4.1.4.9 श्रद्धांजलि Dr Saumya Saxena Students Endowment Scholarship

4.1.4.10 Ms Teena Gupta Memorial Scholarship

4.1.4.11 Sh Sultan Chand Endowment Scholarship

4.1.4.12 Dr (Ms) Usha Aggarwal 'Tejaswini' Scholarship

4.1.4.13 Fellowships Received by ANDC Students from External Sources

4.1.4.13.1 Meritorious Students Award from Government of Delhi

4.1.4.13.2 Meritorious Students Award from University of Delhi

4.1.4.13.3 POSE Scholarship

4.1.4.13.4 INSPIRE Scholarship

4.1.4.13.5 UP GOVERNMENT Scholarship

4.1.5 Student Aid for Knowledge, Success, Honour and Motivation (SAKSHAM)

4.1.6 Co-curricular Activities

4.1.6.1 Awards Won by Students in Various Conferences/Competitions

4.1.6.2 Training Programmes/Internships attended by the Students

4.1.6.3 Participation by Students in Various Conferences/Workshops

4.2 Class Representatives

4.3 Result Analysis



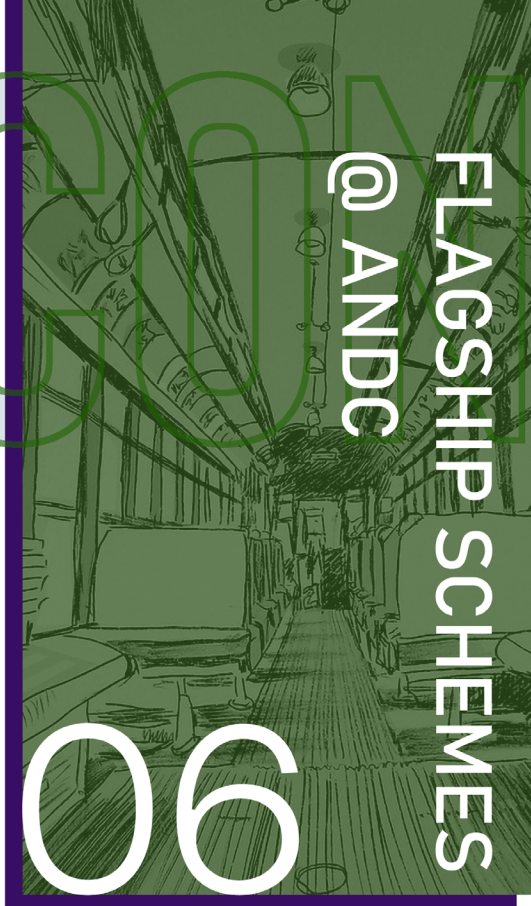
CONTENTS

ACHIEVEMENTS OF FACULTY

05

- 5.1** 'निष्ठा' ANDC Service Award
- 5.2** Achievements of Prof. Ravi Toteja, Officiating Principal
- 5.3** Contribution of Faculty to School/College Education
 - 5.3.1** Books/Chapters (in Books) Published
 - 5.3.2** Educational e-content Uploaded on the University of Delhi/Other Websites
 - 5.3.3** Enriching School/College Education
- 5.4** Awards/Honours
- 5.5** Invited Talks
- 5.6** Conferences, Workshops, Training Programmes Organized
- 5.7** Seminars, Symposia, Workshops, Training Programmes Participated/Attended
- 5.8** Faculty as Editors/Reviewers/Advisory
- 5.9** Membership of Various Societies/Panels
- 5.10** Other Achievements
- 5.11** Ph.D. Awarded to the Faculty
- 5.12** Faculty Registered for Ph.D. Programme
- 5.13** Faculty Development Programmes/ Refresher Course Attended by Faculty
- 5.14** Faculty on Leave
- 5.15** Research Publications by Faculty in Journals, Magazines, National and International Conferences and Seminars
- 5.16** Achievements of Non-teaching staff
 - 5.16.1** Ph.D. Thesis Submitted By Non-Teaching Staff
 - 5.16.2** Training/Workshops Attended/Other Achievements by Non-Teaching Staff
- 5.17** Scale Upgradation/Appointments of Teaching/ Non-teaching Staff
 - 5.17.1** Teaching Staff
 - 5.17.2** Non-Teaching Staff

CONTENTS



6.1 *Unnat Bharat Abhiyaan (UBA)*

6.1.1 Adopted Areas

6.1.2 Activities under UBA

6.2 *UGC Paramarsh Scheme*

6.2.1 Mentee Institutions

6.2.2 Activities under UGC *Paramarsh* Scheme

6.3 DBT STAR COLLEGE SCHEME

6.3.1 Interdisciplinary Activities by the STAR Departments

6.3.1.1 International Conferences

6.3.1.2 Outreach Activities

6.3.2 New Initiatives under DBT STAR COLLEGE SCHEME

6.3.2.1 Virtual lab at ANDC (V-Lab@ANDC)

6.3.2.2 Bootcamps for V-Lab Development

6.3.2.3 Development of Research Facilities

6.3.2.4 Establishment of State-Of-The-Art Laboratories for Skill Enhancement

6.3.2.5 Augmenting Existing Labs To Carry Out Advanced Level Experiments

6.3.3 Interdisciplinary Projects under DBT STAR College Scheme

6.3.4 Virtual Videos Created by Students of ANDC

6.3.5 Live Videos Created by Faculty of ANDC

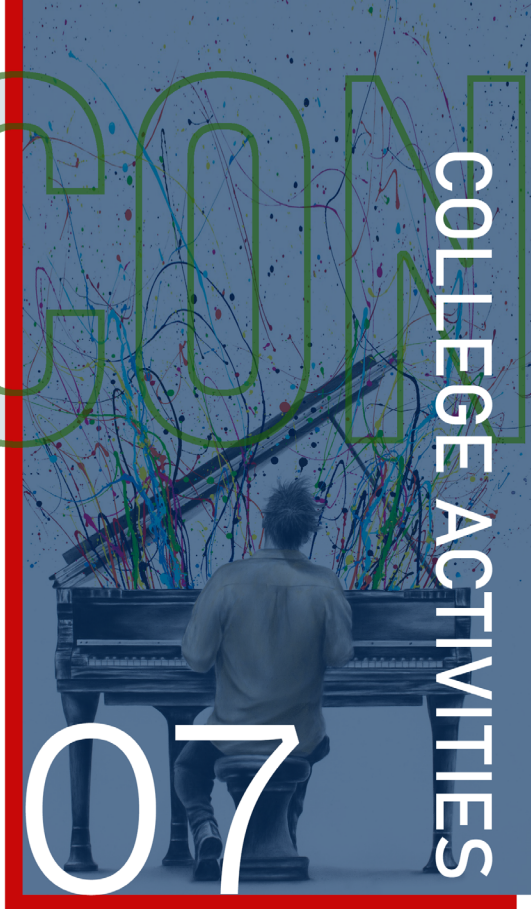
6.3.6 Exhibitions/Seminars/Training Courses Conducted

6.3.7 Outreach Activities (Popular Lectures)/Visits

6.3.8 Invited Lectures



CONTENTS



- 7.1** Internal Quality Assurance Cell (IQAC)
 - 7.1.1** Activities Organized by IQAC
 - 7.2** Activities of Staff Council Committees
 - 7.2.1** Annual Academic Events Committee
 - 7.2.1.1** Annual Day Celebrations 2021
 - 7.2.1.2** Orientation Programme 2021
 - 7.2.1.3** Acharya Narendra Dev Memorial Lecture
 - 7.2.2** Annual Cultural Events Committee
 - 7.2.3** National Service Scheme (NSS)
 - 7.2.4** Paritantra, Eco Club
 - 7.2.5** Sashakt: Society For Women Empowerment
 - 7.2.6** Dhvani: Theatre-An enabling experience
 - 7.2.7** IT Committee
 - 7.2.8** Library Committee
 - 7.2.9** Sports Committee
 - 7.2.10** Alumni Affairs Committee
 - 7.2.11** Picfie: The Photographic Society
 - 7.3** Departmental Activities

8. Internal Complaint Committee



CONTENTS

INSTITUTIONAL BIOSAFETY COMMITTEE

09

9. Institutional Biosafety Committee (IBSC)

FOREIGN LANGUAGE COURSES

10

10. Foreign Language Courses



CONTENTS



- 11.1** Financial Grants Received
- 11.2** Medical Consultation and Psychologist/Counsellor Facility



- 10.** Career Counselling and Placement Cell



Annexure I



Annexure II



Annexure III





**ACHARYA
NARENDRA
DEV COLLEGE**
UNIVERSITY OF DELHI

INTRODUCTION

Annual Report
2022



1. INTRODUCTION

As 2022 draws to an end, it is important to acknowledge that the last two years have been replete with learning for all educational institutes. We transitioned from offline to online classes in 2020. The transition was not necessarily easy, but our students and faculty were committed and we were able to create class rooms in living rooms and labs in our kitchens. Like the rest of the world, we adjusted so that our learning never ceases.

Now, as the COVID pandemic is finally receding, we have adapted to a blended mode of learning i.e. the new normal in all educational institutes. Students, Faculty and all the stakeholders are bringing their lessons of the online mode back to physical classrooms. College has swiftly transitioned from online to offline mode of learning, examinations and hands on Practical experiments have commenced in the college. College activities are conducted in hybrid mode, so now we are making best of the online and offline mediums available at our service.

Despite the difficulties of the COVID period, the college came to be recognized amongst the 10 best Science Colleges of the University of Delhi with NIRF ranking of 18 in the 2022 survey. ANDC is one of the few colleges in the University with 16 Professors and 18 Faculty members as independent supervisors. More than 30 students are registered for Ph.D. degree under the supervision of college faculty. This year 07 students have been awarded Ph.D. degrees from our college. Research projects worth more than Rs. 2 Crores, funded by external agencies, like DST, DBT, ICMR etc., are running in the college this year. ANDC faculty have authored 96 publications in Scopus indexed and Peer reviewed Journals and 20 chapters in research related books in the last one year. All in all, ANDC has become a hub for bright minds to explore thier research, academics & social inclinations and expand their horizon.

The College has established a programme called, “Acharya Narendra Dev *Kaushal Kendra*, Skill Hub @ ANDC” wherein the central component of the *Pradhan Mantri Kaushal Vikas Yojana* 3.0 (PMKVY 3.0) has seen the light of day. This has been made possible through the efforts of National Skill Development Corporation (NSDC) UGC. Under this, the College has offered two courses:

- 400 hr course on Web Developer
- 240 hr course on Jam, Jelly and Ketchup Processing

College has been recognized as the nodal centre for the creation of **Virtual Labs**, an initiative of MoE, under NMEICT. ANDC has conceptualized the idea of Virtual lab (V-lab) to provide remote access of various labs to the undergraduate science students via the internet. This way ANDC was able to create an experience of simulation and animation for the students where all facilities and options of actual laboratories could be utilized online. Till today, ANDC has accomplished an array of 24 such experiments. Another success chapter is the establishment of a **Mushroom Research and Skill Development Centre (MRSDC)**. The centre functions as a research and development facility in the field of Microbiology specializing in mushrooms and the enhancement of mushroom cultivation skills amongst the students. ANDC is the second college in the University of Delhi to establish **Zebra Fish Culture facility**.

This year, College organized two online International Conferences:

- Mitigating Contemporary Environmental Issues by Sustainable Approaches (ICMCESA – 2022) from February 22-28, 2022. The event hosted speakers from USA, Slovenia, Australia, UK, Uruguay, and Czech Republic. There were a total of 16 keynote and 28 invited talks, inclusive amalgamation of Professors, Academicians, Scientists, Ecologists, and Law Practitioners etc. There were more than 100 oral presentations by undergraduate, postgraduate research scholars and faculty traversing the entire nation from Kashmir to Kerala. There were 51 oral presentations by the faculty and students of ANDC where they got the opportunity to present their work.

- **Co-organized 6th Annual International E-Conference of Indian Network for Soil Contamination Research** on “Microbes in Sustainable Development” from November 15-18, 2021. The event hosted 30 International and 40 National speakers of international repute. Two Pre conference workshops namely, Art of scientific writing and communication, and Hands on to computational Biology, for (Meta)genomic analysis were also organized for Undergraduate, Postgraduate students and research scholars.

The College also took initiative for school students by initiating the scheme of *avant-garde* research projects in which the college will provide funding to selected projects to promote Science among the school students. This Year, College organized three outreach activities for school students:

- **Science ADDA:** 14 schools registered for the workshop. The event was organised to give hands-on demonstration of some simple easy to do experiments by different departments of our college including Physics, Chemistry, Computer Science, Electronics, Biomedical Science, Zoology and Botany.
- **ECOVILLE:** It was organized on February 27, 2022 as a part of the E- conference that invited submission of *avant-garde* research projects, video presentations, environmental quiz and paper presentations. The highlight of the day was the inauguration of Virtual lab presided over by Dr Garima Gupta, Scientist F, Department of Biotechnology, Govt. of India. Outreach program not only sought to introduce young minds to the infinite spectrum of research and innovative thinking, it also encouraged them by funding avant-garde projects, awarding exciting prizes for quiz winners and best presenters, while providing participation certificates to all.
- **MICROSPHERE 2021:** An online International Outreach Program celebrating the International Microorganism Day under the aegis of Science Foundation, Synapses and INSCR was organized.

53 students have been awarded Merit Positions in the University of Delhi (DU) and 55 students have received Merit Positions in the University of Delhi South Campus (UDSC). 9 students have been awarded Meritorious Students Award by the Directorate of Higher Education, Government of NCT of Delhi. 7 students have been awarded the Meritorious Students Award by the University of Delhi. Our students have won scholarships from DST, Government of Haryana (POSE Fellowship) and Government of UP. This year also UG students have presented their research papers in several National and International Conferences. This year 28 final year students have been placed in well-known MNCs including Wipro, Royal Bank of Scotland, Connection Media, Byju's, Workgen Solutions Pvt Ltd, Tata Consultancy and Princeton Healthcare Pvt Ltd.W

Faculty members powered by their unconditional commitment have garnered many awards for excellence. Some of them include: Prof. Charu Gupta has been conferred Meritorious teacher Award by Directorate of Higher Education, Government of National Capital of Delhi. Prof. Gagan Dhawan who received 'Alexander Fleming Excellence Award-2022' by the Biofootprints Foundation, India at AIIMS, New Delhi, 'Strada Scholarship for Emerging Leaders' by School of Business and Technology, Washington DC, USA. Prof. Gagan Dhawan became 'Institute of Eminence (IoE) Fellow'. Prof. Sunita Hooda got International Distinguished Education Excellence Award 2021 in Environment Chemistry and National Distinguished Researcher Award 2021 in recognition of consistent superior performance in Polymer Chemistry on the eve of World Science Day and National Education Day. Dr Sunita Jetly has been granted a patent on 'A novel beacon-based diagnostic probe/tool/kit for detection of translocation 8;21 in acute myeloid leukemia patients and method of working for the same. Prof. Geetu Gambhir is a recipient of the International Education Excellence Award 2021 for teaching and research excellence in waste water management and National distinguished teacher Award in recognition of consistent superior performance in Organic Chemistry. Prof. Dinesh Arya was awarded Indo Asian Research Excellence Award 2022 and Proud Indian Inspiring Teacher Award 2022. Dr Mamta Bhatia was awarded International Education Excellence award 2021 for teaching and research excellence in Physics. Prof. Sarita Kumar was conferred with S. K. Mahajan Award 2021 for popularization of Scientific Pursuit by HBCSE, TIFR.

This Year several MoUs were Signed by the college including: MoU with NII, Auburn University of Montgomery,

Alabama, USA (International), and Entrepreneurship Cell, **School of Open Learning (SOL)**, University of Delhi.

Three Flagship schemes are running in the college including **Unnat Bharat Abhiyan (UBA)**, *Paramarsh* and DBT STAR College Scheme. Under (UBA), ANDC took care of the rural areas like Khanpur, Govindpuri Slums, Okhla Industrial Area, PulPehlad and Tajpur Pahari, Badarpur. Under UBA, College organized number of awareness drives on various social issues in the adopted areas like vaccine awareness, holi awareness etc. Door to door survey were also conducted in those areas to collect various data like facilities (school, dispensaries, parks, etc.) present in the areas, school dropouts and residents interested in web development workshop being conducted by the college etc. A free medical health check-up camp was also organized by UBA@ANDC in the Okhla Slum. The camp was organized in collaboration with *ASTHA* (NGO) and Earth Revital Foundation (NGO). Under *Paramarsh* scheme, ANDC mentored following colleges: A.K.P. (PG) College, Bulandshahr, U.P.; Dr Nobin Bordoloi College, Assam; Manyawar Kanshiram Government Degree College, Ghaziabad, U.P.; Manyawar Kanshiram Government Degree College, Aligarh, U. P.; Holy Family College of Nursing, Okhla, Delhi and Swami Shraddhanand College, Alipur Delhi. Under the *Paramarsh* Scheme, the college conducted an online meeting with all the mentee institutions to discuss initiatives and other steps to be taken during this academic year. Regular meetings were held with the IQAC members of Holy Family College of Nursing, Okhla, New Delhi and Swami Shraddhanad College, Alipur, Delhi in order to help them in documentations to apply for NAAC accreditation. An online talk on 'License and Copyright Considerations in E-content Development' was organized for the faculty members of Holy Family College of Nursing, Okhla, New Delhi. DBT has recommended and upgraded Star Status to the participating departments in the college with one-time non-recurring grant of Rs. 15.00 lakhs (per department) and recurring grant of Rs. 5.00 lakhs per year per department along with contingency of Rs 1.00 lakhs per year and travel grant of Rs 2.00 lakhs per year for a period of three years. The College has also organized several conferences, workshops outreach activities and invited talks under the umbrella of DBT.

College continues to promote financial assistance to needy and meritorious UG students by SAKSHAM and other fellowships. College also provides research contingency of Rs.15000/- per annum to all the research laboratories.



**ACHARYA
NARENDRA
DEV COLLEGE**
UNIVERSITY OF DELHI

RESEARCH

Annual Report
2022



2 RESEARCH

2.1 Research Initiatives at the UG Level: Interdisciplinary Projects under DBT STAR College Scheme / ELITE

The Star College Scheme was introduced by DBT to improve teaching learning methods in the science colleges and to encourage students to pursue higher education in science. Acharya Narendra Dev College being part of the DBT Star College scheme since 2017 conducts several Interdisciplinary Projects and provide research exposure to students at UG level. ELITE is a research fellowship scheme initiated by college in 2012 to motivate students to take up summer projects under the mentorship of faculty during vacations, from May to July. Under this scheme, a stipend of Rs. 1,000/- per month is offered to every student who enrolls for the program. Following is the list of projects carried out by the UG students under the mentorship of the faculty of college

S. No.	Title of the Project	Mentor/s	Detail of Student/s with courses
1	To investigate the conditions which promote lysogeny intemperate myco-bacteriophages	Prof. Urmi Bajpai (Biomedical Science)	Anirudh Kumar Srishti Singh B.Sc. (H) Biomedical Science, II Year
2	To check whether virus/phages under-go lysogeny based on Virus-Virus in-teraction only		Mehak Sharma B.Sc. (H) Biomedical Science, II Year
3	Purification and characterization of ly-sins from mycobacteriophages.		Pulkrit Singh B.Sc. (H) Zoology, II Year
4	Bacteriophage encoded lysins: Nature's Enzybiotics (Enzyme as antibiotics)		Shivam B.Sc. (H) Biomedical Science, II Year
5	Tumor Suppressor Genes v/s Body Mass & Longevity	Dr Sunita Jetly Dr Ritu Khosla (Biomedical Science)	Yash Goel Sharika Mattoo B.Sc. (H) Biomedical Science, II Year
6	Synthesis of various Nanoparticles by using extracts from medicinal plants, their characterization and assessment of antimicrobial properties	Prof. Gagan Dhawan Dr Satendra Singh (Biomedical Science) Prof. Seema Gupta (Chemistry)	Suravi, Riya, Alshad, Gaurav, Hiya, Tabish, Kalyani, Nidhi, Harshelle, Tanushree, Deepa- rati, Harinandna, Krishna and Kapil B.Sc. (H) Biomedical Science and B.Sc. (H) Chemistry, II Year
7	Genetic predisposition to Hepatocellu-lar carcinoma and possible prognosis and treatment strategies	Dr Archna Pandey Dr Ritu Khosla (Biomedical Science)	Bisakha Das Pritika Kwatra B.Sc. (H) Biomedical Science, III Year

8	Utilization of lignocellulosic waste in cultivation of <i>Pleurotus djamor</i> var. <i>roseus</i> (Pink oyster mushroom) and recovery of enzymes from spent mushroom substrate.	Dr Anupama Shukla Dr Anita Narang (Botany)	Riya Dayal Lalit Pal Maniket Chauhan Kanchan Pratham Singh Chauhan Shreya Singh B.Sc. (H) Botany, II Year
9	Collection, isolation, characterization and cultivation of different mushrooms	Dr Anupama Shukla Dr Anita Narang Dr Sumit Sahni Dr Manoj Kumar Singh (Botany)	Vridhi Singh Shubhanshu Krishna Mohd. Afham Kanchan Seema Akanksha B.Sc. (H) Botany, III Year
10	Mitigating Air pollution through Phytoremediation	Prof. Charu Khosla Gupta (Botany)	Jay Kumar Sirmoria Sruthi S. Kumar Aishwarya Kumar Chaturvedi B.Sc. (H) Botany, II Year
11	Climate Change and Plant-pollinator relationship		Mridula Rani Mayank Yadav B.Sc. (H) Botany, II Year
12	Study of effect of air pollutants on soil microbiome	Prof. Charu Khosla Gupta Dr Yash Mangla (Botany)	Nikhil Sharma Sahil Chauhan B.Sc. (Prog.) Life Science, II Year
13	ROS regulation during stages of seed germination owing to temperature stress in Sunflower seedling	Dr Geetika Kalra Dr Anita Thakur (Botany)	Arunima Dey Devanshi Saini Deepanshu Kumar Vibha Shukla B.Sc. (Prog.) Life Science, II Year
14	Cultivation of <i>Pleurotus eryngii</i> (King oyster mushroom) on lignocellulosic waste and characterization of enzymes from spent mushroom substrate	Dr Anupama Shukla Dr Sumit Sahni (Botany)	Mr Mohd. Afham B.Sc. (H) Botany, II Year
15	Cultivation of <i>Pleurotus eryngii</i> (King oyster mushroom) on lignocellulosic waste and characterization of enzymes from spent mushroom substrate	Dr Sumit Sahni Dr Manoj Kumar Singh (Botany)	Ms Vridhi Singh B.Sc. (H) Botany, II Year
16	Utilization of Lignocellulosic waste in cultivation of <i>Pleurotus ostreatus</i> (Blue Oyster Mushroom) and recovery of enzymes from spent mushroom substrate	Dr Sumit Sahni (Botany)	Mr Mrityunjay Chakraborty Mr Shubhanshu Krishna B.Sc. (H) Botany, II Year

17	Synthesis of Fe_3O_4 nanoparticles through sonication and its effects	Prof. Sunita Hooda Prof. Geetu Gambhir (Chemistry)	Puneet Chauhan Akshit Jauhri Soven K. Samal B.Sc. (Prog.) Life Science, I Year
18	Investigative study of groundnut husk for the adsorptive removal of dyes from aqueous solution.		Geni Yao Eniya Tapo B.Sc. (Prog.) Life Science, III Year
19	Adsorption of organic dye by magnetized Graphene oxide, Ground nut husk, Guar gum from Aqueous Solution.		Yashank Chauhan Akshat Bhanu Dharmani B.Sc. (Prog.) Life Science, III Year
20	Synthesis of nanoparticles of Polyvinyl Alcohol by CO-Precipitation method		Kapil Sharma Khushi Vishwakarma Vishwa Deepak Srivastava B.Sc. (Prog.) Life Science, I Year
21	Synthesis of magnetic nanoparticles and UV-Visible analysis	Prof. Sunita Hooda Prof. Geetu Gambhir (Chemistry)	Abhijit Roy Bipasa Arya B.Sc. (Prog.) Life Science, I Year
22	Synthesis and Biological Activity of Chalcones	Prof. Rashmi Thukral (Chemistry)	Aashi Yukta Aditi Heena B.Sc. (Prog.) Life Science, II Year
23	Extraction of essential oils by Green methods	Dr Manisha Jain (Chemistry)	Anjali B.Sc. (H) Chemistry, II Year
24	Computational Studies on some Inorganic Compounds Using Avogadro and Gaussian Softwares	Dr Manisha Jain Dr Neeti Misra (Chemistry)	Aditi Kandari Somya Singh B.Sc. (H) Chemistry, II Year
25	Review on synthesis of Heterocyclic compounds and extraction of medicinal plants	Prof. Pankaj Khanna Dr Neeti Mishra Dr Kavita Mittal (Chemistry)	Jai Gautam B.Sc. (Prog.) Physical Science, II Year Shweta B.Sc. (H) Chemistry, II Year
26	Use of catalysts for synthesis of biologically active heterocyclic compounds	Dr Kavita Mittal (Chemistry)	Shweta B.Sc. (H) Chemistry, II Year
27	Magnetite Graphene Oxide/Chitin Nanocomposites as Ion Sensors from Aqueous Systems: A DFT Study	Dr Pragati Malik (Chemistry)	Arnav Bhatt Sachin Rao B.Sc. (Prog.) Life Science, II Year

28	Analyzing the effect of crime in India over Female foreign tourists	Prof. Sharanjit Kaur (Computer Science)	Suruchi Verma Tishya Thukral B.Sc. (H) Computer Science, III Year
29	Exploring machine learning models for ransomware data		Nirmal Mor Sushant B.Sc. (Prog.) Physical Science (Computer Science), III Year
30	Implementing four virtual labs (computer Science computer simulations) https://www.vlab.andcollege.du.ac.in/	Prof. Sharanjit Kaur Dr Gunjan Rani Dr Nishu Singh Dr Vandita (Computer Science)	Nilesh Pandey Amitesh Ananya Shukla Siya Agarwal Harsh Bamotra Shahnawaz Khan Sakshi Garg Aliya Vivek Sankhyan Pankaj Sahu Palak Sharma B.Sc. (H) Computer Science, II Year
31	Disaster management to combat Covid-19	Dr Harita Ahuja, Dr Sunita Narang (Computer Science)	Sant Anandita Abhishek B.Sc. (H) Computer Science, III Year
32	Data Analysis and Visualization of Rainfall and floods in India		Deepanshu Megha Karki Shruti Jain B.Sc. (H) Computer Science, III Year
33	College Resource and Space Utilization App	Mr Mahesh Kumar (Computer Science)	Jyotika Sharma Rishabh Sharma Tanisha Sharma B.Sc. (H) Computer Science, II Year
34	Issues, Challenges, and Growth of e-Learning during Covid-19 pandemic	Ms Nishu Singh Mr Mahesh Kumar (Computer Science)	Tanu G Anam Khan Jyotika Sharma Tanisha Sharma B.Sc.(H) Computer Science, II Year
35	Visualizing your data of music app	Ms Gunjan Rani Mr Mahesh Kumar (Computer Science)	Somesh Abhishek Akancha B.Sc. (Prog.) Physical Science (Chemistry), II Year

36	Alumni Database Handling	Ms Gunjan Rani (Computer Science)	Harsh Bamotra Pratham Sharma B.Sc.(H) Computer Science, II Year Palak Sharma B.Sc. (Prog.) Physical Science (Chemistry), II Year
37	Faculty Database Handling		Shahnwaz Khan Pankaj Sahu Garvit Dubey B.Sc. (H) Computer Science, II Year
38	Text to Speech Converter		Vivek Sharma Aliya Sakshi Garg B.Sc. (Prog.) Physical Science (Chemistry), II Year
39	V-Labs		Nilesh Pandey Sahiba Siya Agarwal B.Sc. (H) Computer Science, II Year
40	Library Book Reminder		Vivek Sharma Aliya Sakshi Garg B.Sc. (Prog.) Physical Science (Chemistry), II Year
41	Designing of a first order Low-pass and High-pass filter using op-amp (Virtual Lab Development)	Dr Ravneet Kaur Ms Gauri Ghai (Electronics)	Ankush Rana B.Sc. (H) Electronics, II Year Vishal Gupta B.Sc. (H) Electronics, I Year
42	Study of the I-V characteristics of the Common Base configuration of BJT and obtain r_i , r_o , α . (Virtual Lab Development)	Dr Ravneet Kaur Ms Gauri Ghai (Electronics)	Anubhav Singh Alok Singh B.Sc. (H) Electronics, II Year
43	To design JK Master Slave using elementary gates (Virtual Lab Development)		Akash Jha B.Sc. (H) Electronics, II Year Muskan Kumar Sharma B.Sc. (H) Electronics, I Year
44	To verify Malus law		Swati Shukla B.Sc. (H) Electronics, II Year Sneha B.Sc. (H) Electronics, I Year
45	To determine the value of Boltzmann constant by study the forward characteristics of diode.		Naman Prasad B.Sc. (H) Electronics, II Year

46	Monte Carlo Estimation and Simulation of Pi using the 3D geometry Octahedron	Dr Sanjeeta Rani Dr Manisha Verma (Physics)	Ayush Mishra B. Sc. (H) Physics, II Year
47	Monte Carlo Estimation and Simulation of Pi using the 3D geometry Icosahedron		Vaibhav Thapliyal B. Sc. (H) Physics, II Year
48	To determine Young's modulus, Modulus of rigidity and Poisson's ratio for the material of a wire by Searle's method with the help of Vlab.	Dr Sanjeeta Rani Dr V. Bhaskar Raj Dr Satya Prakash Dr Neelakshi Borah (Physics)	Neha Khanra Nisha Khanra B.Sc. (H) Physics, I Year
49	Automated and upgraded machine as replacement of noncontact thermometer used for COVID-19 detection for entry in public spaces such as metro stations, parks etc.	Prof. Arijit Chowdhuri Dr V. Bhasker Raj (Physics)	Pratham Malik B.Sc. (Prog.) Physical Science (Electronics), II Year Niharika Upadhyay B.Sc. (H) Biomedical Science, III Year
50	Environmental and gas sensing applications of Quartz Crystal Microbalance (QCM)		Kalpajit Roy Prahlad Sharma Varnika Aggarwal B.Sc. (H) Physics, II Year
51	Investigating the factors influencing generation and effects of Eddy currents	Prof. Seema Makhija (Zoology) Prof. Arijit Chowdhuri (Physics)	Rati Chaturvedi B.Sc. (H) Zoology, I Year
52	Gas Leakage Detector using Arduino and GSM Module with SMS Alert and Sound Alarm	Dr V Bhasker Raj (Physics)	Prashant Verma B.Sc. (H) Physics, II Year
53	Mutations in SARS-COV 2	Prof. Sarita Kumar (Zoology)	Anshika Sharma B.Sc. (H) Zoology, I Year
54	Effect of Chitin Synthesis Inhibitors on the growth and biochemical parameters of insect pests of agricultural importance		Gunjan Grover B.Sc. (H) Zoology, II Year Anaam Asif Moin Charu Jaiswal Khushi Aggarwal Khushi Vashishtha Twishi Mishra Kanishka Bothra Divya Yadav Shruti Kumari Singh Preeti Singh Sanskriti B.Sc. (H) Zoology, I Year

55	Biological Importance of heterocyclic Compound	Prof. Ravi Toteja Prof. Seema Makhija (Zoology) Dr Pooja Bhagat (Chemistry)	Swati Maheshwari Ujjwal Kumar Gupta Radhika Garg B.Sc. (H) Zoology, II Year
56	Bioindicators to assess the soil quality of ANDC College	Prof. Ravi Toteja Prof. Seema Makhija Dr Rahul Dev (Zoology) Dr Pooja Bhagat (Chemistry)	Meghana Bisht Tanya Chopra Ayushi Gupta B.Sc. (H) Chemistry, II Year
57	Creation of animation and simulator for Virtual Laboratory of Zoology practicals	Prof. Ravi Toteja Prof. Seema Makhija Dr Rahul Dev (Zoology)	Avnija Tyagi Ritika Chandel Sejal Arora B.Sc. (H) Zoology, III Year Harshita Basab B.Sc. (H) Zoology, I Year

2.2 Research Projects

ANDC faculty has bagged many research projects from external funding agencies which also supplement the funds available for infrastructural development of the college. Following are the ongoing research projects which are funded from external funding agencies:

Sl. No.	Investigator	Title of Project	Funding Agency	Grant (in Lakhs)
1	Prof. Urmi Bajpai (Biomedical Science)	Recombinant endolysins from mycobacteriophages: Exploring their anti-mycobacterial potential	SERB, Department of Science and Technology	46.70
2		An investigational study on Mycobacteriophages and their enzymes as new drugs (IND) for treating tuberculosis	Indian Council of Medical Research (ICMR)	22.70
3	Prof. Sarita Kumar Mr. Ravinder Kumar Sagar (Zoology)	Toxic Sugar Bait (ATSB) methods to control mosquitoes in different regions of Delhi and NCR	Indian Council of Medical Research (ICMR) MERA INDIA PROJECT: Mera/3/2020-ECD-II	35.28
4	Prof. Sarita Kumar (Zoology)	Developing and documenting innovative practices for learning physics and biology through experimentation for children and young adults	DST Women Scientist Scheme-B	12.60

5	Prof. Seema Makhija Prof. Ravi Toteja (Zoology)	DNA barcoding for ciliate species identification of Delhi	DST-SERB	41.97
6	Dr Sunita Jetly Co-PI (Biomedical Science)	Medical Awareness, capability, patient empowerment and partnership for managing cancer through e-learning	DST- National Council for Science and Technology	17
7	Prof. Arijit Chowdhuri Co-PI (Physics)	Development of process and evaluation of electron suppression coating on the grids used in TWTs	Microwave Tube Research and Development Centre (MTRDC), DRDO	23.60

2.3 Research Supervision

2.3.1 Post-Doctoral Fellows under the Supervision of College Faculty

Sl. No.	Supervisor (Department)	Post-Doctoral fellow	Area of work and date of registration
1	Prof. Sarita Kumar (Zoology)	Dr Monika Mishra (CSIR-SRA)	Physiological, Biochemical and Molecular Response of <i>Helicoverpa armigera</i> Hübner to Synergistic Combinations of Triflumuron and β -sitosterol January 01, 2021

2.3.2 Ph.D. Students Enrolled under the Supervision of College Faculty

Sl. No.	Supervisor (Department)	Ph.D. student	Area of work	Registration (month, year)
1	Prof. Urmi Bajpai (Biomedical Science)	Ritu Arora	Phage lysins	November, 2017
2		Kanika Nadar	Mycobacteriophages	April, 2021
3	Prof. Gagan Dhawan (Biomedical Science)	Nishtha Agrawal	Modulating host signaling cascade: Potential antiviral tool against Chikungunya virus	September, 2016
4		Harekrushna Jena	Design and development of synthetic vectors for the delivery of biomolecules	March, 2019
5		Akanksha Negi	Polymeric nanoparticles: Design, synthesis and their applications in drug delivery	February, 2022
6		Vadant Soni	Role of microbiota-derived metabolites in immune checkpoint blockade immunotherapy of colorectal cancer	February, 2022

7	Prof. Charu Khosla Gupta (Botany)	Nitin Joshi	Assessing Impact of Climate Change on some medicinally important plants	March, 2022
8	Prof. Sharanjit Kaur (Computer Science) Co-Supervisor	Kirti Jain	Network analysis	November, 2018
9	Prof. Amit Garg (Electronics)	Rupali Pandey	Synthesis and Characterization of 2D Materials and their Applications	March, 2021
10		Sandeep Singhanian	Role of Functional Group in Gas Sensing of 2D Materials	January, 2022
11		Preeti Bharati	Growth and Characterization of GaN based High Electron Mobility Transistors	January, 2022
12		Anju	Engineered 2D Materials for Smart Biosensing	January, 2022
13	Dr Sada Nand Prasad (Mathematics)	Sonia Aneja	Dynamical Systems & Chaos Theory	January, 2022
14		Preeti Yadav	Non Linear Dynamics	January, 2022
15	Dr Chaman Singh (Mathematics)	Gurudatt Rao Ambedkar	Optimization	February, 2021
16		Jyoti Kohli	Optimization	February, 2022
17		Garima Sethi	Inventory Control and Management	July, 2021
18	Prof. Arijit Chowdhuri (Physics)	Shiva Lami-chane	Multicomponent Oxide Thin Films for Functional Device Applications	April, 2018
19		Rohit Miglani	Functional materials for Microwave Resonator	January, 2019
20		Ajay Kumar Sao	Development of sensing layers for detection of chemical warfare (CW) agents/stimulants	January, 2019
21		Jatinder Pal Singh	Growth and characterization of some 2D materials for sensing application	March, 2021
22	Prof. Sarita Kumar (Zoology)	Vinay Singh Dagar	Emamectin Benzoate as a potential control agent of cotton bollworm <i>Helicoverpa armigera</i>	September, 2016

23	Prof. Sarita Kumar (Zoology)	Kungreiliu Panmei	Effect of Lufenuron on the growth and development of <i>Aedes aegypti</i>	March, 2018
24		P. Lanbilu	Effects of synergistic combinations of an IGR and beta-cyfluthrin on the growth and development of red cotton bug, <i>Dysdercus koenigii</i> (Fabr.) (Hemiptera: Pyrrhocoridae)	November, 2018
25		Manu Sankar	Characterization of Diflubenzuron Resistance in Dengue Vector, <i>Aedes aegypti</i> L. (Diptera: Culicidae)	November, 2019
26		Jyoti Falswal	Taxonomic studies of non- <i>Apis</i> bees Pollinators from North India	November, 2019
27		Divya Yadav	Identification of novel insecticide targets in mosquitoes	March, 2022
28	Prof. Monisha Khanna Kapur (Zoology)	Harsha	Bioactive potential of <i>Streptomyces</i> spp. against diverse pathogenic fungi	March, 2022
29	Prof. Ravi Toteja Prof. Seema Makhija (Zoology)	Swati Maurya	Microorganisms as Bioindicators in Diverse Environments	April, 2018
30		Sandeep	Ecotoxicological studies on ciliates	January, 2021
31	Dr Monica Misra (Zoology) Co-supervisor	Bhumika	Morphological and Molecular studies on Intestinal parasites of freshwater fish, <i>Channa striata</i> (Snakehead Murrel) from Meerut region	March, 2022

2.3.3 Ph.D. Thesis Submitted under the Supervision of College Faculty

Sl. No.	Supervisor (Department)	Name of student	Thesis title	Date of Thesis Submission
1	Prof. Urmi Bajpai (Biomedical Science)	Jyoti Rani	Computational Approach for Drug Repurposing in Tuberculosis and Pathway Modeling for Type 2 Diabetes Associated Tuberculosis	March 09, 2022

2	Prof. Gagan Dhawan (Biomedical Science)	Indu Singh	Small molecule- and polymer-based bioactives: Design, synthesis and evaluation	May 27, 2022
3	Dr Chaman Singh (Mathematics)	Kamna Sharma	Development and Analysis of Production Inventory Model with Product Stewardship and Green Design	January 29, 2022
4	Prof. Monisha Khanna Kapur (Zoology)	Munendra Kumar	Molecular analyses of extracellular chitinases and antifungal compounds from <i>Streptomyces</i> spp.	May 06, 2022

2.3.4 Ph.D. Degree Awarded under the Supervision of College Faculty

Sl. No.	Supervisor (Department)	Name of student	Thesis title	Date of award of degree
1	Prof. Sunita Hooda (Chemistry)	Drashya	Design and Synthesis of Graphene Oxide and Chitin based Nano-materials for Water Purification and Biological Application” from Department of Chemistry, University of Delhi	February 26, 2022
2	Prof. Amit Garg (Electronics)	Shani Kumar	Fabrication of Graphene Oxide Membranes for their Potential use in water Purification Applications, Electronic Science	February 26, 2022
3		Vishal Dhingra	Studies on Gas Sensing Properties of Graphene Oxide Post Tailoring through Sonication and Nanostructured Catalysts, Electronic Science	February 26, 2022
4	Prof. Sarita Kumar (Zoology)	Roopa Rani Samal	Characterization of Mechanisms Involved in the Development of Acetamiprid and Deltamethrin Resistance in an Indian Strain of <i>Aedes aegypti</i> L	September 09, 2021
5	Prof. Seema Makhija Prof. Ravi Toteja (Zoology)	S. Sripoorna	Ciliates as cellular tool to assess heavy metal toxicity	February 26, 2022
6	Prof. Seema Makhija (Zoology)	Jeeva S. Abraham	Taxonomy, Phylogeny and Molecular Systematics of Ciliates from Delhi, India	February 26, 2022
7	Prof. Monisha Khanna Kapur (Zoology)	Prateek Kumar	Structural analyses of bioactive compounds from <i>Streptomyces</i> spp. and identification of their biosynthetic gene clusters	September 03, 2021

2.3.5 External Students Trained under ANDC Faculty

Sl. No.	Supervisor (Department)	Candidate	Project title
1	Prof. Urmi Bajpai (Biomedical Science)	Dhruv Pahwa M.Sc. (Biochemistry), Banaras Hindu University	Discovery of Mycobacteriophages and basic techniques in Microbiology
2		Ruchir Sahni BS-MS student at the Indian Institute of Science Education and Research (IISER), Pune	Discovery of Mycobacteriophages
3	Dr Sunita Jetly (Biomedical Science)	Anushka Sharma Lady Shri Ram College for Women, Delhi University.	Treatment modalities for Home isolated COVID patients in India - A survey of doctors
4	Prof. Sarita Kumar	Yanav Lall Modern School, Barakhamba Road, New Delhi	Formulation of <i>Clitoria ternatea</i> leaves-mediated silver nanoparticles to control <i>Aedes aegypti</i> larvae
5		Devaj Gupta DPS International School, Saket	Multifunctional activity of graphene oxide-based nanoformulation against the disease vector, <i>Aedes aegypti</i>
6		Karmanyaraj Yadav The Doon School, Dehradun	Indigenous plants demonstrating effective antioxidant properties
7		Atharv Gupta The Shri Ram School Moulisari, Gurugram	Microencapsulated phytocompounds for <i>Aedes</i> control
8		Nayan Katyal M.Sc. Biotechnology, Amity University of Biotechnology	Toxicity, irritancy and alteration in biochemical parameters induced by deltamethrin and alpha-cypermethrin in the dengue vector <i>Aedes aegypti</i> L.
9		Anushree Gupta M.Sc. Immunology, Amity Institute of Virology & Immunology	Variations in physiological parameters in dengue vector <i>Aedes aegypti</i> L. induced by chemical insecticides (Imidacloprid and Cypermethrin)
10		Manya Jaiswal M.Sc. Immunology, Amity Institute of Virology & Immunology	Biochemical alterations in <i>Aedes aegypti</i> L. as a defence mechanism to xenobiotics. (Cyhalothrin and Malathion)
11		Shailja Mathur M.Sc. Immunology, Amity Institute of Virology & Immunology	Reversion of resistance in <i>Aedes aegypti</i> using microsomal monooxygenase inhibitor

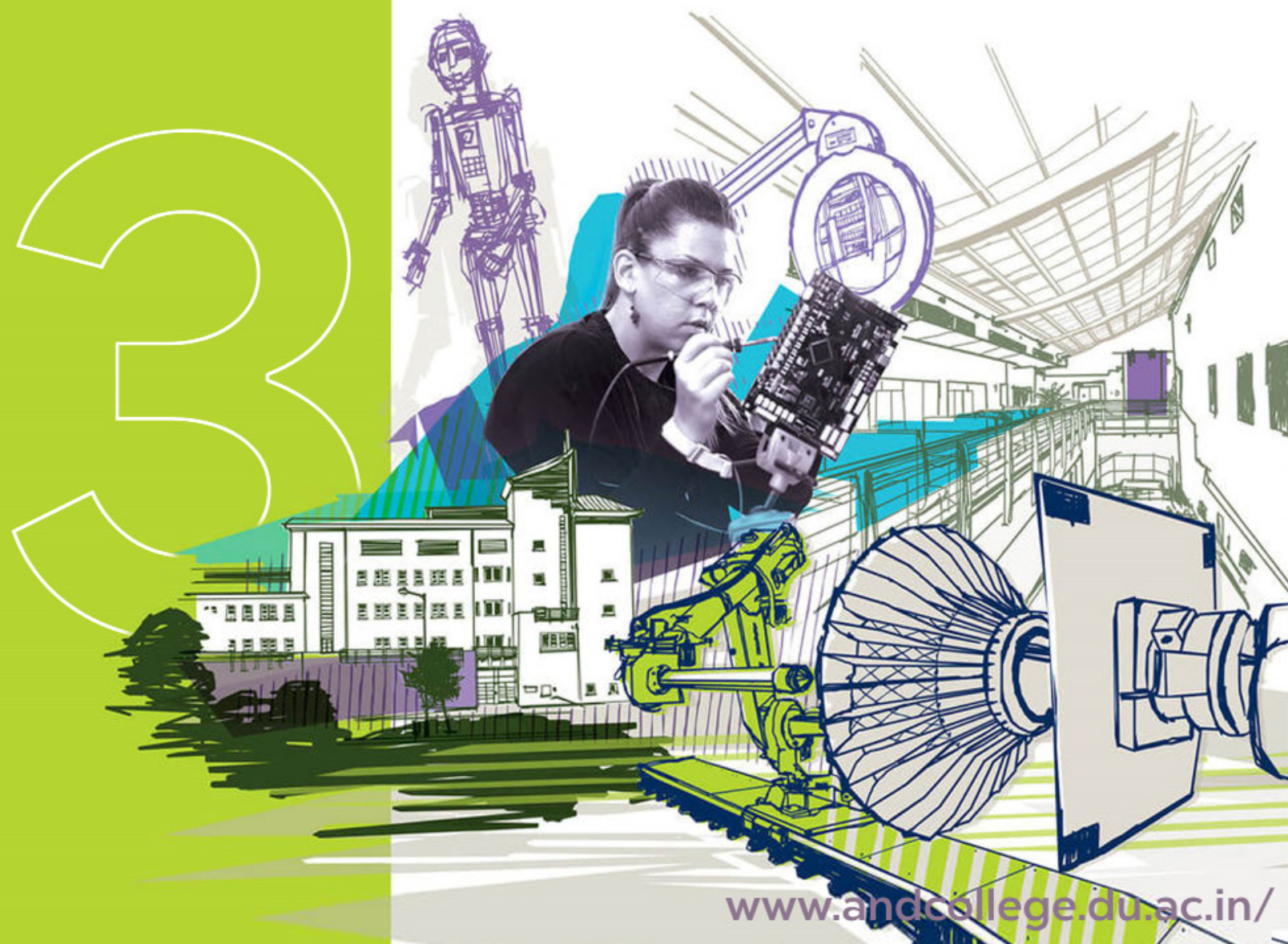
12	Prof. Sarita Kumar	Shailja Mathur M.Sc. Immunology, Amity Institute of Virology & Immunology	Reversion of resistance in <i>Aedes aegypti</i> using microsomal monooxygenase inhibitor
13		Apoorva Rajput M.Sc. Biotechnology, Institute of Management Studies, Ghaziabad, Uttar PradeshW	Reversion of resistance in <i>Aedes aegypti</i> using microsomal monooxygenase inhibitor
14		Nayan Katyal M.Sc. Biotechnology, Amity University of Biotechnology	Formulation, Characterization and Evaluation of Dinotefuran Nanometric Emulsion Bioefficacy against <i>Dysdercuskoenigii</i>
15		Priyanka Verma M.Sc. Biotechnology, Amity University of Biotechnology	Assessment and Characterization of Imidacloprid's Nanometric Emulsion Effectiveness against <i>Dysdercuskoenigii</i>
16	Prof. Ravi Toteja Prof. Seema Makhija (Zoology)	Krishna Aggarwal Class XII, Student of Delhi Public School, R. K. Puram, New Delhi	Isolation and characterization of new bacteria from the soil
17		Shivangani Sharma M.Sc Microbiology, Galgotias University	Isolation and characterization of bacteria from soil
18		Vanya Garg M.Sc Microbiology, Galgotias University	Bioremediation of heavy metal (copper) using ciliates
19		Ashish Arora B,Tech, in Biotechnology, Amity University	Effect of Heavy metal (zinc) on ciliate



**ACHARYA
NARENDRA
DEV COLLEGE**
UNIVERSITY OF DELHI

COLLABORATIONS WITH NATIONAL AND INTERNATIONAL ORGANIZATIONS

Annual Report 2022



3. COLLABORATIONS WITH NATIONAL AND INTERNATIONAL ORGANIZATIONS

3.1 MoU with Auburn University of Montgomery, Alabama, USA (International)

Acharya Narendra Dev College, University of Delhi, India and Auburn University of Montgomery, Alabama, USA, have created a cooperative alliance. The program would encourage international credit transfer and progression arrangements, academic articulation agreements for various programs, the exchange of research and academic materials of mutual interest, collaborative and foster research activities and projects, the exchange of teaching expertise, the development of e-learning training, and the application of distance learning.

3.2 Skill Hub @ ANDC

Nodal Officer: Dr Pooja Bhagat

The National Education Policy (NEP) 2020 has recommended the incorporation of vocational skills in school and higher education curriculums so that students can design their own paths of study and life plans. To integrate vocational education in the mainstream, sharing of infrastructure and developing well-defined pathways for students to continue with their chosen academic-vocational pursuits, an initiative for the creation of Skill Hubs across the educational and skill ecosystem has been proposed to actualize the intent on the ground.

The ‘Skill Hubs Pilot’ is implemented under the central component of *Pradhan Mantri Kaushal Vikas Yojana 3.0* (PMKVY 3.0) through National Skill Development Corporation (NSDC) with the support of State Skill Development Missions (SSDMs), State Education Department/Agencies and District Skill Committees (DSCs). The ‘Skill Hub Initiative’ under the PMKVY 3.0 scheme focuses on the introduction of skill training programmes in the education ecosystems. The courses may be based on the vocational courses being offered in the Samagra Shiksha or similar NSQF aligned courses which they are already offering. Skill Hubs are nodal skill centers identified to provide skill development and vocational training opportunities to target population segments from school dropouts and out-of-education candidates.

Acharya Narendra Dev *Kaushal Kendra*, Skill Hub @ ANDC is selected as a Training Provider for the two Courses – 400 hour “Web Developer” Course and 240 hour “Jam, Jelly and Ketchup Processing Technician” Course. Only Indian candidates with a valid Aadhar Card will be able to apply in these free courses. The classes for the same will be held six days a week in the college. Minimum 70% attendance is required by the candidates to sit in the examination. Candidates will get Rs 500/- (deposited directly to the beneficiary candidate account) as the reward money after the completion of the course. In this academic session, the college is running the Web Developer Course since March 14, 2022.

3.3 Science-Setu Programme: Memorandum of Understanding (MoU) between ANDC and NII

The National Institute of Immunology and Acharya Narendra Dev College joined together to launch the NII-Acharya Narendra Dev College Science Setu Programme. Such an endeavor is urgently needed since it raises public understanding of the value of science. The main objective is to support the national initiative to entice more and more talented young minds to choose a profession in science and technology. The endeavor would take into account the evolving requirements of biological sciences education, learning, and research. Additionally, it would support the delivery of innovation, research, and continual improvement by involving a talent pool of future biology students. In addition, the endeavor will integrate the undergraduate teaching in biology to the NII in the idea of “success through access. The programme will use on-site and/or online learning methods to accomplish its goals and objectives (depending upon the feasibility). Lectures and discussions, laboratory exercises, summer student and teacher internships, mentorship for student and teacher science projects, career opportunities, cutting-

edge teaching and research methodologies, science and technology policy concerns are all possible under the programme. Other relevant activities are another option, as long as it is mutually agreed upon. The programme will inculcate the value of science among students and choose a profession in science.

3.4 Science-Setu Programme: Memorandum of Understanding (MoU) between ANDC and THSTI

Coordinators: Prof. Urmi Bajpai, Dr Anupama Shukla, Prof. Seema Makhija, Dr Satendra Singh, Dr Sumit Sahni, Dr Rahul Dev

The Science-Setu programme is an initiative undertaken by the Translational Health Science Technology Institute (THSTI) wherein the scientists share their research interests with the undergraduate students of Acharya Narendra Dev College. Under Science-Setu, a webinar was organized on April 21, 2022 with the theme ‘Understanding Disease Biology -Tools, Designs and Challenges’. The speakers were from the Translational Health Science and Technology Institute (THSTI). Dr Krishnamohan Atmakuri, Associate Professor, THSTI, spoke on the topic ‘Sepsis’ and Dr Amit Kumar Pandey, Associate Professor, THSTI, gave an insight on ‘Genome Editing Technology’. About 75 students participated in the webinar.

3.5 Collaboration with IIT, Delhi for creation of Virtual Labs

Nodal Officers: Prof. Seema Makhija, Dr Sumit Sahni, Dr Vineet Kumar Singh

College has been recognized as nodal centre for creation of virtual labs, an initiative of MoE, under NMEICT. Theoretical concepts can be delivered to students online but for better understanding of various concepts, a hands-on is a must. ANDC has conceptualized the idea of Virtual lab (V-lab) to provide remote access of various labs to the undergraduate science students through internet.

3.6 MoU with Entrepreneurship Cell, School of Open Learning (SOL), University of Delhi

ANDC, in collaboration with Entrepreneurship cell, School of Open Learning, University of Delhi will be offering certificate course in Entrepreneurship and start up under the UGC scheme of “National skills qualifications framework”. The course can be done after 10+2 and will be of six months duration. This collaboration will also provide the potential entrepreneurs from ANDC with assistance in availing the entrepreneurship schemes by central and state government.

3.7 Th!nk Lab– Collaboration with CUBE

Th!nk Lab is an autonomous lab of the students, which works without any supervision of teachers in collaboration with CUBE (Collaborative Understanding Biology Education) network, an initiative of Homi Bhabha Centre for Science Education, TIFR, Mumbai. Under the network, students are connected with students, teachers and research scientists across the country and abroad to discuss and seek answers to various research questions.

3.8 University of Delhi @ ANDC SPIE Student Chapter

Faculty Advisor: Prof. Amit Garg

SPIE Office Bearers (Total existing members: 33)

1. President- Ms Shruti Yadav, B.Sc. (H) Electronics
2. Vice-President- Mr Devesh Yadav, B.Sc. (Prog.) Physical Science (Computer Science)
3. Secretary- Mr Aditya Goyal, B.Sc. (Prog.) Physical Science (Computer Science)
4. Treasurer- Mr Shivansh Bhatnagar, B.Sc. (H) Electronics
5. Technical Officer- Mr Ankush Rana, B.Sc. (H) Electronics
6. Editorial Officer- Mr Kalpajit Roy, B.Sc. (H) Physics

International Day of Light 2021 Celebration

Date/Mode/Location: May 16, 2021, Online mode: Google Meet

Participants: Around 300 students from all over India

The SPIE student chapter at Acharya Narendra Dev College, University of Delhi organized thrilling events online on the occasion of International Day of Light on May 16, 2021 to cheer the students and participants. The official theme of SPIE, “Let Your Light Shine” was the name given to the event. The four major events organized in this celebration included Web based Treasure Hunt, Big Fact Meme Hunt, Advertizee Competition, and Sci-Fi Quiz Competition.

Workshop on Basics of Arduino Programming

Date/Mode/Location: June 01-02, 2021, Online mode: Google Meet

Participants: School students of classes 9 to 12

Speaker: Chapter members

The SPIE chapter organized a workshop in the online mode amid the second wave of Covid for the students of Lovely Public School, Delhi. The workshop titled ‘Basics of Arduino Programming’ was organized for two days (June 01-02, 2021), where the chapter members mentored a group of 100 students in learning and implementing Arduino Programming through an online platform named Tinkercad. Some basic experiments related to Arduino were displayed like the blinking of LEDs, measurement of distance using ultrasonic sensors, the beeping of buzzers etc, to provide a basic look into the working and programming of Arduino circuits. At the end of the workshop, the quiz conducted to test the understanding and learning of the students from the workshop showed a good performance overall.

Talk On ‘Imaging Arithmetic: Physics U Maths> Physics + Maths’

Speaker: Prof. Gaurav Sharma

Date/Mode/Location: June 29, 2021, Online mode: Google Meet

Participants: Chapter members and PG and Ph.D. students from other colleges as well

An interactive and educational session was organized under the banner of the SPIE ANDC Research Programme (SARP). Around 75 undergraduate students from different colleges attended the session. Dr Gaurav Sharma, Professor of Electrical and Computer Engineering, University of Rochester, New York, delivered a talk on ‘Imaging Arithmetic: Physics U Maths> Physics + Maths’.

Cloud Computing Workshop

Industry Partner: Brain Mentors Private Limited, Delhi

Date/Mode/Location: September 06-10, 2021, online mode, Google Meet.

Participants: Chapter members, ANDC students, and other college students.

Speaker: Mr Ravikant Tyagi from Brain Mentors

Cloud computing is the delivery of computing services including servers, storage, databases, networking, software, analytics, and intelligence over the internet (the cloud) to offer faster innovation, flexible resources, and economies of scale. Acknowledging the importance of these services in the current technological world, the SPIE chapter in collaboration with Brain Mentors Pvt. Ltd. (industry partner) organized an online workshop on ‘Cloud Computing’ from September 06-09, 2021 and September 11, 2021 on Google Meet. The key learning outcomes included: understanding the fundamentals of cloud computing, an introduction to core services of AWS (Amazon Web Services), billing and support services, and the security aspects of cloud computing. About 50 students participated with enthusiasm and the workshop was highly productive as per the feedback obtained.

Science Education Outreach Activity 2021

Topic: Sensor Interfacing using Arduino

Date/Mode/Location: October 18-31, 2021, online mode: Google Meet

To promote contemporary optics at the school level, the SPIE chapter performed an outreach activity with 9-12 standard students from two different schools. Five chapter members acted as mentors to students for this activity. Since students did not have any access to laboratory materials because of the Covid lockdown, all the activities were so designed that they could be easily performed their own homes. All the selected activities introduced the practical aspect of the concepts of Arduino Programming. Specifically, through the activity titled 'Sensor Interfacing using Arduino' students were given an insight into the different aspects of Arduino and its applications.

Ongoing Research Projects

1. SPIE Mask Detector

After the breakout of COVID-19, there arose a severe need to ensure the usage of air droplet protection mechanism, like face masks by the masses. Using Machine Learning Algorithms, we have come up with an idea to make a face mask detector that detects the presence of face masks on a human face. Integrated Data Science algorithms along with Electronic Science advances will be compiled together to detect whether a person is with or without a face mask and by giving an appropriate output using Buzzer or LED (i.e., red - without mask and green - with mask).

2. Li-Fi (Light Fidelity) and Analysis

Sound transmission using LED lights has already been demonstrated, so through this project, some of the chapter members will apply data analysis tools and techniques to check the relation between different wavelengths and the transmitted sound. The data will be collected from a working project using smartphone apps to demonstrate the use of handheld devices in doing projects.

Talk On Career Opportunities in Publishing

Date/Mode/Location: February 04, 2022, online mode: Google Meet

Participants: 50 (approx.) chapter members and college students

Speaker: Mr. Sahil Gupta, Founder at publishingconsultant.in

The world today is consuming media at a rate higher than ever before. Content creation is now a viable career option for aspiring students. Since it is such a new, different and rather diverse field, many aspirants are justifiably confused as to how they should go about to pursue this. The SPIE Student Chapter at Acharya Narendra Dev College, University of Delhi teamed up with Mr. Sahil Gupta, founder at publishingconsultant.in to shed some light on this largely underdiscussed field.

Quiz Competition on Telescope

Date/Mode/Location: February 20, 2022, online Google Meet.

Participants: Chapter members and students from various colleges and schools

The successful launch of the James Web Telescope is no less than a marvelous achievement for humanity. Hence, to celebrate this humungous accomplishment, SPIE Student Chapter decided to come up with a QUIZ COMPETITION ON TELESCOPES. This competition was held on February 20, 2022 via Google Meet and the Quizzes App. Students from various colleges, irrespective of their domains, participated wholeheartedly. The competition went off well, and in the end, the top three winners were awarded exciting prizes.

National Science Day-Museum of Illusions Visit

Date/Location: February 28, 2022, Museum of Illusions, New Delhi.

A visit to the Museum of Illusions, New Delhi is a unique experience for students as they have the opportunity not only to have fun but also to learn a lot about vision, perception, human brain and Science. One of the best things about this museum is the holograms and optical illusions. There are a number of images, portraits, and even engraved pieces of art that give it a 3D look. Some of the things to watch out for include images that disappear without reason, change their motif, or pop out of the picture. On February 28, 2022, we visited the Museum of Illusions, Connaught Place, New Delhi, Delhi 110001 on the occasion of National Science Day. Trips like these increase awareness and enthusiasm in young minds. Exposure to such knowledge, encourages students in the field of optics and mind storming.

Full Stack Web Development Using MERN

Industry Partner: Brain Mentors Pvt. Ltd., Delhi

Date/Mode/Location: March 05 - 09, 2022, online mode, Google Meet

Participants: 25 (approx.) chapter members and college students

Speaker: Mr Amit Srivastava, Founder-CEO Brain Mentors Pvt. Ltd.

With the advent and global accessibility of the internet, the world is now more interconnected than ever before. Everyday more and more websites are being added to the already seemingly-endless list. It wouldn't be wrong to say that digital innovations have ushered in a new age - the age of the internet. Recognizing the potential of this new and exciting career field, the SPIE Student Chapter at Acharya Narendra Dev College, University of Delhi partnered with Brain Mentors Pvt. Ltd to organize an online workshop focusing on Web Development using the latest industry-ready tools. On March 05, 2022 approximately 25 students attended the virtual workshop through the online conference portal, Google Meet. Mr. Amit Srivastava, Founder-CEO of Brain Mentors Pvt. Ltd. introduced the basics of the tools required and the essence and industry necessities for web development. The students learnt the basics of front-end and back-end web designing.

Learning Holography: A One-Day Offline Workshop

Date/Location: March 14, 2022, SPIE Lab, Acharya Narendra Dev College

Covid was no less than a nightmare for all of us, and the education system all over the world was heavily shaken by it. But "every sunset brings the promise of a new dawn." Hence, to rejuvenate offline learning after the catastrophe, the SPIE Student Chapter organized a one-day offline workshop on Holography, conducted by an esteemed faculty Dr Sanjay Kumar. Each session lasted around 1.5 hours, and a real hologram image was brought out at the end. The hologram was also cut into four pieces and distributed among the students as a token of learning and experience. The session was highly enriching and fruitful.

Arduino and Sensor Interfacing Workshop

Industry Partner: Touch Techno, Delhi

Date/Location: March 26, 2022, Electronics Lab at Acharya Narendra Dev College.

Participants: Around 30 students

Microcontrollers such as Arduino is a boiling topic in the field of Science. Together with sensors, Arduino can do wonders by simplifying our lives. Keeping in mind the need for students to learn modern technologies, the SPIE Student Chapter of Delhi at Acharya Narendra Dev College partnered with Touch Techno to bring a fun and informative physical hands-on one day workshop in the college. Students were first taught about the theoretical aspects of a microcontroller followed by hands on practical projects including blinking of LEDs to using IR sensors to make obstacle detectors. All the students were provided with individual Arduino Uno systems along with LEDs, sensors, wires and other required equipment to perform experiments.

Summer School on Optics and Photonics: Fundamentals and Applications Organized by IIT Delhi

Five members (Mr Naman Sirohi, B.Sc. (H) Electronics, I year; Ms Neha Khanra, B.Sc. (H) Physics, I year; Ms Nisha Khanra, B.Sc. (H) Physics, I year; Mr Aryan Kesarwani, B.Sc. (Prog.) Physical Science (Chemistry), II year; Ms Sakshi Garg, B.Sc. (Prog.) Physical Science (Computer Science), II year) of SPIE Student Chapter University of Delhi at Acharya Narendra Dev College, participated in the Summer School on 'OPTICS AND PHOTONICS: FUNDAMENTALS AND APPLICATIONS' organized by IIT Delhi from June 06-24, 2022 in the online mode.

3.9 NPTEL-SWAYAM Local Chapter @ ANDC

SPOC/Convenor: Prof. Gagan Dhawan

The National Programme on Technology Enhanced Learning (NPTEL) was initiated by seven Indian Institutes of Technology (Bombay, Delhi, Kanpur, Kharagpur, Madras, Guwahati and Roorkee) along with the Indian Institute of Science, Bangalore in 2003 (Online web portal <http://nptel.ac.in>).

NPTEL began offering open online courses in March 2014 along with certificates from the IITs/IISc for those who completed the courses successfully. The objective of NPTEL online certification is to enable students to obtain certificates for courses, to make students employable in the industry or pursue a suitable higher education programme. These certificates are envisioned for use in credit transfer to universities or for making the student more employable or for enhancing his growth in his current place of work.

These courses enable the students to directly engage and learn from the best faculty in the country in that particular subject. This will strengthen the fundamentals of the student in the course and give him an opportunity to explore new areas of interest – which are not possible in a regular college environment. Also, they give students the opportunity to learn in greater depth the subjects they wish to master. These courses are also serving as faculty development programmes (15-20% of enrolments are by faculty in different colleges).

UGC and AICTE are actively encouraging colleges and universities to adopt at least one online course a semester for credit transfer. Many have already incorporated the same. Also, several IITs such as IIT Madras, IIT Roorkee, IIT Tirupati, IIT Palakkad, etc are allowing these courses to be taken for credits.

To take this initiative forward and to encourage more students across colleges to participate in this initiative, a **SWAYAM NPTEL Local Chapter** has been established in our college. 112 students from different departments of the college have registered for various online NPTEL courses in the current academic year.

3.10 OPEN Initiative - Creative Commons Network @ ANDC

Authorized Representative – Prof. Sarita Kumar

Acharya Narendra Dev College is known for being a pioneer in Open Educational Resources (OER) within the University of Delhi. Being committed to OER, the college became an institutional member of the Creative Commons network in May 2018. Prof. Sarita Kumar attended the CC Global Summit virtually held during September 20-24, 2021, which was attended by a large number of open evangelists throughout the world.

In order to promote 'Open Education' among students and academicians across India, an online talk on 'License and Copyright Considerations in E-content Development' was organized on December 17, 2021 using Google Meet (meet.google.com/bsw-mdbg-wkj). The talk was given by Prof. Savithri Singh, Country Lead, Creative Commons, India. She addressed the faculty members of Holy Family College of Nursing and made them aware about the OER, CC licenses and copyright issues while developing e-content. A total of 35 faculty members joined the talk who raised a large number of queries regarding open education, open access and copyright issues. The participants found the talk quite informative and insightful.



**ACHARYA
NARENDRA
DEV COLLEGE**
UNIVERSITY OF DELHI

STUDENTS' CORNER

Annual Report 2022

4



4 STUDENTS' CORNER

4.1 Students' Achievements, Scholarships and Aid

4.1.1 Merit Positions in the University of Delhi (2020-2021)

S. No.	Name	Course	Year	Rank in University	CGPA
1	Jayant Wadhwa	B.Com. (H)	I	I	10.00
2	Shivam	B. Sc. (H) Biomedical Science	I	II	9.50
3	Rohit Rajesh Gokhale	B. Sc. (H) Biomedical Science	III	I	9.63
4	Muskan Gupta	B. Sc. (H) Biomedical Science	III	III	9.38
5	Nahid	B. Sc. (H) Biomedical Science	III	III	9.38
6	Shreya Roy Chowdhury	B. Sc. (H) Biomedical Science	III	III	9.38
7	Tamanna	B. Sc. (H) Biomedical Science	III	III	9.38
8	Meghana Bisht	B.Sc. (H) Chemistry	I	I	10.00
9	Tanya Chopra	B.Sc. (H) Chemistry	I	I	10.00
10	Muskan	B.Sc. (H) Chemistry	III	III	9.75
11	Priyash Verma	B.Sc. (H) Chemistry	III	III	9.75
12	Anushka Jain	B.Sc. (H) Computer Science	II	I	10.00
13	Priya Singh	B.Sc. (H) Computer Science	II	I	10.00
14	Rishi Sarbobhoum	B.Sc. (H) Computer Science	II	I	10.00
15	Sant Kumar	B.Sc. (H) Computer Science	II	I	10.00
16	Suruchi Verma	B.Sc. (H) Computer Science	II	I	10.00
17	Tabassum Rana	B.Sc. (H) Computer Science	II	III	9.89
18	Pratika Tripathi	B.Sc. (H) Computer Science	III	III	9.75
19	Tanya Gupta	B.Sc. (H) Computer Science	III	III	9.75
20	Shivansh Bhatnagar	B.Sc. (H) Electronics	I	I	9.86
21	Karishma Goswami	B.Sc. (H) Electronics	I	II	9.77
22	Shubham Kumar Mishra	B.Sc. (H) Electronics	I	II	9.77
23	Swati Shukla	B.Sc. (H) Electronics	I	III	9.73
24	Sagar Bisht	B.Sc. (H) Electronics	II	I	9.89
25	Sumit	B.Sc. (H) Electronics	II	II	9.79
26	Yash Goel	B.Sc. (H) Maths	I	II	9.91
27	Gurpreet Kaur	B.Sc. (H) Maths	III	I	10.00
28	Priyanshi Gupta	B.Sc. (H) Maths	III	I	10.00
29	Pulkit Narayan Pandey	B.Sc. (H) Maths	III	I	10.00
30	Pushkar Pandey	B.Sc. (H) Maths	III	I	10.00
31	Somiya Kapoor	B.Sc. (H) Maths	III	I	10.00
32	Sukanta Sarkar	B.Sc. (H) Maths	III	I	10.00
33	Sunidhi Khanna	B.Sc. (H) Maths	III	I	10.00
34	Adity Dubey	B.Sc. (H) Maths	III	II	9.88
35	Neha	B.Sc. (H) Maths	III	II	9.88

36	Sakshi Sharma	B.Sc. (H) Maths	III	II	9.88
37	Anmol Behera	B.Sc. (H) Maths	III	III	9.75
38	KM Shikha Kumari	B.Sc. (H) Maths	III	III	9.75
39	Nidhi Sharma	B.Sc. (H) Maths	III	III	9.75
40	Pooja	B.Sc. (H) Maths	III	III	9.75
41	Prachi	B.Sc. (H) Maths	III	III	9.75
42	Ranjeet Kumar Sahu	B.Sc. (H) Maths	III	III	9.75
43	Ritik Kehra	B.Sc. (H) Maths	III	III	9.75
44	Shalini Kataria	B.Sc. (H) Maths	III	III	9.75
45	Shruti Chandra Gupta	B.Sc. (H) Maths	III	III	9.75
46	Vaibhav Mishra	B.Sc. (H) Maths	III	III	9.75
47	Bindu	B.Sc. (H) Physics	II	I	10.00
48	Khushi Goyal	B.Sc. (H) Zoology	II	II	9.89
49	Suhani Rathore	B.Sc. (H) Zoology	III	III	9.75
50	Jyoti Sharma	B.Sc. (Prog.) Life Science	III	II	9.86
51	Neerdhi Goswami	B.Sc. (Prog.) Physical Science	II	III	9.86
52	Riya Chaudhary	B.Sc. (Prog.) Physical Science	II	III	9.86
53	Nitesh Kumar	B.Sc. (Prog.) Physical Science	III	III	9.86

4.1.2 Merit Positions in the University of Delhi South Campus (UDSC) (2020-2021)

S.No.	Name	Course	Year	Rank in UDSC	CGPA
1	Jayant Wadhwa	B.Com. (H)	I	I	10.00
2	Shivam	B. Sc. (H) Biomedical Science	I	II	9.50
3	Rohit Rajesh Gokhale	B. Sc. (H) Biomedical Science	III	I	9.63
4	Muskan Gupta	B. Sc. (H) Biomedical Science	III	III	9.38
5	Nahid	B. Sc. (H) Biomedical Science	III	III	9.38
6	Shreya Roy Chowdhury	B. Sc. (H) Biomedical Science	III	III	9.38
7	Tamanna	B. Sc. (H) Biomedical Science	III	III	9.38
8	Vridhi Singh	B. Sc. (H) Botany	I	III	9.64
9	Mohini Kumari	B. Sc. (H) Botany	II	III	9.64
10	Meghana Bisht	B.Sc. (H) Chemistry	I	I	10.00
11	Tanya Chopra	B.Sc. (H) Chemistry	I	I	10.00
12	Muskan	B.Sc. (H) Chemistry	III	III	9.75
13	Priyash Verma	B.Sc. (H) Chemistry	III	III	9.75
14	Anushka Jain	B.Sc. (H) Computer Science	II	I	10.00
15	Priya Singh	B.Sc. (H) Computer Science	II	I	10.00
16	Rishi Sarbob-houm	B.Sc. (H) Computer Science	II	I	10.00
17	Sant Kumar	B.Sc. (H) Computer Science	II	I	10.00
18	Suruchi Verma	B.Sc. (H) Computer Science	II	I	10.00

19	Tabassum Rana	B.Sc. (H) Computer Science	II	II	9.89
20	Pratika Tripathi	B.Sc. (H) Computer Science	III	III	9.75
21	Tanya Gupta	B.Sc. (H) Computer Science	III	III	9.75
22	Shivansh Bhatnagar	B.Sc. (H) Electronics	I	I	9.86
23	Karishma Goswami	B.Sc. (H) Electronics	I	II	9.77
24	Shubham Kumar Mishra	B.Sc. (H) Electronics	I	II	9.77
25	Swati Shukla	B.Sc. (H) Electronics	I	III	9.73
26	Sagar Bisht	B.Sc. (H) Electronics	II	I	9.89
27	Sumit	B.Sc. (H) Electronics	II	II	9.79
28	Yash Goel	B.Sc. (H) Maths	I	II	9.91
29	Gurpreet Kaur	B.Sc. (H) Maths	III	I	10.00
30	Priyanshi Gupta	B.Sc. (H) Maths	III	I	10.00
31	Pulkit Narayan Pandey	B.Sc. (H) Maths	III	I	10.00
32	Pushkar Pandey	B.Sc. (H) Maths	III	I	10.00
33	Somiya Kapoor	B.Sc. (H) Maths	III	I	10.00
34	Sukanta Sarkar	B.Sc. (H) Maths	III	I	10.00
35	Sunidhi Khanna	B.Sc. (H) Maths	III	I	10.00
36	Adity Dubey	B.Sc. (H) Maths	III	II	9.88
37	Neha	B.Sc. (H) Maths	III	II	9.88
38	Sakshi Sharma	B.Sc. (H) Maths	III	II	9.88
39	Anmol Behera	B.Sc. (H) Maths	III	III	9.75
40	KM Shikha Kumari	B.Sc. (H) Maths	III	III	9.75
41	Nidhi Sharma	B.Sc. (H) Maths	III	III	9.75
42	Pooja	B.Sc. (H) Maths	III	III	9.75
43	Prachi	B.Sc. (H) Maths	III	III	9.75
44	Ranjeet Kumar Sahu	B.Sc. (H) Maths	III	III	9.75
45	Ritik Kehra	B.Sc. (H) Maths	III	III	9.75
46	Shalini Kataria	B.Sc. (H) Maths	III	III	9.75
47	Shruti Chandra Gupta	B.Sc. (H) Maths	III	III	9.75
48	Vaibhav Mishra	B.Sc. (H) Maths	III	III	9.75
49	Bindu	B.Sc. (H) Physics	II	I	10.00
50	Khushi Goyal	B.Sc.(H) Zoology	II	II	9.89
51	Suhani Rathore	B.Sc.(H) Zoology	III	III	9.75
52	Jyoti Sharma	B.Sc. (Prog.) Life Science	III	I	9.86
53	Neerdhi Goswami	B.Sc. (Prog.) Physical Science	II	II	9.86
54	Riya Chaudhary	B.Sc. (Prog.) Physical Science	II	II	9.86
55	Nitesh Kumar	B.Sc. (Prog.) Physical Science	III	III	9.86

4.1.3 Merit Positions in the College (2020-2021)

4.1.3.1 Merit Positions in the College (Non-Cumulative)

S. No.	Name	Course	Year	Rank in College	CGPA
1	Jayant Wadhwa	B.Com. (H)	I	I	10.00
2	Ashwin Kumar	B.Com. (H)	I	II	9.77
3	Chhavi Gupta	B.Com. (H)	I	II	9.77
4	Aayushi Chachra	B.Com. (H)	I	III	9.73
5	Aayushi Kushwaha	B.Com. (H)	I	III	9.73
6	Dhaval Arora	B.Com. (H)	I	III	9.73
7	Rishi Prasad	B.Com. (H)	I	III	9.73
8	Ved Vaibhav Deo	B.Com. (H)	I	III	9.73
9	Shivam	B. Sc. (H) Biomedical Science	I	I	9.50
10	Shrishti Singh	B. Sc. (H) Biomedical Science	I	II	9.00
11	Ekta	B. Sc. (H) Biomedical Science	I	III	8.86
12	Vridhi Singh	B.Sc. (H) Botany	I	I	9.64
13	Maniket Chauhan	B.Sc. (H) Botany	I	II	9.23
14	Mridula Rani	B.Sc. (H) Botany	I	III	9.09
15	Aishwary Kumar Chaturvedi	B.Sc. (H) Botany	I	III	9.09
16	Meghana Bisht	B.Sc. (H) Chemistry	I	I	10.00
17	Tanya Chopra	B.Sc. (H) Chemistry	I	I	10.00
18	Bhanu Miglani	B.Sc. (H) Chemistry	I	II	9.77
19	Monika	B.Sc. (H) Chemistry	I	II	9.77
20	Taruna	B.Sc. (H) Chemistry	I	II	9.77
21	Ayushi Gupta	B.Sc. (H) Chemistry	I	III	9.73
22	Ishita Belwal	B.Sc. (H) Chemistry	I	III	9.73
23	Nilesh Pandey	B.Sc. (H) Computer Science	I	I	9.77
24	Shahnwaz Khan	B.Sc. (H) Computer Science	I	I	9.77
25	Yash Lohia	B.Sc. (H) Computer Science	I	I	9.77
26	Ananya Shukla	B.Sc. (H) Computer Science	I	II	9.73
27	Harsh Bamotra	B.Sc. (H) Computer Science	I	III	9.64
28	Jyotika Sharma	B.Sc. (H) Computer Science	I	III	9.64
29	Ramit Yadav	B.Sc. (H) Computer Science	I	III	9.64
30	Siya Agarwal	B.Sc. (H) Computer Science	I	III	9.64
31	Shivansh Bhatnagar	B.Sc. (H) Electronics	I	I	9.86
32	Karishma Goswami	B.Sc. (H) Electronics	I	II	9.77
33	Shubham Kumar Mishra	B.Sc. (H) Electronics	I	II	9.77
34	Swati Shukla	B.Sc. (H) Electronics	I	III	9.73
35	Yash Goel	B.Sc. (H) Mathematics	I	I	9.91
36	Aditya	B.Sc. (H) Mathematics	I	II	9.77
37	Anand kumar Yadav	B.Sc. (H) Mathematics	I	II	9.77

38	Prerna Maan	B.Sc. (H) Mathematics	I	II	9.77
39	Priya	B.Sc. (H) Mathematics	I	II	9.77
40	Shruti Arya	B.Sc. (H) Mathematics	I	II	9.77
41	Ashutosh Garg	B.Sc. (H) Mathematics	I	III	9.68
42	Anjani Nandan Tiwari	B. Sc.(H) Physics	I	I	9.45
43	Ayush Mishra	B.Sc. (H) Physics	I	II	9.27
44	Chandrima Roy	B.Sc. (H) Physics	I	III	9.00
45	Harsh Kumar	B.Sc. (H) Physics	I	III	9.00
46	Isha Khare	B.Sc. (H) Physics	I	III	9.00
47	Kalpajit Roy	B.Sc. (H) Physics	I	III	9.00
48	Prahlad Sharma	B.Sc. (H) Physics	I	III	9.00
49	Varnika Agarwal	B.Sc. (H) Physics	I	III	9.00
50	Amit Singh	B.Sc. (H) Physics	I	III	9.00
51	Rajkumar Jain	B.Sc. (H) Zoology	I	I	9.59
52	Nitesh	B.Sc. (H) Zoology	I	II	9.27
53	Rakhi Yadav	B.Sc. (H) Zoology	I	II	9.27
54	Twishi Mishra	B.Sc. (H) Zoology	I	III	9.23
55	Arunima Dey	B.Sc. (Prog.) Life Science	I	I	9.55
56	Aastha Srivastava	B.Sc. (Prog.) Life Science	I	II	9.14
57	Devanshi Saini	B.Sc. (Prog.) Life Science	I	II	9.14
58	Sahil Chauhan	B.Sc. (Prog.) Life Science	I	III	9.00
59	Manish Pal	B.Sc. (Prog.) Physical Science	I	I	9.45
60	Kirti	B.Sc. (Prog.) Physical Science	I	II	9.41
61	Shreya Rawat	B.Sc. (Prog.) Physical Science	I	III	9.27
62	Nitin Sharma	B.Sc. (Prog.) Physical Science	I	III	9.27
63	Vaidik Thakre	B.Sc. (Prog.) Physical Science	I	III	9.27
64	Anchal Singh	B.Com. (H)	II	I	9.57
65	Ankit Kumar	B.Com. (H)	II	I	9.57
66	Tarush Bajra	B.Com. (H)	II	I	9.57
67	Teesha Rautela	B.Com. (H)	II	I	9.57
68	Vaishali Bhardwaj	B.Com. (H)	II	I	9.57
69	Tanya Gupta	B.Com. (H)	II	II	9.50
70	Kirtika Choudhury	B.Com. (H)	II	III	9.39
71	Simran Gupta	B.Com. (H)	II	III	9.39
72	Pritika Kwatra	B.Sc. (H) Biomedical Science	II	I	9.39
73	Than Dar Aung	B.Sc. (H) Biomedical Science	II	II	9.36
74	Nitika Chauhan	B.Sc. (H) Biomedical Science	II	III	9.29
75	Sakshi Sharma	B.Sc. (H) Biomedical Science	II	III	9.29
76	Mohini Kumari	B.Sc. (H) Botany	II	I	9.64
77	Hitesh Kala	B.Sc. (H) Botany	II	II	9.57
78	Pragya Muni	B.Sc. (H) Botany	II	II	9.57
79	Ajita Ojha	B.Sc. (H) Botany	II	III	9.46
80	Shweta Yadav	B.Sc. (H) Botany	II	III	9.46

81	Shiwani Kashyap	B.Sc. (H) Chemistry	II	I	9.89
82	Sneha Khurana	B.Sc. (H) Chemistry	II	II	9.79
83	Saloni Kashyap	B.Sc. (H) Chemistry	II	III	9.68
84	Anushka Jain	B.Sc. (H) Computer Science	II	I	10.00
85	Priya Singh	B.Sc. (H) Computer Science	II	I	10.00
86	Rishi Sarbobhoum	B.Sc. (H) Computer Science	II	I	10.00
87	Sant Kumar	B.Sc. (H) Computer Science	II	I	10.00
88	Suruchi Verma	B.Sc. (H) Computer Science	II	I	10.00
89	Tabassum Rana	B.Sc. (H) Computer Science	II	II	9.89
90	Ayushi Sharma	B.Sc. (H) Computer Science	II	III	9.79
91	Sagar Bisht	B.Sc. (H) Electronics	II	I	9.89
92	Sumit	B.Sc. (H) Electronics	II	II	9.79
93	Mohd. Mukhtar Ansari	B.Sc. (H) Electronics	II	III	9.57
94	Priya	B.Sc. (H) Mathematics	II	I	9.57
95	Sachin Patel	B.Sc. (H) Mathematics	II	II	9.46
96	Meenakshi	B.Sc. (H) Mathematics	II	III	9.39
97	Bindu	B.Sc. (H) Physics	II	I	10.00
98	Somsuvra Das	B.Sc. (H) Physics	II	II	9.82
99	Kunal Kumar	B.Sc. (H) Physics	II	III	9.61
100	Khushi Goyal	B.Sc. (H) Zoology	II	I	9.89
101	Komal Goyal	B.Sc. (H) Zoology	II	II	9.79
102	Hafiza	B.Sc. (H) Zoology	II	III	9.68
103	Harshita	B.Sc. (H) Zoology	II	III	9.68
104	Radhika Garg	B.Sc. (H) Zoology	II	III	9.68
105	Mahak	B.Sc. (Prog.) Life Science	II	I	9.32
106	Preeti	B.Sc. (Prog.) Life Science	II	I	9.32
107	Sumitra Shah	B.Sc. (Prog.) Life Science	II	I	9.32
108	Aanchal Bhaskar Aggarwal	B.Sc. (Prog.) Life Science	II	II	9.18
109	Inshul Bansal	B.Sc. (Prog.) Life Science	II	II	9.18
110	Muskan	B.Sc. (Prog.) Life Science	II	II	9.18
111	Pooja Rai	B.Sc. (Prog.) Life Science	II	III	8.95
112	Yashank Chauhan	B.Sc. (Prog.) Life Science	II	III	8.95
113	Neerdhi Goswami	B.Sc. (Prog.) Physical Science	II	I	9.86
114	Riya Chaudhary	B.Sc. (Prog.) Physical Science	II	I	9.86
115	KM Parul Agarwal	B.Sc. (Prog.) Physical Science	II	II	9.73
116	Deepanshi Saini	B.Sc. (Prog.) Physical Science	II	III	9.59
117	Mahek Goel	B.Com. (H)	III	I	9.50
118	Manas Gambhir	B.Com. (H)	III	II	9.38
119	Raghav Wadhwa	B.Com. (H)	III	II	9.38
120	Aashirwad Pandey	B.Com. (H)	III	III	9.25
121	Harshit Kumar Garg	B.Com. (H)	III	III	9.25
122	Pratishtha Bisht	B.Com. (H)	III	III	9.25

123	Saurabh Mangla	B.Com. (H)	III	III	9.25
124	Vansh Aggarwal	B.Com. (H)	III	III	9.25
125	Vivek Taneja	B.Com. (H)	III	III	9.25
126	Anjali Sharma	B.Com. (H)	III	III	9.25
127	Devansh Kotnala	B.Com. (H)	III	III	9.25
128	Rohit Rajesh Gokhale	B.Sc. (H) Biomedical Science	III	I	9.63
129	Muskan Gupta	B.Sc. (H) Biomedical Science	III	II	9.38
130	Nahid	B.Sc. (H) Biomedical Science	III	II	9.38
131	Shreya Roy Chowdhury	B.Sc. (H) Biomedical Science	III	II	9.38
132	Tamanna	B.Sc. (H) Biomedical Science	III	II	9.38
133	Annie Singh Batra	B.Sc. (H) Biomedical Science	III	III	9.25
134	Harshvardhan Gupta	B.Sc. (H) Biomedical Science	III	III	9.25
135	Deepanshi Patel	B.Sc. (H) Botany	III	I	9.38
136	Andaleeb Zahra	B.Sc. (H) Botany	III	II	9.25
137	Gaurav Rawat	B.Sc. (H) Botany	III	II	9.25
138	Anjali Meena	B.Sc. (H) Botany	III	III	9.13
139	Ankita	B.Sc. (H) Botany	III	III	9.13
140	Lakshika	B.Sc. (H) Botany	III	III	9.13
141	Neha	B.Sc. (H) Botany	III	III	9.13
142	Muskan	B.Sc. (H) Chemistry	III	I	9.75
143	Priyash Verma	B.Sc. (H) Chemistry	III	I	9.75
144	Pragya	B.Sc. (H) Chemistry	III	II	9.50
145	Amit	B.Sc. (H) Chemistry	III	III	9.38
146	Pratika Tripathi	B.Sc. (H) Computer Science	III	I	9.75
147	Tanya Gupta	B.Sc. (H) Computer Science	III	I	9.75
148	Bhumi Chaudhary	B.Sc. (H) Computer Science	III	II	9.63
149	Chirag Garg	B.Sc. (H) Computer Science	III	II	9.63
150	Prakriti Gupta	B.Sc. (H) Computer Science	III	III	9.50
151	S Sai Sacheen	B.Sc. (H) Computer Science	III	III	9.50
152	Anamta Islam	B.Sc. (H) Electronics	III	I	10.00
153	Pushkar Baranwal	B.Sc. (H) Electronics	III	I	10.00
154	Ashutosh Mani Tripathi	B.Sc. (H) Electronics	III	II	9.63
155	Ankita Shukla	B.Sc. (H) Electronics	III	III	9.50
156	Anurag Saxena	B.Sc. (H) Electronics	III	III	9.50
157	Gurpreet Kaur	B.Sc. (H) Maths	III	I	10.00
158	Priyanshi Gupta	B.Sc. (H) Maths	III	I	10.00
159	Pulkit Narayan Pandey	B.Sc. (H) Maths	III	I	10.00
160	Pushkar Pandey	B.Sc. (H) Maths	III	I	10.00
161	Somiya Kapoor	B.Sc. (H) Maths	III	I	10.00
162	Sukanta Sarkar	B.Sc. (H) Maths	III	I	10.00
163	Sunidhi Khanna	B.Sc. (H) Maths	III	I	10.00
164	Adity Dubey	B.Sc. (H) Maths	III	II	9.88
165	Neha	B.Sc. (H) Maths	III	II	9.88

166	Sakshi Sharma	B.Sc. (H) Maths	III	II	9.88
167	Anmol Behera	B.Sc. (H) Maths	III	III	9.75
168	KM Shikha Kumari	B.Sc. (H) Maths	III	III	9.75
169	Nidhi Sharma	B.Sc. (H) Maths	III	III	9.75
170	Pooja	B.Sc. (H) Maths	III	III	9.75
171	Prachi	B.Sc. (H) Maths	III	III	9.75
172	Ranjeet Kumar Sahu	B.Sc. (H) Maths	III	III	9.75
173	RitikKehra	B.Sc. (H) Maths	III	III	9.75
174	Shalini Kataria	B.Sc. (H) Maths	III	III	9.75
175	Shruti Chandra Gupta	B.Sc. (H) Maths	III	III	9.75
176	Vaibhav Mishra	B.Sc. (H) Maths	III	III	9.75
177	Kshitij Gautam	B.Sc.(H) Physics	III	I	9.63
178	Vidit Verma	B.Sc.(H) Physics	III	I	9.63
179	Khusboo Gupta	B.Sc.(H) Physics	III	II	9.50
180	Banshi Lal	B.Sc.(H) Physics	III	III	9.38
181	Karan Bajaj	B.Sc.(H) Physics	III	III	9.38
182	Pravin Bhimashankar Kamale	B.Sc.(H) Physics	III	III	9.38
183	Sanket Verma	B.Sc.(H) Physics	III	III	9.38
184	Vedavyas S A	B.Sc.(H) Physics	III	III	9.38
185	Vivek Kumar	B.Sc.(H) Physics	III	III	9.38
186	Yukta Kandpal	B.Sc.(H) Physics	III	III	9.38
187	Suhani Rathore	B.Sc. (H) Zoology	III	I	9.75
188	Amisha Panda	B.Sc. (H) Zoology	III	II	9.50
189	Harshita	B.Sc. (H) Zoology	III	III	9.25
190	Soni Gupta	B.Sc. (H) Zoology	III	III	9.25
191	Jyoti Sharma	B.Sc. (Prog.) Life Science	III	I	9.86
192	Chavi Vats	B.Sc. (Prog.) Life Science	III	II	9.59
193	Deepanshu Vats	B.Sc. (Prog.) Life Science	III	II	9.59
194	Sneha Mahar	B.Sc. (Prog.) Life Science	III	III	9.32
195	Nitesh Kumar	B.Sc. (Prog.) Physical Science	III	I	9.86
196	Mallika Yadav	B.Sc. (Prog.) Physical Science	III	II	9.73
197	Rohit Yadav	B.Sc. (Prog.) Physical Science	III	III	9.59
198	Naveen Rawat	B.Sc. (Prog.) Physical Science	III	III	9.59
199	Jaya	B.Sc. (Prog.) Physical Science	III	III	9.59
200	Geetika	B.Sc. (Prog.) Physical Science	III	III	9.59
201	Gaurav Dwivedi	B.Sc. (Prog.) Physical Science	III	III	9.59

4.1.3.2 Merit Positions in the College (Cumulative)

S. No.	Name	Course	Rank in College	G_CGPA
1	Rohit Rajesh Gokhale	B.Sc. (H) Biomedical Science	I	9.284
2	Sudeepta Singh	B.Sc. (H) Biomedical Science	I	9.284
3	Shreya Roy Chowdhury	B.Sc. (H) Biomedical Science	II	9.230

4	Tamanna	B.Sc. (H) Biomedical Science	III	9.014
5	Neha	B.Sc. (H) Botany	I	9.108
6	Mohit Singh Kanyal	B.Sc. (H) Botany	II	8.932
7	Gaurav Rawat	B.Sc. (H) Botany	III	8.689
8	Priyash Verma	B.Sc. (H) Chemistry	I	9.270
9	Amit	B.Sc. (H) Chemistry	II	9.216
10	Amisha Thakur	B.Sc. (H) Chemistry	III	8.797
11	Bhumi Chaudhary	B.Sc. (H) Computer Science	I	9.432
12	Pratika Tripathi	B.Sc. (H) Computer Science	II	9.284
13	Tanya Gupta	B.Sc. (H) Computer Science	II	9.284
14	Mukesh Kumar	B.Sc. (H) Computer Science	III	9.068
15	Pushkar Baranwal	B.Sc. (H) Electronics	I	9.108
16	Anamta Islam	B.Sc. (H) Electronics	II	8.730
17	Yash Varshney	B.Sc. (H) Electronics	III	8.568
18	Priyanshi Gupta	B.Sc. (H) Maths	I	9.797
19	Gurpreet Kaur	B.Sc. (H) Maths	II	9.568
20	Sunidhi Khanna	B.Sc. (H) Maths	III	9.554
21	Sumit Kumar Sah	B.Sc. (H) Maths	III	9.554
22	Vidit Verma	B.Sc. (H) Physics	I	9.311
23	Khusboo Gupta	B.Sc. (H) Physics	II	8.905
24	Arpita Debnath	B.Sc. (H) Physics	III	8.851
25	Banshi Lal	B.Sc. (H) Physics	III	8.851
26	Amisha Panda	B.Sc. (H) Zoology	I	9.541
27	Suhani Rathore	B.Sc. (H) Zoology	II	9.473
28	Sunidhi Aneja	B.Sc. (H) Zoology	III	9.230
29	Mallika Yadav	B.Sc. (Prog.) Physical Science	I	9.621
30	Nitesh Kumar	B.Sc. (Prog.) Physical Science	II	9.485
31	Mayank Singla	B.Sc. (Prog.) Physical Science	III	9.258
32	Jyoti Sharma	B.Sc. (Prog.) Life Science	I	9.045
33	Deepanshu Vats	B.Sc. (Prog.) Life Science	II	8.970
34	Alia Afreen	B.Sc. (Prog.) Life Science	III	8.652
35	Sachin Goyal	B. Com. (H)	I	8.676
36	Raghav Gupta	B. Com. (H)	II	8.514
37	Saurabh Mangla	B. Com. (H)	III	8.351

4.1.4 Scholarships and Awards

4.1.4.1 Best Student Silver Jubilee Award

An award of Rs. 10,000/- (Rupees Ten Thousand only) was instituted in 2016, to commemorate the Silver Jubilee year of the College, given to the Best All Round Student of the year. This prize is awarded to a final year student who is meritorious, actively participates in various committees of the college, contributes towards research, and wins prizes/ awards for the College. **Tarush Bajra B.Com (H) III Year** is selected for the Best Student Silver Jubilee Award for the academic session 2021-22.

4.1.4.2 Abhinav Halen Scholarship

It is a matter of great pride for the College that Mr Abhinav Halen, a student of the first batch of B.Sc. (H) Electronics at Acharya Narendra Dev College has instituted two annual Abhinav Halen Scholarships of Rs. 15,000/- (Rupees Fifteen Thousand only) each, for needy students of the Department of Electronics (academic session 2016-17 onwards). This year the scholarship is awarded to:

S. No.	Name of the Student	Course, Year
1	Sagar Bisht	B.Sc. (H) Electronics, III Year
2	Prashant Kumar	B.Sc. (H) Electronics, I Year

4.1.4.3 Krishna Toteja Memorial Scholarship

Professor Ravi Toteja, faculty member in Department of Zoology and officiating Principal of the college, has instituted this scholarship (academic session 2016-17 onwards) in the memory of his mother. One scholarship of Rs. 6,000/- (Rupees Six Thousand only) per year is awarded to a meritorious and needy girl student of B.Sc. (H) Zoology. This year the scholarship is awarded to **Sanskriti, B.Sc. (H) Zoology, II Year.**

4.1.4.4 Urmil Gupta Scholarship

Professor Seema Gupta, Department of Chemistry of the college has donated Rs. 1,00,000/- for the institution of a scholarship of Rs. 6,000/- (Rupees Six Thousand only) in her Mother-in-law's name. The Fund called 'Urmil Gupta Memorial Scholarship' has been created for this. The scholarship is to be awarded from the accrued annual interest. Students of B.Sc. (H) Chemistry with a low family income are eligible for the reward of this scholarship. This year the scholarship is awarded to **Nandkishor Ahirwar, B.Sc. (H) Chemistry, II Year.**

4.1.4.5 Asha Walia Memorial Scholarship

Professor Seema Gupta, Department of Chemistry of the college has donated Rs. 1,00,000/- for the institution of a scholarship of Rs. 6,000/- (Rupees Six Thousand only) in her Mother's name. The Fund called 'Asha Walia Memorial Scholarship' has been created for this. The scholarship is to be awarded from the accrued annual interest. Students of B.Sc. Life Science with a low family income are eligible for the reward of this scholarship. This year the scholarship is awarded to **Swati, B.Sc. (Prog.) Life Science, II Year.**

4.1.4.6 Smt. Snehlata Gupta Fellowship

Dr Manisha Jain, Associate Professor, Department of Chemistry of the college has donated Rs. 1,90,000/- for the institution of a scholarship of Rs. 5,000/- (Rupees Five Thousand only). The Fund called 'Smt. Snehlata Gupta Fellowship' has been created for this. The scholarship is to be awarded from the accrued annual interest. Need based student of B.Sc. (H) Chemistry with a low family income is eligible for the reward of this scholarship. This year the scholarship is awarded to **Kapil Kumar Rathore, B.Sc. (H) Chemistry, II Year.**

4.1.4.7 D. C. Arora Scholarship

This scholarship is awarded in two categories, needy and meritorious. Each of these categories comprises of 2 scholarships of Rs. 10,000/- (Rupees Ten Thousand only). This year the scholarships awarded in Meritorious category only. The proud recipients are:

S. No.	Name of the Student	Course, year
1	Devangana Sharma	B.Sc. (H) Botany, III Year
2	Jayant Wadhwa	B.Com (H), II Year

4.1.4.8 Dr Saumya Saxena Memorial Scholarship

Dr Saumya Saxena, our beloved colleague from Botany department passed away on March 23, 2017. In her memory, her husband Dr Harsh Kumar has instituted a fund which is being used to award a scholarship of Rs. 10,000/- (Rupees Ten Thousand only) to a meritorious and needy girl from B.Sc. (H) Botany. The proud recipient of this award is **Vridhi Singh, B.Sc. (H) Botany, II Year.**

4.1.4.9 श्रद्धांजलि: Dr Saumya Saxena Students Endowment Scholarship

The Alumni of B.Sc. (H) Botany has created a scholarship fund in honour of their beloved teacher Dr Saumya Saxena. This endowment scholarship has been created through voluntary contribution made by students whom Dr Saumya Saxena had taught during her career. The fund is called as Dr Saumya Saxena Students Endowment fund with name of the scholarship as Shradhanjali श्रद्धांजलि: Dr Saumya Saxena Students Endowment Scholarship". The interest earned is being used for awarding two scholarships worth Rs. 6,000/- (Rupees Six Thousand only) each every year for students of B.Sc. (H) Botany. The scholarships are awarded on need-cum-merit basis: one to the second year student (based on need and the first year performance) and one to the third year student (based on need and the second year performance). This year only one student is selected for the award. The proud recipient of the scholarship is **Jatin, B.Sc. (H) Botany, III Year.**

4.1.4.10 Ms Teena Gupta Memorial Scholarship

This scholarship was instituted in the year 2006-07 in the memory of Ms Teena Gupta, an alumna of the Department of Electronics from the college and faculty in the Department of Computer Science who passed away at an early age. There are six such scholarships worth Rs. 6,000/- (Rupees Six Thousand only) each and are awarded to needy cum deserving students of B.Sc. (H) Electronics and B.Sc. Physical Science with Computer Science. The awardees of the scholarship are:

S. No.	Name of the Student	Course, Year
1	Md. Mukhtar Ansari	B.Sc. (H) Electronics, III Year
2	Rohit Maurya	B.Sc. (H) Electronics, II Year
3	Chandan Kumar	B.Sc. (H) Electronics, I Year
4	Vishal Gupta	B.Sc. (H) Electronics, I Year
5	Devender	B.Sc. (Prog.) Physical Science (Computer Science), II Year
6	Amit Rathore	B.Sc. (Prog.) Physical Science (Computer Science), I Year

4.1.4.11 Sh. Sultan Chand Endowment Scholarship

This scholarship is awarded to a student of B.Com. (H) III Year who secures the second highest percentage of marks in the college in B.Com. (H) II Year University examination. The amount of scholarship is Rs. 3,500/- (Rupees Three Thousand Five Hundred only). This year the fellowship is awarded to **Tanya Gupta, B.Com. (H) III Year.**

4.1.4.12 Dr (Ms) Usha Aggarwal “Tejaswini” Scholarship

This scholarship is awarded to a student of B.Com. (H) II Year who secures highest percentage of marks in the college in B.Com (H) II Semester university examination. Amount of scholarship is Rs 3500/- (Rupees Three Thousand Five Hundred only). This year the fellowship is awarded to **Jayant Wadhwa, B.Com (H) II Year.**

4.1.4.13 Fellowships Received by ANDC Students from External Sources

4.1.4.13.1 Meritorious Students’ Award from Government of Delhi

The Directorate of Higher Education, Government of NCT of Delhi rewards the toppers from Delhi Government funded colleges of University of Delhi. The amount of this fellowship is Rs. 10,000/- (Rupees Ten Thousand only) and all ANDC students are eligible for this. This Year, the fellowship is awarded to the following nine students:

S. No.	Name of the student	Course, Year
1	Jayant Wadhwa	B. Com (H), I Year
2	Meghana	B.Sc. (H) Chemistry, I Year
3	Tanya Chopra	B.Sc. (H) Chemistry, I Year
4	Anushka Jain	B. Sc. (H) Computer Science, II Year
5	Priya Singh	B. Sc. (H) Computer Science, II Year
6	Rishi Sarbobhoum	B. Sc. (H) Computer Science, II Year
7	Sant Kumar	B. Sc. (H) Computer Science, II Year
8	Suruchi Verma	B. Sc. (H) Computer Science, II Year
9	Bindu	B. Sc. (H) Physics, III Year

4.1.4.13.2 Meritorious Students’ Award from University of Delhi

Faculty of Science, University of Delhi rewards the meritorious students who are pursuing science courses from colleges of University of Delhi. The amount of this award given is Rs. 3,000/- (Rupees Three Thousand only) which is to be used by the student for the purchase of books. This year, the award is given to the following seven students:

S. No.	Name of the student	Course, Year
1	Prince CP	B. Sc. (H) Physics, I Year
2	Amal Joshi	B. Sc. (H) Chemistry, I Year
3	Somsuvra Das	B. Sc. (H) Physics, III Year
4	Bindu	B. Sc. (H) Physics, III Year
5	Mohini Kumari	B. Sc. (H) Botany, III Year
6	Radhika Garg	B. Sc. (H) Zoology, III Year
7	Khushi Goyal	B. Sc. (H) Zoology, III Year

4.1.4.13.3 POSE Scholarship

This scholarship is given by Haryana State Council for Science, Innovation and Technology, DST, Government of Haryana. This scholarship contains an amount Rs. 10,000/- (Rupees Ten Thousand only). This year the fellowship is awarded to **Suman, B.Sc. (H) Chemistry, II Year**.

4.1.4.13.4 INSPIRE Scholarship

DST, Government of India gives INSPIRE scholarship of Rs. 80,000/- (Rupees Eighty Thousand only) to the meritorious students. This year, the scholarship is given to **Kartikey Tiwari, B.Sc. (Prog.) Physical Science (Computer Science), II Year**.

4.1.4.13.5 UP GOVERNMENT Scholarship

For securing rank in merit list, UP GOVERNMENT awards Rs. 21,000/- (Rupees Twenty Thousand Only). **Kartikey Tiwari, B.Sc. (Prog.) Physical Science (Computer Science), II Year** received this scholarship on December 27, 2021

4.1.5 Student Aid for Knowledge, Success, Honour and Motivation (SAKSHAM)

The college continues to offer a helping hand to needy and deserving students, in the form of financial aid through *SAKSHAM*. Under this scheme, Rs. 150/- is collected from students, besides monthly donations by faculty, non-teaching staff and well-wishers. After a rigorous evaluation of their needs, selected students are supported in the following categories:

1. Full fee waiver (Except Security Deposit)
2. A stipend of Rs. 1000/- per month for ten months
3. Stationery + photocopying upto Rs. 3000/- for the academic year
4. Book-bank aid (5 books for every grantee)

This year, the following students were supported in one or more of the above category:

4.1.5.1 Full fee waiver (Except Security Deposit)

S. No.	Name of the student	Course
1	Abhishek Kumar	B.Com (H), I Year
2	Abhishek Kumar	B.Sc.(H) Computer Science, II Year
3	Abhishek Kumar Prajapati	B.Sc. (Prog.) Physical Science (Electronics), I Year
4	Aditi Sharma	B.Sc. (Prog.) Life Science, II Year
5	Aditya Raj Sah	B.Sc. (H) Computer Science, II Year
6	Akanchha Kumari	B.Sc. (Prog.) Physical Science (Computer Science), II Year
7	Akansha Kumari	B.Sc.(H) Mathematics, II Year
8	Amal Joshy	B.Sc.(H) Chemistry, I Year
9	Amit Rathore	B.Sc. (Prog.) Physical Science (Computer Science), I Year
10	Anjali	B.Sc.(H) Chemistry, II Year

11	Anjali Bhadana	B.Sc.(H) Biomedical Science, III Year
12	Ankit	B.Sc. (Prog.) Physical Science (Electronics), I Year
13	Ayush Mishra	B.Sc. (H) Physics, II Year
14	BamarTagyung	B.Sc. (H) Biomedical Science, I Year
15	Bhavna	B.Sc. (H) Biomedical Science, II Year
16	Chetna Panchal	B.Sc. (Prog.) Physical Science (Computer Science), I Year
17	Devender Kumar	B.Sc. (Prog.) Physical Science (Computer Science), II Year
18	Divya	B.Sc. (Prog.) Physical Science (Computer Science), I Year
19	Divyam Singh	B.Sc.(H) Computer Science, II Year
20	Hemant Singh	B.Sc.(H) Maths, II Year
21	Himanshu	B.Sc. (Prog.) Physical Science (Chemistry), (Chem), I Year
22	Himanshu Rai	B.Sc.(H) Electronics, I Year
23	Hirday Sehgal	B.Sc.(H) Biomedical Science, II Year
24	Isha Das	B.Sc.(H) Maths, II Year
25	Jai Gautam	B.Sc. (Prog.) Physical Science (Chemistry), II Year
26	Kalyani Kumari	B.Sc.(H) Biomedical Science, II Year
27	Karamveer	B.Sc. (Prog.) Physical Science (Chemistry), I Year
28	Kashish	B.Sc. (Prog.) Physical Science (Chemistry), I Year
29	Khushi Rani	B.Sc.(H) Biomedical Science, I Year
30	Kirti	B.Sc. (Prog.) Physical Science (Electronics), II Year
31	Manju	B.Com (H), I Year
32	Manshi	B.Sc.(H) Zoology, II Year
33	Mansi Anand	B.Sc.(H) Biomedical Science, III Year
34	Monu	B.Sc.(H) Maths, I Year
35	Muskan Sarawagi	B.Sc. (Prog.) Physical Science (Chemistry), II Year
36	Neha	B.Sc. (Prog.) Physical Science (Chemistry), I Year
37	Nitin Sharma	B.Sc. (Prog.) Physical Science (Chemistry), II Year
38	Palak Sharma	B.Sc. (Prog.) Physical Science (Computer Science), II Year
39	Pankaj Sahu	B.Sc. (Prog.) Physical Science (Computer Science), II Year
40	Pawan	B.Sc. (Prog.) Physical Science (Computer Science), III Year
41	Pooja	B.Sc. (Prog.) Physical Science (Computer Science), I Year
42	Prabhat Kumar	B.Sc.(H) Chemistry, II Year
43	Prarit	B.Sc.(H) Maths, II Year
44	Prashant Verma	B.Sc.(H) Physics, II Year
45	Prayag Yadav	B.Sc. (Prog.) Physical Science (Chemistry), II Year
46	Preksha	B.Sc.(H) Biomedical Science, I Year
47	Prince	B.Sc.(H) Biomedical Science, I Year
48	Priya	B.Sc.(H) Maths, II Year
49	Priya Arora	B.Com (H), III Year
50	Priyanshu Sharma	B.Sc. (Prog.) Physical Science (Chemistry), II Year
51	Ram Lakhan	B.Sc.(H) Biomedical Science, II Year

52	Rashi	B.Sc. (Prog.) Physical Science (Computer Science), I Year
53	Rekha	B.Sc. (H) Botany, II Year
54	Rishita	B.Sc. (Prog.) Physical Science (Chemistry), I Year
55	Ritika Chandel	B.Sc. (H) Zoology, III Year
56	Rohit	B.Sc. (H) Maths, II Year
57	Sakshi Sharma	B.Sc. (H) Biomedical Science, III Year
58	Sakshi yadav	B.Sc. (H) Chemistry, II Year
59	Saloni Kashyap	B.Sc. (H) Chemistry, III Year
60	Sant Kumar	B.Sc. (H) Comp. Sc., III Year
61	ShishpalMeghwal	B.Sc. (H) Maths, II Year
62	Shivam Shukla	B.Sc. (H) Physics, I Year
63	Shiwani Kashyap	B.Sc. (H) Chemistry, III Year
64	Shruti Jha	B.Sc. (Prog.) Life Science, II Year
65	Shweta	B.Sc. (H) Chemistry, II Year
66	Sonam Pal	B.Sc. (Prog.) Physical Science (Chemistry), I Year
67	Sumit Kumar	B.Sc. (Prog.) Physical Science (Computer Science), III Year
68	Sunny Kumar	B.Sc. (Prog.) Physical Science (Chemistry), III Year
69	Sunny Tiwari	B.Sc. (H) Maths, III Year
70	Suraj Sengar	B.Sc. (Prog.) Physical Science (Chemistry), II Year
71	Surbhi Kumari	B.Sc. (H) Maths, II Year
72	Tripti	B.Sc. (H) Biomedical Science, II Year
73	Vishal Kashyap	B.Sc. (Prog.) Physical Science (Chemistry), II Year
74	Yashraj Aditya	B.Sc. (H) Botany, II Year

Book Bank Aid

S. No.	Name of the Student	Course
1	Anjali	B.Sc. (H) Chemistry, I Year
2	Prashant Verma	B.Sc. (H) Physics, I Year
3	Rashi	B.Sc. (Prog.) Physical Science (Computer Science), I Year

4.1.6 Co-curricular Activities

ANDC students are active in all spheres of college activities including research. They participate in various conferences, workshops, inter-college curricular and extra-curricular competitions etc. and attain positions at national and international platforms.

4.1.6.1 Awards Won by Students in Various Conferences/Competitions

Name of the student, Course	Details of the event
Anamika Binu B. Sc. (H) Biomedical Science, II Year	Won third prize in digital poster making competition organised by NSS, Hansraj, December 2021.
	Won first prize in poster making competition organised by Eco club DDUC college, November 01, 2021
	Won third prize in slogan writing competition at NSS Ramanujan college on October 31, 2021
	Won first prize in poster making competition at PGDAV college on October 11, 2021

Aastha Jaluthria B. Sc. (H) Biomedical Science, II Year	Secured 3 rd position in Essay Writing Competition topic 'Mahatma Gandhi and Science' organised by Gandhian Study Centre of Bhaskaracharya College of Applied Science, DU on March 06, 2021
Ramesh Niraula Tejaswini B. Sc. (H) Biomedical Science, II Year	First Runner-up of Bio-Entrepreneurship Competition held by Netaji Subhas University of Technology on January 07, 2022
Tanisha Sharma B.Sc. (H) Computer Science, I Year	Won first position in the Poetry competition organized by Tark on the theme of republic day, ANDC on January 26, 2022
	Won first position in poetry competition organized by Shaheed Rajguru College of Applied Science for Women on January 02, 2022
Prajwal Akash B.Sc. (H) Chemistry, III Year	Photographer for the "AbhivyaktiShrinkhla" organised by ANDC, DU on October 08, 2021
Dhaval Arora B.Com. (H), II Year	Won 2 nd position in Vegetable art competition at Shaheed Rajguru college of applied Science for Women held on September 30, 2021
Jayant Wadhwa B.Com. (H), II Year	Won 1 st prize in open Mic competition in Shyamlal College, University of Delhi held on April 21, 2022
Neerddhi Goswami B.Sc. (Prog.) Physical Science (Computer Science), III Year	Won second position in Telescope Quiz organized by SPIE, ANDC on February 20, 2022.
Kalpajit Roy B.Sc. (H) Physics, I Year Varnika Agarwal B.Sc. (H) Physics, II Year	One of the finalist team at international research competition, Phoenix Space Launchpad Challenge, organized by Phoenix Space education Ltd. where the team wrote a research proposal on "Power Production on Mars: Space-based Solar Power Satellite" and presented online in front of scientists on October 04, 2021

4.1.6.2 Training Programs/Internships Attended by the Students

Name of the student, Course	Details of the event
Ishita Belwal B.Sc. (H) Chemistry II Year	Joined a summer research fellowship program by Indian Academy of Science, Bengaluru and NCL, Pune during June 06-August 06, 2022
Devaditya Pushkar B. Sc. (Prog.) Physical Science (Computer Science), II Year	Joined 3-months internship at Solvelancer, June 08-September 03, 2021

4.1.6.3 Participation by Students in Various Conferences/Workshops

Name of the Student, Course	Details of the Event
Aastha Gupta Pallavi Saini B.Sc. (H) Biomedical Science, II Year	Attended one day Webinar on protein analysis organised by learn to upgrade on February 19, 2022
	Attended Workshop on Medical industry-growth, prospects and future: Indian scenario organized by Skill Lync on February 15, 2022
	Participated in Online 1.5 Hour Excel Training organised by BIZWIZ.CO.IN on August 15, 2021
	Completed the 2 hours Master Class on P2B#151 Google Colab Machine Learning App by Perfect Plan B E-Learning Private Limited on August 12, 2021

Aastha Gupta, Pallavi Saini B.Sc. (H) Biomedical Science, II Year	Completed Basic Molecular Biology Module 4: PCR and Real-Time PCR organised by CDC on January 31, 2022
	Completed Basic Molecular Biology Module 3: Nucleic Acid Extraction organised by CDC on January 30, 2022
	Completed Basic Molecular Biology Module 2: Laboratory Practice organised by CDC on January 27, 2022
	Completed Basic Molecular Biology Module 1: Basic Science organised by CDC on January 24, 2022
Aastha Gupta B.Sc. (H) Biomedical Science, II Year	Attended webinar on “Blood donation in India - a year into pandemic” organised by Khoon on the occasion of World Blood Donor Day on June 14, 2021
Yash Goel B.Sc. (H) Biomedical Science, II Year	Attended the “Graphic Designing Workshop” organised by Ramanujan College, University of Delhi on January 15, 2022

Bhupender B.Sc. (H) Biomedical Science, II Year	Attended A Two-Day International Online Symposium on “Reproductive Health and Physical Fitness” organised by Deen Dayal Upadhyaya College, University of Delhi from September 28-29, 2021
	Attended Live Online Sessions on Introduction to Yoga and Meditation organised by AyurYoga Life Institute from June 18-21, 2021
Anamika Binu B.Sc. (H) Biomedical Science, II Year	Participated in Microsphere: An International outreach program organised by Deen Dayal Upadhyay College, University of Delhi on September 17, 2021
	Completed one day skill development workshop on Microsoft Excel on August 25, 2021 organised by Atma Ram SanatanDharm College
	Participated in a webinar on “Protein structure and function-pentafunctional AROM complex” organised by Department of biochemistry, Deshbandhu College, University of Delhi on July 31, 2021
Dipankar Dev Rishi B.Sc. (H) Chemistry, I Year	Participated in CALCO-HOLICS : The Mathematics Quiz organised by Ramanujan College, University of Delhi on March 10, 2022
	Participated in Lecture II: Catalysis for sustainable chemistry (International Lecture Series) organised by Kirori Mal College, University of Delhi on January 28, 2022
Anuj Thakur Dipankar Dev Rishi B.Sc. (H) Chemistry, I Year	Passed Chem Collective virtual labs test organised by IIT Bombay
Anurag Bumrara Dipankar Dev Rishi B.Sc (H) Chemistry, I Year	Participated in Event Marketing Mafia organised by Ramanujan College, University of Delhi on April 11-12, 2022

Aranya Shukla B.Sc. (H) Chemistry, I Year	Participated in ABHIVYAKTI-Article Writing Competition of DHRUVA 2022, organized by IIM-Tiruchirappalli
	Participated in BLOG-THON conducted in E-Summit'22, organized by Entrepreneurship Cell, IIT BHU
	Participated in online People's Reflections Writing Competition Online in January, 2022 and April, 2022
Prabhat Kumar B.Sc. (H) Chemistry, II Year	Participated in Trademaster competition conducted by Techfest organised by IIT Bombay
	Participated in webinar on "IPR, Patent and Chemistry" organised by Miranda House, University of Delhi on August 11, 2021
	Participated in online international conference on "Emerging trends in chemical and applied Science for sustainable future" organised by Hansraj College, University of Delhi
	Participated in international lecture series entitled "Multifaceted Chemistry – An ever evolving domain of science" organised by Deshbandhu College, University of Delhi, 2021.
Krishna Agrawal B.Sc. (H) Chemistry, II Year	Participated in NIUS Exposure cum Enrichment Camp organised by Homi Bhabha Center For Science Education, TIFR from December 20-30, 2021
	Completed 5 tasks in #Young Warrior NXT Programme organised by UNICEF India on September 20, 2021
	Participated in "Yoga for unity and wellbeing – 100 days of yoga" programme organised by Ministry Of AYUSH from June 14-21, 2021
	Participated in "Yoga Appreciation Programme" organised by Ministry Of AYUSH on June 21, 2021
Taruna B.Sc. (H) Chemistry, II Year	Participated in <i>Aazadi ka Amrit Mahotsava – "Rashtragaan"</i> Initiative organised by Ministry of Culture on August 10, 2021
Bhanu Miglani Saumya Singh B.Sc. (H) Chemistry, II Year	Participated in webinar on "IPR, Patent and Chemistry" organised by Miranda House, University of Delhi on August 11, 2021
Gaurav Prajapati B.Sc. (H) Chemistry, II Year	Participated in 3 days programme on "The Fastrack Internship programme" organised by I Digitalpreneur Academy from October 10-13, 2021
	Participated in international lecture series "Lecture I: Biomolecular Chemistry" organised by Kirori mal College, University of Delhi on September 17, 2021
	Participated in international conference on "Recent trends in drug discovery and development" organised by Maitreyi College, University of Delhi on September 08, 2021
Aditi Kandari Gaurav Prajapati Krishna Agrawal Saumya Singh B.Sc. (H) Chemistry, II Year	Participated in Online Intercollegiate quiz on "Fundamentals of Chemistry" organised by Rajiv Gandhi College of Arts Commerce and Science, University of Mumbai on August 27, 2021

Meghna Bisht B.Sc. (H) Chemistry, II Year	Participated in NIUS Exposure cum Enrichment Camp organised by Homi Bhabha Center For Science Education, TIFR from December 20-30, 2021
	Worked as student coordinator in organizing online lecture series of Alumni in Department of Chemistry, Acharya Narendra Dev College, University of Delhi on October 16, 2021
Shweta B.Sc. (H) Chemistry, II Year	Participated and presented a poster in International Symposium on “Chemical Wisdom by Her” organised by Desh-bandhu College, University of Delhi on January 31, 2022
Siya Agarwal B.Sc. (H) Computer Science, I Year	Participated in Seminar on Employability skills for the future (Maitreyi College in collaboration with the ICT Academy) on September 18, 2021
Asadullah Muradi B.Sc. (H) Computer Science, I Year	“React Native” Mata Sundri College For Women, University of Delhi on September 01, 2021
Rajat Sharma B.Sc. (H) Computer Science, I Year	Participated in talk on Social Entrepreneurship and Economic Development, February 19, 2022 organized by Quantum school of business, Quantum University Roorkee
	Attended a webinar “Tuneable index/ back end of line platform for enhanced integrated photonics and advanced devices”, organised jointly by OSA and SPIE student chapter Manipal University on September 24, 2021
	Participated in 11 th <i>Bhartiya Chhatra Sansad</i> (online) organized by MIT school of Government Pune from September 23-28, 2021
	Participated in Tech. heritage, Poster Making Competition, Azadi ka Amrit Mahotsav organized by Department of Computer Science of Kalindi College, University of Delhi from September 19, 2021
	Participated in the “Yoga for Unity and Well-being” 100 days of yoga programme from March 14-June 21, 2021 organized by National Institute of Yoga, Ministry of Ayush, India
Aman Rajput Asadullah Muradi Raj Khatri Rajat Sharma Vishal Kumar Yadav B.Sc. (H) Computer Science, I Year	Participated in National Yoga Workshop by NSUT from June 14-21, 2021
	Attended ‘IP Awareness/Training program’ under National intellectual property awareness mission by government of India on January 19, 2022
Rajat Sharma Raj Khatri Asadullah Muradi B.Sc. (H) Computer Science, I Year	Attended Graphic Designing Workshop by Ramanujan College, University of Delhi on January 15, 2022
	Attended ‘Website Designing Using WordPress Workshop’ (AI4Indian) organised by BIT Meerut and University of Delhi on June 13, 2021

<p>Tanisha Sharma</p> <p>B.Sc. (H) Computer Science, I Year</p>	<p>Participated in poetry competition on September 30, 2021 organized by Rajdhani College on theme GANDHI@2k21</p>
	<p>Participated in debate competition organized by LAFZ (National Level) on August 15, 2021</p>
	<p>How to Crack Virtual Placement Drives, Shivaji College, University of Delhi on July 01, 2021</p>
<p>Akanchha Kumari</p> <p>B.Sc. (Prog.) Physical Science (Computer Science), II Year</p>	<p>E-Poster Making Competition on the theme “हरति दवाली – स्वस्थ दवाली”, November 01, 2021 organised by Eco Club of Deen Dyal Upadhyay College</p>
<p>Sakshi Garg</p> <p>B.Sc. (Prog.) Physical Science (Computer Science), II Year</p>	<p>Attended Summer School of Optics and Photonics, IIT Delhi from June 06-24, 2022</p>
	<p>Attended Comprehensive Business Training Program (Ecell NIT Hamirpur), September 25-November 06, 2021</p>
	<p>E-Yantra Online Certified Embedded Systems and Robotics Course, IIT Bombay from May 01-June 10, 2021</p>
	<p>E-yantra first round qualifier, Robotics competition organized by IIT Bombay, eYRC 2019-2020</p>
<p>Kapil Sharma</p> <p>B.Sc. (Prog.) Life Science, I Year</p>	<p>Attended International Seminar on Revisiting the ideas of India from Swaraj to New India organised by Department of Political science, University of Delhi held on May 19-21, 2022</p>
	<p>Attended webinar “Contemporary advances in generic medicines Govt of Maharashtra Elphinstone college, Department of Biotechnology on February 27, 2021</p>
	<p>Participated in Workshop on Robotics organised by Atma Ram Sanatan Dharma College, University of Delhi held on February 17-18, 2022</p>
<p>Bindu</p> <p>B. Sc. (H) Physics, III Year</p>	<p>Participated in a workshop for undergraduate science students on “Flavor of Research, Investigative Projects in Multidisciplinary Contexts” organized by D S Kothari Center for research and innovation in science education, Miranda House, University of Delhi from June 15-July 31, 2021</p>
<p>Bindu</p> <p>Rakhshanda Naureen Ansari</p> <p>B.Sc. (H) Physics, III Year</p>	<p>Poster presented on December 03-05, 2021 in the 5th International Conference on Innovative Approaches in Applied Science and Technologies on “Space Based Solar Power Satellite Models for Power Production on Mars” organized by Babasaheb Bhim Rao Ambedkar University, Lucknow</p>
<p>Kalpajit Roy</p> <p>B.Sc. (H) Physics, II Year</p>	<p>Participated in Online National Science Day Programme by Inter University Accelerator Centre, New Delhi on February 28, 2022</p>
<p>Soumya Srivastav</p> <p>B. Sc. (H) Physics, I Year</p>	<p>Resource person at a 6 day boot camp entitled “Virtual Lab Development 1.0”, organized by Acharya Narendra Dev College, University of Delhi from January 17-22, 2022</p>
<p>Ayush Mishra</p> <p>Vaibhav Thapliyal</p> <p>B. Sc. (H) Physics, III Year</p>	<p>Resource person at a boot camp entitled “Virtual Lab Development 2.0”, organized by Acharya Narendra Dev College, University of Delhi from June 27-July 01, 2022</p>

Neha Khanra	Attended “Indian Young Physicists League (IYPL talks’ 22)” under the association of Indian Physics Students (AIPS) on April 23-24, 2022
Nisha Khanra	Attended “Full stack web development using MERN” organized by Brain Mentors from March 05-09, 2022
B.Sc. (H) Physics, I Year	Participated in a national level inter-college science quiz organized by IISER Pune on February 20, 2022

4.2 Class Representatives

Course and Year	Class Representative
B. Sc. (H) Biomedical Science, I Year	Hirithik Singh Rathore
B. Sc. (H) Biomedical Science, II Year	Anirudh Kumar
B. Sc. (H) Biomedical Science, III Year	Bisakha Das
B. Sc. (H) Botany, I Year	Mitali Saini
B. Sc. (H) Botany, II Year	Mridula
B. Sc. (H) Botany, III Year	Mohini
B. Sc. (H) Chemistry, I Year	Jyoti Mishra
B. Sc. (H) Chemistry, II Year	Dipankar
B. Sc. (H) Chemistry, III Year	Khushi Meena
B. Sc. (H) Computer Science, I Year	Kanak Megha
B. Sc. (H) Computer Science, II Year	Pratham
B. Sc. (H) Computer Science, III Year	Sant Kumar
B. Com. (H), I Year (Section A)	Uttam Srivastava
B. Com. (H), I Year (Section B)	Rishabh Jain
B. Com. (H), II Year (Section A)	Shivam Kumar
B. Com. (H), II Year (Section B)	Akshat Mishra
B. Com. (H), III Year (Section A)	Ritik Gupta
B. Com. (H), III Year (Section B)	Pradeep
B. Sc. (H) Electronics, I Year	Naman Sirohi
B. Sc. (H) Electronics, II Year	Sanju Singha
B. Sc. (H) Electronics, III Year	Shruti Yadav
B. Sc. (H) Mathematics, I Year	Radhika
B. Sc. (H) Mathematics, II Year	Isha Das
B. Sc. (H) Mathematics, III Year	Esha Arya
B. Sc. (H) Physics, I Year	Shivam Shukla
B. Sc. (H) Physics, II Year	Vaibhav Thapliyal
B. Sc. (H) Physics, III Year	Bindu Rajput
B. Sc. (H) Zoology, I Year	Jayanta Mondal
B. Sc. (H) Zoology, II Year	Manisha
B. Sc. (H) Zoology, III Year	Sahil Kaushik

B.Sc. (Prog.) Physical Science (Electronics), I Year	Esha
B.Sc. (Prog.) Physical Science (Electronics), II Year	Anuj
B.Sc. (Prog.) Physical Science (Electronics), III Year	Govinda Verma
B.Sc. (Prog.) Physical Science (Chemistry), I Year	Shivam Kumar
B.Sc. (Prog.) Physical Science (Chemistry), II Year	Suraj sen Sagar
B.Sc. (Prog.) Physical Science (Chemistry), III Year	Sunny Kumar
B.Sc. (Prog.) Physical Science (Computer Science), I Year	AnshNimker
B.Sc. (Prog.) Physical Science (Computer Science), II Year	Kartikey Tiwari
B.Sc. (Prog.) Physical Science (Computer Science), III Year	Vivek Bhardwaj
B. Sc. (Prog.) Life Science, I Year	Ishika
B. Sc. (Prog.) Life Science, II Year	Sandeep
B. Sc. (Prog.) Life Science, III Year	Ankush

4.3 Result Analysis

University Guidelines

The examination scheme of University of Delhi is as follows:

Computation of Semester Grade Point Average (SGPA) and Cumulative Grade Point Average (CGPA):

1. The SGPA is the ratio of sum of the product of the number of credits with the grade points scored by a student in all the courses taken by a student and the sum of the number of credits of all the courses undergone by a student i.e. $SGPA (S_i) = \Sigma(C_i * G_i) / \Sigma C_i$ where C_i is the number of credits of the i th course and G_i is the grade point scored by the student in the i th course.

2. The CGPA is also calculated in the same manner taking into account all the courses undergone by a student over all the semesters of a programme, i.e. $CGPA = \Sigma(C_i * S_i) / \Sigma C_i$ where S_i is the SGPA of the i th semester and C_i is the total number of credits in that semester.

3. The SGPA and CGPA shall be rounded off to 2 decimal points and reported in the transcripts.

The University of Delhi follows a 10-point grading system with the following letter grades as given below:

Table 1: Grades and Grade Points

Grade	Grade Point
O (Outstanding)	10
A+ (Excellent)	9
A (Very Good)	8
B+ (Good)	7
B (Above Average)	6
C (Average)	5
P (Pass)	4
F (Fail)	0
Ab (Absent)	0

College Performance

	I Year	II Year	III Year
No of students appeared	660	559	700
No of students passed (including ER)	653	553	699
Pass Percentage	98.94	98.93	99.86
No of students passed (excluding ER)	627	539	689
Pass Percentage	95.00	96.42	98.43

Result Analysis Semester-wise CBCS: Semester-I (2020-2021)

Department-wise percentage of Students obtaining the desired SGPA (CBCS I Semester, 2020-2021)

Dept	BMS	Botany	Chem	Comm	CS	Elect	Math	Phys	Zool	PS	LS
SGPA											
9-10	4.25	17.77	51.06	54.63	46.3	26.08	74.19	30.43	27.27	16.95	14.89
8-9	55.31	46.66	34.04	38.88	38.89	36.95	20.97	47.82	47.72	56.78	57.44
7-8	34.04	22.22	4.25	4.62	14.81	28.26	1.61	17.39	9.09	19.49	19.14
6-7	4.25	8.88	0	0	0	2.17	0	2.17	6.81	5.08	4.25

Department-wise percentage of Students obtaining the desired SGPA (CBCS II Semester, 2020-2021)

Dept	BMS	Botany	Chem	Comm	CS	Elect	Math	Phys	Zool	PS	LS
SGPA											
9-10	36.17	24.45	65.95	90.74	83.3	36.95	80.65	30.43	59.09	53.39	46.8
8-9	44.68	37.78	19.15	4.62	14.8	39.13	16.13	45.65	15.90	19.49	36.17
7-8	10.63	20	2.13	1.85	1.85	15.21	3.22	10.86	6.81	15.25	6.38
6-7	8.51	8.89	2.13	0.92	0	2.17	0	6.52	4.54	7.62	6.38

Department-wise Percentage of Students obtaining the desired CGPA (CBCS I year, 2020-2021)

Dept	BMS	Botany	Chem	Comm	CS	Elect	Math	Phys	Zool	PS	LS
CGPA											
9-10	4.25	17.78	60.5	59.81	51.9	21.73	58.06	19.56	34.09	18.64	8.51
8-9	70.21	44.44	30.23	35.51	42.6	47.82	33.87	56.52	38.63	45.76	63.83
7-8	17.02	20	6.9	1.87	5.56	21.73	4.83	15.21	11.36	22.03	17.02
6-7	6.38	8.9	0	0.93	0	2.17	3.22	2.17	4.54	7.62	6.38

Department-wise percentage of Students obtaining the desired SGPA (CBCS III Semester, 2020-2021)

Dept	BMS	Botany	Chem	Comm	CS	Elect	Math	Phys	Zool	PS	LS
SGPA											
9-10	22.5	31.81	43.24	11.7	66.67	30.95	23.64	17.5	24.32	58.33	6.06
8-9	52.5	5	45.94	68.1	29.41	59.52	58.18	40	56.75	30.56	81.81
7-8	17.5	9.1	8.11	18.1	1.961	7.14	14.55	22.5	18.91	8.33	12.12
6-7	2.5	4.54	2.7	2.12	0	0	1.81	10	0	0.92	0

Department-wise percentage of Students obtaining the desired SGPA (CBCS IV Semester, 2020-2021)

Dept	BMS	Botany	Chem	Comm	CS	Elect	Math	Phys	Zool	PS	LS
SGPA											
9-10	52.5	77.27	43.24	53.2	41.18	21.42	43.64	30	56.75	37.96	57.57
8-9	27.5	13.63	43.24	35.1	25.49	35.71	32.73	32.5	21.62	37.96	21.21
7-8	7.5	0	2.7	9.57	25.49	23.80	18.18	20	16.21	11.11	15.15
6-7	0	4.54	5.4	0	5.882	14.28	0	7.5	5.40	9.25	6.06

Department-wise Percentage of Students obtaining the desired CGPA (CBCS II year, 2020-2021)

Dept	BMS	Botany	Chem	Comm	CS	Elect	Math	Phys	Zool	PS	LS
CGPA											
9-10	2.5	27.27	24.32	4.3	47.06	11.90	27.27	17.5	40.54	44.44	6.06

8-9	67.5	45.45	45.94	51.61	39.22	59.52	50.91	40	43.24	34.25	48.48
7-8	12.5	13.64	21.62	35.48	11.76	21.42	18.18	25	13.51	16.66	33.33
6-7	10	9.09	5.40	8.6	0	4.761	0	7.5	2.70	2.77	9.09

Department-wise percentage of Students obtaining the desired SGPA (CBCS V Semester, 2020-2021)

Dept	BMS	Botany	Chem	Comm	CS	Elect	Math	Phys	Zool	PS	LS
SGPA											
9-10	35.55	32.83	33.33	47.25	34.69	27.27	88.46	60.71	33.33	49.24	19.23
8-9	48.9	46.27	45.23	45.05	44.9	43.18	11.54	28.57	55.55	37.88	56.41
7-8	6.7	13.43	14.28	4.39	12.24	20.45	0	5.35	8.88	10.61	20.51
6-7	4.5	5.97	4.76	3.29	2.041	6.81	0	1.78	0	2.27	2.56

Department-wise percentage of Students obtaining the desired SGPA (CBCS VI Semester, 2020-2021)

Dept	BMS	Botany	Chem	Comm	CS	Elect	Math	Phys	Zool	PS	LS
SGPA											
9-10	24.44	16.41	33.33	43.96	42.86	36.36	98.08	42.86	33.33	34.85	17.94
8-9	48.88	61.19	47.61	50.55	44.9	59.09	1.92	41.07	57.77	53.79	61.53
7-8	17.77	20.89	19.04	4.39	6.122	2.27	0	8.92	4.44	9.091	16.66
6-7	6.67	0	0	1.09	0	2.27	0	0	2.22	1.515	2.56

Department-wise Percentage of Students obtaining the desired CGPA (CBCS III year, 2020-2021)

Dept	BMS	Botany	Chem	Comm	CS	Elect	Math	Phys	Zool	PS	LS
CGPA											
9-10	8.89	1.49	4.76	0	32.65	31.81	94.23	51.79	24.44	40.909	1.28
8-9	37.78	31.34	54.76	16.48	48.98	50	5.76	35.71	66.66	47.727	23.07
7-8	31.12	43.28	28.57	68.13	6.122	13.63	0	5.35	4.44	10.606	33.33
6-7	11.12	17.91	11.9	14.28	10.2	2.27	0	1.78	2.22	0.7576	33.33



**ACHARYA
NARENDRA
DEV COLLEGE**
UNIVERSITY OF DELHI

ACHIEVEMENTS OF FACULTY

Annual Report 2022

5



www.andcollege.du.ac.in/

5 ACHIEVEMENTS OF FACULTY

5.1 ‘निष्ठा’ ANDC Service Award

College instituted the निष्ठा ANDC Service Award in 2017-18 to felicitate the college employees for completing given years of service. Award has been constituted for employees that include teaching staff and non-teaching staff working in substantive capacity and Principal rendering given years of regular service to the college. Teaching and non-teaching staff completing 25 years of regular service and Principal completing 10 years of service at Acharya Narendra Dev College, University of Delhi shall be eligible for this award. It will be a commemorative award consisting of a specially designed plaque, shawl and a certificate. Award shall be given on Annual Day celebrations of the college every year.

In the year 2022, following employees will be the recipient of निष्ठा ANDC Service Award

Name of the employee	Department	Date of joining on permanent basis	No. of years of service as on December 31, 2021
Prof. Sharanjit Kaur	Computer Science	July 16, 1996	25 Years, 5 Months
Dr Surinder Kaur	Commerce	August 29, 1996	25 Years, 4 Months
Mr Sanjay Vohra	Instructor/Placement Officer	August 30, 1996	25 Years, 4 Months

5.2 Achievements of Prof. Ravi Toteja, Officiating Principal

Post 2018, the college is headed by Prof. Ravi Toteja and his passion for Undergraduate research and social inclusivity resulted in college getting the STAR STATUS under DBT Star College Scheme.

Under his able guidance the College also mentored one rural College for applying Star College Scheme to DBT. In addition, the College also got associated with flagship schemes like *Paramarsh* of UGC and *Unnat Bharat Abhiyaan* of Govt. of India. Under UBA, ANDC took care of the rural areas like Khanpur, Govindpuri Slums, Okhla Industrial Area, PulPehlad and Tajpur Pahari, Badarpur. Under *Paramarsh* scheme, ANDC mentored following colleges: A.K.P (PG) College, Dr Nobin Bordoloi College, Manyawar Kanshiram Government Degree College, Ghaziabad, Manyawar Kanshiram Government Degree College, Aligarh, Holy Family College of Nursing and Swami Shraddhanand College.

Prof. Toteja took initiative to upgrade College's **website** with the collective efforts of the IT Committee headed by Prof. Seema Makhija. New website is user friendly, bilingual and all the information can be accessed from the site. Link for the website is: <https://www.andcollege.du.ac.in/>

Under his leadership, this year the College signed several **Memorandum of Understandings (MoU)** with National and International institutes like THSTI, SOL, NII and Auburn University Montgomery,

He has been instrumental in successful creation of an online platform- **Virtual Labs** for performing experiments remotely. In virtual labs one can do simulation of experiments. Currently there are simulators under Physical Science, Biological Science, Chemical Science and Computer Science domain. Virtual lab can be accessed through the following link <https://www.vlab.andcollege.du.ac.in>

Under his able guidance, the college established a **Mushroom Research and Skill Development Centre (MRSDC)**. The centre functions as a research and development facility in the field of Microbiology specializing in mushrooms and the enhancement of mushroom cultivation skills amongst the students.

Under the mentorship of Prof. Toteja, ANDC also established a **Laboratory on Zebra Fish Culture**. ANDC is the second college in the University of Delhi to establish this type of facility. The College has also got registered with the Institutional Animal Ethical Committee.

Another milestone achieved under his leadership is the starting of **Acharya Narendra Dev Kaushal Kendra, Skill Hub @ ANDC**. Under this, the College offered two courses:

- 400 hr course on Web Developer and
- 240 hr course on Jam. Jelly and Ketchup processing technician

This year, under his leadership college organized two online International Conferences:

- **6th Annual International E-Conference of Indian Network for Soil Contamination Research** on “Microbes in Sustainable Development” in association with Deen Dayal Upadhyaya College (DU), Gargi College (DU), Kirori Mal College (DU), PG Department of Zoology, Magadh University (MU), Maitreyi College (DU), Ramjas College (DU), Sri Venkateswara College (DU), Sri Guru Tegh Bahadur Khalsa College (DU), C.M.P. College (AU), PhiXgen Pvt. Ltd., Gurugram and College of Commerce, Arts and Science, Patna from November 15-18, 2021.
- **International E-Conference** titled “Mitigating Contemporary Environmental Issues by Sustainable Approaches (ICMCESA – 2022) from February 22-28, 2022.

Prof. Toteja took initiative for school students also by initiating the scheme of *avant-garde* research projects in which the college will provide funding to selected projects to promote science among the school students. Outreach program like “MICROSPHERE 2021”, Science ADDA and ECOVILLE were also organized this year under his leadership.

He has been Patron of various seminars, workshops and webinars conducted under DBT Star College scheme, NSS, IQAC and other societies of the College.

He is chairperson of Institutional Biosafety Committee, Reviewer for Journals, Coordinator of DBT Star College and has published research articles in peer-reviewed journals and presented various research papers at National and International conferences. At present he is supervisor of two Ph.D. Students and has guided several Post-graduate students for their dissertations.

He has co-authored book entitled **Textbook of Immunology**, Wiley Publishers, ISBN 9789390455607.

He was Session CHAIR in 6th Annual International Conference of INSCR on “MICROBES IN SUSTAINABLE DEVELOPMENT” organized in association with the Department of Zoology (DU), Acharya Narendra Dev College (DU), DeenDayal Upadhyaya College (DU), Gargi College (DU), Kirori Mal College (DU), PG Department of Zoology (MU), Maitreyi College (DU), Ramjas College (DU), Sri Venkateswara College (DU), C.M.P. College (AU), SGTB Khalsa College (DU), COCAS (PU) & PhiXgen Pvt. Ltd., Gurugram from November 15-18, 2021. He was Session chair in the Three day International Conference on Infections and Immunity held from October 08-10, 2021 in Daulat Ram College, University of Delhi.

Contribution to NEP: Convenor of syllabus drafting committee as per UGCF 2022 based on NEP 2020 guidelines for B.Sc. (H) Zoology Paper DSC II: Cell Biology

In addition, he is Co-PI of DST SERB Research Project titled ‘DNA Barcoding for ciliate species identification of Delhi, India’.

5.3 Contribution of Faculty to School/College Education

5.3.1 Books/Chapters (in Books) Published

Faculty	Title	Publication	Year
Prof. Urmi Bajpai (Biomedical Science)	Bacteriophages in the Treatment of Biofilms	Bacteriophages: Interaction, Diversity and Applications, Nova Science Publishers, Inc.415 Oser Avenue, Suite NHauppauge, NY 11788 USA. ISBN: 978-1-68507-860-7	2022
Prof. Gagan Dhawan (Biomedical Science)	Understanding the pharmacology and pharmacotherapeutics for infectious diseases	Nanotechnology for Infectious Diseases (Springer-Nature Publication, Singapore). ISBN: 978-981-16-9189-8	2022
Dr Ritu Khosla (Biomedical Science)	Concepts in Environmental Studies	IK International Publishing House Pvt Ltd. ISBN: 9789390620456	2021
Dr Anita Narang Dr Manoj Kumar Singh Dr Sumit Sahni (Botany)	Impact of Climate Change on Functional AM Fungi in Rhizosphere	Climate Change and the Microbiome, Sustenance of the Ecosphere; Vol. 63; Ed. D.K. Choudhary, Arti Mishra, Ajit Verma; Publ: Springer; p-397-418	2021
	Production of liquid Bio-fuels from Lignocellulosic Biomass	Energy: Crisis, Challenges and Solutions; Ed. Pardeep Singh, Suruchi Singh, Gaurav Kumar, Pooja Baweja; Publ: John Wiley & Sons Ltd.; p-208-230	2021
	Sustainable Solution for Future Energy Challenges Through Microbes	Energy: Crisis, Challenges and Solutions; Ed. Pardeep Singh, Suruchi Singh, Gaurav Kumar, Pooja Baweja; Publ: John Wiley & Sons Ltd.;p-231-249	2021
Dr Sumit Sahni (Botany)	Facets of AM Fungi in Sequestering Soil Carbon and Improving Soil Health. In Fungal diversity, ecology and control management	Springer, Singapore; pp. 327-344	2022
Dr Sandeep Kumar Goel (Commerce)	BCOE-143: Fundamentals of Financial Management Block 2: Investment Decisions Unit-5: Capital Budgeting – An Introduction Unit-6: Techniques of Capital Budgeting – I Unit-7: Techniques of Capital Budgeting – II Unit-8: Capital Budgeting under Risk and Uncertainty	School of Management Studies, Indira Gandhi National Open University, Maidan Garhi, New Delhi. ISBN:978-93-5568-352-6	2022

Prof. Sunita Hooda (Chemistry)	Metal-Organic Frameworks (MOFs) as Versatile Detoxifiers for Chemical Warfare Agents (CWAs)	Chemical Warfare Agents, Springer, Chapter 20, In Press, Dec. 2021	2021
	Characterization of Mesoporous Materials	Advanced Functional Porous Materials, Springer, Chap. 6, 2021, Pages 175-204, e Book ISBN 978-3-030-85397-6, Print. ISBN: 978-3-030-85396-9	2021
Prof. Dinesh Arya (Chemistry)	New Horizons in Life Science	Biological and Physical Applications of Silver Nanoparticles, Vital Biotech Publication 772, Basant Vihar, Kota, Rajasthan-324009 India, 2022. ISBN: 978-93-92953-00-2	2022
	The Impact of Climate Change on human health in India: An Overview	Vital Biotech Publication 772, Basant Vihar, Koa, Rajasthan-324009 India, 2022. ISBN: 978-93-92953-00-2	2022
Prof. Pankaj Khanna (Chemistry)	Nanocatalysis for Reduction/Hydrogenation Reactions	Advanced Nanocatalysis for Organic Synthesis and Electroanalysis (2022) 1: 96-113. https://doi.org/10.2174/9789815040166122010008	2022
	Graphene Based Nanomaterials as Catalyst in Reduction Reactions	Graphene-Based Nanomaterial Catalysis (2022) 1: 130-151. https://doi.org/10.2174/9789815040494122010010	2022
Ms Bhawna Kaushik (Chemistry)	Nanostructured Inorganic-organic silica as green material for sustainable development of catalysts	Applications of Advanced Green Materials, Elsevier	2021
Ms Sangeeta Relan Dr Shalu Mahajan (Commerce)	Book Review on "Covid Reset"	Business Analyst, SRCC Vol. 42(1) ISSN 0973-211X	2021
Prof. Amit Garg (Electronics)	Editor: Digital Electronics,	Khanna Publishers, 2022, ISBN: 978-93-92549-14-4	2022
Dr Joita Dhar Rakshit (English)	Criticism of the British Raj in the Writings of Nineteenth Century British Women Travelers to India." Travel Writing: Critical Explorations, edited by Sarita Jain and Sarita Chanwaria. pp. 98-108.	Authors Press, New Delhi	2021
Ms Anupama Rastogi (Mathematics)	Wealth Creation and Expected Pension in National Pension Scheme	Research Analog, ISBN:978-81-954010-6-2	2021

Dr Mamta Bhatia (Physics)	Women in business and entrepreneurial roles: Get smarter with STEM	Routledge, Taylor and Francis group, pg.72-83. ISBN: 978-1-003-16078-6, 2021	2021
	Smart economics led by gender equality	Routledge Book Series, , Taylor and Francis group, pg.29-37, ISBN: 978-1-003-16078-6, 2021	2021
Prof. Arijit Chowdhuri (Physics)	CdS-SnO ₂ Nanocomposite Sensor for Room Temperature Detection of NO ₂ Gas	Suryadevara, N.K., George, B., Jayasundera, K.P., Roy, J.K., Mukhopadhyay, S.C. (eds) Sensing Technology. Lecture Notes in Electrical Engineering, vol. 886. (2022). Springer, Cham. https://doi.org/10.1007/978-3-030-98886-9_22	2022
Dr Rakesh Kumar Sonker (Physics)	Recent Developments on the Properties of Chalcogenide Thin Films	Intech Open	2022
	Current Development and Challenges in Textile-Based Flexible Supercapacitors	CRC Press	2022
	Experimental and Characterization Techniques	CRC Press	2021
Prof. Sarita Kumar (Zoology)	Illustrated Biology – Textbook for Class XI	Sultan Chand & Sons (P) Ltd., New Delhi. ISBN: 978-93-90851-70-6	2022
	TestFit – Biology	Sultan Chand & Sons (P) Ltd., New Delhi. ISBN: 978-93-90851-09-6	2022
	Characterization of mesoporous materials.	Advanced Functional Porous Materials: From Macro to Nano Scale Lengths. Editors: Uthaman, A., Thomas, S., Li, T., Maria, H. (Eds.), pp: 175-204, Springer International Publishing. ISBN: 978-3-030-85396-9. DOI: 10.1007/978-3-030-85397-6	2021
Prof. Ravi Toteja Prof. Seema Makhija (Zoology)	Textbook of Immunology	Wiley Publishers, ISBN: 978-93-9045-5607	2021

5.3.2 Educational e-content Uploaded on the University of Delhi/Other Websites

Faculty	e-Content
Dr Pooja Bhagat (Chemistry)	Qualitative Analysis of Unknown Organic Compound (Phenol), (Reviewer) of 1 module, 4 Quadrants of UG level as per CBCS sponsored by GAD-TLC of MHRD under the PMMMNMTT scheme 2021
Prof. Rashmi Thukral (Chemistry)	Developed Teacher's e-Kit (in four quadrant format) in Chemistry at GAD-TLC of MHRD
Dr Manisha Jain (Chemistry)	Developed Virtual Lab on Redox titrations hosted on V-lab@ ANDC https://www.vlab.andcollege.du.ac.in/chSc/titration/redox-titration.html Prepared a video lecture on 'Study of pH dependence of UV- Vis spectra of aqueous potassium dichromate solution' which is uploaded on YouTube (October 2020) https://youtu.be/XCf6lZq4XEE Developed a Demonstration Video for Undergraduate Chemistry Students on 'Preparation of Copper(II) sulphate monohydrate' which is uploaded on YouTube (June 2020). https://youtu.be/TWYu4d6-xj8
Dr Kavita Mittal (Chemistry)	Developed One Practical Module of Teacher's e-Kit (e-content in Four Quadrants Format) in Chemistry, Guru Angad Dev-TLC of MHRD under the PMMMNMTT scheme in August 2021.
Prof. Arijit Chowdhuri (Physics)	Cathode Ray Oscilloscopes – I : https://www.youtube.com/watch?v=k-Ko81VrkJVY&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel Cathode Ray Oscilloscopes – II : https://www.youtube.com/watch?v=c77Zph_Yg6k&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=3 Insight into Engineering: https://www.youtube.com/watch?v=YaBwJzl-2wpI&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=3 Digital Systems – Logic Gates: https://www.youtube.com/watch?v=NlZifixSo&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=4 Digital Systems – Gates and applications – I: https://www.youtube.com/watch?v=ZrLEe3m7sKg&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=5 Digital Systems – Gates and applications – II: https://www.youtube.com/watch?v=qbwfZ5-Ir5I&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=6 Energy Conservation and Harvesting – I: https://www.youtube.com/watch?v=U0yvGlyZY5w&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=7 Energy Conservation and Harvesting – II: https://www.youtube.com/watch?v=3VeE-Oxr4vE&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=8 Wz Multiplexers – I: https://www.youtube.com/watch?v=k_W2Ff-cz86E&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=9 Multiplexers – II: https://www.youtube.com/watch?v=uhCui6hb-9BA&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=10 National Technology Day: https://www.youtube.com/watch?v=lQ3FdGsrItA&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=11 Flip-Flops-I: https://www.youtube.com/watch?v=UZI2HJMf-w&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=12

Dr V Bhasker Raj (Physics)	<p>Solve 1-D heat equation (PDE) using finite difference and Crank Nicolson method in SCILAB (February 15, 2022) https://www.youtube.com/watch?v=d_aCYcaGMPY</p> <p>Solve boundary value problems (linear differential equations) using Shooting method in SCILAB (January 24, 2022) https://www.youtube.com/watch?v=oEJe4MYyU2U</p> <p>Solve ODE (Dirichlet and mixed boundary) using Finite difference method in SCILAB (January 16, 2022) https://www.youtube.com/watch?v=Z2_UgvFAWxw&t=117s</p> <p>Solve ODE (1st and 2nd order) using Euler's & modified Euler's method in SCILAB (December 22, 2021) https://www.youtube.com/watch?v=A_9Wf0S-H5U&t=1s</p> <p>Solve system of linear equations using Gauss Elimination method in SCILAB (October 11, 2021) https://www.youtube.com/watch?v=qH1YhJjo1Ck&t=2s</p> <p>Solve a system of linear equations using Gauss Seidel method in SCILAB (October 04, 2021) https://www.youtube.com/watch?v=dMMMyphNLk4M</p> <p>Numerical Integration using Trapezoidal & Simpson's rule (1/3 and 3/8) in SCILAB (September 24, 2021) https://www.youtube.com/watch?v=bHPqzurml7w&t=1s</p> <p>Interpolation using Newton's Forward and Backward difference formula in SCILAB (September 18, 2021) https://www.youtube.com/watch?v=1B8C9DZic9U</p>
Dr V Bhasker Raj (Physics)	<p>Introduction to SCILAB for beginners (part-2) (September 5, 2021) https://www.youtube.com/watch?v=CKdaC6BmiIM&t=7s</p> <p>Introduction to SCILAB for beginners (part-1) (August 30, 2021) https://www.youtube.com/watch?v=bHVOPECO8-o&t=5s</p> <p>Molecular Dynamics simulation (NVT) (full code in SCILAB) via Lennard Jones potential: Part-2 (August 15, 2021) https://www.youtube.com/watch?v=L4eJei4JsVU</p> <p>Molecular Dynamics simulation (full code in SCILAB) via Lennard Jones potential: Part-1 (June 27, 2021) https://www.youtube.com/watch?v=qhagrbwP84E&t=105s</p>

5.3.3 Enriching School/College Education

Faculty Involved (Department)	Contribution	Duration
Prof. Urmi Bajpai Prof. Gagan Dhawan Dr Sunita Jetly Dr Archana Pandey Dr Rajesh Chaudhary Dr Satendra Singh Dr Rimpay Kaur Chowhan Dr Ritu Khosla (Biomedical Science)	Member of syllabus drafting committee as per UGCF 2022 based on NEP 2020 guidelines for B.Sc. (H) Biomedical Science	Ongoing since March 2022

Dr Sumit Sahni Dr Vineet Kumar Singh (Botany)	Member of syllabus drafting committee as per UGCF 2022 based on NEP 2020 guidelines for B.Sc. (H) for Botany.	Ongoing since March 2022
Dr Shalu Mahajan (Commerce)	Member, Subcommittee, "Finance", during the formulation of Undergraduate Curriculum Framework (UGCF) -2022 based on National Education Policy (NEP)-2020 held at the department of commerce, Faculty of Commerce and Business, University of Delhi.	April-May 2022
Prof. Seema Gupta (Chemistry)	Member of Examination Board for National Chemistry Olympiad 2022 organized by HBCSE as a part of Chemistry Olympiad Program in India	September 2021-November 2021
Dr Neeti Misra (Chemistry)	Member of syllabus drafting committee as per UGCF 2022 based on NEP 2020 guidelines for B.Sc. (H) Chemistry	Ongoing since March 2022
Dr Manisha Jain (Chemistry)	Member, Committee for formulation of 'Undergraduate Curriculum Framework (UGCF) based on National Education Policy (NEP) 2020' for B.Sc. Physical Science and B.Sc. Life Sc.	April 2022
Prof. Pankaj Khanna (Chemistry)	Resource Person for 'Workshop to develop assessment questions for MOOCs on SWAYAM', organised by CIET, NCERT, New Delhi	July 19-21, 2021
	Core Committee Member for the formulation of UGCF-2022 Syllabus at the Department of Chemistry, University of Delhi.	March 2022
Prof. Sharanjit Kaur (Computer Science)	Ph.D. Pre-admissions Preparation Classes for the candidates to under privileged (OBC/SC/ST/EWS) category of the society	September 06-24, 2021 (12 hrs)
Prof. Amit Garg (Electronics)	Member, Curriculum Design Committee, B.Sc. (H) Electronics under UGCF 2022, University of Delhi.	February-March 2022
Dr Ravneet Kaur (Electronics)	Resource Person in a five-day workshop on "Development of Competency Framework and Revisiting of the Learning Outcomes in Science and Mathematics (PAC 6.01/2021-22)" held online at DESM, NCERT, New Delhi	March 07-11, 2022
	Resource Person in a five-day workshop on "Development of Competency Framework and Revisiting of the Learning Outcomes in Science and Mathematics (PAC 6.01/2021-22)" held online at DESM, NCERT, New Delhi	February 28-March 04, 2022.
	Resource Person in a five-day workshop on "Online Course in Teaching of Science at Upper Primary Stage." held online at DESM, NCERT, New Delhi	January 17-21, 2022.
	Resource Person in a five-day workshop on "Online Course in Teaching of Science at Upper Primary Stage." held online at DESM, NCERT, New Delhi	January 10-14, 2022.

Prof. Sarita Kumar (Zoology)	Resource Person in Workshop on “Development of Competency Framework and Revisiting of the Learning Outcomes in Science and Mathematics (Task 4)”	February 28-March 04, 2022
	Resource Person in Workshop on “Reviewing and Editing of Learning Outcomes based activities under Road Map in Biology at Higher Secondary Stage (Assessment Questions).”	February 21-22, 25-27, 2022
	Resource Person in Workshop on “Development of Audio/Video resources on Experiments/Activities in Biology at Higher Secondary Stage (Class XII).” (PAC 6.08/2021-22)	February 14-16, 2022
	Resource Person in Workshop on “Development of Learning Outcomes based activities under Road Map in Biology at Higher Secondary Stage (Assessment Questions).” (PAC 6.07/2021-22)	February 09-13, 2022
	Resource Person in Workshop on “Development of Learning Outcomes based activities under Roadmap in Biology at Higher Secondary Stage.” (PAC 6.07/2021-22), DESM, NCERT	February 03-04, 2022
	Resource Person in the programme “Development of question bank and summative assessment for the online course in Science for teachers teaching science at Upper primary level” DESM, NCERT	January 10-14, 2022; January 17-21, 2022
	Resource Person in the programme “Development of Learning Outcomes based Byte-sized videos in Biology at Higher Secondary Stage” DESM, NCERT	October 04 and October 06, 2021
	Resource Person in Workshop on ‘Development of Learning Outcomes based activities under Roadmap in Biology at Senior Secondary Stage.’ (PAC 6.07/2021-22), DESM, NCERT	September 15, 2021; November 29-30, 2021
	Resource Person in the programme “Development of Audio/Video resources based on laboratory manual in Biology at Higher Secondary Stage (Class XII)” DESM, NCERT	September 20, 2021

Prof. Seema Makhija (Zoology)	Member of syllabus drafting committee as per UGCF 2022 based on NEP 2020 guidelines for B.Sc. (H) Zoology Paper: DSE IV- Bioenergetics and Enzymology	February –March, 2022
	Convenor of syllabus drafting committee as per UGCF 2022 based on NEP 2020 guidelines for B.Sc. (H) Zoology Paper: DSE X- Model Organisms in Research	February –March, 2022
Dr Sweety Shrimali (Zoology)	Member of syllabus drafting committee as per UGCF 2022 based on NEP 2020 guidelines for B.Sc. (H) Zoology /B.Sc. Life Science, Paper: SEC 9- Animal Cell Culture	February –March, 2022
Dr Aparna Sharma (Zoology)	Member of syllabus drafting committee as per UGCF 2022 based on NEP 2020 guidelines for B.Sc. (H) Zoology, Paper: DSE 3-Chronobiology and for B.Sc. (H) Zoology /B.Sc. Life Science, Paper: SEC 9- Animal Cell Culture	February –March, 2022

5.4 Awards/Honours

Awardees' Name (Department)	Name of the Award/Honour	Awarded/ Honoured by	Awarded on Date
Prof. Gagan Dhawan (Biomedical Science)	Institute of Eminence (IoE) Fellow	Delhi School of Skill Enhancement and Entrepreneurship Development (DSSEED), Institution of Eminence, University of Delhi	June 01, 2022
	Alexander Fleming Excellence Award-2022	Biofootprints Foundation, India at AIIMS, New Delhi	May 10, 2022
	Strada Scholarship for Emerging Leaders	School of Business and Technology, Washington DC, USA	January 10, 2022
Prof. Charu Khosla Gupta (Botany)	Meritorious Teacher Award	Directorate of Higher Education, Government of National Capital of Delhi	March 04, 2022
Prof. Sunita Hooda (Chemistry)	International Distinguished Education Excellence Award 2021 in Environment Chemistry	Global Annual Education & Research Excellence Awards being conferred on December 18, 2021 at Centre for Professional Advancement, Vijayawada, India.	December 18, 2021
	National Distinguished Researcher Award 2021 in recognition of consistent superior performance in Polymer Chemistry on the eve of World Science Day and National Education Day 2021	International Multidisciplinary Research Foundation (IMRF) Institute of Higher Education, Vijaywada, Andhra Pradesh, India, on 11 th Nov. 2021	November 11, 2021

Prof. Geetu Gambhir (Chemistry)	International Education Excellence Award 2021 for teaching and research excellence in waste water management	Centre for Professional Advancement, in the Global Annual Education and Research Summit 2021.	December 18, 2021
	National Distinguished teacher Award in recognition of consistent superior performance in Organic Chemistry	International Multidisciplinary Research Foundation, Institute of higher education and research	November 11, 2021
Prof. Dinesh Kumar Arya (Chemistry)	Indo Asian Research Excellence Award 2022 (Inorganic Chemistry)	Ratna Prasad Multidisciplinary Research & Educational Society	February 28, 2022
	Proud Indian Inspiring Teacher Award 2022 (Inorganic Chemistry)	International Multidisciplinary Research Foundation	January 26, 2022
Dr Mamta Bhatia (Physics)	International Education Excellence award 2021 for teaching and research excellence in Physics	Center for Professional advancement , CPACE at Global Annual Education and Research Summit 2021	December 18, 2021
Prof. Sarita Kumar (Zoology)	S. K. Mahajan Award 2021 for Popularization of Scientific Pursuit	HBCSE, TIFR, Mumbai	October 03, 2021

5.5 Invited Talks

Faculty (Department)	Details
Prof. Urmi Bajpai (Biomedical Science)	<ul style="list-style-type: none"> Delivered a talk on “Antibiotic Resistance: A silent epidemic”, at the SERB sponsored seminar on Drug Resistance: Causes and Challenges Ahead. Organized by Noida Institute of Engineering and Technology (Pharmacy Institute), Greater Noida, June 11, 2022. Delivered an Online talk on “Bacterial infections, antibiotic resistance and prospects of phage lysins as a new class of antimicrobials” in the Biotechnology Lecture Series, organized by Department of Biotechnology, Cochin University of Science and Technology, Kochi, Kerala, April 12, 2022 Delivered an Online talk on “Bacteriophages and encoded lysin enzymes as potential therapeutics” organized by Emerging Biopharmaceutical Manufacturers (EBPMN), and International Bacteriophage Research Consortium (IBRC), December 03, 2021.
Prof. Gagan Dhawan (Biomedical Science)	<ul style="list-style-type: none"> Delivered a talk in AICTE-ATAL Face to Face Faculty Development Programme (FDP) on ‘Drug Discovery & Design in 21st Century’ organized by Netaji Subhas University of Technology (NSUT), Dwarka, New Delhi from July 05-09, 2021, Talk on Day 4 (July 08, 2021) Delivered a talk in 13th Annual Conference on ‘Advances in Cell and Tissue Culture 2021’ (ACTC 2021) organized by Kirkstall Limited, York, UK on November 03, 2021

Dr Vineet Kumar Singh (Botany)	<ul style="list-style-type: none"> • Delivered a talk on Statistical Softwares in National Virtual Hands-on Workshop: Tools used in Biostatistics Research and Training 13-14 Aug 2021 organized by Ramjas College, University of Delhi • Delivered a talk on Role of Advanced Statistical Software and Use of SPSS in Bio-statistics in National Workshop on Statistical Analysis of Biological Data, 17 Jan-21 Feb, organized by Zakir Hussain Delhi College, DU
Prof. Seema Gupta (Chemistry)	Delivered a talk on “Role of stakeholders on Vigilance, Corruption and Transparency in Governance in India” on November 01, 2021 on the occasion of Vigilance Awareness Week 2021 organized by Vivekananda College, Daulat Ram College and Acharya Narendra Dev College, University of Delhi
Prof. Pankaj Khanna (Chemistry)	Delivered an Online talk on Prochirality to Asymmetric Synthesis-A Learning Curve” for the students of Amity Institute of Applied Science, on December 24, 2021.
Dr Shalu Mahajan (Commerce)	Delivered an Online talk on “Teacher to Mentor: A Paradigm Shift” November 11, 2021, Aditi Mahavidyalya, University of Delhi
Prof. Sharanjit Kaur (Computer Science)	<ul style="list-style-type: none"> • Delivered an Online talk on Modeling Epidemic dynamics thru contact networks (Tutorial 3, May 16) 10:00 am CEST - 1:30 PM IST at International Health Informatics Conference May 17-19,2022 • Delivered an Online talk on Data Exploration and Visualization using Python in Online Elementary FDP on “Software Engineering Paradigms of Computational Intelligence” from October 25-29, 2021 at Netaji Subhas University of Technology.
Dr Harita Ahuja (Computer Science)	<ul style="list-style-type: none"> • Delivered an Online 2 hour talk on “Canva: Online Graphics Designing Tool” in 30 hours online Add-On course on ‘Information and Communications Technology’ held from 20th February-27th March 2022, organized by Department of Computer Science under the aegis of IQAC, Swami Shraddhanand College, DU on March 3 and 15, 2022. • Delivered an Online 2 hour talk on “Social Ethics & Cyber Security” in 30 hours online Add-On course on ‘Information & Communications Technology’ held from February 20-March 27, 2022, organized by Department of Computer Science under the aegis of IQAC, Swami Shraddhanand College, DU, March 15, 2022. • Delivered an Online talk on “BMI Calculator, an Android Application” in One Day Interaction Program “Science Adda” organized under DBT Star Scheme by Acharya Narendra Dev College, DU, December 20, 2021. • Delivered an online talk on “Introduction to NumPy and Hands-on with NumPy”, in Five-day online workshop on “Data Analysis and Visualization of Covid-19 Data using Python” organized under DBT Star Scheme by Acharya Narendra Dev College, DU held from June 22-26, 2021.
Prof. Amit Garg (Electronics)	<ul style="list-style-type: none"> • Delivered a talk on Basics of Arduino Programming, Lovely Public School, Priyadarshini Vihar, Delhi, Classes-VI-VIII, June 01-02, 2021. <p>Delivered a talk on Business Incubator in Educational Institutions – A Window of Opportunity for Entrepreneur Students at Indira Gandhi National Open University, New Delhi, December 24, 2021.</p>
Dr Ravneet Kaur (Electronics)	<ul style="list-style-type: none"> • Delivered a talk on Communication: Past, Present and Future on February 03, 2022, organized by Internal Quality Assurance Cell (IQAC) of ARSD College.

Prof. Sarita Kumar (Zoology)	‘Mendelian and Non-Mendelian Inheritance’ Department of Zoology, Punjab Agricultural University, Ludhiana, Punjab. February 23, 2022 ‘An Overview of Animal Classification: Understanding Criteria’ Department of Zoology, Punjab Agricultural University, Ludhiana, Punjab; February 22, 2022
Dr Aparna Sharma (Zoology)	Guest Speaker for AMET 2021, The Viridescent Voyage, on the occasion of World Environment Day, June 05, 2021 in the Department of Ecology and Environmental Science, Pondicherry University

5.6 Conferences, Workshops, Training Programmes Organized

Faculty (Department)	Details
Dr Sunita Jetly (Biomedical Science)	Organized a Webinar and Screening program for Thalassemia in NSUT (NSS) on October 29, 2021
Prof. Urmi Bajpai (Biomedical Science)	<ul style="list-style-type: none"> Organized IBRC Online Symposium on “Phage Lysins: Promising alternatives to antibiotics” on July 09, 2021 Organized webinar on “Introduction to BioNEST-UDSC & Bio entrepreneurship” by Mr Vijay Kantharia, CEO, BioNEST-UDSC. February 15, 2022 Organized webinar on “Designing of a Novel Vector for One-Step Cloning & Expression in E.coli” by Mr Shinto James, IISER, Bhopal. January 28, 2022
Prof. Gagan Dhawan (Biomedical Science)	<ul style="list-style-type: none"> Coordinator, National Seminar on Vigilance, Corruption and Transparency in Governance - A Re-assessment on the occasion of Vigilance Awareness Week 2021 being organized in association with Vivekananda College and Daulat Ram College, University of Delhi on November 01, 2021 Coordinator, Youth Panel Discussion on Sustainable Development Goals during Ecosystem Restoration Month organized in association with Vivekananda College and Daulat Ram College, University of Delhi from June 05-July 03, 2021
Dr Archana Pandey Dr Satendra Singh Dr Rimpay Kaur Chowhan Dr Ritu Khosla (Biomedical Science)	Organized a one-day workshop on “Tools in Modern Biology” for the non-teaching staff on April 21, 2022
Dr Sunita Jetly Dr Archana Pandey Dr Ritu Khosla Dr Deepshikha (Biomedical Science)	Organised Five-day National Workshop (Virtual) on “Flow cytometry and qPCR-based Blood Analyses” from October 20-24, 2021 under the aegis of DBT Star Scheme

Dr Anupama Shukla Dr Anita Narang (Botany)	<ul style="list-style-type: none"> Organised a talk on “Mycorrhizosphere to Rhizosphere Microbiome: the Paradigm Shift” by Prof. Manju M Gupta Department of Botany, Sri Aurobindo College, University of Delhi, June 23, 2021 Organised a talk on “Cultivation of Edible Mushrooms : Pleurotus species”, by Prof. Rajni Gupta, Department of Botany, Kirori Mal College, University of Delhi, June 17, 2021
Dr Anupama Shukla (Botany)	Organised a talk on Challenges and Strategic solutions for breaking the bias for better nutrition and health outcomes by Deepti Gulati, Industry chair Professor, NIFTEM, Sonapat on March 08, 2022
Dr Anita Narang Prof. Charu K. Gupta Dr Sumit Sahni Dr Anita Thakur Dr Vineet Kumar Singh (Botany)	Organized a five day ‘Hands-on-Workshop’ on Laboratory techniques in Botany for the students of B.Sc. Hons in Botany and B.Sc. (Prog.) Life Science from October 21-26, 2021
Dr Anita Narang (Botany)	Organized an online talk of ‘Menstrual Health and Hygiene’ on June 23, 2022 for college students
Prof. Charu K. Gupta (Botany)	<ul style="list-style-type: none"> Organized a one-day workshop for the non-teaching staff on April 26, 2022 to update them with all the new equipment purchased by the Department of Botany Organized the valedictory talk ‘Tarumitra,’ the botanical society of Acharya Narendra Dev College by Prof Vishnu Bhatt, Department of Botany, University of Delhi on April 20, 2022 on ‘Harnessing apomixis to preserve hybrid vigour’. Organized Dr Saumya Saxena Memorial talk lecture 2022 by Prof. Mohammad Zahid Ashraf, Head, Department of Biotechnology, Jamia Milia Islamia on ‘Biomarker discovery for cardiovascular diseases using multi omics approaches’ on March 23, 2022 Organized a talk by Dr Dhanya Bhaskar, Associate Professor at Indian Institute of Forest Management on ‘Biodiversity Conservation as if people and ecosystem matter’ on October 28, 2021
Dr Sumit Sahni Dr Vineet Kumar Singh (Botany)	<ul style="list-style-type: none"> Worked as Organizing Member in the workshop V-Lab Development Bootcamp 2.0 organized from June 27-July 01, 2022 Convenor, Workshop On “Initiating Virtual labs @ ANDC” in collaboration with IIT-Delhi organized on July 24, 2021 for the students Organized a 5-Day workshop entitled “V-Lab development Boot Camp 1.0” for undergraduate Students from January 17-22, 2022
Prof. Ravi Toteja Prof. Seema Makhija (Zoology) Dr Sumit Sahni Dr Vineet Kumar Singh (Botany)	Organized an online 6th Annual International Conference of Indian Network for Soil Contamination Research on “Microbes in Sustainable Development” from November 15-18, 2021
Prof. Seema Gupta (Chemistry)	Organized an online webinar on “e- resources of Delhi University and infibnet-NList” on Saturday, July 31, 2021

Dr Pooja Bhagat (Chemistry)	Resource person for a Workshop to prepare Items for conducting written examination for various posts by Haryana Public Service Commission from October 28-30, 2021
Prof. Sunita Hooda Dr Pooja Bhagat Dr Neeti Misra Prof. Geetu Gambhir Dr Kavita Mittal Dr Pragati Malik (Chemistry)	Resource person in a one-day workshop on “Introduction to New Experiments” organised under DBT Star College Scheme by Dept of Chemistry, Acharya Narendra Dev College, University of Delhi on April 21, 2022
Prof. Sunita Hooda Prof. Geetu Gambhir Dr Kavita Mittal (Chemistry)	<ul style="list-style-type: none"> Organised Hands-on Workshop for Non-teaching Staff on “The calibration and standardization of laboratory equipment and glassware” under DBT Star College Scheme by Acharya Narendra Dev College, DU on April 20, 2022. Organised lecture series (online mode) of “Journey of an Alumni” held weekly from October 16, 2021, Acharya Narendra Dev College, DU.
Prof. Sunita Hooda Prof. Geetu Gambhir Dr Pragati Malik (Chemistry)	<ul style="list-style-type: none"> Organized the Four Day National Hands-on workshop (online mode) on Exploring and Understanding Computational Chemistry Using Gaussian: Molecular Builder and Visualization Tool, organized by Abhikriya, The Chemical Society of Acharya Narendra Dev College, University of Delhi under the aegis of DBT STAR College Scheme and IQAC from March 07-10, 2022. Organized Five day workshop on Analytical Laboratory techniques from October 25 -29, 2021. Organized the Two Day online National Hands-on workshop on Computational Chemistry: A New Approach to Understanding & Solving Chemical Problems, organized by Abhikriya, The Chemical Society of Acharya Narendra Dev College, University of Delhi under the aegis of DBT STAR College Scheme and IQAC from October 06-07, 2021. Organized a Two Days Webinar Workshop on Basics of Photoshop organized by Abhikriya, The Chemical Society of Acharya Narendra Dev College, University of Delhi under the aegis of DBT STAR College Scheme and IQAC from September 30-October 01, 2021 Worked as a Team Member in organizing an International Lecture on “Role of Chemistry in Eradication of Pandemic Covid-19” by Dr Vikas Malhotra, held on April 17, 2021, organized by Chemistry Department of Acharya Narendra Dev College, University of Delhi
Ms Bhawna Kaushik (Chemistry)	<ul style="list-style-type: none"> Organised ‘Going Global Workshop’ on Green Chemistry Education Today for a Sustainable Tomorrow, May 27-29, 2022 Organised RSC symposium series on ‘Frontiers in Green Chemistry and Sustainable Development: Special Emphasis on Food, Water and Energy’, November 25, 2021. Organised ACS symposium series on “Green Chemistry and Sustainable Development”, November 24-25, 2021.

Dr Sandeep Kumar Goel (Commerce)	<ul style="list-style-type: none"> • Member Organizing Committee, International Webinar on ‘Business Responsibility & Sustainability Reporting’, Indian Commerce Association Delhi-NCR Chapter in collaboration with Department of Commerce, Delhi School of Economics, University of Delhi, June 24, 2022 • Member Organizing Committee, Online Round-table Discussion with Professor Michael Hopkins on his New Book on ‘CSR and Sustainability: The Big Issues of the Day’, Indian Commerce Association Delhi-NCR Chapter, May 25, 2022 • Convenor, Workshop on ‘Application of Cost Accounting Standards in the Preparation of Cost Statement’, Department of Commerce in collaboration with IQAC, Acharya Narendra Dev College, University of Delhi, New Delhi, April 20, 2022 • Member Organizing Committee, National Webinar on ‘NEP 2020 and Commerce Education’, Indian Commerce Association Delhi-NCR Chapter, September 07, 2021
Dr Shalu Mahajan Dr Jitender Goel (Commerce)	<ul style="list-style-type: none"> • Member Organizing Committee, Workshop by Prof. Rajiv Kumar Goel held on April 20, 2022 on “Application of Cost Accounting Standards in the Preparation of Cost Statement”, organized by Department of Commerce and IQAC, Acharya Narendra Dev College, University of Delhi, New Delhi. • Organised a seminar under In conversation with alumni series on “career options after graduation” by Mr. Nitin Deveshwar held on April 01, 2022 • Organised a Webinar in collaboration with IQAC on “An insight into Currency Derivative” by Sugandha Sachdeva held on September 11, 2021
Dr Shalu Mahajan (Commerce)	<ul style="list-style-type: none"> • Organised a Workshop on Ace Google by Department of Commerce on April 06-08, 2022 • Conducted a Workshop organised by Department of Commerce on Ace excel held from March 07-09, 2022 • Organised a Workshop by Bodhini, Department of Commerce on Ace Canva by Dr Surinder Kaur and Mr. Ayush Goyal held from February 04-06, 2022 • Organised a Webinar by Training, Learning and Placement cell, Department of Commerce on “Career Opportunities in MNCs by CA Sameer Mahajan on October 09, 2021 • Organised a webinar on Role of IT in Indian Banking System by Department of Commerce by Prof. Madhu Vij on July 14, 2021
Dr Jitender Goel (Commerce)	<ul style="list-style-type: none"> • Conducted a Three Days Workshop under Ace the Skill Week held on April 06-08, 2022 on “Ace Google”
Prof. Sharanjit Kaur (Computer Science)	Organized a workshop on Face recognition using Python by Prof. Xavier Challudurai, October 26-30, 2021

<p>Dr Sunita Narang (Computer Science)</p>	<ul style="list-style-type: none"> Organized a Two- Day online workshop on “<i>HTML: A Prerequisite for MERN Stack</i>” by Mr. Rishi Sarbobhoum, Mr. Aditya Goyal, Mr. Devesh Yadav and Mr. Sushant Sharma on October 06, 2021 Organized a Two-Day online workshop on “<i>Effective Presentation & Image Management for Success</i>” by Mrinal Gupta Virmani, Confidence Coach & Soft skills Trainer, Image Consultant & Chartered Accountant, August 24, 2021. Organized a Technical Talk on “<i>Role of IT in Indian Banking system</i>” by Prof. Madhu Vij, Former Professor in Finance, Faculty of Management Studies, University of Delhi. July 14, 2021
<p>Dr Harita Ahuja (Computer Science)</p>	<p>As Department Coordinator, DBT Star College Scheme 2021-2022, organized following Technical Talks under Turing Society</p> <ul style="list-style-type: none"> “Role of IT in Indian Banking system” on July 14, 2021 by Prof. Madhu Vij, Former Professor in Finance, Faculty of Management Studies, University of Delhi “Semantic Intelligence- The next step in Artificial Intelligence” on October 01, 2021 by Dr. Sarika Jain, Assistant Professor, Department of Computer Science, NIT, Kurukshetra “Explainable AI” on October 04, 2021 by Mr. Pranjal Mishra, Lead Data Scientist, CIMB Bank “Predictive Modeling using Python” on October 08, 2021 by Dr. Nihar Ranjan Roy, Associate Professor, Sharda University “Cisco Network Administration” on March 03-04, 2022 by Mr. Bineet Kumar Joshi, Assistant Professor, Department of Computer Science, Swami Rama Himalayan University “Wireless Security Network” on March 04, 2022 by Prof. Sanjay Kumar Dhurandher, Professor and Head in the Division of Information Technology, Netaji Subhas Institute of Technology (NSIT), DU, India <p>As Department Coordinator, DBT Star College Scheme 2021-2022, organized following workshops:</p> <ul style="list-style-type: none"> Two- Day online workshop on “Effective Presentation and Image Management for Success” by Mrinal Gupta Virmani, Confidence Coach & Soft skills Trainer, Image Consultant and Chartered Accountant from August 24-25, 2021 Two- Day online workshop on “Front End Web UI Frameworks Overview: Bootstrap” by Mr. Ashwani Bhatia, Web Designer/ Developer from October 02-03, 2021 Two- Day online workshop on “HTML: A Prerequisite for MERN Stack” by Mr. Rishi Sarbobhoum, Mr. Aditya Goyal, Mr. Devesh Yadav, Mr. Sushant Sharma, Students, ANDC from October 06-07, 2021 Four- Day online workshop on “A First Step Towards Developing Virtual Lab Using MERN Stack” by Mr. Prabhat Chandra, Freelance Trainer/ Developer from October 09-24, 2021 Five- Day online workshop on “Face Recognition using Python” by Dr. Xavier Chelladurai, Director and Professor, Christ Human Resource Center from October 26-30, 2021 Two- Day online workshop on “Let’s Talk DevOps” by Mr. Shailesh Thakur, Senior DevOps Engineer, o9 Solutions Inc. from March 11-13, 2022

Mr Mahesh Kumar (Computer Science)	<ul style="list-style-type: none"> Resource Person and member organizing committee in Five Day Online Workshop on Data Analysis and Visualization of Covid-19 Data using Python, organized by department of Computer Science on June 22-26, 2021 Organized Three Days Online workshop on “Let’s Talk DevOps” by Mr. Shailesh Thakur, Senior DevOps Engineer, o9 Solution Inc., Bengaluru, March 11-13, 2022 Organized a technical Talk on “Cisco Network Administration” by Mr. Bineet Kumar Joshi, Assistant Professor, Department of Computer Science, Swami Rama Himalayan University, Swami Ram Nagar, Jolly Grant, Dehradun - 248016, Uttarakhand during March 03-04, 2022
Prof. Anju Agrawal (Electronics)	Organized an invited talk on Magnetic Nano-structures based Microwave monolithic signal processing devices: Fabrication and testing by Prof. Bi-joy Kumar Kuanr, Special Centre for Nanoscience, Jawahar Lal Nehru University on April 19, 2022.
Dr Ravneet Kaur (Electronics)	<ul style="list-style-type: none"> Organized a workshop on Full Stack Web Development using MERN from March 05-09, 2022 Organized Training workshop and demonstration of Control Lab with software and data acquisition and Universal Dev Board with FPGA and CPLD for Teachers in collaboration with industry partner M/s Silicom Electronics on April 25, 2022 Organized a Hands-on Workshop on Arduino and Sensor Interfacing in technical collaboration with industry partner Touch Techno Pvt. Ltd. on March 26, 2022. Organized Training Workshop and demonstration of lab Equipment for Teaching and Non- Teaching Staff in collaboration with industry partner M/s Vijayanta Electronics on March 23, 2022. Organized a workshop on Holography on March 14, 2022 Organised an Invited Talk on Digital Transformation and it’s impact on the future after Covid-19 delivered by Dr Amita Kapoor, Associate Professor, Shaheed Rajguru College of Applied Science on July 07, 2021 Organised an Invited Talk on Creative Thinking and Entrepreneurial Skills by Dr Ravinder Kaur Associate Professor, MoE IIC Ambassador Department of Electronics Deen Dayal Upadhyay College held on June 23, 2021
Dr Mamta Bhatia (Physics)	“Women and Sustainable Business Development”: Program coordinator of one week online International Certificate program January 20-25, 2022, in collaboration with National Law University, Delhi and Trakya University, Turkey
Prof. Arijit Chowdhuri Dr V. Bhasker Raj (Physics)	Coordinator, Intellectual Property Awareness program under National Intellectual Property Awareness mission (NIPAM) on January 19, 2022
Prof. Arijit Chowdhuri Dr Sanjay Kumar Dr V. Bhasker Raj (Physics)	Resource person in the Hands-on workshop on Digital Systems and Applications with Microprocessors and Microcontrollers from October 20-27, 2021

Dr Siddhartha Dr Ambika (Physics)	Resource person: Hands-on Workshop on Modern Physics. November 10-17, 2021
Prof. Sarita Kumar (Zoology)	Intellectual Property Awareness Program under NIPAM, Govt. of India; Dec 29, 2021
Prof. Seema Makhija Mr Ravinder Sagar Dr Aparna Sharma Dr Sweety Shrimali Dr Rahul Dev Mr Vineet Girdharwal (Zoology) Mr Abhay Pratap Singh (Environmental Science)	Organized seven days Hands-on workshop on Biological Techniques from September 27- October 04, 2021
Prof. Seema Makhija Mr Ravinder Sagar Dr Aparna Sharma Mr Vineet Girdharwal Dr Rahul Dev Dr Sweety Shrimali Ms Bhumika Chauhan (Zoology)	Organized two days Hands-on workshop on Tools and Techniques of Biotechnology from April 07-08, 2022
Prof. Seema Makhija (Zoology)	<ul style="list-style-type: none"> Organized MICROSPHERE 2021: An International Outreach Program to celebrate the International Microorganism Day under the aegis of Science Foundation, Synapses and INSCR and in collaboration with IIT Roorkee, Deen Dayal Upadhyaya College, Gargi College, Kirori Mal College, Maitreyi College, Ramjas College, Sri Venkateswara College, (DU), Magadh University, Allahabad University and our Industry associate - PhiXgen Pvt. Ltd. Organized IP Awareness/Training Program under the National Intellectual Property Awareness Mission by the Intellectual Property Office, India, December 29, 2021. Organized an online workshop on Initiating Virtual Labs in collaboration with IITD on August 24, 2021.
Prof. Seema Makhija Dr Rahul Dev (Zoology)	Organised Hands-on Training for Support Staff on “Tools in Modern Biology”, April 21, 2022
Mr Abhay Pratap Singh (Environmental Science)	Contributed as Session Chair at International Conference on Modern Approaches In Science & Technology (ICMAST2022) organized by School of Engineering and Science (SoES), GD Goenka University, Gurugram on April 04, 2022

5.7 Seminars, Symposia, Workshops, Training Programmes Participated/Attended

Faculty (Department)	Details
Dr Sunita Jetly (Biomedical Science)	Attended Online International Conference on Infection and Immunity at Daulat Ram College, University of Delhi on October 08-10, 2021.
Prof. Gagan Dhawan (Biomedical Science)	Attended ICGEB-DBT International Workshop on NMR spectroscopy for drug development and biomarker discovery from April 25-May 01, 2022.
Dr Satendra Singh Dr Rimpay Kaur Chowhan (Biomedical Science)	Attended five day workshop on “Flow cytometry and qPCR based blood analysis” organized by Department of BMS, Acharya Narendra Dev College, University of Delhi, from October 20-24, 2021
Dr Satendra Singh (Biomedical Science)	Attended one day National seminar on “Introduction to Bionest-UDSC and Bio entrepreneurship Organized by Department of BMS, Acharya Narendra Dev College, University of Delhi on February 15, 2022
Dr Ritu Khosla (Biomedical Science)	Attended Online Course on “PCR 101: Polymerase Chain Reaction (PCR) and Quantitative PCR (qPCR)” organized by Department of BMS, Acharya Narendra Dev College, University of Delhi from August 08-11, 2021
Dr Rimpay Kaur Chowhan (Biomedical Science)	Attended E-workshop on “Meta-sentiment-bibliometric Analysis using R” organized by Commacad from September 27-29, 2021
Dr Anupama Shukla (Botany)	<ul style="list-style-type: none"> • Attended Webinar on World Ozone Day organized by Deshbandhu College, University of Delhi on September 16, 2021. • Attended International webinar on “Ethics in Research and Publications” on September 05, 2021. • Attended “Immunity and Natural Immunity booster”, Maitreyi College, University of Delhi on July 31, 2021 • Attended Workshop on “Microbes for Sustainable and Resilient Future” from December 07-11, 2021. • Attended workshop on “Environmental Hazards of E-waste and Plastic Waste” organized by Acharya Narendra Dev College, University of Delhi on July 31, 2021 • Attended International webinar on “Enhancing food and nutritional security through promoting R&D in dryland crops: ICRISAT’s Role on July 26, 2021. • Attended workshop on “Floral Gardening Skills” organized by Gargi College, University of Delhi on July 19, 2021 • Attended workshop on “The Science of Viticulture and Enology” organized by Sri Aurobindo College, University of Delhi on July 12, 2021.

Dr Anita Narang (Botany)	<ul style="list-style-type: none"> • Participated in a workshop on “Microbes for Sustainable and Resilient Future” organized by Department of Botany, University of Delhi, from December 07-11, 2021. • Participated in the 6th Annual International Conference of INSCR on “Microbes in Sustainable Development” organized by Department of Zoology; University of Delhi, from November 15-18, 2021. • Participated in One and a half month Executive Development Programme (equivalent to Certificate course) on “Hands-on with MS Office Essentials” conducted by Department of Vocation, Ramanujan College; University of Delhi, from July 19-September 03, 2021. • Participated in a webinar on “Translational genomics in soybean; How genetic information can be made relevant to breeders’ by Prof. Francois Belzile, University of Laval, Canada, on June 27, 2022. • Participated in Five day FDP on ‘Environmental Audit’ conducted by Kirori Mal College, University of Delhi in association with MHRD PMMMNMTT from June 28 -July 02, 2021 • Participated in National Webinar on ‘Mucormycosis and post covid recovery; effects, complications and solutions’ on June 18, 2021, organized by Guru Nanak College, Velachery, Chennai. • Participated in National Webinar on ‘Plant metabolic engineering’ on June 15, 2021, organized by Guru Nanak College, Velachery, Chennai.
Dr Anita Narang (Botany) Dr Meenu Mohil (Physics)	Participated in International Webinar on ‘Covid-19: Truths and Myths’ on June 09, 2021, organized by IQAC, Acharya Narendra Dev College.
Prof. Charu K. Gupta (Botany)	Attended eight online sessions on Dialogue series with Women Environmental conservationists organized by Shaheed Rajguru College of Applied Science for Women, University of Delhi from August 06-September 26, 2021.
Dr Anita Thakur (Botany)	Successfully completed a five-week-long (January 17, 2022 to February 21, 2022) National Workshop on Statistical Analysis of Biological Data with grade A+, organised by Department of Botany, Zakir Husain Delhi College, University of Delhi
Dr Vineet Kumar Singh (Botany)	Attended Seminar on Comparative Genomics and Functional Analysis of Master Regulators: Leveraging (Bio) Informatics, Omics and Biology of Model and Crop Plants for Trait Modification 25 Jan, 2022, at Shivaji College, University of Delhi
Prof. Seema Gupta (Chemistry)	<ul style="list-style-type: none"> • Attended Online webinar on “Staying Healthy Through Future COVID waves: Essential DOs and DONT’s” on July 03, 2021 conducted by New Delhi Institute of Management • A Workshop on Read and Publish and Author’s Publishing Journey on July 08, 2021 organized by Cambridge University Press and University of Delhi

Prof. Seema Gupta Dr Pooja Bhagat (Chemistry)	<ul style="list-style-type: none"> • Participated in a workshop on 'Read and Publish Model and Online Resources from Cambridge University Press available to University of Delhi' organized by Cambridge University Press and University of Delhi on July 08, 2021 • Attended 2-day NIUS teacher workshop titled 'A Closer Look at Re-designing Experiments for Undergraduate Chemistry Laboratory' conducted online by Homi Bhabha Centre for Science Education (HBCSE, TIFR) from June 17-18, 2021
Dr Neeti Misra Dr Manisha Jain (Chemistry)	Participated in a National online workshop on 'Exploring and Understanding Computational Chemistry using Gaussian: molecular builder and visualization tool' organized by Abhikriya, the Chemical society of Acharya Narendra Dev College, University of Delhi under the aegis of DBT Star College scheme and IQAC from March 07-10, 2022
Dr Neeti Misra (Chemistry) Dr Ravneet Kaur (Electronics) Prof. Rachna Joshi (Physics)	Attended the webinar on, "Understanding Plagiarism Detection Software Ouriginal" organized by University of Delhi in Association With eGalactic Pune on January 28, 2022.
Dr Neeti Misra (Chemistry)	Participated in National Virtual Lab Workshop on "Computer aided Drug design" organized by Department of Chemistry, Aggarwal College Ballabhgarh from October 06-09, 2021.
Dr Manisha Jain (Chemistry)	Participated in a workshop for formulation of questions/items for written examination by Haryana Public service Commission on October 28-30, 2021 in IIC Delhi.
Prof. Geetu Gambhir Dr Pragati Malik (Chemistry)	Participated in one day online national conference on New Frontiers in Biosensing organized by Department of Chemistry, Hansraj College, University of Delhi on April 03, 2021 Attended a lecture on "Rational Approaches in Drug Design and Development" under International Lecture Series entitled "Multifaceted Chemistry: An ever-evolving domain of science" organized by Deshbandhu College, Kalkaji, University of Delhi held on March 20, 2021
Prof. Pankaj Khanna (Chemistry)	Attended 9th Asian Network Of Natural & Unnatural Materials International Conference (ANNUM-9) organised by the Department of Chemistry, University of Delhi on Friday, April 08, 2022.

Dr Kavita Mittal (Chemistry)	<ul style="list-style-type: none"> • Attended one day International Symposium “Chemical Wisdom by Her” organized by Department of Chemistry, Deshbandhu College, University of Delhi on January 31, 2022 through online mode. • Participated in webinar titled “Plagiarism in Academic Writing & Research” organized by RASAYANATVA: The Chemical Society of Hansraj College, University of Delhi on November 20, 2021. • Participated in Two days International E-Conference on “Recent Trends in Drug Discovery and Development” organized by Department of Chemistry, Maitreyi College, University of Delhi, from October 08-09, 2021. • Participated in Two days National Hands-on Workshop (online mode) on “Computational Chemistry: A New Approach to Understanding & Solving Chemical Problems” organised by Acharya Narendra Dev College, University of Delhi, from October 06-07, 2021. • Participated in two days online workshop entitled “Tools for exploring Chemistry” organised by Rajdhani College, University of Delhi from July 12-13, 2021. • Attended one day online national webinar entitled “Implementation of Academic Bank of Credits” organized by Guru Angad Dev-Teaching Learning Centre of MHRD, SGTB Khalsa College, University of Delhi under the PMMMNMTT scheme of Ministry of Education on July 10, 2021.
Mr. Namonarayan Meena (Chemistry)	Participated in the International Seminar on “Multidisciplinary Approach Towards Science and Education” Organised by Raj Rishi Govt Autonomous College, Alwar (Raj.) on April 13, 2022
Dr Sandeep Kumar Goel (Commerce)	<ul style="list-style-type: none"> • Attended International Webinar on ‘Business Responsibility and Sustainability Reporting’, Indian Commerce Association Delhi-NCR Chapter in collaboration with Department of Commerce, Delhi School of Economics, University of Delhi, June 24, 2022 • Attended Workshop on ‘Syllabus and Amendments Relevant to Corporate Accounting - B.Com. (H) and B.Com., Department College Interface, Department of Commerce, Delhi School of Economics, University of Delhi in association with Deen Dayal Upadhyaya College, University of Delhi, New Delhi, June 15, 2022 • Attended National Webinar on ‘Become the Author of Your Life’, Society of Commerce and Management Lecture Series, Department of Commerce, Rajdhani College, University of Delhi, New Delhi, India, January 18, 2022 • Attended Webinar on ‘Discover Emerald Resources for Your Academic Excellence and Research’, Emerald Publishing, January 18, 2022. • Attended Webinar on ‘Empowering Investors towards Security Market’, Analytica, Department of Commerce and IQAC, P.G.D.A.V. College in association with SEBI, August 07, 2021.

Dr Sandeep Kumar Goel Dr Jitender Goel (Commerce)	<ul style="list-style-type: none"> • Attended Webinar on 'An Insight into Currency Derivatives', Bodhini, Academic Events and Research Committee, Department of Commerce, Acharya Narendra Dev College, University of Delhi, New Delhi, September 11, 2021. • Attended National Webinar on 'National Education Policy 2020: Role of Commerce in Education', Department of Commerce, Rajdhani College, University of Delhi, New Delhi, September 02, 2021.
Prof. Anju Agrawal (Electronics) Dr Sandeep Kumar Goel (Commerce) Dr Ravneet Kaur (Electronics) Mr Mahesh Kumar (Computer Science)	Participated in the Vice-Chancellors' Conclave on "National Education Policy 2020: Its Implementation, Opportunities and Challenges", organized by Department of Commerce and IQAC, Rajdhani College, University of Delhi, on July 16, 2021.
Dr Sandeep Kumar Goel (Commerce) Dr Ranjeet Singh (Physics) Dr. Rahul Dev (Zoology)	Webinar on 'Power Your Research with Scopus', Researcher Academy on Campus, University of Delhi/Elsevier, November 23, 2021.
Dr Jitender Goel (Commerce)	Attended National Webinar on 'NEP 2020 and Commerce Education', Indian Commerce Association Delhi-NCR Chapter, September 07, 2021.
Dr Shalu Mahajan (Commerce)	<ul style="list-style-type: none"> • Participated in one day webinar on "OBE: examination & Evaluation" organised by Mahatma Hansraj Faculty Development Centre, Hansraj College, University of Delhi on June 22, 2021. • Participated in IVth National Seminar on "An overview on Union Budget 2022 organised by Society of Commerce and Management Lecture Series, Department of Commerce, Rajdhani College, University of Delhi Held on February 17, 2022. • Successfully completed one week (online) training workshop on "Developing Administrative skills and Leadership" jointly organised by Shyam Lal College in collaboration with Mahatma Hansraj Faculty Development centre, Hansraj College, University of Delhi held from September 25, 2021 to October 1, 2021.
Mr Ankit Singh (Commerce)	<ul style="list-style-type: none"> • Attended 2- days Online Workshop in Cyber Attacks and Web Application Security organized by Department of Information Technology, February 25-26, 2022 • Attended National Webinar on " IOT: New Era of Digitization" organized by Department of Electronic Science, TuljaramChaturchand College of Arts, Science and Commerce, Baramati (M.H), January 08, 2022. • Attended Webinar programme on Recent Advancements in Commerce and Management organized by SreeSastha Arts And Science College on April 29, 2022 • Attended One day International Webinar on Reshaping Today's Education: Progressive Education in 21st Century organized by International Council for Education, Research and Training on March 25, 2022

Mr Ankit Singh Ms Hanisha Bhagat (Commerce)	<ul style="list-style-type: none"> • Attended Three Days National Virtual Workshop on Research Methodology and Data Analysis using MS Excel by Kamaraj College on March 17-19, 2022 • Attended 5-days Online National Workshop on Research Methodology in Literary Studies and Humanities organized by NIT, Srinagar from February 28-March 04, 2022 • Attended International Webinar on Essential Skills for Research Writing and Publishing Special Reference to IPR by J. Watumull Sadhubella Girls College on February 24, 2022 • Attended International Webinar on Email Etiquette and Marketing organized by DIGISAKSHAM on January 30, 2022 • Attended International Webinar on ASEAN Government Initiative in Managing Covid-19 organized by Excel Engineering College on January 25, 2022 • Attended Two Day online Workshop on Write Research Article using LaTeX organized by Aditya college of Engineering from December 27-28, 2021
Prof. Sharanjit Kaur (Computer Science)	Attended COMPUTE 2021: 14th Annual Conference, November 18-20, 2021 held at Department of Computer Science, University of Delhi
Dr Harita Ahuja (Computer Science) Dr Ravneet Kaur (Electronics)	One Week online workshop entitled “Tools and Techniques in Statistical Analysis” organized by Acharya Narendra Dev College, University of Delhi, under the aegis of DBT STAR College Scheme, from April 06-19, 2021
Dr Pragati Malik (Chemistry)	<ul style="list-style-type: none"> • Attended workshop on “Tools for Exploring Chemistry” held at Rajdhani College, University of Delhi during July 12-13, 2021 • Attended 50 Hr International workshop on computational chemistry organized by Hindu Colleg, University of Delhi in collaboration with Department of Physics, Stockholm University, Sweden and Department of Chemistry, J. V. College, Baraut, U. P. from February-April 2021
Mr Mahesh Kumar (Computer Science)	<ul style="list-style-type: none"> • Participated in a Webinar on Cyber Unsafe at Department of Computer Science, Miranda House on December 30, 2021, Presented by Dr Gaurav Gupta, Additional Director at MeitY. • Participated in the IP Awareness/Training program under National Intellectual Property Awareness Mission on December 29, 2021 at Acharya Narendra Dev College, University of Delhi. • Participated in the 11th International eConference on ‘Cyber Security’ organized by International Association of Scientists and Researchers (IASR), on November 27-28, 2021 • Participated in a 2-Days Workshop on “Designing and Development of e-Resources for Teaching and Learning - Part II”, organized by Department of Computer Science and Department of Chemistry Rajdhani College, University of Delhi, July 23-24, 2021
Prof. Anju Agrawal Dr Ravneet Kaur Ms Gauri Ghai (Electronics)	<ul style="list-style-type: none"> • Participated in Robonetics: 30 days intense workshop on “Robotics and its analogy implementation” Organised by Tech Analogy from September 24-October 23, 2021. • Attended Online Lecture Series on “Fundamentals and Applications of Technology Driven Sensors.” organised by IEEE EDS Delhi Chapter from September 24-25, 2021

Prof. Anju Agrawal Dr Ravneet Kaur Dr Monika Bhattacharya (Electronics)	Attended International Symposium on “History and Future of Transistors” organised by IEEE EDS Delhi Chapter on December 23, 2021.
Dr Ravneet Kaur Ms Gauri Ghai (Electronics)	Attended 6-Day Boot camp entitled “Virtual Lab Development 1.0” organized by ANDC, University of Delhi, New Delhi from January 17-22, 2022
Dr Ravneet Kaur (Electronics)	Attended IP Awareness/Training program under National Intellectual Property Awareness Mission organized by Intellectual Property Office, India on December 29, 2021
Ms Gauri Ghai (Electronics)	Development of Competency Framework and Revisiting of the Learning Outcomes in Science and Mathematics organized by Department of Education in Science and Mathematics, NIE, NCERT from February 28-March 04, 2022 and March 07-11, 2022. Participated in Science Adda organized by ANDC, University of Delhi on December 20, 2021
Dr Monika Bhattacharya (Electronics)	Attended One Week Online International Workshop on Statistical Data Analysis using SPSS, May 21-27, 2022, organized by Aryabhatt Institute of Academic and Research, Lucknow and Science Tech Institute (run by MKS Educational Society), Lucknow, UP India. Participated in Science Adda organized by ANDC, University of Delhi on December 20, 2021.
Mr Abhay Pratap Singh (Environmental Science)	Attended National Webinar on “Scope of Wildlife Biology” held on August 12, 2021 organized by Department of Zoology, Dhempe College of Arts and Science
Dr. Sarita Agrawal (Mathematics)	Participated in IP awareness/ Training program under the National Intellectual Property Awareness Mission on December 29, 2021 organised by Intellectual Property office ,India.
Dr Meenu Mohil (Physics)	Attended six-day online workshop titled “ First Step towards Developing Virtual Lab Using MernStack” organised by Department of Computer Science, Acharya Narendra Dev College from October 09-24, 2021 (onWeekends).
Dr Ranjeet Singh (Physics)	Attended Live Webinar on ‘Accelerate your research using Elsevier’s Scopus’ at University of Delhi on February 11, 2022
Prof. Rachna Joshi (Physics)	Attended webinar on “Managing References made easy using Mendeley” organized by University of Delhi in collaboration with Elsevier on May 25, 2022
Dr Satya Prakash Yadav Dr Ambika Dr Sanjay Kumar (Physics)	IP Awareness/Training program under National Intellectual Property Awareness Mission on January 19, 2022
Dr Aman Phogat (Physics)	LabVIEW Augmented Experimentation Workshop, Maharaja Institute of Technology Mysore, August 28 and September 04, 2021
Prof. Sarita Kumar (Zoology)	Research and Innovation in STEM (IRIS) National fair, January 15-21, 2022 AHI EVRAN International Conference on Scientific Research, Kırşehir Ahi Evran University, Turkey, November 30-December 02, 2021.

Dr Aparna Sharma (Zoology)	Program under National Intellectual Property Awareness Mission on December 29, 2021 organized by Intellectual Property Office, India. Attended International Conference on Chronobiology 2021 held from July 15-17, 2021. Attended IP Awareness/Training
Dr Sweety Shrimali (Zoology)	Attended the 'IP Awareness/Training Program' organized under the National Intellectual Property Awareness Mission by the Intellectual Property Office, India on December 29, 2021. Attended the 'International Conference on Chronobiology (ICC 2021)' organized by Jawaharlal Nehru Centre for Advanced Scientific Research (JNCASR), Bangalore, INDIA and UC Davis, USA, July 15-17, 2021.
Dr. Rahul Dev (Zoology)	<ul style="list-style-type: none"> • Participated in the webinar on "Intellectual Property Rights in Academics" organized by Research Committee in collaboration with IQAC, Kalindi College, University of Delhi on September 30, 2021 • Attended webinar on "IP Awareness/Training Program under National Intellectual Property Awareness Mission" organized by Intellectual Property Office, India on December 29, 2021 • Participating in the 6th Annual International Conference of INSCR on "Microbes in Sustainable Development" organized by University of Delhi colleges, COCAS (PU) and PhiXgen Pvt. Ltd., Gurugram from 15th to 18th November 2021
Ms Bhumika Chauhan (Zoology)	Attended three (Online) days International Conference organized by Zakir Hussain College, University of Delhi from May 25-27, 2022.

5.8 Faculty as Editors/Reviewers/Advisory

Faculty (Department)	Name of Journal/Committee
Prof. Urmi Bajpai (Biomedical Science)	<p>Mentor: "<i>In-silico</i> analysis of Lysin genes against ESKAPE pathogens". Ex Gratia Basis July-September, 2021</p> <p>Advisor, "Design & Development of Recombinant Lysins against ESKAPE Pathogens and E.coli. September, 2021 for one year. Consultancy Amount INR 10 Lakhs</p> <p>Honorary Advisor, "Development of recombinant lysins against drug-resistant <i>Escherichia coli</i> causing urinary tract infections appropriate expression system". Approved for funding under BIRAC's BIG scheme, Department of Biotechnology, GoI.</p>
Prof. Gagan Dhawan (Biomedical Science)	<p>Appointed as a 'Grant Reviewer' by Engineering and Physical Science Research Council (EPSRC), United Kingdom for reviewing a research proposal submitted by a team at Imperial College London, UK</p> <p>Associate Editor: Current Research in Drug Discovery</p> <p>Member, Editorial Board: Technology in Cancer Research & Treatment (SAGE)</p> <p>Reviewer: Organic and Biomolecular Chemistry (RSC), Chemical Communications (RSC), Green Chemistry (RSC), Polymer International (Wiley), IET Nanobiotechnology (Wiley), Therapeutic Advances in Medical Oncology (SAGE), Scientific Reports- Nature Publishing House, Agriculture and Food Security- BMC (Part of Springer Nature), Biotechnologia Chemical Papers (Springer), Chemistry and Biodiversity (Wiley), Journal of Biomolecular Structure and Dynamics (Taylor and Francis), Future Medicinal Chemistry (Future Medicine), Technology in Cancer Research & Treatment (SAGE), Applied Organometallic Chemistry (Wiley)</p>

Dr Anita Narang (Botany)	Reviewer: Plant Science Today Journal a Scopus Web of Science indexed Journal.
Prof. Charu Khosla Gupta (Botany)	Reviewer and Judge for the 8 th International Conference on Education 2022 (ICEDU-22) held from March 24-26, 2022, organised by The International Institute of Knowledge Management, Sri Lanka.
Prof. Pankaj Khanna (Chemistry)	Reviewer : Chemistry Select, Wiley and Chemistry & Biodiversity, Wiley.
Prof. Sharanjit Kaur (Computer Science)	Reviewer: International conference DEXA 2022 (August 22-22, 2022) Reviewer: Internal Conference ICICCT July 16, 2022, India
Prof. Amit Garg (Electronics)	Reviewer: Journal of Chemical Technology & Biotechnology published by Wiley, Journal of the Taiwan Institute of Chemical Engineers and Analytical Methods published by the Royal Society of Chemistry
Dr Ravneet Kaur (Electronics)	Expert Reviewer for IT related Vocational Education courses at Bhartiya Shiksha Board (BSB)
Dr Monika Bhattacharya (Electronics)	<ul style="list-style-type: none"> • Expert Reviewer for IT related Vocational Education courses at Bhartiya Shiksha Board (BSB) • Member of Syllabus Drafting committee (for new UGCF framework under NEP) for the following subjects: <ul style="list-style-type: none"> • CAD Designing (SEC) • Artificial Intelligence & Machine Learning (DSE) • PCB Designing and Fabrication (SEC) • Embedded Systems (DSC) • Artificial Intelligence (GE) • Advanced Machine Learning • Soft Computing
Dr Chaman Singh (Mathematics)	Reviewer: International Transactions in Mathematical Science and Computer, International Journal of Inventory Control and Management
Prof. Arijit Chowdhuri (Physics)	Reviewer: Journal of ES Materials & Manufacturing Technical Session Judge at The 8th International Conference on Education 2022 Education In Times of Uncertainty: Preparing For The Future” held online from March 24-26, 2022
Dr Siddhartha (Physics)	Reviewer: ACS Journals, Asian Journal of Chemical Science, Journal of Applied Polymer Science

Prof. Sarita Kumar (Zoology)	<ul style="list-style-type: none"> • Member of Board of Research Studies, University of Delhi (till Feb 2022) • Member of Committee of Courses, Department of Zoology, University of Delhi (till Dec 2021) • Coordinator of the 'Sub-Committee 1' constituted for pre-screening of application of promotion cases of faculty members, Acharya Narendra Dev College • Editor of Theory and Practical course material of '<i>Insect and Vector Borne Diseases</i>' for B.Sc. General with Zoology Program, IGNOU • Editor of Theory and Practical course material of '<i>Human Physiology</i>' for B.Sc. (H) Biochemistry, IGNOU • External Expert in Doctoral Committee, Ph.D. Life Science, IGNOU • External Expert for the Development of M.Sc. Zoology Course, IGNOU • Editorial Board: Frontiers in Physiology (Switzerland); Vector Biology Journal (USA); The Open Access Journal of Science and Technology (UK); Journal of Applied and Natural Science (Haridwar); Journal of Advances in Medicine and Medical Research' (previously called British Journal of Medicine and Medical Research) (India, USA and UK) • Reviewer: Scientific Reports (USA), Inorganic and Nano-metal Chemistry (UK), Frontiers in Physiology (Switzerland), Frontiers in Public Health (Switzerland), Frontiers in Pharmacology (Switzerland), Royal Society Open Science (UK), Malaria Journal (UK), Environmental Science and Pollution Research (Germany)
Prof. Monisha Khanna Kapur (Zoology)	Journal of Environmental Management
Prof. Seema Makhija (Zoology)	Reviewer: International Journal of Agriculture and Biology, Environmental Science and Pollution Research, Microbial Research, PLoS ONE, Heliyon

5.9 Membership of Various Societies/Panels

Faculty (Department)	Achievements
Prof. Urmi Bajpai (Biomedical Science)	Constituent member: University of Delhi NEP 2020 Interdisciplinary Courses Sub-Committees. October 2021-January 2022.
Prof. Charu Khosla Gupta (Botany)	<ul style="list-style-type: none"> • Life Member Delhi University Botanical Society • Life member of Association of Teachers in Biological Science
Dr Sumit Sahni (Botany)	Life Membership of Society of Indian Network for Soil Contamination Research
Dr Pooja Bhagat (Chemistry)	<ul style="list-style-type: none"> • Life member of Indian Science Congress • Life member of Indian Society of Analytical Science • Life member of Association of Chemistry Teachers
Prof. Rashmi Thukral (Chemistry)	<ul style="list-style-type: none"> • Life membership of Indian Society Of Analytical Scientists Delhi Chapter India Organisation-IOC Ltd, Faridabad • Life membership of Indian Association of Chemistry Teachers • Life membership of The Indian Science Congress Association
Prof. Geetu Gambhir (Chemistry)	<ul style="list-style-type: none"> • Life member of Indian Society of Analytical Science • Life member of Association of Chemistry Teachers

Dr Manisha Jain (Chemistry)	<ul style="list-style-type: none"> • Member, Committee for formulation of ‘Undergraduate Curriculum Framework (UGCF) based on National Education Policy (NEP) 2020’ for B.Sc. Physical Science and B.Sc. Life Sc. (April 2022) • A working group member of Chemistry Undergraduate Syllabi Revision 2019, in the light of UGC’s Learning Outcome-Based Curriculum Framework (UGC-LOCF) to revise the Generic Elective Course titled ‘Atomic Structure, Bonding, General Organic Chemistry (Theory + Practical)’ in life Science (CBCS).
Dr Kavita Mittal (Chemistry)	Life Member, Chemical Research Society of India, India
Dr Sandeep Kumar Goel (Commerce)	<ul style="list-style-type: none"> • Life Member, Indian Commerce Association. • Life Member, Indian Accounting Association.
Dr Shalu Mahajan (Commerce)	<ul style="list-style-type: none"> • Indian Accounting Association, Membership no. DH-225 • Indian Commerce Association, Membership no. D214
Dr Jitender Goel (Commerce)	<ul style="list-style-type: none"> • Life Member, Indian Accounting Association • Life Member, Indian Commerce Association
Prof. Sharanjit Kaur (Computer Science)	Member of Computer Society of India
Mr Mahesh Kumar (Computer Science)	Associate Member, Computer Society of India.
Prof. Amit Garg (Electronics)	Member of Society of Photo-Optical Instrumentation Engineers (SPIE)
Dr Monika Bhattacharya (Electronics)	<ul style="list-style-type: none"> • Member of IEEE, Electron Devices Society • Expert Reviewer for IT related courses in Bhartiya Shiksha Board
Dr Chaman Singh (Mathematics)	<ul style="list-style-type: none"> • Life Time Member of Operational Research Society of India • Life Time Member of Association for Advancement in Combinatorial Science
Prof. Arijit Chowdhuri (Physics)	<ul style="list-style-type: none"> • Life member (OM No 7197) of Indian Association of Physics Teachers (IAPT) • Life member (LM 975) of Plasma Science Society of India (PSSI)
Prof. Rachna Joshi (Physics)	<ul style="list-style-type: none"> • Life member, Indian Association of Physics teachers (Membership No. - OMNO: 7196) • Life member, Plasma Science Society of India (Membership No. - LM 1766) • Life Member, Indian Society of Atomic and Molecular Physics (Membership No. - 1664) • Life Member, Division of Plasma Physics, Association of Asia Pacific Physical Societies (Membership No. - 2110) • Life Member, Indian Laser Association (Membership No.: LM1465) • Regular Fellow, Optical Society of India (Member No.1772)
Dr Ambika (Physics)	<ul style="list-style-type: none"> • Life Member, Nuclear Track Society of India (NTSI)

Prof. Sarita Kumar (Zoology)	<ul style="list-style-type: none"> Life member of Indian Science Congress, Delhi Chapter Life member of Association of Teachers in Biological Science (ATBS) Life member of National Academy of Vector Borne Diseases, Bhubaneswar Life member of Indian Society of Parasitology, Lucknow Member of Scientific Advisory Board, Virginia, USA Member of WikiEducator Community, India (www.wikieducator.org/User:Saritasanjay)
Prof. Monisha Khanna Kapur (Zoology)	<ul style="list-style-type: none"> Member of the Institutional Biosafety Committee (IBSC) Life member of Association of Microbiologists of India (AMI). Life member of Journal of Microbial World. Life member of Association of Teachers in Biological Science. Life member of Indian Network for Soil Contamination Research (INSCR)
Prof. Seema Makhija (Zoology)	<ul style="list-style-type: none"> Life Member, Indian Society of Cell Biology Life Member, International Society of Protistologists Life Member of INSCR Life Member, Association of Teachers in Biological Science Member of Institutional Biosafety Committee

5.10 Other Achievements

Faculty (Department)	Achievements
Dr Sunita Jetly (Biomedical Science)	<ul style="list-style-type: none"> Appreciation certificate as Program officer PO from Ministry of Ayush for Yoga and Nature cure program (June 18-21, 2021) State Blood Cell Officer for coordination of colleges of university of Delhi for thalassemia awareness and Screening Session chair in one of the sessions in the International Conference on infection and immunity 2nd Prize in poster presentation in Online International Conference on Infection and Immunity (October 08-10, 2021), organized by Daulat Ram College, University of Delhi
Dr Rajesh Chaudhary (Biomedical Science)	<ul style="list-style-type: none"> Newspaper report published with respect to my statement in Times of India https://m.timesofindia.com/city/delhi/tailless-lineblue-butterfly-spotted-in-delhi-for-first-time/amp_articleshow/91424105.cms
Dr Satendra Singh (Biomedical Science)	Committee member for New Education policy syllabus revision for UGCF 2020
Dr Anita Narang (Botany)	Actively involved in designing NEP syllabus for Botany(H) and B.Sc. (Life Science)
Dr Sumit Sahni (Botany)	<ul style="list-style-type: none"> Establishment of V-Labs @ ANDC. Working as a Nodal Coordinator of Nodal Center of Vlab @ IIT-DELHI at ANDC. Establishment of Mushroom Research and Skill Development Centre

Dr Anita Thakur (Botany)	<ul style="list-style-type: none"> • Member of the team organizing the educational trip of Botany 2nd-year students to Dhanaulti, Uttarakhand in the academic year 2021-22. • Member of the team organizing the educational trip of Botany 1st-year students to Mukteshwar, Uttarakhand in the academic year 2021-22.
Dr Manisha Jain (Chemistry)	<ul style="list-style-type: none"> • A working group member of Chemistry Undergraduate Syllabi Revision 2019, in the light of UGC's Learning Outcome-Based Curriculum Framework (UGC-LOCF) to revise the Generic Elective Course titled 'Atomic Structure, Bonding, General Organic Chemistry (Theory + Practical)' in c. life Science (CBCS). • Confidential work at UPSC on Feb 25, 2022. • Confidential work at UPSC on Jan 12-14, Jan 18 and Jan 20-21, 2022 • Convenor/Nodal Officer, ECA Admissions (Undergraduate), (2021-2022)
Dr Pragati Malik (Chemistry)	<ul style="list-style-type: none"> • Paper Setter of Haryana Public Service Commission, October 28-30, 2021 • Paper Setting at National Testing Agency, September 3, 2021
Dr Sandeep Kumar Goel (Commerce)	<ul style="list-style-type: none"> • Joint Secretary, Indian Commerce Association, Delhi NCR Chapter. • Executive Member, Indian Accounting Association, Delhi Chapter. • Founder Director, ANDC inStart Foundation, Section 8 Company. • Research Advisory Committee, Ph.D. student, Vivek Jaiswal, Department of Commerce, Delhi School of Economics, University of Delhi. • Member, Syllabus Revision Committees, Under Graduate Curriculum Framework (UGCF) 2022 for B.Com.(Hons.), B.Com. (Programme) and B.A.(Programme)-Banking and Insurance, Department of Commerce, Delhi School of Economics, University of Delhi. • Member Expert Committee to design the Programme Structure and First year syllabus as per N E P, BVoc (A&F), Ambedkar University, Delhi. • Superintendent, IGNOU Examination June 2021 TEE conducted at Acharya Narendra Dev College, August-September 2021. • Board Member for Conduct of M.Phil./Ph.D. Interviews, Department of Commerce, Delhi School of Economics, University of Delhi, December 27-29, 2021. • Part-Time Assistant Coordinator, IGNOU Learning Support Centre (07191), Acharya Narendra Dev College since February 2022.
Dr Jitender Goel (Commerce)	Associate Editor: The biannual newsletter, "The Chronicles" of the Department of Commerce, Acharya Narendra Dev College.

Dr Sunita Narang (Computer Science)	Member of syllabus drafting committee as per UGCF 2022 based on NEP 2020 guidelines for B.Sc. (H) Computer Science, Paper: DSE – Database Management System, GE3 - Database Management System
Dr Harita Ahuja (Computer Science)	Member of syllabus drafting committee as per UGCF 2022 based on NEP 2020 guidelines for B.Sc. (H) Computer Science, Paper: DSE -Computer Graphics
Prof. Amit Garg (Electronics)	<ul style="list-style-type: none"> • Member, Curriculum Design Committee, Bhartiya Shiksha Board (BSB) for classes IX-X- Coding, Artificial Intelligence, Classes IX-XII-Electrical and Electronics Technology • Content Reviewer, BSB for the papers -Mobile Applications, Coding • Teaching of Ph.D. Coursework: • Teaching one of the papers in the Ph.D. course work, 2022- ES-2 Fabrication, Characterization Techniques for Electronic Materials • Subject Expert in the Selection Committee for appointment of Assistant Professor for B.Tech Programmes running in an affiliated engineering college under GGSIPU, Delhi.
Dr Chaman Singh (Mathematics)	<ul style="list-style-type: none"> • Gautam Buddha University, Noida: Registered as Co-Supervisor SRM University, NCR Campus, Modinagar: Registered as Co-Supervisor • Establishment of Research Labs: Mathematical Research Center for Advancement in Combinatorial Science (MRCACS) which provides facilities to students to do research in different fields of Mathematics. Presently students are enrolled in the field of Optimization and Dynamical Systems
Dr. Sarita Agrawal (Mathematics)	<ul style="list-style-type: none"> • Received Certificate of Commitment on 73rd Republic Day Celebrations on January 28, 2022 from the Deputy Secretary (IT), Ministry of Defense.
Dr Mamta Bhatia (Physics)	<ul style="list-style-type: none"> • Women and STEAM : Conducted session as course Instructor at one week online International Certificate program titled : Women and Sustainable Business Development, January 20-25, 2022,in collaboration with National Law University, Delhi and Trakya University, Turkey • “Women and Sustainable Business Development” Program coordinator of one week online International Certificate program, January 20-25, 2022,in collaboration with National Law University, Delhi and Trakya University, Turkey

<p>Prof. Subhash Kumar (Physics)</p>	<ul style="list-style-type: none"> • Member of ‘Special Taskforce on Global Rankings’ for the year 2021-22 of the University of Delhi constituted by the Hon’ble VC, University of Delhi. • Member of the ‘GATI (Gender Advancement for Transforming Institutions)’ projectsponsored by the Department of Science & Technology, GoI at University of Delhi • Member of Project ‘RISHII (Resources for Internationalization of Higher EducationInstitutions in India)’, which is co-funded by the Erasmus+ Programme of the EuropeanUnion. University of Delhi being one of the partners of this international project whereinthree Departments of the University of Delhi, viz. Department of Physics and Astrophysics,Department of Social Work and Faculty of Law are representing the University underRISHII. • Member of Interdisciplinary Sub-Committees / Working Groups constituted for assistingthe National Education Policy (NEP) Inter-disciplinary Courses Committee, University ofDelhi in framing the syllabi for the NEP Interdisciplinary Courses. • Member of the Sub-Committees / Working Group for the Interdisciplinary course(VAC-Value Added Course) on ‘IT Skills, Data Analysis and Mathematics’ • Member of the Editorial Board of the University of Delhi for the 98th Annual Report of the year 2020-2021 of the University.
<p>Prof. Sarita Kumar (Zoology)</p>	<ul style="list-style-type: none"> • Certificate awarded from ‘<i>Indian Science & Engineering Fair (INSEF) 2022</i>’, for guiding the student’s projects; Jan 26, 2022 • Recognized as a project guide to Atharv Gupta for participation of the project ‘<i>Formulations and Synthesis of Inert Compounds with Toxic and Biochemical Altering Potency against Aedes aegypti</i>’ in IRIS National Fair, Jan 15-21, 2022 • Recognized as a project guide to Devaj Gupta for participation of the project ‘<i>Multifunctional Activity of Graphene oxide-based Nanofor-mulations with Malathion and Endosulphan against Aedes aegypti</i>’ in IRIS National Fair, Jan 15-21, 2022 • Appointed Academic Editor of the book ‘<i>Advances in Diptera – In-sight, Challenges and Management Tools</i>’, IntechOpen, London, UK • Member of Institutional Animal Ethics Committee (IAEC), IGNOU
<p>Prof. Monisha Khanna Kapur (Zoology)</p>	<ul style="list-style-type: none"> • Placement of Ph.D. student registered under the Supervision of College Faculty • Dr Prateek Kumar as Assistant Professor (PG Department) in Department of Zoology, University of Allahabad

Prof. Seema Makhija (Zoology)	<ul style="list-style-type: none"> Session Co-chair during the 6th Annual International Conference of INSCR on “Microbes in Sustainable Development from November 15-18, 2021 Scientific Chair for the “Keynote Session” in HEALTH 2021 Virtual International Conference on “Cancer Biology : Advances and Challenges” held on November 11-13, 2021 in Deshbandhu College, University of Delhi Session chair for one of the sessions in the Three day International Conference on Infections and Immunity held from October 08-10, 2021 in Daulat Ram College, University of Delhi
----------------------------------	---

5.11 Ph.D. Awarded to the Faculty

Faculty (Department)	Thesis Title and Year	Institution
Dr Vishal Dhingra (Electronics)	Studies on gas sensing properties of graphene oxide post tailoring through sonication and nanostructured catalyst (Awarded on February 26, 2022)	Department of Electronic Science, South Campus, University of Delhi
Dr Aman Phogat (Physics)	Development of Resistive Plate Chambers and Front-end Electronics for ICAL Experiment (Awarded on February 26, 2022)	Department of Physics and Astrophysics, University of Delhi

5.12 Faculty Registered for Ph.D. Programme

Sl. No.	Faculty	Title of thesis	Institution	Month of Registration
1	Ms Sangeeta Relan (Commerce)	Corporate Governance and Gender Diversity	Department of Commerce, Faculty of Commerce and Business, Delhi School of Economics, University of Delhi	January 2022
2	Ms Anuradha Sarin (Commerce)	Employee behavior, work systems and employer performance-An exploratory study in select organizations	Department of Commerce, Faculty of Commerce and Business, Delhi School of Economics, University of Delhi	September 2019
3	Ms Poonam Chauhan (Commerce)	An empirical study of the impact of Micro finance systems of SBI on poverty eradication and women empowerment	Mahrishi university of information technology	July 2021
4	Ms Sapna (Commerce)	Cost and Productivity analysis of good grain crops in Haryana	Mahrishi Dayanand University, Rohtak	March 2016

5	Ms Deepika (Commerce)	Political marketing is an Indian context	Delhi School of Economics, University of Delhi	September 2019
6	Ms Bhawna Kaushik (Chemistry)	Design and Fabrication of Visible Light Responsive Zinc based Magnetic Photocatalysts for Effective Heteroarylation, Nitrobenzene Reduction and Degradation of Organic Pollutants	Department of Chemistry, University of Delhi	November 2018
7	Mr Dinesh Kumar (Electronics)	Synthesis and Characterization of Polymer nanocomposites thin films and its applications	Department of Electronics, University of Delhi	May 2019
8	Mr Gaurav Sharma (Mathematics)	Study of some fuzzy game theoretic models	Department of Mathematics, University of Rajasthan	July 2018
9	Mr Gurudutt Rao Ambedkar (Mathematics)	Optimization of Green Inventory	Department of Mathematics, University of Delhi	March 2021
10	Ms Bhumika Chauhan (Zoology)	Morphological and Molecular studies on Intestina parasites of freshwater fish, Channa striata (Snakehead Murrel) from Meerut region	Chaudhary Charan Singh University, Meerut	March 2022
10	Mr Vineet Girdharwal (Zoology)	General Ecology of Spotted Owlet (Athene Brama) in Urban and Wilderness Area of Meerut, Uttar Pradesh, India	Dr Gargi M.M.M. College CCS University, Meerut	March 2022

5.13 Faculty Development Programmes/ Refresher Course Attended by Faculty

Faculty	Name of the Course	Organized by	Duration
Dr Rimpay Kaur Chowhan (Biomedical Science)	FDP on Basics of Research	Mahatma Hansraj Faculty Development Centre, Hansraj College, University of Delhi.	June 18-24, 2021
Dr Anupama Shukla Dr Anita Narang (Botany)	Executive Development Programme (equivalent to Certificate course) on "Hands on with MS Office Essentials"	Department of Vocation, Ramanujan College; University of Delhi	July 19-September 03, 2021
	FDP on Environmental Audit	Kirori Mal College, University of Delhi in association with MHRD PMMMNMIT	June 28-July 02, 2021

Dr Sumit Sahni (Botany)	Advanced Online Refresher Course/Two Week Faculty Development Program on Data Visualization with Tableau	Guru Angad Dev Teaching Learning Centre-A Centre of Ministry of Education under PMMMNMTT	August 12-25, 2021
	International (Online) Multidisciplinary Faculty Development Programme On 'Applications of Genomics, Metagenomics and Bioinformatics in Biological Systems'	Mahatma Hansraj Faculty Development Centre-A Centre of MoE, Govt. of India.Under Pandit Madan Mohan Malaviya National Mission on Teachers and Teaching (PMMMNMTT)	August 16-20, 2021
Prof. Rashmi Thukral (Chemistry)	FDP on Building Academic Leaders for 21 st Century Higher Education	Guru Angad Dev Teaching Learning Centre under the PMMMNMTT of Ministry of Education.	April 14-20, 2022
Dr Pooja Bhagat (Chemistry) Prof. Seema Makhija (Zoology)	V-Lab Development Bootcamp 1.0	Acharya Narendra Dev College under the aegis of DBT STAR College Scheme	January 17-22, 2022
Dr Neeti Misra (Chemistry)	Online interdisciplinary two-week refresher course on 'Managing online classes and co-creating MOOCS 11.0	Teaching Learning Centre, Ramanujan College, University of Delhi under the aegis of PMMMNMTT	February 07-21, 2022
Prof. Geetu Gambhir (Chemistry)	Faculty Development Program Four-Quadrant Model for Development of E-Content, MOOCs and Teacher's e-Kit	Guru Angad Dev Teaching Learning Centre, SGTB Khalsa College, University of Delhi under the Pandit Madan Mohan Malaviya National Mission on Teachers and Teaching (PMMMNMTT) of Ministry of Education	September 29-October 05, 2021
Prof. Geetu Gambhir (Chemistry)	Faculty Development Program Assessment and Evaluation in Higher Education	Guru Angad Dev Teaching Learning Centre, SGTB Khalsa College, University of Delhi under the Pandit Madan Mohan Malaviya National Mission on Teachers and Teaching (PMMMNMTT) of Ministry of Education.	July 14-20, 2021
Dr Kavita Mittal (Chemistry)	FDP on Digital Pedagogy and Climate Change Education Across Disciplines	Sri Venkateswara College, University of Delhi, India in collaboration with TROP ICSU, a Climate Change Education Project by the International Union of Biological Science (IUBS)	August 28, 2021

Mr Ankit Singh Ms Hanisha Bhagat (Commerce)	FDP on ICT Tools for Effective Teaching Learning	Kamla Nehru Mahavidyalaya, Nagpur	May 23-28, 2022
	FDP on Digital Skills for Educators	Saraswati College of Professional Studies, Ghaziabad	May 01-08, 2022
	FDP on Research Methodology in Social Science	Bhavan's Vivekanand College of Science, Humanities & Commerce	April 18-22, 2022
	FDP on Digital Pedagogy for 21 st Century Teachers	G.H. Raisonni University Saikheda (M.P)	March 01-08, 2022
	FDP on Research in Social Science: Contemporary Trends, Perspectives, and Pedagogy	Jawahar Lal Nehru University and Galgotias University	February 07-13, 2022
	FDP on Personal Finance and Tax Planning (An Interdisciplinary Approach)	Guru Angad Dev Teaching Learning Centre, SGTB Khalsa College, University of Delhi	November 18-24, 2021
Prof. Sharanjit Kaur (Computer Science)	FDP on Effective Teaching of Machine Learning	IIIT Delhi and ACM India Council	January-May 2022 (36 hours)
	FDP on Deep Learning for Time Series Data	Electronics & ICT Academy, NIT Warangal, Telangana, India and Pondicherry University, Kalapet, Puducherry	December 20-30, 2021 (40 hours)
Dr Sunita Narang (Computer Science)	FDP on “Managing On-line Classes & Co- Creating MOOCS (Level 2)”	Teaching Learning center, Ramanujam College, University of Delhi, PMMMNM, MHRD	June 02-16, 2021
Ms Gunjan Rani (Computer Science)	Completed a Faculty Development/Induction Programme	Ramanujan College	March 21– April 19, 2022
	Attended Online FDP on “Internet of Things (IoT)”	AICTE Training and Learning Academy	December 06-10, 2021
Mr Mahesh Kumar (Computer Science)	Online Two Week Inter-disciplinary Refresher Course/ FDP on “Managing Online Classes & Co- Creating MOOCS (Level 2)”	Teaching Learning Centre, Ramanujan College, University of Delhi	June 02-16, 2021
	4-Week Induction/Orientation Programme for “Faculty in Universities/Colleges/ Institutes of Higher Education”	Teaching Learning Centre, Ramanujan College, University of Delhi	March 21-April 19, 2022

Prof. Amit Garg (Electronics)	Workshop (Online) On “Trans-disciplinary Areas of Research and Teaching.	Shanti Swarup Bhatnagar (SSB) Awardee on Affordable Health- care Technologies in Sensing, Drug Delivery & Therapy by Professor Rohit Srivastava, Himanshu Patel Chair Profes- sor and Head, Department of BSBE, IIT Bombay.	January 10, 2022
	Two Days online Lecture Series on Fundamentals and Applications of Technology Driven Sensors”	IEEE Electron Devices Society Delhi Chapter	September 24-25, 2021
Dr Monika Bhattacharya (Electronics)	One Week Online Faculty Development Program On Advanced Research Meth- odology Applicable in New Education Policy.	Digvijai Nath Post Graduate College Gorakhpur & Science Tech Institute, Lucknow	June 21-28, 2022
	One Week Online International Workshop on Statistical Data Analysis using SPSS	Aryabhatt Institute of Academic and Research, Lucknow & Science Tech Institute (run by MKS Educational Society), Lucknow, UP India	May 21-27, 2022
Mr Abhay Pratap Singh (Environmental Science)	FDP on Wildlife Conserva- tion and Management	Daulat Ram College, Univer- sity of Delhi in collaboration with Mahatma Hansraj Faculty Development Centre, Hansraj College, University of Delhi	October 04-09, 2021
Ms Anupama Rastogi (Mathematics)	FDP on ‘Creation and De- velopment of MOOCS while managing online classes’	Keshav Mahavidyalaya, University of Delhi	August 24-31, 2021
	FDP on ‘Advance Research Methodology Applicable in New Education Policy’	Digvijai Nath Post Graduate College, Gorakhpur, UP and Science Tech Institute, Luc- know, UP	June 22-28, 2022
	FDP on ‘Graph Theory and its Applications’	Deshbandhu College, University of Delhi	September 15-21, 2021
	FDP ‘One Week Online International Workshop on Statistical Data Analysis using SPSS’	Aryabhatta Institute of Aca- demics and Research, Lucknow, UP and Science Tech Institute, Lucknow, UP	May 21-27, 2022
Dr Deo Datta Aarya (Mathematics)	FDP on Data Analytics & Mathematical Software Tools	Teaching Learning Centre, Ra- manujam College (DU)	February 25- March 03, 2022
	FDP on Differential Equa- tions and Mathematical Modeling	Department of Mathematics, Jaypee Institute of Information Technology, Noida (U.P.)	February 14-27, 2022

Dr Neeti Goel (Mathematics)	Recent Developments in Mathematical Science And Engineering	AICTE Training And Learning (ATAL) Academy at Maharshi Dayanand University, Rohtak	December 21-26, 2021
Dr Meenu Mohil (Physics)	FDP on Advanced Linear Algebra	Miranda House, University Of Delhi	September 27- October 01, 2021
	FDP on Personal Financial Planning and E-filing of Income Tax Returns	Sri Aurobindo college, University of Delhi.	September 02-08, 2021
Dr Ranjeet Singh (Physics)	Online Two-Week Refresher Course in 'Physics	Teaching Learning Centre, Ramanujan College, University of Delhi under the aegis of Ministry of Education, Pandit Madan Mohan Malaviya National Mission on Teachers and Teaching	October 27-November 10, 2021
	Online Two – Week Inter Disciplinary Refresher Course / Faculty Development Programme on 'Managing Online Classes & Co – Creating MOOCS 6.0	Teaching Learning Centre, Ramanujan College, University of Delhi under the aegis of Ministry of Education, Pandit Madan Mohan Malaviya National Mission on Teachers and Teaching	July 05-19, 2021
Prof. Subhash Kumar (Physics)	Successfully completed the course conducted online titled 'Astronomical Analysis	Teaching Learning Centre (TLC) of IUCAA (Inter University Centre for Astronomy & Astrophysics, Pune) in online mode. The TLC is supported by PMMMNMTT scheme of the Department of Education, Govt. of India 2021). After evaluation, was placed as top 5 candidates of the course	November 08-December 18, 2021
Prof. Subhash Kumar (Physics)	Successfully completed the 12 week course 'Introduction to Astrophysical Fluids', Evaluation completed in proctored examination in August 2021)	NPTEL-SWAYAM under the Ministry of HRD, Govt. of India	January to April 2021
	(Physics)	Teaching Learning Centre (TLC) of IUCAA (Inter University Centre for Astronomy & Astrophysics, Pune) in online mode. The TLC is supported by PMMMNMTT scheme of the Department of Education, Govt. of India	May 10 -June 11, 2021

Prof. Subhash Kumar (Physics)	Successfully participated in 'The Olympiad Exposure Camp in Astronomy'	Homi Bhabha Centre for Science Education (HBCSE) -a national center of Tata Institute of Fundamental Research, Mumbai	Online mode from January 17 to 21, 2022 and Onsite camp during April 06 – 08, 2022 at HBCSE – TIFR campus.
Prof. Rachna Joshi (Physics)	Faculty Development Program On Advanced Research Methodology Applicable in New Education Policy	D. N. P. G. College Gorakhpur and Science-Tech institute Lucknow, U.P. India	June 22-28, 2022
Dr Satya Prakash Yadav (Physics)	4 Week Induction/ Orientation Programme	Teaching Learning Centre, Ramanujan College, University of Delhi	July 19-August 17, 2021
Dr V Bhasker Raj Dr Sanjay Kumar(Physics)	Online Faculty Development Program on MOOC's and E-Learning in Context Of National Education Policy	Delhi School Of Public Policy and Governance, Institution Of Eminence, University of Delhi in Collaboration with National Law University and Judicial Academy Assam and Bhartiya Shikshan Mandal and National Institute of Open Schooling, Ministry Of Education, Government of India	October 18-24, 2021
Dr V Bhasker Raj (Physics)	Online Interdisciplinary Faculty Development Programme on 'MOOC's, E-Content Development, Research Methodology and Statistical Tools in Open Education World'	Kalindi College, University of Delhi in collaboration with Mahatma Hansraj Faculty Development Centre	August 03-17, 2021
Dr Siddhartha Dr Ambika (Physics)	Four -Week Induction Programme for "Faculty in Universities/Colleges of Higher Education"	Teaching Learning Centre, Ramanujan College, University of Delhi under the aegis of Ministry of Education, Pandit Madan Mohan Malaviya National Mission on Teachers and Teaching.	July 17-August 19, 2021
Dr Aparna Sharma (Zoology)	One Week Faculty Development Program (online) on 'Computational Approach to Drug Discovery'	Deshbandu College, University of Delhi and Center for Bioinformatics, Computational and Systems Biology in collaboration with Mahatma Hansraj Faculty Development Center, Hansraj College, University of Delhi	August 02-07, 2021

Ms Bhumika Chauhan (Zoology)	Interdisciplinary Faculty Development Programme (FDP) on “Roadmap for building New India with New Education Policy”	Hansraj College, University of Delhi	July 21-25, 2021
---------------------------------	---	--------------------------------------	------------------

5.14 Faculty on Leave

Sl.No.	Name and Designation	Department	Period	Nature of Leave
1	Dr Mamta Bhatia (Associate Professor)	Physics	November 22, 2021- August 21, 2022	Sabbatical
2	Prof. Sarita Kumar (Professor)	Zoology	April 04, 2022 - March 31, 2023	Sabbatical
3	Dr Shallu Sachdeva (Associate Professor)	Chemistry	July 21- October 26, 2021	Child Care
4	Dr Priti Goyal (Associate Professor)	Physics	March 24 - April 22, 2022	Child Care
5	Dr Surinder Kaur (Associate Professor)	Commerce	March 24 - August 04, 2022	Child Care
6	Dr Harita Ahuja (Associate Professor)	Computer Science	June 04 - November 30, 2022	Maternity

5.15 Research Publications by Faculty in Journals, Magazines, National and International Conferences and Seminars

ANNEXURE-I

5.16 Achievements of Non-teaching staff

5.16.1 Ph.D. thesis submitted by Non-teaching staff

S.No.	Name	Title of Thesis and Details of Submission
1	Ms Arunita Chaukiyal (Computer Science)	Title of thesis – Transmission Power Control in Wireless Sensor Networks Submitted at- Jawaharlal Nehru University, New Delhi Date of Submission – March 2022.

5.16.2 Training/Workshops Attended/Other Achievements by Non-teaching Staff

S. No.	Name	Training/Workshops Attended
1	Mr V.S. Rao Administrative Officer	Attended Four Weeks Online Training Programme on Educational Administration (June 14-July 11, 2021) conducted by India Gandhi National Tribel University, Amarkantak 484887 (M.P.)
2	Mr V.S. Rao Administrative Officer Ms Meenu Malhotra Section Officer (Admin)	One Week Online Training Workshop on “Developing Administrative Skills and Leadership” Programme on Educational Administration (September 25-October 01, 2021) conducted by Shyam Lal College, University of Delhi in collaboration with Mahatma Hansraj Faculty Development Centre, Hansraj College, University of Delhi.
3	Ms Meenu Malhotra Section Officer (Admin)	One month Online workshop on “Preventive Healthcare: Yog for Anxiety and Stress Management during Covid Pandemic” Organized by the Department of Physical Education and Internal Quality Assurance Cell (IQAC) Janki Devi Memorial College from May 21-June 21, 2021.
4	Ms Namrata Arora (Officiating Librarian)	<ul style="list-style-type: none"> Completed certificate course in German from Acharya Narendra Dev College (University of Delhi) in first division with distinction Attended a workshop on Use of Web of Science in research held on dated April 07, 2022 organized by Delhi University Attended a webinar on “Understanding Plagiarism Detection Software Ouriginal” organized by University of Delhi in association with eGalactic, Pune on January 28, 2022 Attended a webinar on Selective Dissemination of Information Services to Library Users using Print and Open Access resources organized by Delhi College of Arts & Commerce on November 12, 2021 Attended a one-week online training workshop on “Developing Administrative Skills and Leadership” organized by Shyam Lal College and Hansraj College (University of Delhi) from September 25-October 01, 2021
5	Ms Arunita Chaukiyal (Computer Science)	<ul style="list-style-type: none"> “Cisco Network Administration” from March 03-04, 2022 by Mr. Bineet Kumar Joshi, Assistant Professor, Department of Computer Science, Swami Rama Himalayan University “Wireless Security Network” on March 04, 2022, by Prof. Sanjay Kumar Dhurandhar, Netaji Subhas University of Technology, Delhi “Predictive Modelling Using Python” on October 08., 2021 by NiharRanjan Roy, Associate Professor, Sharda University “Semantic Intelligence – The Next Step in Artificial Intelligence” on October 01, 2021 by Dr Sarika Jain, Assistant Professor, Department of Computer Science, NIT, Kurukshetra Five days online workshop on “Face Recognition using Python” by Dr Xavier Chelladurai, Director & Professor, Christ Human Resource Center, October 26-30, 2021 Five days online workshop on “A First Step Towards Developing Virtual Lab Using MERN Stack” by Mr. Prabhat Chandra, Freelance Trainer/Developer from October 09 -24, 2021 (only weekends) Two days online workshop on “Front End WebUI Frameworks Overview: Bootstrap” by Mr. Ashwini Bhatia, Web Designer/ Developer from October 02-03, 2021
6	Mr Diwakar Bhardwaj (Semi Professional Assistant)	Attended a Computer Training Programme of one week duration from September 01-07, 2021 organized by Delhi University Library System.

5.17 Scale Upgradation/Appointments of Teaching/ Non-teaching Staff

5.17.1 Teaching staff: Details of promotion of teaching staff from May 2021 to June 2022

S.No.	Name	Designation	Level	Date of Promotion
1	Prof. Sunita Hooda	Professor	14	July 18, 2018
2	Prof. Seema Gupta (Chemistry)	Professor	14	March 31, 2021
3	Prof. Anju Agrawal	Professor	14	July 18, 2018
4	Prof. Amit Garg	Professor	14	July 18, 2018
5	Prof. Gagan Dhawan	Professor	14	October 06, 2019
6	Prof. Rashmi Thukral	Professor	14	July 18, 2018
7	Prof. Charu Khosla Gupta	Professor	14	July 18, 2018
8	Prof. Vibha Gaur	Professor	14	July 18, 2018
9	Prof. Arijit Chowdhuri	Professor	14	July 18, 2018
10	Prof. Laxmi Narain	Professor	14	July 18, 2018
11	Prof. Pankaj Khanna	Professor	14	August 14, 2020
12	Ms Poonam Chauhan	Associate Professor	13A	March 12, 2021
13	Mr Vishal Dhingra	Associate Professor	13A	February 18, 2013
14	Mr Ravinder Kumar Sagar	Associate Professor	13A	May 07, 2020
15	Dr Vikrant Kumar	Associate Professor	13A	March 18, 2021
16	Dr Chaman Singh	Associate Professor	13A	March 29, 2022
17	Dr Manoj Kumar Garg	Assistant Professor	11	July 10, 2013
		Assistant Professor	12	July 10, 2018

5.17.2 Non-Teaching staff

List of MACP cases of non-teaching staff during the period May 2021 to June 2022

S.No.	Name	MACP	Dated
1	Mr C.L. Pal	2nd MACP	June 27, 2021
2	Mr Ram Niwas Yadav	3rd MACP	December 14, 2021
3	Mr Suresh Kumar	3rd MACP	December 14, 2021
4	Mr Atlesh Kumar Tanwar	3rd MACP	December 14, 2021
5	Mr Sachchidanand Mishra	3rd MACP	December 14, 2021
6	Mr Sanjeev Kumar	3rd MACP	December 14, 2021
7	Mr Kamal Jit Singh	3rd MACP	May 12, 2022
8	Mr Ashutosh	2nd MACP	May 21, 2022
9	Mr Mahesh Chander Kandpal	2nd MACP	May 03, 2022
10	Mr Ashutosh	2nd MACP	May 03, 2022

11	Mr Prem Singh	2nd MACP	May 03, 2022
12	Mr Ashok Kumar	2nd MACP	May 03, 2022
13	Ms Sangeeta Goswami	2nd MACP	May 03, 2022
14	Mr Harish Kumar	2nd MACP	May 03, 2022



**ACHARYA
NARENDRA
DEV COLLEGE**
UNIVERSITY OF DELHI

FLAGSHIP SCHEMES @ANDC

Annual Report 2022



www.andcollege.du.ac.in/

6 FLAGSHIP SCHEMES @ANDC

6.1 *Unnat Bharat Abhiyaan* (UBA)

Project Coordinator: Dr Pooja Bhagat (Chemistry)

The Mission of *Unnat Bharat Abhiyaan* is to enable higher educational institutions to work with the people of rural India in identifying development challenges and evolving appropriate solutions for accelerating sustainable growth. It also aims to create a virtuous cycle between society and an inclusive academic system by providing knowledge and practices for emerging professions and to upgrade the capabilities of both the public and the private sectors in responding to the development needs of rural India.

Acharya Narendra Dev College is one of the participating Institutions in *Unnat Bharat Abhiyan* with Indian Institute of Technology, Delhi as the Regional Coordinating Institute.

6.1.1 Adopted Areas

Under UBA, ANDC has adopted following five rural areas in South Delhi:

1. Khanpur
2. Govindpuri Slum Area
3. Okhla Industrial Area
4. PulPehlad
5. Tajpur Pahari Badarpur

6.1.2 Activities under UBA

Due to pandemic, physical visits to the adopted villages couldn't take place in the first half of the session and hence at that time, UBA @ ANDC team worked virtually and remained in contact with the people. Our team interacted with the villagers over phone calls and WhatsApp chat groups. Regular information and updates were shared with them regarding Covid and its necessary protocols for their safety and hygiene. It was only after when the things were eased a little, UBA volunteers visited these villages and did physical survey.

The following activities were carried out under UBA @ANDC during academic session 2021-22:-

- On December 19, 2021, volunteers conducted a basic survey of the facilities (school, dispensaries, parks, etc.) present in the adopted area Tajpur Pahadi Village (95S, D-block). Volunteers also created awareness on various social issues.
- On January 11, 2022, volunteers created vaccine awareness through digital drive for 15-18 age groups for our adopted areas.
- On February 26, 2022 and March 06, 2022, volunteers conducted survey in adopted areas to collect data of school dropouts and also of residents who were interested in web development workshop being conducted by the college
- On March 16, 2022, holi awareness drive was conducted by volunteers in the adopted slums. Volunteers

requested residents to not throw colour on street animals, to save water and to not use harmful colours.

- On March 29, 2022, volunteers spreaded the news of the free medical health check-up camp to be organized by the college on April 03, 2022 in the Mazdoor Kalyan Camp.
- On April 02, 2022, volunteers conducted a door-to-door survey in Mazdoor Kalyan Camp, Okhla Industrial Area to know the requirements and expectations of the slum residents. Volunteers made a basic list of medical problems faced by residents and made arrangement keeping minute details in mind. They pasted posters at various places in the slum spreading the news of the survey.
- On April 03, 2022, a free medical health check-up camp was organized by UBA@ANDC in Okhla Slum. The camp was organized in collaboration with **ASTHA (NGO)** and **Earth Revital Foundation (NGO)**. ASTHA provided the space and basic infrastructure required for the camp, whereas Earth Revital Foundation provided necessary items to be used in health camp and also PPE kits to health workers. Dr Praveen Bharti and Dr Vikram, Medicine Department, AIIMS, New Delhi, were available for the consultation during the health camp was invited by Earth Revital Foundation.

All the precautions and protocols to prevent the spread of COVID-19 were well taken care of. Sanitizers were extensively used at the entrance, reception table, consultation tables and patient-examination room. Free masks were distributed to all the residents who came for health check-up. Everyone was asked to wear masks.

The camp was inaugurated by one of the senior most citizen of the area, Ms Kiran Devi. Besides the general health check-up in which B.P., oxygen level, pulse, body temperature, proper functioning of heart by stethoscope and weight were measured. Both the doctors checked up around 80 residents in the Camp and gave their consultations to them. Basic medicines were also distributed and other treatments were recommended.

The purpose of the camp was to make the residents aware about their health and also motivate them to lead a healthier and active lifestyle.

- On May 27, 2022, volunteers spread door-to-door awareness on various issues related to summer like heat wave (how to tackle it), regarding water scarcity, saving electricity, cleanliness and various other issues of general importance.

6.2 UGC *Paramarsh* Scheme

Acharya Narendra Dev College was sanctioned ***Paramarsh***, the UGC Scheme for “Mentoring NAAC Accreditation Aspirant Institutions to promote Quality Assurance in Higher Education”. The main objective of the scheme is to enhance the overall quality of the mentee institutions and Mentoring the Non-Accredited Higher Education Institutions to enable them to get accredited. Under the scheme, the college was provided the responsibility of guiding the six Mentee institutions through the services provided for self-improvement, to facilitate sharing of knowledge, acquaint with the information and opportunities for research collaboration and faculty development.

6.2.1 Mentee Institutions

Sl. No.	Name of the Mentee Institutions
1	Dr Nobin Bordoloi College Na-Ali, Dhekiajuli, P.O. Na-Ali Dhekiajuli, Jorhat-9, Assam
2	Manyawar Kanshiram Government Degree College Nand Gram, Ghaziabad – 201 003
3	Holy Family of College of Nursing Okhla Road, New Delhi – 110 025
4	Manyawar Kanshiram Government Degree College, near Somna Toll Plaza, Gabhana (Aligarh), Uttar Pradesh – 202 136
5	Swami Shraddhanand College, University of Delhi, Alipur, Delhi - 110 036
6	A.K.P. Post Graduate College, Kila Road, New Shivpuri Khurja, Distt. Bulandshahr UP

6.2.2 Activities under UGC *Paramarsh* Scheme

Under the *Paramarsh* Scheme, the college conducted following activities during 2021

- An online meeting was held on September 09, 2021 with all the mentee institutions to discuss initiatives and other steps to be taken during this academic year under the aegis of the scheme. The institutions raised various queries which were solved by the Principal and IQAC coordinator.
- Regular meetings were held with the IQAC members of Holy Family College of Nursing, Okhla, New Delhi, in order to help them in documentations and apply for NAAC accreditation. The process of NAAC accreditation was explained at length to enable them to get accredited with a good score.
- An online talk on ‘License and Copyright Considerations in E-content Development’ was organized on December 17, 2021 for the faculty members of Holy Family College of Nursing, Okhla, New Delhi as a part of NAAC requirement. The talk was given by Prof. Savithri Singh, Country Lead, Creative Commons – India to make the faculty aware about the OER, CC licenses and copyright issues while developing e-content.
- A visit was organized to Swami Shraddhanad College, Alipur, Delhi, on December 22, 2021 to acquaint the staff members with the process of NAAC accreditation. The IQAC coordinator, Prof Sarita Kumar, made a presentation for the college staff and explained each step of the process, and solved their queries.

6.3 DBT STAR COLLEGE SCHEME

Star College Scheme was initiated by DBT to support colleges and universities offering undergraduate education to improve science teaching across the country. This scheme aimed for improving critical thinking and ‘hands on’ experimental work at undergraduate (college) level in Science. It is expected to encourage more students to take up higher education in science. Star College Scheme has been divided into two categories viz. first, strengthening of support to science departments for undergraduate education and second, grant of Star College Status. Criteria for selection as a ‘Star College’ is very stringent and budget provision is double for

colleges accorded Star College Status. Department of Biotechnology (DBT) has recommended for support under the strengthening component of the Star College Scheme to seven departments (Biomedical Science, Botany, Chemistry, Electronics, Physics, Zoology and Computer Science) of the College in 2017. Under the strengthening component of the Star College Scheme, DBT has provided a one-time grant of Rs. 5.00 lakhs and Rs. 2.00 lakhs recurring grant for a period of 3 years to each department. This year the 8th Meeting of the Task Force to review on-going colleges supported under DBT Star College Scheme was held from August 25-26, 2020.

The Task Force after reviewing the work done by the college recommended awarding the Star Status to the participating departments in the college with one-time non-recurring grant of Rs. 15.00 lakhs (per department) and recurring grant of Rs. 5.00 lakhs per year per department along with contingency of Rs 1.00 lakhs per year and travel grant of Rs 2.00 lakhs per year for a period of three years. The college has been thus upgraded to Star Status and the financial support by DBT is extended for another 3 years i.e. from May 21, 2020 to May 21, 2023.

Coordinator	Prof. Ravi Toteja
Co-coordinators	Dr Archna Pandey Prof. Seema Makhija
Departmental Coordinators	
Biomedical Science	Dr Archna Pandey
Botany	Dr Rashmi Sharma
Chemistry	Prof. Sunita Hooda
Computer Science	Dr Harita Ahuja
Electronics	Dr Ravneet Kaur
Physics	Prof. Arijit Chowdhuri
Zoology	Prof. Seema Makhija

6.3.1 Interdisciplinary Activities by the STAR Departments

6.3.1.1 International Conferences

(A) International Conference on Mitigating Contemporary Environmental Issues by Sustainable Approaches [ICMCESA-2022]

Chief Patron: Prof. Yogesh Singh, Vice Chancellor, University of Delhi

Patron: Prof. Balaram Pani, Dean of Colleges, University of Delhi and Mr. Anil Kumar Saini, Chairman, Governing Body, Acharya Narendra Dev College

Co-patrons: Prof. Shri Prakash Singh, Director, University of Delhi, South Campus; Prof. Sanjeev Singh, Joint Director, University of Delhi, South Campus and Dr Vikas Gupta, Registrar, University of Delhi

Chairpersons: Prof. Ravi Toteja, Officiating Principal, Acharya Narendra Dev College and Dr Garima Gupta,

Scientist F, Department of Biotechnology, Govt. of India

Co-chairpersons: Prof. Rup Lal, NASI Senior Scientist Platinum Jubilee Fellow The Energy and Resources Institute; Sr. Prof. Suman Lakhnypaul, HOD, Department of Botany, University of Delhi and Prof. Ashutosh Bhardwaj, OSD, Institute of Eminence, University of Delhi

Scientific Chair: Prof. Arijit Chowdhuri, Prof. Charu K Gupta and Prof. Seema Makhija

Convenors: Prof. Sunita Hooda, Prof. Sarita Kumar, Dr Sanjeeta Rani, Prof. Geetu Gambhir and Dr Archana Pandey

Session Chairs: Sr. Prof. Mridula Gupta, Prof. Rupam Kapoor, Prof. Vishnu Bhat, Prof. R. K. Negi, Prof. Rup Lal, Prof. Shashi Bhushan, Prof. Rina Chakrabarti, Prof. Indranil Dasgupta, Dr Vijay Pal Singh, Prof. Sanjeev Singh, Prof. Alan Warren, Prof. Sukanya Lal, Prof. Prem Lal Uniyal, Dr Renu Bhagat Kumar, Prof. Rajesh Tandon, Prof. Atul Johri, Prof. Sunita Hooda, Prof. Seema Gupta, Dr Sanjeeta Rani, Prof. Sharanjit Kaur, Dr Anupama Shukla, Prof. Sarita Kumar, Dr Anita Narang, Dr Sunita Jetly, Dr Neeti Mishra, Prof. Arijit Chowdhuri, Prof. Charu K. Gupta, Dr Manisha Verma, Dr V Bhasker Raj, Dr Geetika Kalra, Prof. Gagan Dhawan, Dr Rashmi Sharma, Dr Rahul Dev, Dr Neelakshi N. K. Borah, Dr Siddhartha, Dr Sumit Sahni, Mr Abhay Pratap Singh, Prof. Pankaj Khanna, Dr Harita Ahuja, Prof. Urmi Bajpai, Dr Aparna Sharma, Prof. Geetu Gambhir, Dr Sanjay Kumar, Dr Kavita Mittal, Dr Sandeep Kumar Goel, Dr Mamta Bhatia

Session Co-chairs: Dr Anupama Shukla, Dr Anita Narang, Dr Pooja Bhagat, Dr Manisha Verma, Dr Archana Pandey, Dr Rashmi Sharma, Prof. Seema Makhija, Prof. Arijit Chowdhuri, Prof. Charu K. Gupta, Dr Geetika Kalra, Dr Manoj Kumar Singh, Dr Sada Nand Prasad, Dr Ravneet Kaur, Dr Aparna Sharma, Dr Kavita Mittal, Dr Rahul Dev, Dr Pragati Malik, Ms Bhawna Kaushik, Dr Jitender Goel, Dr Yash Mangla, Prof. Gagan Dhawan, Dr Vineet Kumar Singh, Dr Neelakshi N. K. Borah, Dr Narayan Singh, Dr Anita Thakur, Dr Gurudatt Rao Ambedkar, Dr Sweety Shrimali, Mr Pawan Kumar, Dr Siddhartha, Dr Sanjay Kumar

Organizing Secretaries: Dr Vineet Singh, Dr Sumit Sahni, Dr V Bhasker Raj, Dr Gurudatt Rao Ambedkar, Dr Narayan Singh

Coordinators: Prof. Gagan Dhawan, Prof. Pankaj Khanna, Dr Manisha Verma, Dr Pooja Bhagat, Dr Anita Narang, Dr Sandeep Kumar Goel, Dr Anupama Shukla, Dr Rashmi Sharma, Dr Sada Nand Prasad, Dr Ravneet Kaur, Dr Harita Ahuja, Mr Pawan Kumar

Program Committee: Dr Yash Mangla, Dr Pragati Malik, Dr Sweety Shrimali, Dr Manoj Kumar Singh, Dr Sanjay Kumar, Dr Jitender Goel, Dr Aparna Sharma, Dr Rahul Dev, Mr Abhay Pratap Singh, Dr Siddhartha, Dr Neelakshi N. K. Borah, Dr Kavita Mittal, Dr Anita Thakur, Dr Rimpay Kaur Chowhan, Dr Ritu Khosla, Ms Bhawana Kaushik, Ms Ankita Rasaily

Date: February 22-28, 2022

Acharya Narendra Dev College organized an International E-Conference titled “Mitigating Contemporary Environmental Issues by Sustainable Approaches [ICMCESA-2022]. In commemoration of Science week the event spanned from February 22-28, 2022. With consideration of the ongoing “Decade of Action” proclaimed by the United Nations, the main focus of the conference was to generate interest among all on the pressing environ-

mental concerns and the urgent need to adopt sustainable approaches worldwide to protect the habitat. A theme of such pertinence, the speakers and various presenters confronted diverse 'Areas of Concern'. Adhering to Covid-19 protocols regarding travel restrictions and social distancing, this conference was conducted over the virtual platform, the event hosted speakers from USA, Slovenia, Australia, UK, Uruguay, and Czech Republic, to name a few. Prof. Gaytha A Langlois, with extensive experience in crafting municipal and statewide environmental policies, from the Department of Environmental Policy at Bryant University, Rhode Island, USA, graced the inauguration day as the plenary speaker. She addressed the crises arising from misalignment of policy goals and strategies of navigating environmental challenges in her plenary talk titled, "Syzygy or Sisyphus: The Future of Environmental Policy Making". There were a total 16 keynote speakers from all over the world who shared their innovative knowledge and application methodology regards to environment in the conference. There were 28 invited talks from all over India and consisted of an inclusive amalgamation of Professors, Academicians, Scientists, Ecologists, and Law Practitioners etc. The scientific advisory board members for the conference were, Professor C. R. Babu (Retd.) Department of Botany, University of Delhi, INDIA; Professor Gaytha L. Langlois, Professor of Environmental Policy, Bryant University, Rhode Island, USA; Dr Alan Warren (Retd.), Natural History Museum, London, UNITED KINGDOM; Professor Rup Lal, FNA, FNASc, FNAAS, NASI Senior Scientist Platinum Jubilee Fellow, The Energy and Resources Institute, INDIA; Dr J. R. Bhatt Advisor (Climate Change), Ministry of Environment, Forest and Climate Change, INDIA; Prof. Rupam Kapoor, Department of Botany, University of Delhi, INDIA; Prof. Radhey Shyam, Department of Environmental Science, University of Delhi, INDIA; Prof. M. M. Chaturvedi, Department of Zoology, University of Delhi, INDIA; Prof. Amit Singh, Department of Commerce, Delhi School of Economics, INDIA; Prof. Ashutosh Bhardwaj, OSD, Institute of Eminence, University of Delhi, INDIA; Dr Debasish Mohanty, National Institute of Immunology, INDIA; Dr Garima Gupta, Scientist F, Department of Biotechnology, Ministry of Science and Technology, INDIA

This e-conference was a unique affair for a varied number of reasons, the themes and scope of the conference covered the following expansive range, Environmental Assessment, Environmental Mitigation by Physical, chemical and biological approaches, Biodiversity conservation and reclamation, Laws and Policies for Environmental protection, GIS mapping and remote sensing for environmental assessment, Environmental toxicology, Sustainable cities and communities, Environmental economics and eco-preneurship, Igniting young minds for environmental sensitization, Data analytics in environment, Green Finance and Environment and Public Health. Apart from the talks by keynote, invited speakers and participants, the conference programme also consisted of Technical sessions for a pragmatic and empirical approach to the theoretical discussions. There were more than 100 oral presentations by undergraduate, postgraduate research scholars and faculty traversing the entire nation from Kashmir to Kerala. There were 51 oral presentations by the faculty and students of ANDC where they got the opportunity to present their work.

Co-patrons: Prof. Shri Prakash Singh, Director, University of Delhi, South Campus; Prof. Sanjeev Singh, Joint Director, University of Delhi, South Campus and Dr Vikas Gupta, Registrar, University of Delhi...

Chairpersons: Prof. Ravi Toteja, Officiating Principal, Acharya Narendra Dev College and Dr Garima Gupta, Scientist F, Department of Biotechnology, Govt. of India

Co-chairpersons: Prof. Rup Lal, NASI Senior Scientist Platinum Jubilee Fellow The Energy and Resources Institute; Sr. Prof. Suman Lakhanpaul, HOD, Department of Botany, University of Delhi and Prof. Ashutosh Bhardwaj, OSD, Institute of Eminence, University of Delhi

Scientific Chair: Prof. Arijit Chowdhuri, Prof Charu K Gupta and Prof. Seema Makhija

Convenors: Prof. Sunita Hooda, Prof. Sarita Kumar, Dr Sanjeeta Rani, Prof. Geetu Gambhir and Dr Archana Pandey

Session Chairs: Sr. Prof. Mridula Gupta, Prof. Rupam Kapoor, Prof. Vishnu Bhat, Prof. R. K. Negi, Prof. Rup Lal, Prof. Shashi Bhushan, Prof. Rina Chakrabarti, Prof. Indranil Dasgupta, Dr Vijay Pal Singh, Prof. Sanjeev Singh, Prof. Alan Warren, Prof. Sukanya Lal, Prof. Prem Lal Uniyal, Dr Renu Bhagat Kumar, Prof. Rajesh Tandon, Prof. Atul Johri, Prof. Sunita Hooda, Prof. Seema Gupta, Dr Sanjeeta Rani, Prof. Sharanjit Kaur, Dr Anupama Shukla, Prof. Sarita Kumar, Dr Anita Narang, Dr Sunita Jetly, Dr Neeti Mishra, Prof. Arijit Chowdhuri, Prof. Charu K. Gupta, Dr Manisha Verma, Dr V Bhasker Raj, Dr Geetika Kalra, Prof. Gagan Dhawan, Dr Rashmi Sharma, Dr Rahul Dev, Dr Neelakshi N. K. Borah, Dr Siddhartha, Dr Sumit Sahni, Mr Abhay Pratap Singh, Prof. Pankaj Khanna, Dr Harita Ahuja, Prof. Urmi Bajpai, Dr Aparna Sharma, Prof. Geetu Gambhir, Dr Sanjay Kumar, Dr Kavita Mittal, Dr Sandeep Kumar Goel, Dr Mamta Bhatia

Session Co-chairs: Dr Anupama Shukla, Dr Anita Narang, Dr Pooja Bhagat, Dr Manisha Verma, Dr Archana Pandey, Dr Rashmi Sharma, Prof. Seema Makhija, Prof. Arijit Chowdhuri, Prof. Charu K. Gupta, Dr Geetika Kalra, Dr Manoj Kumar Singh, Dr Sada Nand Prasad, Dr Ravneet Kaur, Dr Aparna Sharma, Dr Kavita Mittal, Dr Rahul Dev, Dr Pragati Malik, Ms Bhawna Kaushik, Dr Jitender Goel, Dr Yash Mangla, Prof. Gagan Dhawan, Dr Vineet Kumar Singh, Dr Neelakshi N. K. Borah, Dr Narayan Singh, Dr Anita Thakur, Dr Gurudutt Rao Ambedkar, Dr Sweety Shrimali, Mr Pawan Kumar, Dr Sidhartha, Dr Sanjay Kumar

Organizing Secretaries: Dr Vineet Kumar Singh, Dr Sumit Sahni, Dr V Bhasker Raj, Dr Gurudatt Rao Ambedkar, Dr Narayan Singh

Coordinators: Prof. Gagan Dhawan, Prof. Pankaj Khanna, Dr Manisha Verma, Dr Pooja Bhagat, Dr Anita Narang, Dr Sandeep Kumar Goel, Dr Anupama Shukla, Dr Rashmi Sharma, Dr Sada Nand Prasad, Dr Ravneet Kaur, Dr Harita Ahuja, Mr Pawan Kumar

Program Committee: Dr Yash Mangla, Dr Pragati Malik, Dr Sweety Shrimali, Dr Manoj Kumar Singh, Dr Sanjay Kumar, Dr Jitender Goel, Dr Aparna Sharma, Dr Rahul Dev, Mr Abhay Pratap Singh, Dr Siddhartha, Dr Neelakshi N. K. Borah, Dr Kavita Mittal, Dr Anita Thakur, Dr Rimpay Kaur Chowhan, Dr Ritu Khosla, Ms Bhawana Kaushik, Ms Ankita Rasaily

Date: February 22-28, 2022

Acharya Narendra Dev College organized an International E-Conference titled “Mitigating Contemporary Environmental Issues by Sustainable Approaches [ICMCESA-2022]”. In commemoration of Science week the event spanned from February 22-28, 2022. With consideration of the ongoing “Decade of Action” proclaimed by the United Nations, the main focus of the conference was to generate interest among all on the pressing environmental concerns and the urgent need to adopt sustainable approaches worldwide to protect the habitat. A theme of such pertinence, the speakers and various presenters confronted diverse ‘Areas of Concern’. Adhering to Covid-19 protocols regarding travel restrictions and social distancing, this conference was conducted over the virtual platform, the event hosted speakers from USA, Slovenia, Australia, UK, Uruguay, and Czech Republic, to name a few. Prof. Gaytha A Langlois, with extensive experience in crafting municipal and statewide environmental policies, from the Department of Environmental Policy at Bryant University, Rhode Island, USA, graced the inauguration day as the plenary speaker. She addressed the crises arising from misalignment of policy goals and

strategies of navigating environmental challenges in her plenary talk titled, “Syzygy or Sisyphus: The Future of Environmental Policy Making”. There were a total 16 keynote speakers from all over the world who shared their innovative knowledge and application methodology regards to environment in the conference. There were 28 invited talks from all over India and consisted of an inclusive amalgamation of Professors, Academicians, Scientists, Ecologists, and Law Practitioners etc. The scientific advisory board members for the conference were, Professor C. R. Babu (Retd.) Department of Botany, University of Delhi, INDIA; Professor Gaytha L. Langlois, Professor of Environmental Policy, Bryant University, Rhode Island, USA; Dr Alan Warren (Retd.), Natural History Museum, London, UNITED KINGDOM; Professor Rup Lal, FNA, FNASc, FNAAS, NASI Senior Scientist Platinum Jubilee Fellow, The Energy and Resources Institute, INDIA; Dr J. R. Bhatt Advisor (Climate Change), Ministry of Environment, Forest and Climate Change, INDIA; Prof. Rupam Kapoor, Department of Botany, University of Delhi, INDIA; Prof. Radhey Shyam, Department of Environmental Science, University of Delhi, INDIA; Prof. M. M. Chaturvedi, Department of Zoology, University of Delhi, INDIA; Prof. Amit Singh, Department of Commerce, Delhi School of Economics, INDIA; Prof. Ashutosh Bhardwaj, OSD, Institute of Eminence, University of Delhi, INDIA; Dr Debasish Mohanty, National Institute of Immunology, INDIA; Dr Garima Gupta, Scientist F, Department of Biotechnology, Ministry of Science and Technology, INDIA

This e-conference was a unique affair for a varied number of reasons, the themes and scope of the conference covered the following expansive range, Environmental Assessment, Environmental Mitigation by Physical, chemical and biological approaches, Biodiversity conservation and reclamation, Laws and Policies for Environmental protection, GIS mapping and remote sensing for environmental assessment, Environmental toxicology, Sustainable cities and communities, Environmental economics and eco-preneurship, Igniting young minds for environmental sensitization, Data analytics in environment, Green Finance and Environment and Public Health. Apart from the talks by keynote, invited speakers and participants, the conference programme also consisted of Technical sessions for a pragmatic and empirical approach to the theoretical discussions. There were more than 100 oral presentations by undergraduate, postgraduate research scholars and faculty traversing the entire nation from Kashmir to Kerala. There were 51 oral presentations by the faculty and students of ANDC where they got the opportunity to present their work.

List of Presentations by the Students and Faculty Members of ANDC

S. No.	Topic	Presenter/ Authors
1	A Typical Everyday Exposure to Particulate Matter in the Life of an Undergraduate Student in Delhi	Arijit Chowdhuri, Jay Kumar Sirmoria, Sruthi S. Kumar and Charu Khosla Gupta
2	Sentiment Analysis of Public Opinion on Solar Energy	Rajat Sharma, Ravneet Kaur and Vibha Gaur
3	Real-Time Mask Detection Using CNN & Tensor Flow	Amartya Sinha, Yash Lohiaand Vibha Gaur
4	Comparative Analysis of Energy Consumption in Cryptomining for Environment Sustainability	Ayushi Sharma, Harsh Bamotra, Pratham Sharma and Vibha Gaur
5	Comparative Analysis of Flood Vulnerability Techniques for Detecting Area Specific Indicators	Deepanshu, Megha Karki, Shruti Jain, Sunita Narang and Harita Ahuja
6	Analysis and Prediction of Ground-Water Quality of India Using Linear Regression	Tanisha Sharma, Jyotika Sharma and Vibha Gaur
7	Microcontroller Based Sensor Assisted Weather Monitoring System	Ritesh Raj, Sagar Bisht, Mukhtair Ali, Anju Agrawal and Ravneet Kaur
8	Compartmental Model for Traffic Congestion	Pushkar Pandey, Kunal Pantand Sarita Agarwal

9	CHAR-TOPSIS: A Novel Approach to Rank Asian Countries for Safety Measures during Covid-19 Pandemic	Anindita Panda, Sant Kumar, Abhishek Kumar Prajapati, Harita Ahuja and Sunita Narang
10	Data Analytics for Delhi Pollution	Amit, Ramit Yadav, Ravneet Kaur and Vibha Gaur
11	Making use of ZnO thin films for UV photodetection for measuring germicidal radiation	G. Kuksal, M. Kaish, Y. Kumar and R. K. Meena
12	Health Aware Preventive Recommender System - A Novel Framework using Localised Air Pollutant Prediction	Devansh Sharma, Tishya Thukral, Rahul Basu, Vandita Grover
13	The Effects of Climate Change on the Plant-pollinator Relationship	Mridula Rani, Charu K Gupta, Yash Mangla and Mayank Yadav
14	Effect of Heavy Metal Nanoparticles on Ciliates	Ashish Arora, Sandeep, Swati Maurya, Jyoti Dagar, Drashya, Geetu Gambhir, Ravi Toteja and Seema Makhija
15	Microbial Siderophore and its Applications	Shivangani Sharma, Swati Maurya, Sandeep, Jyoti Dagar, Ajay Kumar, Seema Makhija and Ravi Toteja
16	Bioaccumulation, Removal and Detection of Heavy Metals Using Microorganisms	Vanya Garg, Sandeep, Swati Maurya, Jyoti Dagar, Anupam Prakash, Ravi Toteja and Seema Makhija
17	The Effects of Air pollution on Human Health	Aishwary Kumar Chaturvedi, Yash Mangla and Charu Khosla Gupta
18	Green Finance: sustainable financial solution to India's green endeavours	Sanjay Kumar, V Bhaskar Raj, Rakhee Chauhan, Mamta and Saundaraya Singh
19	Mitigating Air Pollution through <i>Pleurotuseryngii</i> (King Oyster Mushroom) : A Concept	Mohd Afham, Vridhi Singh, Mrityunjoy Chakraborty, Vineet Kumar Singh, Manoj Kumar Singh and Sumit Sahni
20	Electrical and Optical Study of ZnO thin film-based UV photodetector	Babita Sharma, Kajal Jindal, Reema Gupta, Arijit Chowdhuri and Monika Tomar
21	WO ₃ and WO ₃ -SnO ₂ composite based sensors for detection of NO ₂ gas	Jatinder Pal Singh, Kalpajit Roy, Prahlad Sharma, Varnika Agarwal, Anjali Sharma, Monika Tomar and Arijit Chowdhuri
22	Studies on Photovoltaic properties of WO ₃ /BFO bilayer thin films for solar energy harvesting applications	Shiva Lamichhane, Savita Sharma, Monika Tomar and Arijit Chowdhuri
23	Al ₂ O ₃ /CuI/PANI Catalyzed One Pot Synthesis of 2,3-Dihydroquinazolin-4(1H)-ones under Green Solvent Conditions	Sahil Kohli, Ramesh Chandra and Sunita Hooda
24	Improvement of Characteristics and Adsorption Performance of Chitin for Rhodamine 6G By Sonication	Drashya Gautam, Laishram Saya, Geetu Gambhir and Sunita Hooda
25	Role of GO Composite in Detecting Hydrogen Gas	Rupali Pandey, Sandeep Singhanian, Anju and Amit Garg

26	Effect of Diflubenzuron Exposure on the Physiological and Reproductive Fitness of <i>Aedes aegypti</i> L.	Manu Sankar, Divya and Sarita Kumar
27	Insights into the morphological and systematic position of a new species, <i>Gastrostyla indica</i> n. sp. (Protozoa, Ciliophora) isolated from Delhi, India	Jeeva Susan Abraham, Sripoorna, Somasundaram, Swati Maurya, Renu Gupta, Ravi Toteja and Seema Makhija
28	A comparative study of physico-chemical parameters and ciliate diversity of leachate contaminated soil from the landfill and the soil from Jahanpanah City Forest	Swati Maurya, Jeeva Susan Abraham, Sripoorna Somasundaram, Sandeep, Jyoti Dagar, Renu Gupta, Seema Makhija, Pooja Bhagat and Ravi Toteja
29	Heavy Metal Bioremediation by Ciliates	Jyoti Dagar, Sripoorna Somasundaram, Swati Maurya, Jeeva Susan Abraham, Sandeep, Ravi Toteja and Seema Makhija
30	Assessment of Heavy Metal Concentration in River Yamuna	Sandeep, Sripoorna Somasundaram, Swati Maurya, Jeeva Susan Abraham, Jyoti Dagar, Seema Makhija, Pooja Bhagat and Ravi Toteja
31	Screening, identification and characterization of biofilm-inhibiting mycobacteriophages	Kanika Nadar, Ritu Arora and Urmi Bajpai
32	Optimizing Supply Chain Model for Stock-Dependent Price Elasticity of Demand and Carbon Emission	Majhar Alam and Chaman Singh
33	Insect Biodiversity as Bioindicator for Sustainable Development in a Desert Ecosystem	Rita Rath, Neeraja Sood and Sadhna Gupta
34	Environmental Laws and Policies in India	Sadhna Gupta, Rita Rath and Neeraja Sood
35	Ecopreneurship and Consumers' Perception	Charu Kalra, Monika Bansal and Nisha Rana
36	Safe Drinking Water and Human Health: The Challenges Before India	Neeraja Sood, Sadhna Gupta and Rita Rath
37	Characterization of stress-inducible genes in freshwater ciliates by molecular methods for surveying water quality	S. Sripoorna, Jeeva Susan Abraham, Swati Maurya, Ravi Toteja, Renu Gupta and Seema Makhija
38	Classification of the vapours of fuels, simulants of nerve agents, and VOCs by optimizing Artificial Neural Network	VBhasker Raj, Sanjeeta Rani, Manisha Verma, Sanjay Kumar, Mamta and A.T. Nimal
39	Optimizing Perishable Inventory Model for Carbon Emission and Expiring Items	Gurudatt Rao Ambedkar and Chaman Singh
40	Cost determination with two level permissible delay and cash discount for retailer in a multi-level supply chain system	Narayan Singh and BrijendraYadav
41	Does Auxin and Melatonin Interaction Palliate Heavy Metal and Metalloid Toxicity in Plants?	Anita Thakur, Geetika Kalra and Soumya Mukherjee
42	Mass Propagation of Arid Zone Tree Legumes	Anita Narang, Anupama Shukla, Sumit Sahni and Manoj Kumar Singh

43	Mitigation environmental issues with enigmatic Laboulbeniomyces	Riya Dayal, Maniket Chauhan, Anupama Shukla and Anita Narang
44	Synergic Catalysis Through Functionalized MCM-41: A Benign and Environmentally Friendly Route to Organic Synthesis	Sharda Pasricha, Kavita Mittal and Pragya Gahlot
45	Bio-nanocomposite of Guar Gum Decorated with Iron-oxide Nanoparticles as Promising Adsorbent for Reactive Green 19 Dye	Laishram Saya, Drashya Gautam, Geetu Gambhir, W. Rameshwor Singh and Sunita Hooda
46	A Study on Environmental Efficacy of Air-purifiers Vis-à-vis Features and Cost Benefits	Sandeep Kumar Goel, Priyanka, Arijit Chowdhuri and Charu Khosla Gupta
47	Measuring Complexity and Chaos in Three - Species Food Chain System with Mixed Selection of Functional Response	Sada Nand Prasad
48	Acetylation of Alcohols, Phenols and Amines Using Green Methods	Rashmi Thukral and Somya Singh
49	Modelling and Analysis of Fuzzy Sustainable Inventory Model for Deteriorating Item with Controllable Carbon Emissions and Preservation Technology	Yogendra Kumar Rajoria and Deo Datta Aarya
50	Urease as a bioindicator to assess the soil quality	Meghana Bisht, Ayushi Gupta, Tanya Chopra, Pooja Bhagat, Seema Makhija and Ravi Toteja
51	Screening and Molecular Analysis of Antifungal Compounds from Streptomyces Spp. Against Pathogenic Fungi	Monisha Khanna Kapur, Harsha, Prateek Kumar, Munendra Kumar and Renu Solanki

The event was successfully culminated, first of its kind to be executed by any college under University of Delhi, with the hope that it will play a pivotal role in inspiring further synergy on a global scale, which is the only feasible way to manage and sustain our environment. The ambitious feat of planning and executing this week long international conference was possible because of the accommodating nature of all involved. Best Oral and Poster presentations were awarded during the valedictory function.

List of Award Winning Presentations:

Category: Poster Presentation		
Name of the Presenters	Title of the Paper	Award
Rahul Kumar Birendra Kumar Gupta and Ajay Kumar Sharma	On taxonomy and behavioural biology of ant mimicking jumping spider <i>Mymaplata plataleoides</i> O. Pickard-Cambridge, 1869 (Araneae: Salticidae)	First Prize
Pratiti Majumder Tanushri Saxena Arunima Sehgal	Coral bleaching: A cause for concern	Appreciation Award
Category: Oral Presentation: Research Scholar		
Kavya Tanna Sanjay Teraiya Jigna G. Tank	Comparative analysis of vegetation and urbanization at Porbandar City of Saurashtra through geospatial techniques	First Prize

Jatinder Pal Singh Kalpajit Roy Prahlad Sharma Varnika Agarwal Anjali Sharma Monika Tomar Arijit Chowdhuri	WO ₃ and WO ₃ -SnO ₂ composite based sensors for detection of NO ₂ gas	Second Prize
Category: Oral Presentation: Post Graduate Students		
Matta Vineetha Nageswara Rao Amanchi	Environmental impact assessment of Kaleshwaram Lift Irrigation Project, Telangana – A review	First Prize
Category: Oral Presentation: Undergraduate Students		
Devansh Sharma Tishya Thukral Rahul Basu Vandita Grover	Health aware preventive recommender system - A novel framework using localised air pollutant prediction.	First Prize
Ayushi Sharma Harsh Bamotra Pratham Sharma Vibha Gaur	Comparative analysis of energy consumption in cryptomining for environment sustainability	Second Prize
Arijit Chowdhuri Jay Kumar Sirmoria Sruthi S. Kumar Charu Khosla Gupta	A typical everyday exposure to particulate matter in the life of an undergraduate student in Delhi	Third Prize

(B) 6th Annual International e-Conference on International Network of Soil Contamination Research- INSCR 2021 on “MICROBES IN SUSTAINABLE DEVELOPMENT”

Co-Organizers: PG Department Zoology (Magadh University), Department of Zoology, (University of Delhi), Acharya Narendra Dev College (University of Delhi), Deen Dayal Upadhyay College (University of Delhi), Maitreyi College (University of Delhi), Ramjas College (University of Delhi), Kirori Mal College (University of Delhi), Sri Venkateswara College (University of Delhi), CMP College (Allahabad University) and Phixgen Pvt Ltd.

Co-Patron: Prof. Ravi Toteja (Officiating Principal, Acharya Narendra Dev College)

Organizing Secretary (from ANDC): Prof. Seema Makhija

Organizing Committee Members (from ANDC): Dr Vineet Kumar Singh and Dr Sumit Sahni

Date: November 15-18, 2021

In January 2016, the 2030 Goals for Sustainable Development were set by the United Nations to achieve environmental, social and economic development through green methods and clean production technologies. The most important aim of these goals is the fulfilment of basic human needs and wants, as the essential human needs such as food, clothing, shelter and health care are still not available to most people, despite the rapid growth in the world economy. The increase in waste products and depleting natural resources have turned human attention towards efficient green and clear production technologies. The Sustainable Development Goals aim to provide these basic needs for all, through the intelligent use of sustainable science. In this perspective, microorganisms, which are vital for sustaining life on Earth, can play a major role. Keeping in view about the role of microbes in sustainable development, INSCR organized 6th International Conference over the virtual platform. Prof. P. C. Joshi, former Vice Chancellor, University of Delhi and Prof. Balaram Pani, Dean of Colleges, University of Delhi,; HOD, Zoology, Magadh University, Dr Sanjay Kumar, Director CISR Palampur Himachal Pradesh, Dr

Umesh Rai, former Head of Zoology Department, University of Delhi, besides the principals of co-organizing colleges.

The event hosted 30 International and 40 National speakers of international repute. A few of them are: Edward DeLong, University of Hawaii, Honolulu; Prof. Jizhang Zhou, University of Oklahoma, USA; Prof. Kenneth Timis, Germany; Hilary Lapin Schott and Prof. Jack Gilbert, University of California; Daniel Macdonald, University of California; Hock Midt, Netherlands; Hans, Germany. H Reknow, New Zealand's Stephen Craig Carey, America's NASA Program Scientist Mitch Schalte, South Korea's Vipin C Kalia of Konkuk University, Korea's Ganesh de Sartale, Poland's Agnizeka Dybala Defratka, Uruguay's Pavlo Scavone, Prof. Jyoti Prakash Tamang of Sikkim University, INDIA, Prof. Rama Chaudhary of AIIMS Delhi, INDIA. Anushree Malik of IIT Delhi, INDIA and others who enlighten about the role of microbes in sustainable development.

Two Pre conference workshops namely, Art of scientific writing and communication, and Hands on to computational Biology, for (Meta)genomic analysis were also organized for Undergraduate, Postgraduate students and research scholars from November 14-15, 2021. An online Agar Competition was also organized that show active participation from all over the country.

Themes covered in this conference were:

- a. Host Microbiota Interactions
- b. Clinical Microbiology and Infectious Diseases
- c. Microbes for Sustainable Agriculture
- d. Translational and Industrial Microbiology
- e. Microbial Ecology and Biotechnology
- f. Microbiology of Extreme Environments
- g. Empowering academics through Innovative Research

During the conference, undergraduate, postgraduate students, research scholars and faculty members presented their research papers on host microbiota interactions, clinical microbiology and infectious disease, microbes for sustainable agriculture, microbial ecology and biotechnology, microbiology of extreme environment and translation and industrial microbiology under the main themes Microbes in Sustainable Development.

The Conference was a great success with a record total of more than 500 attendees and 138 registered participants. During the conference three parallel sessions were conducted to accommodate 80 poster and more than 70 oral presentations by students and faculty across the globe. The conference concluded with a valedictory session, in which the participants were acknowledged, winners for poster and oral presentations were announced, winners for Agar Art competition were announced and INSCR Journal was released. The chief guest for the valedictory session was Dr Paola Scavone and the Guest of Honor was Prof. Balaram Pani, Dean of Colleges, University of Delhi.

6.3.1.2 Outreach Activities

(A) Science *Adda*- One Day Interaction Program

Patron: Prof. Ravi Toteja (Officiating Principal)

Coordinators: Prof. Seema Makhija, Dr Archana Pandey, Dr Rashmi Sharma, Dr Harita Ahuja, Prof. Sunita Hooda, Dr Ravneet Kaur, Prof. Arijit Chowdhuri

Organizing Committee Members: Prof. Geetu Gambhir, Dr Geetika Kalra, Dr Ritu Khosla, Dr Rimpay Kaur Chowhan, Dr Satender Singh, Dr Rahul Dev, Dr Vineet Girdharwal, Dr Sanjay Kumar, Dr V Bhasker Raj, Dr Kavita Mittal, Dr Pragati Malik, Ms Gunjan Rani, Mr Sanjay, Mr Abhay Pratap Singh

Acharya Narendra Dev College, University of Delhi conducted a One Day Interaction Program called "Science

Adda” (under the aegis of DBT Star College Scheme) for school students on December 20, 2021. The workshop was organised under the patronage of Prof. Ravi Toteja (Officiating Principal, ANDC). The co-ordinators of the event were Prof. Seema Makhija, Prof. Sunita Hooda, Prof. Arijit Chowdhuri, Dr Archana Pandey, Dr Ravneet Kaur, Dr Rashmi Sharma and Dr Harita Ahuja. A total of 14 schools registered for the workshop, while the number of individual participants attending the workshop was 33. The event was organised to give hands-on demonstration of some simple easy to do experiments by different departments of our college including Physics, Chemistry, Computer Science, Electronics, Biomedical Science, Zoology and Botany. Dr Rashmi Sharma, Associate Professor, Department of Botany introduced the students to some very recent and interesting innovations in Science and technology. The workshop was conducted in both physical as well as online mode. The session was concluded by an interesting quiz pertaining to the experiments shown and explained to the students. The complete details of all the experiments shown were given to the participants in the form of a comprehensive workshop manual. All the attendees were given certificates of participation, a foldscope and scientific kits for electronic experiments.

(B) ECOVILLE 2022: An Outreach Programme for school students

Conveners: Dr Pooja Bhagat, Dr Archana Pandey, Prof. Seema Makhija, Dr Rashmi Sharma

Session Chair: Prof. Atul Johri, Dr Anupama Shukla, Dr Sunita Jetly, Dr Mamta Bhatia, Prof. Seema Gupta, Dr Rashmi Sharma

Co-Chair: Dr Sumit Sahni, Dr Vineet Kumar Singh, Dr Pooja Bhagat, Dr Archana Pandey, Dr Rashmi Sharma, Dr Rahul Dev, Dr Gurudutt Rao Ambedkar, Dr Anita Thakur, Dr Yash Mangla, Dr Aparna Sharma, Dr Sweetly Shrimali

Date: February 27, 2022

An outreach programme for school students, “ECOVILLE” was organized on February 27, 2022 as a part of the E- conference that invited submission of avant-garde research projects, video presentations, environmental quiz and paper presentations. The highlight of the day was the inauguration of Virtual lab presided over by Dr Garima Gupta, Scientist F, Department of Biotechnology, Govt. of India. The invited speakers for the talk were Dr Shailly Anand (Deen Dayal Upadhyaya College, University of Delhi) , Prof. Renu Gupta (Maitreyi College, University of Delhi), Dr Binita Dutta (Senior Business Analyst, Hyloris Pharmaceuticals, BELGIUM) and Ms Sangeeta Relan (Acharya Narendra Dev College, University of Delhi). Dr Shailly Anand and Prof. Renu Gupta discussed about the role of microbes and ciliates in the classroom. Dr Binita Dutta talked about Health Care Sustainability issues and Ms Sangeeta Relan threw light on the Dying Habit of Reading. A career counselling session was also organized for the school students by Dr Gauri Garg Dhingra (Kirorimal College, University of Delhi) and Dr Roshan Kumar (Magadh University, Bihar). One of the key highlights and a niche endeavour by the college, this particular outreach program not only sought to introduce young minds to the infinite spectrum of research and innovative thinking, it also encouraged them by funding *avant-garde* projects, awarding exciting prizes for quiz winners and best presenters, while providing participation certificates to all.

List of award winning Paper Presentations by school students:

S. No.	Name of the student	School	Class	Title	Position
1	Shaurya Gambhir Anushka Ramesh	Delhi Public School, R.K Puram, New Delhi Amity International School, Mayur Vihar	X XII	GIS mapping and remote sensing for environmental assessment	First
2	Utkarsh Mittal Rudransh Agnihotri	Birla Vidya Niketan, New Delhi	XII	Forest Guard: An Integrated Sensor cum AI-based Fire- prone Area Mapping and Early Forest Fire Detection System	First

List of Quiz Masters of ECOVILLE:

S. No.	Name of the student	School	Position
1	Yashvi Gupta	Delhi Public School, Rohini	First
2	Lakshit Mittal	Ambience Public School, Safdarjung Enclave	Second
3	Koijam Leewin	Don Bosco School Siaha, Mizoram	Third

6.3.2 New Initiatives under DBT STAR COLLEGE SCHEME

6.3.2.1 Virtual lab at ANDC (V-Lab@ANDC)

Patron: Prof. Ravi Toteja (Officiating Principal)

Coordinator: Prof. Seema Makhija (Zoology), Dr Sumit Sahni and Dr Vineet Singh (Botany)

Conveners: Dr Sanjeeta Rani (Physics), Prof. Sharanjit Kaur (Computer Science), Dr Anita Narang (Botany), Dr Neeti Mishra (Chemistry)

Project Leads: Mr Ayush Mishra, and Mr Vaibhav Thapliyal, B.Sc (H) Physics II Year

Unnatural circumstances need innovative solutions and COVID-19 brings such situations for academics where normal offline education came to a halt. Theoretical concepts were being delivered to students online but for understanding practical concepts a hands-on approach was missing. Acharya Narendra Dev College under the able vision of its principal, Prof. Ravi Toteja conceptualized the idea of Virtual lab (V-Lab) to provide remote access of various labs to the undergraduate science students through the internet, and thus became the first college in the University of Delhi to start V-Lab at its campus.

Virtual lab allows the student to understand, learn and perform the practical on their own remotely with a click of the mouse. It provides a complete Learning Management System (LMS) where students can avail the various learning, including additional web-resources, video-lectures, animated demonstrations and self-evaluation. Web enabled experiments have been designed for remote operation and viewing so as to enthuse the curiosity and innovation into students. This would help them in learning basic and advanced concepts through remote experimentation.

The course structure of various labs and experiments available on V-Lab@ANDC is futuristic, following a four quadrant model for e-content, and is developed considering the National Education Policy (NEP)-2020. V-Lab@ANDC website is created and maintained by our own students for four domains i.e. Biological Science, Chemical Science, Electronics and Physical Science which include seven departments i.e. Biomedical Science, Botany, Chemistry, Computer Science, Electronics, Physics and Zoology.

Although the V-Lab@ANDC was initiated to tackle the COVID related problems in teaching and learning process but is not confined to it. Students now can perform their experiments 24 X 7, on even sophisticated and expensive instruments, multiple times and at their ease without wasting the resources and can even generate the measured data for at least a few experiments.

Through V-Lab@ANDC we are proving the ideology of our college 'Preparing for the future' by exploring and innovating 'Beyond the classroom' or rather 'Beyond the Practical Lab'.

The lab is developed under four domains:

- 1) Biological Science: Developed by the Department of Biomedical Science, Botany and Zoology

- 2) Chemistry: Developed by the Department of Chemistry
- 3) Computer Science: Developed by the Department of Computer Science
- 4) Physical Science: Developed by the Department of Electronics and Physics

6.3.2.2 Bootcamps for V-Lab Development

(A) Bootcamp1.0 (online)

Patron: Prof. Ravi Toteja, Officiating Principal, ANDC

Nodal Officers: Dr Sumit Sahni, Dr Vineet Kumar Singh

Conveners: Dr Sanjeeta Rani, Dr Pooja Bhagat, Prof. Seema Makhija

Organizing Committee Members: Dr Rahul Dev, Mr Abhay Pratap Singh

Resource Persons: Mr Ayush Mishra, Mr Vaibhav Thapliyal, Mr Yash Vermani, Ms Avnija Tyagi

Date: January 17-22, 2022

Bootcamp 1.0 was organized for the College students to train them to build digital content on web i.e. web pages. These pages will also be used for the V-Lab experiment's content page. The topics covered during the workshop were:

- (1) HTML- History and Features, Tags, Special characters, linking images and videos, Internal and external Linking, Working with DOM elements of HTML
- (2) CSS- Animations, Applying properties to DOM (shadow, font size, font family, padding, margin, color, background, display, position, border radius, table)
- (3) JavaScript- Basic Introduction, Objects, Elements, Data Types, Keywords, Looping Constructs, Functions, Animations using Event Listeners

Daily Quizzes were conducted based upon the topics taught in addition to assignments. About 240 students participated in this Bootcamp. The camp was a great success.

(B) Bootcamp 2.0 (offline)

Patron: Prof. Ravi Toteja, Officiating Principal, ANDC

Nodal Officers: Prof. Seema Makhija, Dr Sumit Sahni, Dr Vineet Kumar Singh

Organizing Committee Members: Dr Pooja Bhagat, Mr Abhay Pratap Singh

Resource Persons: Mr Ayush Mishra, Mr Vaibhav Thapliyal

Date: June 27-July 01, 2022

Bootcamp 2.0 was a level II workshop for the students who developed interest in V-Lab development. This workshop was held in offline mode in the Web Centre. The topics covered during the workshop were: Javascript Level 2.0, Programming Methodology and Application Development. The Workshop was attended by more than 30 students from various departments of the college.

List of Experiments created in the virtual lab by the college students:

Name of the Experiment	Animation/Simulator created by	Mentor/s
Domain: Biological Science		
Plastic Impressions of Footprint	Ayush Mishra Vaibhav Thapliyal B.Sc. (H) Physics, II Year Kalyani Kumari B.Sc. (H) Biomedical Science, III Year	Dr Archana Pandey Dr Ritu Khosla (Biomedical Science)
Quantification of Unknown DNA	Ramganesb Pandey Vridhi Singh Mohd. Afham B.Sc. (H) Botany, II Year Ayush Mishra Vaibhav Thapliyal B.Sc. (H) Physics, II Year	Dr Sumit Sahni Dr Vineet K Singh (Botany)
Gram Staining	Ayush Mishra Vaibhav Thapliyal B.Sc. (H) Physics, II Year	
pH of Soil Samples		
Isolation of genomic DNA from <i>E.coli</i>	Avnija Tyagi Ritika Chandel Sejal Arora B.Sc. (H) Zoology, III Year Ayush Mishra Vaibhav Thapliyal B.Sc. (H) Physics, II Year	Prof. Ravi Toteja Prof. Sarita Kumar Prof. Seema Makhija Dr Rahul Dev Mr Sanjay (Zoology)
Isolation of plasmid DNA from <i>E.coli</i>	Avnija Tyagi Ritika Chandel Sejal Arora B.Sc. (H) Zoology, II Year Ayush Mishra Vaibhav Thapliyal B.Sc. (H) Physics, II Year	Prof. Ravi Toteja Prof. Seema Makhija (Zoology)
Height-Weight Experiment	Ayush Mishra Vaibhav Thapliyal B.Sc. (H) Physics, II Year	
Domain: Chemical Science		
Redox Titrations	Ayush Mishra Vaibhav Thapliyal B.Sc. (H) Physics, II Year	Dr Manisha Jain Dr Neeti Misra (Chemistry)
Domain: Computer Science		

Data Frames-3 simulators	Ayush Mishra Vaibhav Thapliyal B.Sc. (H) Physics, II Year Sakshi Garg Aliya Vivek Sankhyan Pankaj Sahu Palak Sharma B.Sc. (Prog.) Physical Science (Computer science), II Year	Prof. Sharanjit Kaur Ms Gunjan Rani (Computer Science)
Prime Numbers	Ayush Mishra Vaibhav Thapliyal B.Sc. (H) Physics, II Year Nilesh Pandey Amitesh singh Ananya Shukla	Prof. Sharanjit Kaur Ms Nishu (Computer Science)
Bubble Sorting	Siya Agarwal Harsh Bamotra Shahnawaz khan B.Sc. (H) Computer Science, II Year	
Domain: Physical Science		
Law of Malus	Ayush Mishra Vaibhav Thapliyal B.Sc. (H) Physics, II Year	Dr Ravneet Kaur (Electronics)
Boltzman's Constant		
Low pass Filter using OP-AMP		
V-I characteristics of Zener Diode		
Monte-Carlo Estimation of Pi	Ayush Mishra Vaibhav Thapliyal B.Sc. (H) Physics, II Year	Dr Sanjeeta Rani (Physics)
Bisection Method for finding roots of polynomials		
Newton-Raphson Method for finding roots of equations		
Secant Method for finding roots of polynomials		
Iterative Method for finding roots of polynomials		
Trapezoidal Rule for definite integral		
Simpson's 1/3 Rule for definite integral		
Eulers Method for Ordinary Differential Equation		
Modified Eulers Method for Ordinary Differential Equation		

6.3.2.3 Development of Research Facilities:

The grant received over the past five years has helped the departments to establish new research facilities, state of the art laboratories as well as augment the existing laboratories and UG research. Key achievements:

(A) Mushroom Research and Skill Development Centre (Department of Botany)

Mushroom Research and Skill Development Centre (MRSDC) at Department of Botany, Acharya Narendra Dev College is set up under the aegis of DBT-STAR status scheme. The coordinators are: Dr Anupama Shukla, Dr Anita Narang, Dr Manoj Kumar Singh, Dr Vineet Kumar Singh and Dr Sumit Sahni. It was inaugurated by Ms Deepti Gulati, Industry Chair Prof., NIFTEM on March, 08, 2022. The centre is established as a research and development facility in the field of Microbiology (especially mushrooms) as well as to enhance the skill of mushroom cultivation amongst the students. The centre has state of the art facility for the production of various types of mushrooms along with the culture facility for other microbes as well. The researchers right now working in the facility are all undergraduate students of B.Sc. (H.) Botany II Year, namely, Vridhhi, Afham, Mrityunjay, Subhanshu, Pratap, Seema, Kanchan, Deepali, Riya, Maniket, Akanksha, Shreya, Pratham, Lalit, Rohit, Ramganesha.

There are two labs in the centre, one is Microbial Culture Facility (MCF) and other one is Mushroom Production Unit (MPU). Microbial Culture Facility has Biosafety Level-II cabinet, an incubator shaker, humidity chamber and rotavapor. Mushroom production unit (MPU) has mushroom racks, humidifier and autoclave unit. The centre is also developing the library of various economically important mushroom species and other microbial cultures. Till now, the centre has cultures of 10 species of mushrooms.

The Centre caters the following issues:

- There is a SEC (Skill Enhancement Course) in IInd year B.Sc. (H) Botany on Mushroom cultivation where students have to acquire practical knowledge of the skill.
- This facility intends to impart knowledge and desired skill set to the students about growing various types of mushrooms.
- Skill development for pilot scale mushroom farming/setting up of mushroom house.
- Through this we could popularize mushroom consumption to fight Protein Energy Malnutrition (PEM).
- It will help in reducing the solid degradable waste of college and other waste material
- It helps in reduction of the levels of air pollutants indirectly through utilization of solid waste.
- It will make students self-reliant to earn for themselves after learning the required skill set.
- This helps in development of human resource for the college and also enables the college to provide consultancy to the interested mushroom growers

(B) Zebrafish Culture Facility (Department of Zoology)

Zebrafish Culture facility under aegis of DBT Star Scheme was established at Acharya Narendra Dev College under the coordinatorship of Dr Monica Misra in January 2022 with the aim to encourage scientific minds towards research, to gain hands on experience of lab work, to indulge in fascinating world of live animal research and to gain more empathetic attitude towards our environment and animals. We are the second College in University of Delhi that has ventured into establishing the Lab on Zebra Fish.

Zebrafish is considered a perfect animal model for research because of its small size, transparent body which helps us to observe the inside anatomy of the fish without using specialised instruments or without having to dissect it, high no. of offsprings, fully sequenced genome with over 70% of annotated human genes, unique ability to repair heart muscle, relatively easy maintenance and breeding in the laboratory. The facility is currently being actively run by second year undergraduate students pursuing their ELITE research projects.

It is expected to allow students to inform action, gather evidence for theories, and contribute to developmental biology and knowledge in the field of zebrafish study, aiming to observe behavioural changes and reproductive

cycle of zebra fish in a controlled environment. As immediate future endeavours, the facility aims to breed zebra fish, and then use them to study behavioural patterns which would help them to establish patterns in the fish and its resemblance to humans. Their ultimate aim is to take up human diseases and study them in Zebra fishes.

6.3.2.4 Establishment of state-of-the-art laboratories for Skill Enhancement (Department of Electronics)

(A) Artificial Intelligence Lab

Artificial Intelligence, Machine Learning, Data Science and Internet of Things can be considered to be one of the most rapidly growing and exciting fields of technology right now. They have deeply penetrated into almost all the sectors of science and technology including consumer electronics, e-commerce, robotics, automation, preventive health care and medical diagnosis. This new lab will give a rigorous practical and hands-on exposure in implementation of Artificial Intelligence and Machine Learning algorithms and designing practically relevant AI systems.

(B) Internet of Things (IoT) Lab

IoT Lab has also been established to provide a basic understanding about current trends and potential applications of Internet of Things (IoT). This lab which is compliant with the current Industry Standard 5.0 is intended to provide a comprehensive knowledge on how to build IoT system. The major focus of the lab will be providing the students with the practical training on how to build IoT enabled devices and how these IoT enabled devices are interconnected with each other such that they are able to communicate with each other, exchange useful information amongst themselves and perform the required tasks without the need for any human intervention. Students will be able to integrate various components used in IoT to realise highly efficient M2M communication based automated systems including Smart Home Automation, Smart Security Solution, Smart Industrial and Agriculture solutions.

6.3.2.5 Augmenting Existing labs to carry out advanced level experiments

(A) Establishment of Applied Physics Lab in Department of Electronics

Department of Electronics has established its own Applied Physics laboratory that has facilitated the conduct of various practicals related to quantum physics, thermal physics and material science. Various supporting laboratory equipments and other required accessories have been purchased with assistance from the grant available under DBT STAR college scheme.

(B) Modern Communication Systems Lab

In order to provide practical demonstration of advanced modulation techniques, many new set-ups have been instated in Communication Lab. This has enabled better awareness towards modern modulation techniques which are employed in advanced communication systems. Some of the state-of-the art equipment procured for carrying out experiments related to Modern Communication Systems include setup for

- **Architecture of Mobile phone-** This set-up will prove very useful in providing the students with an overview of current trends in mobile technology.
- **Satellite Communication System-** Set-up for Satellite Communication System has also been introduced in the lab recently to give a practical demonstration to the students on how satellite communication can be used to transmit different types of audio and message signals across any two geographical locations on earth.

(C) Mobile Application Development Lab

Mobile Application Development Lab has been established to provide the students with rigorous training and hands-on exposure on how to develop various useful mobile applications

(D) Control Systems Lab

Control Systems Lab has also been developed which will enable the students to perform various experiments to

study the time response and frequency response of various types of first order and second order control systems

(E) 3D Printing and Designing Lab

3D Printing and Designing Lab has also been established which will help in carrying out 3D device modelling and printing.

Besides this, various other state-of-the art set-ups have also been added to promote innovative research in some of the latest technology areas including VLSI, nano science and technology, Industrial automation through Control Lab.

6.3.3 Interdisciplinary Projects under DBT STAR College Scheme

The grant received by DBT has helped in enhancing scientific exposure of undergraduate students via participation in various interdisciplinary projects/ routine lab work conducted under DBT-STAR college scheme.

S. No.	Title of the Project	Mentor/s	Detail of Student/s with courses
1	To investigate the conditions which promote lysogeny intemperate mycobacteriophages	Prof. Urmi Bajpai (Biomedical Science)	Anirudh Kumar Srishti Singh B.Sc. (H) Biomedical Science, II Year
2	To check whether virus/phages undergo lysogeny based on Virus-Virus interaction only		Mehak Sharma B.Sc. (H) Biomedical Science, II Year
3	Purification and characterization of lysins from mycobacteriophages.	Prof. Urmi Bajpai	Pulkit Singh B.Sc. (H) Zoology, II Year
4	Bacteriophage encoded lysins: Nature's Enzybiotics (Enzyme as antibiotics)		(Biomedical Science)
5	Tumor Suppressor Genes v/s Body Mass and Longevity	Dr Sunita Jetly Dr Ritu Khosla (Biomedical Science)	Yash Goel Sharika Mattoo B.Sc. (H) Biomedical Science, II Year
6	Synthesis of various Nanoparticles by using extracts from medicinal plants, their characterization and assessment of antimicrobial properties	Prof. Gagan Dhawan Dr Satendra Singh (Biomedical Science) Prof. Seema Gupta (Chemistry)	Suravi Riya Alshad Gaurav Hiya Tabish Kalyani Nidhi Harshelle Tanushree Deeparati, Harinandna Krishna Kapil B.Sc. (H) Biomedical Science II Year and B.Sc. (H) Chemistry, II Year

7	Genetic predisposition to Hepatocellular carcinoma and possible prognosis and treatment strategies	Dr Archna Pandey Dr Ritu Khosla (Biomedical Science)	Bisakha Das Pritika Kwatra B.Sc. (H) Biomedical Science, III Year
8	Utilization of lignocellulosic waste in cultivation of <i>Pleurotus djamor</i> var. <i>roseus</i> (Pink oyster mushroom) and recovery of enzymes from spent mushroom substrate.	Dr Anupama Shukla Dr Anita Narang (Botany)	Riya Dayal Lalit Pal Maniket Chauhan Kanchan Pratham Singh Chauhan Shreya Singh B.Sc. (H) Botany, II Year
9	Collection, isolation, characterization and cultivation of different mushrooms	Dr Anupama Shukla Dr Anita Narang Dr Sumit Sahni Dr Manoj Kumar Singh (Botany)	Vridhi Singh Shubhanshu Krishna Mohd. Afham Kanchan Seema Akanksha B.Sc. (H) Botany, III Year
10	Mitigating Air pollution through Phylloremediation	Prof. Charu Khosla Gupta (Botany)	Jay Kumar Sirmoria Sruthi S. Kumar Aishwarya Kumar Chaturvedi B.Sc. (H) Botany, II Year
11	Climate Change and Plant-pollinator relationship		Mridula Rani Mayank Yadav B.Sc. (H) Botany, II Year
12	Study of effect of air pollutants on soil microbiome	Prof. Charu Khosla Gupta Dr Yash Mangla (Botany)	Nikhil Sharma Sahil Chauhan B.Sc. (Prog.) Life Science, II Year
13	ROS regulation during stages of seed germination owing to temperature stress in Sunflower seedling	Dr Anita Thakur Dr Geetika Kalra (Botany)	Arunima Dey Devanshi Saini Deepanshu Kumar Vibha Shukla B.Sc. (Prog.) Life Science, II Year
14	Cultivation of <i>Pleurotus eryngii</i> (king oyster mushroom) on lignocellulosic waste and characterization of enzymes from spent mushroom substrate	Dr Sumit Sahni Dr Anupama Shukla (Botany)	Mr Mohd. Afham B.Sc. (H) Botany, II year
15	Cultivation of <i>Pleurotus eryngii</i> (king oyster mushroom) on lignocellulosic waste and characterization of enzymes from spent mushroom substrate	Dr Sumit Sahni Dr Manoj Kumar Singh (Botany)	Ms Vridhi Singh B.Sc. (H) Botany, II Year
16	Utilization of Lignocellulosic waste in cultivation of <i>Pleurotus ostreatus</i> (Blue Oyster Mushroom) and recovery of enzymes from spent mushroom substrate	Dr Sumit Sahni (Botany)	Mr Mrityunjoy Chakraborty B.Sc. (H) Botany, II Year
17	Utilization of Lignocellulosic waste in cultivation of <i>Pleurotus ostreatus</i> (Blue Oyster Mushroom) and recovery of enzymes from spent mushroom substrate		Mr. Shubhanshu Krishna B.Sc. (H) Botany, II year

18	Synthesis of Fe ₃ O ₄ nanoparticles through sonication and its effects	Prof. Sunita Hooda Prof. Geetu Gambhir (Chemistry)	Puneet Chauhan Akshit Jauhri Soven K. Samal B.Sc. (Prog.) Life Science, I Year
19	Investigative study of groundnut husk for the adsorptive removal of dyes from aqueous solution.		Geni Yao Eniya Tapo B.Sc. (Prog.) Life Science, III Year
20	Adsorption of organic dye by magnetized Graphene oxide, Ground nut husk, Guar gum from Aqueous Solution.		Yashank Chauhan Akshat Bhanu Dharmani B.Sc. (Prog.) Life Science, III Year
21	Synthesis of nanoparticles of Polyvinyl Alcohol by CO-Precipitation method		Kapil Sharma Khushi Vishwakarma Vishwa Deepak Srivastava B.Sc. (Prog.) Life Science, I Year
22	Synthesis of magnetic nanoparticles and UV-Visible analysis		Abhijit Roy Bipasa Arya B.Sc. (Prog.) Life Science, I Year
23	Synthesis and Biological Activity of Chalcones	Prof. Rashmi Thukral (Chemistry)	Aashi Yukta Aditi Heena B.Sc. (Prog.) Life Science, II Year
24	Extraction of essential oils by Green methods	Dr Manisha Jain (Chemistry)	Anjali B.Sc. (H) Chemistry, II year
25	Computational Studies on some Inorganic Compounds Using Avogadro and Gaussian Softwares	Dr Manisha Jain Dr Neeti Misra (Chemistry)	Aditi Kandari Somya Singh B.Sc. (H) Chemistry, II year
26	Review on synthesis of Heterocyclic compounds and extraction of medicinal plants	Prof. Pankaj Khanna Dr Neeti Mishra Dr Kavita Mittal (Chemistry)	Jai Gautam B.Sc. (Prog.) Physical Science (Chemistry), II Year Shweta B.Sc. (H) Chemistry, II Year
27	Use of catalysts for synthesis of biologically active heterocyclic compounds	Dr Kavita Mittal (Chemistry)	Shweta B.Sc. (H) Chemistry, II Year
28	Magnetite Graphene Oxide/Chitin Nanocomposites as Ion Sensors from Aqueous Systems: A DFT Study	Dr Pragati Malik (Chemistry)	Arnav Bhatt Sachin Rao B.Sc. (Prog.) Life Science, II Year

29	Analyzing the effect of crime in India over Female foreign tourists	Prof. Sharanjit Kaur (Computer Science)	Suruchi Verma Tishya Thukral B.Sc. (H) Computer Science, III Year
30	Exploring machine learning models for ransomware data		Nirmal Mor Sushant B.Sc. (Prog.) Physical Science (Chemistry), II Year
31	Implementing four virtual labs (computer Science computer simulations) https://www.vlab.andcollege.du.ac.in/	Prof. Sharanjit Kaur Dr Gunjan Rani Dr Nishu Singh Dr Vandita (Computer Science)	Nilesh Pandey Amitesh Ananya Shukla Siya Agarwal Harsh Bamotra Shahnawaz Khan B.Sc. (H) Computer Science, II Year Sakshi Garg Aliya Vivek Sankhyan Pankaj Sahu Palak Sharma B.Sc. (Prog.) Physical Science (Chemistry), II Year
32	Disaster management to combat Covid-19	Dr Harita Ahuja, Dr Sunita Narang (Computer Science)	Sant Anandita Abhishek B.Sc. (H) Computer Science, III Year
33	Data Analysis and Visualization of Rainfall and floods in India		Deepanshu Megha Karki Shruti Jain B.Sc. (H) Computer Science, III Year
34	College Resource and Space Utilization App	Mr Mahesh Kumar (Computer Science)	Jyotika Sharma Rishabh Sharma Tanisha Sharma B.Sc. (H) Computer Science, II Year
35	Issues, Challenges, and Growth of e-Learning during Covid-19 pandemic	Ms Nishu Singh Mr Mahesh Kumar (Computer Science)	Tanu G Anam Khan Jyotika Sharma Tanisha Sharma B.Sc. (H) Computer Science, II Year
36	Visualizing your data of music app	Ms Gunjan Rani Mr Mahesh Kumar (Computer Science)	Somesh Abhishek Akanccha B.Sc. (Prog.) Physical Science (Chemistry), II Year

37	Alumni Database Handling	Ms Gunjan Rani (Computer Science)	Harsh Bamotra Pratham Sharma B.Sc. (H) Computer Science, II Year Palak Sharma B.Sc. (Prog.) Physical Science (Chemistry), II Year
38	Faculty Database Handling		Shahnwaz Khan Pankaj Sahu Garvit Dubey B.Sc. (H) Computer Science, II Year
39	Text to Speech Converter		Vivek Sharma Aliya Sakshi Garg B.Sc. (Prog.) Physical Science (Chemistry), II Year
40	V-Labs		Nilesh Pandey Sahiba Siya Agarwal B.Sc. (H) Computer Science, II Year
41	Library Book Reminder	Ms Gunjan Rani (Computer Science)	Vivek Sharma Aliya Sakshi Garg B.Sc. (Prog.) Physical Science (Chemistry), II Year
42	Designing of a first order Low-pass and High-pass filter using op-amp (Virtual Lab Development)	Dr Ravneet Kaur Ms Gauri Ghai (Electronics)	Ankush Rana B.Sc. (H) Electronics, II Year Vishal Gupta B.Sc. (H) Electronics, I Year
43	Study of the I-V characteristics of the Common Base configuration of BJT and obtain r_i , r_o , α . (Virtual Lab Development)		Anubhav Singh Alok Singh B.Sc. (H) Electronics, II Year
44	To design JK Master Slave using elementary gates (Virtual Lab Development)		Akash Jha B.Sc. (H) Electronics, II Year Muskan Kumar Sharma B.Sc. (H) Electronics, I Year
45	To verify Malus law		Swati Shukla B.Sc. (H) Electronics, II Year Sneha B.Sc. (H) Electronics, I Year
46	To determine the value of Boltzmann constant by study the forward characteristics of diode.		Naman Prasad B.Sc. (H) Electronics, II Year

47	To determine Young's modulus, Modulus of rigidity and Poisson's ratio for the material of a wire by Searle's method with the help of Vlab.	Dr Sanjeeta Rani Dr V Bhaskar Raj Dr Satya Prakash Dr Neelakshi Borah (Physics)	Neha Khanra Nisha Khanra B.Sc. (H) Physics, I Year
48	Automated and upgraded machine as replacement of noncontact thermometer used for COVID-19 detection for entry in public spaces such as metro stations, parks etc.	Prof. Arijit Chowdhuri Dr V. Bhasker Raj (Physics)	Pratham Malik B.Sc. (Prog.) Physical Science (Electronics), II Year Niharika Upadhyay B.Sc. (H) Biomedical Science, III Year
49	Environmental and gas sensing applications of Quartz Crystal Microbalance (QCM)		Kalpajit Roy Prahlad Sharma Varnika Aggarwal B.Sc. (H) Physics, II Year
50	Investigating the factors influencing generation and effects of Eddy currents	Prof. Arijit Chowdhuri (Physics) Prof. Seema Makhija (Zoology)	Rati Chaturvedi B.Sc. (H) Zoology, I Year
51	Gas Leakage Detector using Arduino and GSM Module with SMS Alert and Sound Alarm	Dr V. Bhasker Raj (Physics)	Prashant Verma B.Sc. (H) Physics, II Year
52	Mutations in SARS-COV 2	Prof. Sarita Kumar (Zoology)	Anshika Sharma B.Sc. (H) Zoology, I Year
53	Effect of Chitin Synthesis Inhibitors on the growth and biochemical parameters of insect pests of agricultural importance		Gunjan Grover B.Sc. (H) Zoology, II Year Anaam Asif Moin Charu Jaiswal Khushi Aggarwal Khushi Vashishtha Twishi Mishra Kanishka Bothra Divya Yadav Shruti Kumari Singh Preeti Singh Sanskriti B.Sc. (H) Zoology, I Year
54	Biological Importance of heterocyclic Compound	Prof. Ravi Toteja Prof. Seema Makhija (Zoology) Dr Pooja Bhagat (Chemistry)	Swati Maheshwari Ujjwal Kumar Gupta Radhika Garg B.Sc. (H) Zoology, II Year

55	Bioindicators to assess the soil quality of AND College	Prof. Ravi Toteja Prof. Seema Makhija Dr Rahul Dev (Zoology) Dr Pooja Bhagat (Chemistry)	Meghana Bisht Tanya Chopra Ayushi Gupta B.Sc. (H) Chemistry, II Year
56	Creation of animation and simulator for Virtual Laboratory of Zoology practicals	Prof. Ravi Toteja Prof. Seema Makhija Dr Rahul Dev (Zoology)	Avnija Tyagi Ritika Chandel Sejal Arora B.Sc. (H) Zoology, III Year Harshita Basab B.Sc. (H) Zoology, I Year

6.3.4 Virtual Videos Created by Students of ANDC

S.No.	Title of Video	Contributor (Department)	URL
1	Mitosis Animation	Ms Sanskriti Ms Anju Ms Ritika B.Sc (H) Zoology, II Year	https://youtu.be/Zr4tx-5eY3YM
2	Cell Types in Blood	Me Junaid Ms Sneha Ms Shreyansh Ms Manshi Ms Shruti B.Sc (H) Zoology, II Year	https://youtu.be/Zr4tx-5eY3YM
3	Mitosis	Ms Sanskriti Ms Anju Ms Ritika B.Sc (H) Zoology, II Year	https://youtu.be/dsq0nIgZQLU
4	Blood Group Determination	Mr Junaid Ms Sneha Ms Shreyansh Ms Manshi Ms Shruti B.Sc (H) Zoology, II Year	https://youtu.be/s7f-GvHanxjI
5	To determine the dissolved oxygen in a water sample by Winkler's Method	Ms Swati Maurya Ms Jyoti Dagar Mr Sandeep Antil Prof. Ravi Toteja Prof. Seema Makhija	https://www.youtube.com/watch?v=5S_JVZs312s&t=48s
6	Cytochemical demonstration of DNA by Feulgen	Ms Swati Maurya Ms Jyoti Dagar Mr Sandeep Antil Prof. Ravi Toteja Prof. Seema Makhija	https://youtu.be/-gX-rKXQMPlg

6.3.5 Live Videos Created by Faculty of ANDC

S.No.	Title of Video	URL
Prof. Ravi Toteja, Prof. Seema Makhija, Mr Sanjay Kumar		
1	Meiosis: Practical Class	https://www.youtube.com/watch?v=8VCnakFV4V8
Prof. Arijit Chowdhuri		
2	Cathode Ray Oscilloscope-1	https://www.youtube.com/watch?v=kKo81Vrk-JVY&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel
3	Cathode Ray Oscilloscope- 2	https://www.youtube.com/watch?v=c77ZphYg6k&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=3
4	Logic Gates	https://www.youtube.com/watch?v=N_1Zifiix-So&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=5
5	Digital Systems: Gates and Applications – 1	https://www.youtube.com/watch?v=ZrLEe3m7sKg&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=6
6	Digital Systems: Gates and Applications – 2	https://www.youtube.com/watch?v=qbW-fZ5-Ir5I&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=7
7	Energy Conservation and Harvesting – 1	https://www.youtube.com/watch?v=U0yvGlyZY-5w&t=283s
8	Energy Conservation and Harvesting – 2	https://www.youtube.com/watch?v=3VeE-Ox-r4vE&list=PLNsppmbLKJ8L5-b3dqLXnhnrn-z3UsAKel&index=9
9	Multiplexers – 1	https://www.youtube.com/watch?v=k_W2Ffcz86E
10	Multiplexers – 2	https://www.youtube.com/watch?v=uhCui6hb9BA
11	Flip Flops – 1	https://www.youtube.com/watch?v=UZI-z2HJMf-w&list=PLNsppmbLKJ8KeElxy81OIC-AGIWJAG-8gL
12	Flip Flops – 2	https://www.youtube.com/watch?v=aHr-L4aakHaM&list=RDCMUCA7OQkX9AEIVQ-6j9i0OSQhA&index=4
13	Shift Registers – 1	https://www.youtube.com/watch?v=HbYfM-WGKsYU&list=RDCMUCA7OQkX9AEIVQ-6j9i0OSQhA
14	Shift Registers – 2	https://www.youtube.com/watch?v=50iAC2GO0Y&list=PLNsppmbLKJ8KeElxy81OIC-AGIWJAG8gL
Dr Manisha Jain		

15	Study of pH dependence of UV-Vis spectra of aqueous potassium dichromate solution	https://youtu.be/XCf6lZq4XEE
16	Preparation of Tetraaminecopper(II) sulphate monohydrate	https://youtu.be/TWYu4d6xj8
Dr V. Bhasker Raj		
17	Solve 1-D heat equation (PDE) using finite difference and Crank Nicolson method in SCILAB	https://www.youtube.com/watch?v=d_aCYcaGMPY
18	Solve boundary value problems (linear differential equations) using Shooting method in SCILAB	https://www.youtube.com/watch?v=oEJe4MYyU2U
19	Solve ODE (Dirichlet and mixed boundary) using Finite difference method in SCILAB	https://www.youtube.com/watch?v=Z2_UgvFAWx-w&t=117s
20	Solve ODE (1st and 2nd order) using Euler's & modified Euler's method in SCILAB	https://www.youtube.com/watch?v=A_9Wf0S-H5U&t=1s
21	Solve system of linear equations using Gauss Elimination method in SCILAB	https://www.youtube.com/watch?v=qH1Y-hJo1Ck&t=2s
22	Solve a system of linear equations using Gauss Seidel method in SCILAB	https://www.youtube.com/watch?v=dMMMyphN-Lk4M
23	Numerical Integration using Trapezoidal & Simpson's rule (1/3 and 3/8) in SCILAB	https://www.youtube.com/watch?v=bHPqzurmI-7w&t=1s
24	Interpolation using Newton's Forward and Backward difference formula in SCILAB	https://www.youtube.com/watch?v=lb8C9DZic9U
25	Introduction to SCILAB for beginners (part-2)	https://www.youtube.com/watch?v=CKdaC6B-miIM&t=7s
26	Introduction to SCILAB for beginners (part-1)	https://www.youtube.com/watch?v=bHVOPE-CO8-o&t=5s
27	Molecular Dynamics simulation (NVT) (full code in SCILAB) via Lennard Jones potential: Part-2	https://www.youtube.com/watch?v=L4eJei4JsVU
28	Molecular Dynamics simulation (full code in SCILAB) via Lennard Jones potential: Part-1	https://www.youtube.com/watch?v=qhagrbw-P84E&t=105s

6.3.6 Exhibitions/Seminars/Training Courses Conducted

Biomedical Science

- 1 Training on **Tools in Modern Biology** for Non-Teaching Staff on April 21, 2022.
- 2 Webinar on **Introduction to BioNEST-UDSC and Bio entrepreneurship** by Mr Vijay Kantharia, CEO, BioNEST-UDSC on February 15, 2022.

- 3 **Online Python learning** workshop with resource persons -Ms Shruti Gupta and Mr Alok Anand, Jawaharlal Nehru University in the month of November, 2021 (weekends, 20 hours).
- 4 National Seminar on **Vigilance, Corruption and Transparency in Governance - A Re-assessment** on the occasion of Vigilance Awareness Week 2021 being organized in association with Vivekananda College and Daulat Ram College, University of Delhi on November 01, 2021.
- 5 National Workshop (Virtual) on **Flow Cytometry and qPCR Based Blood Analyses** on October 20-24, 2021.
- 6 IBRC Online Symposium on “**Phage Lysins: Promising alternatives to antibiotics**”. Speakers during the symposium were: Dr T. S. Balganes, President and Member, Board of Directors, Ganga Gen Biotechnologies Pvt. Ltd. (GBPL), Mr Sukumar Hariharan, Head of Development, GBPL, India., Prof Vincent A. Fischetti, Prof. & Head, Laboratory of Bacterial, Pathogenesis and Immunology, Rockefeller University, USA and Dr Joseph Campbell, Program Officer and Leader, Bacteriophage Interest Group, National Institute of Allergy and Infectious Diseases (NIAID), NIH, USA on July 09, 2021.
- 7 Youth Panel Discussion on **Sustainable Development Goals** during Ecosystem Restoration Month organized in association with Vivekananda College and Daulat Ram College, University of Delhi on June 05- July 03, 2021.

Botany

- 1 Training on **Tools in Modern Biology** for Non-Teaching Staff on April 26, 2022.
- 2 Five day Hands-on-Workshop on **Revisiting Laboratory Techniques in Botany** on October 20-26, 2021.

Chemistry

- 1 Two Sessions were organised in a one-day workshop on **Introduction to New Experiments** on April 21, 2022.
- 2 Hands on Workshop for Non-Teaching staff **The Calibration and Standardization of Laboratory Equipments and Glassware** was organized for the Non-teaching staff on April 20, 2022.
- 3 Five days workshop on **Analytical Laboratory techniques** on October 25-29, 2021.
- 4 Two days online workshop on **Computational Chemistry** on October 06-07, 2021.
- 5 Two days online workshop on **Photoshop** on September 30- October, 01, 2021.

Computer Science

- 1 Three Days online Workshop under FOSS Club on **Let's Talk DevOps** by Mr. Shailesh Thakur, Senior DevOps Engineer, o9 Solutions Inc on March 11-13, 2022.
- 2 Two Days online Technical Talk was organized under Turing Society on **Cisco Network Administration** by Mr Bineet Kumar Joshi, Assistant Professor, Department of Computer Science, Swami Rama Himalayan University on March 03-04, 2022.
- 3 Technical Talk online under Turing Society on **Wireless Security Network** by Prof. Sanjay Kumar Dhurandher, Professor and Head in the Division of Information Technology, Netaji Subhas Institute of Technology (NSIT), University of Delhi, India on March 04, 2022.
- 4 Five Days online Workshop was organized under FOSS Club on **Face Recognition using Python** by Dr Xavier Chelladurai, Director and Professor, Christ Human Resource Center on October 26-30, 2021.
- 5 Five Days online Workshop under FOSS Club on **A First Step Towards Developing Virtual Lab Using MERN Stack** by Mr. Prabhat Chandra, Freelance Trainer/ Developer on October 09-24, 2021.
- 6 Two Days online Workshop under FOSS Club on **HTML: A Prerequisite for MERN Stac** by Mr. Rishi Sarbobhoum, Mr. Aditya Goyal, Mr. Devesh Yadav, Mr. Sushant Sharma, Students, ANDC on October 06-07, 2021.
- 7 Two Days online Workshop under FOSS Club on **Front End WebUI Frameworks Overview: Bootstrap** by Mr. Ashwani Bhatia, Web Designer/ Developer on October 02-03, 2021.

Electronics

- 1 Training workshop and **Demonstration of Control Lab with software and data acquisition and Universal Dev Board** was organized with FPGA and CPLD for Teachers in collaboration with industry partner M/s Silicom Electronics on April 25, 2022.
- 2 Hands-on Workshop on **Arduino and Sensor Interfacing** was organized in technical collaboration with industry partner Touch Techno Pvt. Ltd on March 26, 2022.
- 3 Training Workshop and **Demonstration of lab Equipment** for Teaching and Non- Teaching Staff was organized in collaboration with industry partner M/s Vijayanta Electronics on March 23, 2022.
- 4 Workshop on **Holography** was organized on March 14, 2022.
- 5 Workshop on **Full Stack Web Development using MERN** was organized on March 05-09, 2022.
- 6 Hands-on workshop on **Cloud Computing** was organized in technical collaboration with industry partner M/s Brain Mentors Pvt. Ltd. on September 06-10, 2021.
- 7 Two day Hands on workshop on **Arduino programming** was organized on June 01-02, 2021.
- 8 Several events were organised on the occasion of IDL 2021 under the theme '**Let your Light Shine**' on International Day of Light 2021 Celebration on May 16, 2021.

Physics

- 1 Organized a webinar on **Intellectual Property Rights Awareness Program** under National Intellectual Property Awareness mission (NIPAM) in collaboration with Office of the Controller General of Patents, Designs & Trade Marks Department for Promotion of Industry and Internal Trade Ministry of Commerce & Industry, Government of India on January 19, 2022.
- 2 Hands – on workshop on **Basic and Contemporary Thermal Physics, Mechanics and Laser Application** was on November 12-19, 2021.
- 3 Hands – on workshop on **Modern Physics** was organized on November 10-17, 2021.
- 4 Hands – on workshop on **Digital Systems and Applications with Microprocessors and Microcontrollers** organized on October 20-27, 2021.

Zoology

- 1 One Day workshop was organized on **Tools in Modern Biology** for the support staff to familiarize them with the new equipment purchased under the STAR Scheme on April 21, 2022.
- 2 Two days Hands-on workshop was organized on **Tools and Techniques of Biotechnology** on April 07-08, 2022. During this workshop, students were given hands on experience for DNA isolation, Agarose Gel Electrophoresis, PCR, Haemoglobin estimation, BP measurement and Southern Blotting.
- 3 Seven days Hands-on workshop was organized on **Biological Techniques** on September 27–October 04, 2021. During this workshop, students were given hands-on experience for the preparation of LB Media, Blood group determination. SDS-PAGE and ELISA etc.
- 4 An online workshop was organized on **Initiating Virtual Labs** in collaboration with IITD on August 24, 2021.

6.3.7 Outreach Activities (Popular Lectures)/Visits

Biomedical Science

- 1 Prof. Urmi Bajpai delivered talk in the Webinar on “**Bacteriophages and encoded lysin enzymes as potential therapeutics**” organized by Emerging Biopharmaceutical Manufacturers (EBPMN), and International Bacteriophage Research Consortium (IBRC) on December 03, 2021.
- 2 Prof. Urmi Bajpai delivered an online talk on “**Bacterial infections, antibiotic resistance and prospects of phage lysins as a new class of antimicrobials**” in the Biotechnology Lecture Series, organized by Department of Biotechnology, Cochin University of Science and Technology, Kochi, Kerala-682022 on April 12, 2022.
- 3 Prof. Urmi Bajpai delivered a talk on “**Computational Mining of Bacteriophage Genomes for Antibacterial Agents**”. Organized by Department of Computational Biology, Indraprastha Institute of Information Technology (IIIT), Okhla Phase III, Delhi on July 01, 2022.

- 4 Prof. Urmi Bajpai delivered a talk on “**Antibiotic Resistance: A silent epidemic**”, at the SERB sponsored seminar on Drug Resistance: Causes and Challenges Ahead. Organized by Noida Institute of Engineering and Technology (Pharmacy Institute), Greater Noida on June 11, 2022.
- 5 Prof. Gagan Dhawan delivered talk on 13th annual conference on Advances in Cell and Tissue Culture 2021 (ACTC 2021), on topic “**Exploring the effect of polydopamine-aminoglycoside nanoconjugates for combating bacterial biofilms and augmenting cell migratory effect**” on November 03, 2021.
- 6 Dr Sunita Jetly as state blood cell Coordinator organised Webinar and **Screening program for thalassemia** in NSUT, Gargi College and BCAS, DU on October 29, 2021.
- 7 Prof. Gagan Dhawan delivered talk on AICTE-ATAL Face to Face Faculty Development Programme (FDP) on “**Drug Discovery & Design in 21st Century**” organized by Netaji Subhas University of Technology (NSUT), Dwarka, New Delhi, on topic “**Hunting for new drugs: Molecular insights into drug discovery**” on July 08, 2021.

Botany

- 1 Students of B.Sc. (H) Botany II and III Year went to FRI, Dehradun, Dhanaulti and Kanatal, Uttarakhand and gained hands on knowledge about the ecology, herbarium, mushroom cultivation.
- 2 Students virtually visited **Yakult’ Industrial Plant** at Sonapat, Haryana.
- 3 An interactive session was organised at Tagore International School to familiarise students about CUET and the admission process to Central Universities with specific reference to University of Delhi and basic science courses on July 12, 2022.
- 4 Students visited Mukteshwar and Nainital and studied ecology, herbarium preparation.

Chemistry

- 1 Lecture series in online mode of “**Journey of an Alumni**” held weekly on October 16 - December 10, 2021.

Electronics

- 1 Dr Ravneet Kaur and Ms Gauri Ghai served as a resource person in a five-day workshop on “**Development of Competency Framework and Revisiting of the Learning Outcomes in Science and Mathematics (PAC 6.01/2021-22)**” held online at DESM, NCERT, New Delhi on March 07-11, 2022.
- 2 Dr Ravneet Kaur and Ms Gauri Ghai served as a resource person in a five-day workshop on “**Development of Competency Framework and Revisiting of the Learning Outcomes in Science and Mathematics (PAC 6.01/2021-22)**” held online at DESM, NCERT, New Delhi from February 28-March 04, 2022.
- 3 An Education visit was organized to Museum of Illusions, New Delhi on National Science Day on February 28, 2022.
- 4 Dr Ravneet Kaur delivered a lecture as a Resource Person on the topic Communication: Past, Present and Future on February 03, 2022 organized by Internal Quality Assurance Cell (IQAC) of ARSD College.
- 5 Dr Ravneet Kaur serves as a resource person in a five-day workshop on “**Online Course in Teaching of Science at Upper Primary Stage.**” held online at DESM, NCERT, New Delhi on January 17- 21, 2022.
- 6 Dr Ravneet Kaur serves as a resource person in a five-day workshop on “**Online Course in Teaching of Science at Upper Primary Stage.**” held online at DESM, NCERT, New Delhi on January 10-14, 2022.
- 7 An Outreach Program and workshop was organized on **Sensor Interfacing using Arduino and Tinker CAD simulation** on October 18-30, 2021.

Physics

- 1 Faculty members of Department of Physics activity led by Dr Siddhartha along with Mr Pawan Kumar, Dr Neelakashi K. Borah, Dr Rakesh K Sonker and Dr Ambika with some students were instrumental in establishment of COVID-19 Isolation centre. The center provided free medicines, oxygen ambulances and teleconsultation to needy patients from senior doctors of the country and also helped in creating awareness, through conduction awareness camp and distribution of hygiene kits (mask, Soap, Hand Sanitizer, food and Gloves) free of cost. The Services have been appreciated by Government of India and State Governments, specially, Hon’ble Vice President of India, Director General of Health Services, Government of India,

Director General of Health Services, Government of Uttarakhand, Director AIIMS, Bhopal, Member, National Commission for Women, Government of India, Vice Chancellor, Sr. IAS, IPS, IRS, Indians biggest organisation in the field of Social Service SEWA BHARTI and other distinguished personalities of India.

- 2 An Education visit was organized for 10 students each to Inter University Accelerator Centre (formerly Nuclear Science Centre) and National Physical Laboratory, New Delhi on February 28, 2022 (National Science Day).

Zoology

- 1 Visit to Sulabh International museum of toilets: A trip organized by the Department of Zoology under the aegis of DBT STAR college scheme to Sulabh International museum of toilets on April 18, 2022. The students learnt how they make sanitary napkins by own & sale them in affordable price. The museum had a rare collection of facts, pictures and objects detailing the historic evolution of toilets from 2500 BC to date. It provides a chronological account of developments relating to technology, toilet related social customs, toilet etiquettes, prevailing sanitary conditions and legislative efforts of different times. It had an extensive display of privies, chamber pots, toilet furniture, bidets and water closets in use from 1145 AD to the modern times. It also had a rare collection of beautiful poems related to toilet, their usage. Few photos of different toilets. The trip also enlighten us about how people use the toilets in hilly areas, forest areas in villages & still using. It was also explained that how the waste material is converted into fertilizer and the use of waste material into creating bio gas. How bio gas- used is used in kitchen. Dr Pathak founded Sulabh International Social Service Organisation in 1970 and launched a social reform-cum-environmental upgradation movement taking up the challenge of sanitation related pollution leading to environmental degradation and health hazards caused by the practice of open defecation and use of bucket toilets.
- 2 Visit to IVF Centre: A trip was organized by the Department of Zoology under the aegis of DBT STAR college scheme to South end IVF Centre on April 05, 2022. Southend Fertility & IVF is the Best IVF Centre in Delhi that has helped thousands of couples conceive their own baby using advanced assisted reproductive techniques (ART). Southend was founded by Dr Sonia Malik, a renowned Fertility and IVF Specialist and Dr Avtar Krishan, a leading Anesthesiologist as a dream to offer comprehensive fertility treatment services and Test tube baby centre in Delhi. It was very informative and wonderful learning experience and students enjoyed learning about IVF processes.
- 3 Dr Sarita Kumar delivered a talk on **Mendelian and Non-Mendelian Inheritance** for the students of Department of Zoology, Punjab Agricultural University, Ludiana, Punjab on February 23, 2022.
- 4 Dr Sarita Kumar delivered a talk on **An Overview of Animal Classification: Understanding Criteria** for the students of Department of Zoology, Punjab Agricultural University, Ludhiana, Punjab on February 22, 2022.
- 5 Virtual tour of Aravalli Biodiversity Park on February 10, 2022. This year we got an opportunity to virtually visit the Park and understand the great features it holds. The Park also provides for a great open-air laboratory for students and researchers. Biodiversity parks like this are ideal platforms for promoting conservation education. Especially in times of COVID crisis, the virtual tours proved so efficient and helpful in understanding the entire system without having put ourselves to any risk.
- 6 An online International Outreach Program was organized to Celebrate International Microorganism Day as “MICROSPHERE 2021” by ANDC in collaboration with 10 different institutes to generate awareness about microbes to the school students on September 27, 2021. About 800 students attended the program.
- 7 School student, Mr Krishna was trained in the laboratory of Prof. Ravi Toteja and Prof. Seema Makhija from July-September, 2021.
- 8 Establishment of Zebra Fish Culture Facility: For Details See Section 6.3.2.3

6.3.8 Invited Lectures

Biomedical Science

S.No.	Invited Speaker	Affiliation	Title	Date
1	Ms Anuja Agarwala	Senior Dietitian, AIIMS and Member, FSSAI	Kitchen is your Health tool	April 18, 2022

2	Mr Vijay Kantharia	CEO, BioNEST-UDSC	Introduction to BioNEST-UDSC & Bioentrepreneurship	February 15, 2022
3	Mr Shino James	IISER, Bhopal	Designing of a Novel Vector for One-Step Cloning & Expression in E.coli	January 28, 2022

Botany

1	Prof. Rajni Gupta	Kirori Mal College, University of Delhi	Cultivation of edible mushroom: Pleurotus	June 17, 2021
2	Prof. Manju M Gupta	Sri Aurobindo College, University of Delhi	From mycorrhizosphere to rhizosphere microbiome: The beautiful journey	June 23, 2021
3	Dr Dhanya Bhaskar, Associate Professor	Indian Institute of Forest Management, Bhopal	Biodiversity Conservation as if people and ecosystem matter'	October 28, 2021
4	Ms Deepti Gulati	National Institute of Food Technology Entrepreneurship and Management, Sonapat	Challenges and strategic solutions for breaking the bias for better nutrition and health outcomes	March 08, 2022
5	Prof. Mohammad Zahid Ashraf	Jamia Millia Islamia University, Delhi		March 23, 2022
6	Prof. Vishnu Bhat	Department of Botany, University of Delhi	Harnessing Apomixis to preserve Hybrid Vigour	April 20, 2022

Chemistry

1	Mr Rahul Giri	Katayev Lab, University of Fribourg, Switzerland	Journey of an Alumni Episode -1 The Rise	October 16, 2021
2	Mr Sachin Giri	Gevorgyan Research Group, University of Texas, Dallas, United States	Journey of an Alumni Episode -2 The Rise	October 22, 2021
3	Ms Anmol Thanai	University of Manchester, United Kingdom	Journey of an Alumni Episode -3 The Rise	October 30, 2021
4	Dr Vipendra Kumar	University of Illinois, Urbana Champaign IL, USA,	Journey of an Alumni Episode -4 The Rise	November 26, 2021
5	Mr Vinod Singh Adhikari	Flying Officer in Indian Air Force	Journey of an Alumni Episode -5 The Rise	December 10, 2021
6	Ms Shreya Arora	Reviewer Selection Lead at Taylor & Francis, New Delhi	Ethics to Paper writing	April 19, 2022

Computer Science

1	Prof. Madhu Vij	Department of Computer Science	Role of IT in Indian Banking System	July 14, 2022
2	Dr Sarika Jain	Assistant Professor, Department of Computer Science, NIT, Kurukshetra.	Semantic Intelligence- The next step in Artificial Intelligence	October 01, 2021
3	Mr Pranjal Mishra	Lead Data Scientist, CIMB Bank.	Explainable AI	October 04, 2021
4	Dr Nihar Ranjan Roy	Associate Professor, Sharada University.	Predictive Modeling using Python	October 08, 2021
5	Mr Bineet Kumar Joshi	Assistant Professor, Department of Computer Science, Swami Rama Himalayan University	Cisco Network Administration	March 03-04, 2022
6	Prof. Sanjay Kumar Dhurandher	Professor and Head in the Division of Information Technology, Netaji Subhas Institute of Technology (NSIT), University of Delhi, India.	Wireless Security Network	March 04, 2022

Electronics

1	Prof. Bijoy Kumar Kuanr	Special Centre for Nanoscience, JNU, New Delhi	Magnetic Nano-structures based Microwave Monolithic Signal Processing Devices	April 19, 2022
2	Prof. Gaurav Sharma	Electrical & Computer Engineering, University of Rochester, New York	use of Physics U Math for Imaging Arithmetic	June 29, 2021
3	Dr Amita Kapoor	Shaheed Rajguru College of Applied Science	Digital Transformation and it's impact on the future after Covid-19	July 7, 2021
4	Dr Ravinder Kaur	Deptt. Of Electronics, Deen Dayal Upadhaya College, Delhi University	Creative Thinking and Entrepreneurial Skills	June 23, 2021

Physics

1	Dr Parminder Singh	Dronacharya Government College, Gurugram	An introduction to astronomical observations	March 29, 2022
2	Dr David Kocman	Department of Environmental Science, Jožef Stefan Institute (JSI) Ljubljana, Slovenia	Engagement of citizens in co-designing citizen science studies in environmental epidemiology: opportunities and challenges	February 24, 2022

3	Dr Natasa Mori	Department of Organisms and Ecosystems Research, National Institute of Biology in Ljubljana, Slovenia	Aquatic biofilms as “bioengineers” for newly emerging pollutants removal	February 23, 2022
4	Dr Siva Karuturi	School of Engineering Australian National University, Australia	Advanced Semiconductor and Catalytic Materials for Sustainable Hydrogen Generation	February 23, 2022
5	Dr Mukesh Kumar Thakur	J. Heyrovsky Institute of Physical Chemistry of the Czech Academy of Science, Prague, Czech Republic	The Role of the 2D materials for sustainable Growth and Future Optoelectronic Device Applications for environment	February 22, 2022
6	Dr Anjali Sharma Kaushik	Department of Physics, ARSD College, University of Delhi, New Delhi, INDIA	Low temperature operated efficient NO ₂ gas sensors for environmental monitoring	February 22, 2022
7	Dr Kajal Jindal	Department of Physics, Kirori Mal College, University of Delhi	In ₂ Se ₃ thin films based high performance self-powered UV photodetector for environmental applications	February 25, 2022

Zoology

1	Prof. Gaytha A Lagolis	Prof. of Environmental Policy, Bryant University, Rhode Island, USA	Syzygy or Sisyphus: The Future of Environmental Policy Making	February 22, 2022
2	Prof. Andy Purvis	The Natural History Museum, London, UNITED KINGDOM	Using biodiversity models to support the nature-positive transition	February 26, 2022
3	Prof. Rup Lal	NASI Senior Scientist Platinum Jubilee Fellow, The Energy and Resources Institute (TERI), INDIA	Hot springs located Atop the Himalayan Ranges at Manikaran and Kheer Ganga in Himachal Pradesh, India : Potential Sources of Microbial Diversity and Thermostable Enzymes	February 25, 2022
4	Dr Sanjukta Subudhi	DBT-TERI Center of Excellence in Advanced biofuels & Bio-commodities, The Energy and Resources Institute (TERI), Delhi, INDIA	Microbial intervention for advanced Biofuel production	February 28, 2022
5	Dr Bettina Sonntag	Research Department for Limnology, Mondsee, University of Innsbruck, AUSTRIA	Identification and monitoring of ciliated key protists in aquatic environments in the light of a sustainable environmental approach	February 25, 2022

6	Dr Mrityunjay Kar Suar	KIIT University	Incubating Ideas to Build Sustainable Environmental Technologies	February 26, 2022
7	Prof. Hardeep Kaur	Ramjas College, University of Delhi, Delhi, INDIA	Antifungal compounds: emerging environmental pollutants	February 22, 2022
8	Dr B. Anjan Prusty	Department of Natural Resources Management & Geo-informatics, Berhampur University, Odisha, INDIA	Criteria for Identifying Coastal & Marine Eco Sensitive Areas: A Revisit	February 24, 2022
9	Dr. Rachna Chandra	Department of Environmental Science - Forestry, Faculty of Agriculture, Sri University, Cuttack, Odisha, INDIA	Mangrove plantation activities in Kachchh, Gujarat	February 24, 2022
10	Dr Nageswar Rao Amanchi	University College of Science, Osmania University, Hyderabad, Telangana, INDIA	Ecosystem Restoration – Certain key approaches, principles and interventions	February 23, 2022
11	Dr Gayatri Kanungo	Senior Environmentalist, World Bank, USA	Nourish Ecosystems, Nurture Biodiversity, Enable Food and Enhance Resilience – Integrating Nature's potential	February 28, 2022
12	Dr Binita Dutta	Senior Business Analyst, Hyloris Pharmaceuticals, BELGIUM	Health care sustainability	February 27, 2022
13	Dr Charu Dogra Rawat	Ramjas College, University of Delhi, Delhi, INDIA	Overcoming challenges in the sustainable remediation of Hexachlorocyclohexane (HCH) dumpsite soils	February 22, 2022
14	Prof. Ram Kumar	School of Earth, Biological and Environmental Science, Central University of South Bihar, Gaya, Bihar, INDIA	Zero Hunger and climate mitigation: Constraints and possibilities	
15	Dr Vikas Sachdev	Department of Gastroenterology, AIIMS, New Delhi	ELISA	October 4, 2021

16	Dr Raunak Dinker	School of Engineering & Science, G D Goenka University, Gurugram, Haryana, INDIA	Environmental mitigation through biological approaches	February 22, 2022
17	Dr Himender Bharti	Department of Zoology and Environmental Science, Punjabi University, Patiala, INDIA	Anthropocene: A misplaced trust in Ecological Utopia	February 22, 2022
18	Dr Utkarsh Sood	The Energy and Resources Institute (TERI), Delhi, INDIA	The role of genomics in resolving classification anomalies of bacterial genera	February 26, 2022



**ACHARYA
NARENDRA
DEV COLLEGE**
UNIVERSITY OF DELHI

COLLEGE ACTIVITIES

Annual Report 2022



7 COLLEGE ACTIVITIES

7.1 Internal Quality Assurance Cell (IQAC).

Chairperson	Prof. Ravi Toteja Officiating Principal
College Management	Prof. Geetu Gambhir Bursar
	Mr V. S. Rao Administrative Officer
	Mr Chetanya Sharma Section Officer (Accounts)
Alumni cum NGO	Mr Debadityo Sinha
Teacher Members	Prof. Gagan Dhawan Professor, Department of Biomedical Science
	Dr Anupma Shukla Associate Professor, Department of Botany
	Prof. Pankaj Khanna Professor, Department of Chemistry
	Dr Sandeep Kumar Goel Associate Professor, Department of Commerce
	Dr Preeti Marwaha Associate Professor, Department of Computer Science
	Dr Ravneet Kaur Associate Professor, Department of Electronics
	Prof. Arijit Chowdhuri Professor, Department of Physics
	Prof. Sarita Kumar Professor, Department of Zoology
Coordinator	Dr Sada Nand Prasad Associate Professor, Department of Mathematics

7.1.1 Activities organized by IQAC

The IQAC members of the college over the last year, undertook many initiatives including guidance of colleges/institutes based on the following points:

- The IQAC members visited Holy Family College of Nursing on September 28, 2021 to guide them about arranging periodic assessment and nuances regarding accreditation besides creating awareness about academic Programmes / projects.
- A meeting with the External Members of IQAC of the college was held on December 15, 2021. Therein the external members were apprised of how a stimulating academic environment for the promotion of quality teaching-learning and research is being maintained in the college despite the rude interruption by the COVID-19 pandemic.
- An online talk on the importance and utility of Creative Commons by Prof. Savithri Singh was organized for the faculty members of Holy Family College of Nursing on December 17, 2021. It is envisioned that by Creative Commons, the collaboration can be promoted with other stakeholders of higher education for quality evaluation, promotion and sustenance.
- The IQAC team visited Swami Shraddhanand College (SSN), University of Delhi, on December 22, 2021 under the UGC *Paramarsh* Scheme. The IQAC members interacted with the faculty and non-teaching

staff of SSN College and therein the IQAC Director presented and explained the process of submission of AQAR with all the indicators.

- IQAC also organised the second Dr B. R. Ambedkar Memorial Lecture on ‘Dr B. R. Ambedkar’s Contribution to Nation Building’ on March 25, 2022 in the college Seminar Hall. Prof. Sushma Yadav, Member UGC, was the keynote speaker.
- The Department of Commerce, in collaboration with IQAC, organized a workshop on ‘Application of Cost Accounting Standards in the Preparation of Cost Statement’ on April 20, 2022 in the college Seminar Hall. Prof. Rajiv Kumar Goel of DCAC, University of Delhi was the resource person.
- IQAC also prepared the AQARs for the years 2016-2017, 2017-2018, 2018-2019, 2019-2020, 2020-2021 as per the formats provided by NAAC, UGC.
- IQAC has also been an integral part of organization of Conferences/Workshops/Scientific talks being organized by the college. Some of the same are enumerated here as under:
 - IP Awareness/Training program under National Intellectual Property Awareness mission (NIPAM) on January 19, 2022
 - International e-Conference on “Mitigating Contemporary Environmental issues by Sustainable Approaches (IMCESA-2022) from February 22-28, 2022
 - Hands-on workshop on Digital Systems and Applications with Microprocessors and Microcontrollers organized from October 20-27, 2021
 - Science Adda – One day Interaction Programme with school students organized on December 20, 2021
 - Hands-on workshop on Modern Physics organized from November 10 -17, 2021
 - Hands-on on workshop on Basic & Contemporary Thermal Physics, Mechanics and Laser Application organized from November 12-19, 2021
 - Besides the aforementioned, the IQAC team of the college has been working tirelessly to encourage self-evaluation and accountability for bringing autonomy in the teaching-learning process, to foster innovation in practice and to undertake high quality research studies, consultancy and training programmes.

7.2 Activities of Staff Council Committees

7.2.1 Annual Academic Events Committee

Joint Convenors: Dr Pooja Bhagat (Chemistry)

Prof. Seema Makhija (Zoology)

7.2.1.1 Annual Day Celebrations 2021

- The Annual Day of the college was organized on August 31, 2021 in the hybrid mode. **Prof. P C Joshi**, Vice-Chancellor, University of Delhi, was the Honourable Chief Guest **Prof. Sarman Singh**, Director, AIIMS, Bhopal and **Prof. Balaram Pani**, were the Guests of Honour. They joined the event online. The Chairman, Governing body, **Prof. Anwar Alam** graced the occasion with his presence.
- The program began with the ceremonial lighting of the lamp followed by the Invocation of Goddess Saraswati and followed by BIHU dance by the members of the North Eastern Cell of ANDC. Officiating Principal, Prof. Ravi Toteja, presented the Annual Report, highlighting the major achievements of the staff and the students.
- This was followed by the key- note address of **Prof. P C Joshi**. Vice Chancellor, University of Delhi. He praised the hard work carried out by faculty members, non-teaching staff and students of the college. The VC also asserted that the teaching and non- teaching staff are the gems of the college. **Prof. Sarman Singh**, Director, AIIMS Bhopal was the Guest of Honour for the event. He discussed about the COVID-19 pandemic and felt that it is not only a health issue but also a social issue. He enlightened the gathering about the facts and

myths of COVID-19 and suggested that the media should play a positive role in combating this stressful time. He also appreciated the achievements of the college during this academic year. **Prof. Balaram Pani**, Dean Colleges, University of Delhi gave his best wishes to the College for all its future activities. He asserted that the education system was greatly affected during the pandemic but the university faculty has evolved unique methods for teaching and learning processes. He also congratulated the College for holding its Annual Day in the hybrid mode.

- The editors in-chief of the college magazine, Ms Sarah Parwez (English) and Mr. Rahul Kumar Sharma (Hindi) presented 'Insight 2021' to the Guests and Officiating Principal for online release.
- निष्ठा Awards were given to the following teaching members of the college who have completed 25 years of regular service in the college:
 - 1 Ms Anupama Raštogi (Mathematics)
 - 2 Dr Poonam A Kant (Zoology)
 - 3 Dr Vatsala Kohli (Mathematics)
 - 4 Prof. Sarita Kumar (Zoology)
 - 5 Dr M. S. Rajeswari (Botany)
 - 6 Dr Shalu Dhanda (Physics)
 - 7 Dr Pooja Bhagat (Chemistry)
 - 8 Prof. Anju Agrawal (Electronics)
- निष्ठा Awards were given to the following non-teaching members in 2020 but due to online annual day in that year, they were awarded this year: -
 - 1 Mr. V. S. Rao (Administrative Officer)
 - 2 Mr. Chetanya Sharma (Section Officer, Accounts)
 - 3 Ms Meenu Malhotra (Section Officer)
- Meritorious students were awarded for their accomplishments. A ghazal recitation was performed by Mr Syed Mehran Shah, a musician carrying forward the legacy of the Patiala Gharana of music followed by a street play by *Dhwani*, the Theatre society of the college. Dr Pooja Bhagat gave the Vote of Thanks and the Annual Day celebrations ended with the singing of the National Anthem.

7.2.1.2 Orientation Programme 2021

- Due to the pandemic, it was decided to conduct the Orientation Programme virtually. The college organized the Orientation Programme on November 22-23, 2021 for the freshly admitted students to familiarize them with the college and enable them to interact with their teachers and classmates. The programme was held in two phases: College- specific and Department-specific orientation.
- The College-specific Orientation Programme was held on November 22, 2021 where the following four sessions were run:
 - Session-I Teaching Learning and Resources (TLR) (1h 30 min)
 - Session-II Research and Professional Practice (RP) (1h)
 - Session-III Theatre Society (*Dhwani*) & Talent Hunt (1h)
 - Session-IV Mentoring, Counselling, Outreach and Inclusivity (1h)
- The College Orientation started with the welcome address by the Officiating Principal, Prof. Ravi Toteja. A detailed presentation was held to acquaint each student with the academic culture of the College, co-curricular and extra-curricular activities, attendance rules, internal assessment criteria, add-on courses, skill development through research and entrepreneurship, grievance cell, students' council and choice-based credit system, etc.
- The convenors of each college committee interacted with the students in their allotted sessions where they informed about the initiative and activities held by the committees every year.

- The Department-specific Orientation Programme was held on November 23, 2021. In the Departmental Orientation, students interacted with their course teachers, lab staff and seniors. They were taken on virtual tours of their department: staff room, labs and classrooms. They were told about the college and its general rules and regulations. Mentors (Department Teachers) were allotted to each student and the time table was also shared with them. All students took a pledge during these orientation programmes to ensure their name in the voting list and apply for a voter card.

7.2.1.3 Acharya Narendra Dev Memorial Lecture

- Acharya Narendra Dev Memorial Lecture was held on October 31, 2021. The programme began with the ceremonial lighting of the lamp followed by the Invocation of Goddess Saraswati and introduction to Acharya Narendra Deva.
- **Dr Talat Ahmad**, Vice Chancellor, University of Kashmir was the Honourable Chief Guest. He was welcomed by the Officiating Principal, Prof. Ravi Toteja. He talked about the revolutionary ideas of Acharya ji. He emphasized that the teaching of Acharya Ji is more relevant for the young generation. He also appreciated the contribution of India in the development of the vaccine for coronavirus and how our country has contributed in combating this pandemic globally. He was keen on future collaborations and projects between ANDC College and Kashmir University. He appreciated the college for its NAAC grading and NIRF ranking.

7.2.2 Annual Cultural Events Committee

Joint Convenors: Ms Seema Gupta (Mathematics)

Dr Geetika Kalra (Botany)

The whole world has been affected by the Covid-19 pandemic which has created havoc in everyone's life. In the last two years, education had to be shifted to the online mode due to the shutting down of institutions. Along with regular online classes, the cultural events were being celebrated in the online mode. However, after the relaxation of covid norms and the re-opening of colleges and schools, activities are beginning to start in the hybrid and offline modes. Keeping up the tradition of organizing memorable cultural fests, Acharya Narendra Dev College successfully organized the Annual Cultural Festival Leiothrixx 2022, on April 11-12, 2022 keeping all Covid-19 measures suggested by the DDMA guidelines. An annual festival is a time when the entire team at ANDC including faculty members, students and staff members come together and contribute their best to this great endeavour to bring out the extraordinary talent in the participants from various colleges.

The two-day programme was presided over by our officiating principal, Prof. Ravi Toteja and the function was attended by Ms Atishi, MLA Kalkaji as a Chief Guest and Shri Anil Saini, Chairperson, Governing body of Acharya Narendra Dev College as Guest of Honour. A total of 26 events were organised and nearly 300 teams with more than 1000 students participated in the event from various colleges from all around Delhi NCR. Events like War of DJs *Beatnik*, Rap Battle-*Mazrap Battle*, Western and Folk Dance, *Buniyaad* 'The Debate', *Sahir*, the street play and Gully Cricket and Fashion show were the prime attractions. Some interesting events like *Bassbox*, *Futsal Forever*, *Nagma* and *Nazmein* got an overwhelming response. The Highlight of the cultural festival was the DJ and band night on Day1 and Celebrity Night on Day 2. On Day 1, 'Aagaaz', a famous band gave out a splendid performance and DJ Devi had enthralled the gathered audience. On Day 2, The Landers, a famous Punjabi group of singers stole the show with their captivating rendering of some of their famous numbers. The cultural festival ended with a vote of thanks by Prof. Ravi Toteja and Convenors of the Annual Events Committee.

The prime focus of the cultural activities was on refining the young minds, a job that can't be accomplished by academics alone. It is an amalgamation of art and culture, along with studies that helps in nurturing the creativity in young enthusiastic students. ANDC has always promoted cultural activities which nurture the skill of team

work amongst the students during the organization of such events. The Proctorial Committee headed by Prof. Dinesh Kumar Arya, played a crucial role in the overall peaceful conduct of the event.

7.2.3 National Service Scheme (NSS)

Convenor: Dr Sunita Jetly (Biomedical Science)

National Service Scheme @ ANDC under the supervision of Programme Officer Dr Sunita Jetly, organized more than 200 events, both via online and offline modes in the backdrop of the COVID-19 lockdown and the reopening of the college thereafter.

- **Cancer Awareness Programmes**

A series of four offline Cancer Awareness programmes at Nithari Village and Geja Village of NOIDA, Sanga Mitra BaudhVihar and Shakti Shalini of Nehru Nagar Delhi, was organised under the aegis of Department of Science and Technology in collaboration with Dr B.R. Ambedkar Centre for Biomedical Research and Delhi School of Public health, IOE, University of Delhi on April 01, May 15, May 29 and June 23, 2021 respectively. NSS students reached out to people at the grassroot level to motivate them to practise lifestyle changes which can prevent cancer. The Breast Cancer Month started with a webinar on cancer prevention and adopting a healthy life style in collaboration with Sanjeevani on October 04, 2021 followed by poster, reels, quiz, film screening on breast cancer prevention and detection. The Breast Cancer Month culminated in an inspiring workshop by a real time breast cancer survivor, DrNeetiLeekha Chhabra, on October 28, 2021.

- **Thalassemia Awareness and Screening**

Thalassemia screening was undertaken on May 23, 2022 and November 11, 2021 at ANDC and NSUT campus for the awareness and screening of the youth for any carrier stage of Thalassemia (in collaboration with a team from Maulana Azad Medical College). NSS is doing this series of Thalassemia Awareness since 2020 under the guidance of Prof. (Dr) Seema Kapoor and Dr Ranjana under the aegis of State Blood Cell.

- **Vaccination Awareness Drive**

Post COVID-19, vaccination awareness is required and this was done by visiting the slums of Okhla and Govindpuri Village from July 22-25, 2021 to educate the residents about the importance of timely vaccination. To increase this impact, a Nukkad Natak was prepared by NSS students and performed on August 08 and 10, 2021 in Okhla and Govindpuri slums respectively.

- **Blood Donation Awareness Drive**

NSS organised a webinar 'World Blood Donor Day' (June 13, 2021) in collaboration with 'Khoon', an NGO on June 14, 2021 where an informative talk on the dos and don'ts of blood donation was given by P K Goi. An awareness video on blood donation was also prepared in collaboration with *Dhwani*. This was supplemented by a blood donation camp (September 24, 2021), Blood Donation Awareness Rally and Blood Donation Awareness Quiz (March 23, 2022). NSS@ANDC has adopted Thalassemic Girls, living in post COVID-19. Since, there is a huge requirement of blood for patients in India, such activities will motivate the students to donate blood.

- **7th International Yoga Day Celebrations**

The seventh International Yoga Day was celebrated with enthusiasm. The celebrations were held from June 14-17, 2021 under the guidance of Acharya Swati Jha in collaboration with NSUT. This was followed by five days (June 17-21, 2021) of online yoga workshop with Nature AyurYoga Institute, NSUT and six colleges of University of Delhi. The introductory session was taken by Mrs. Shashi Sharda followed by the introduction to meditation by Mr. Naveen Kumar H. In addition, to sustain the interest of the volunteers, a workshop on

Yoga for nutrition, was held on September 21, 2021 and the Significance of Surya Namaskar on January 13, 2022 was presented through posters.

- **Poshan Abhiyaan**

POSHAN Abhiyaan is a flagship programme of the Government of India to improve the nutritional outcome for children, adolescents, pregnant women and lactating mothers. The National Nutrition Mission termed as the Hon'ble Prime Minister's overarching scheme for Holistic Nutrition –POSHAN Abhiyaan was launched as a multi-ministerial convergence mission. NSS participated in this vision through a gamut of activities ranging from Nutrition Drive Poster and videos, Poshan Abhiyan Quiz and Yoga for nutrition workshop to make India malnutrition free.

- **Five Projects of NSS**

The routine activities and programme started in the last two years were done under five Projects: **VID IPSA, Swachh Bharat Abhiyan (SBA), Project Wellness, Project Feeding Stray Animals and Project Awareness about Government Schemes.**

- 1 **VID-IPSA**

The aim of the project was to educate the underprivileged children, especially the girl child, living in slums. NSS volunteers at ANDC took online as well as offline classes for the children of Okhla and Govind Puri slums. The Beat Co-Campaign - MGNCRE, Ministry of Education, July 05, 2021 was conducted for inspiring students to undertake activities under VIDIPSA Students listened to the speech on Celebrating One Year of National Education Policy 2020 by Honorable Prime Minister on July 29, 2021. A Webinar on the Impact of National Education Policy on Youth Empowerment and Sports Development was organised on August 04, 2021. A workshop on Financial Literacy in collaboration with Vittshala, SRCC, University of Delhi was organised on August 17, 2021. To add fun to studies a slum visit on Children's Day was organised to interact with children. Various activities like video and poster making competitions were performed on Teacher's Day (September 05, 2021), International Literacy Day (September 08, 2021) and National Education Day (November 11, 2021) to observe the significance of education and literacy in the life of each individual

- 2 **Swachh Bharat Abhiyan (SBA):**

NSS Volunteers performed various activities to reemphasize the importance of sanitation and cleanliness especially in the milieu of this pandemic. The first attempt under this project was the offline cleaning drive of NSS Room and it's surroundings. Several such cleanliness drives in the college were undertaken from August till December, 2021. '*Swachhta Pakhwada*' was celebrated with posters and video making and it culminated with a Pledge Taking Ceremony on August 18, 2021. NSS volunteers also conducted a cleanliness drive in Pochanpur Village, Dwarka on October 30, 2021 and Clean India Campaign at Birla House, New Delhi on October 20, 2021.

- 3 **Project Wellness**

It was initiated with the aim of motivating students for practicing healthy habits and to attain better physical and mental health outcomes. Social media handles were extensively used to spread the message through various activities like posters on World Mental Health Day and FIT India Run, Art of Mind Control session under Project Wellness and Nasha Mukti Pledge. Volunteers also participated in FIT India Run and obtained an appreciation certificate for the same.

- 4 **Project Feeding Stray Animal**

'Kahaani Bezubaano ki Meri Zubaani' (Individual story with stray animal) was organized on November

11, 2021 and “Stray Snapx” a photography competition was held on September 05, 2021. Stray animals whose responsibility volunteers had undertaken were fed year-round.

5 **Project Awareness about Government Schemes:**

The aim of the project was to spread awareness about diverse schemes among the beneficiary population of India so that they can make use of them in times of need and provide assistance to their families. Volunteers created awareness posters and videos on various schemes launched by the government over the years. The masses were given information about the five pillars of ‘AtmaNirbhar Bharat’ mainly the following government schemes:

- 1 Jan Dhan Yojana
- 2 Pradhan Mantri Awas Yojana
- 3 PM Gareeb Kalyan Yojana
- 4 Atal Pension Yojana
- 5 Skill India etc.

• **National Road Safety Month**

The nation celebrated National Road Safety Month 2021 instead of Road Safety Week from January 18, 2021 to February 17, 2021 as road accidents are one of the leading causes of mortality and morbidity in India. The theme of this year’s Road Safety Month was, ‘Sadak Suraksha- Jeevan Raksha’. After an initial survey on road safety awareness during the Road Safety Week, several activities like Reel Making Competition, Quiz, Painting and MEME Competition, Cartoon and Caricature on Road Safety, Unveiling through Tales and a Short Film were carried out on road safety.

• **Vigilance Awareness Week**

During Vigilance Awareness Week from October 26-November 01, 2021 with great enthusiasm and active participation several activities were organized in order to spread this year’s theme – ‘Independent India @ 75: Self Reliance with Integrity. The week started with Integrity Pledge Video on October 26, 2021 followed by group discussion on ‘Independent India @ 75 : Self Reliance with Integrity’, slogan writing, intriguing discussion on ‘Relevance of Sardar Vallabh Bhai Patel in Today’s World’ on the occasion of National Unity Day.

• **Vande Mataram**

India has entered into its 75th year of independence. NSS, in reverence to our freedom fighters undertook several activities like, Nukkad Natak video for social media platform, Essay Writing Competition- Role of Women in India’s Freedom Struggle, Interactive quiz based on quotes and beliefs of Freedom Fighters and posters on Partition Horrors Remembrance Day, Azadi ka Amrut Mahotsav Independence Day with- Poster Series on Independence. NSS also participated in the 75th Independence Day Celebration at NSUT Campus. Republic Day was celebrated with videos theme ‘*Ek Vote Adhikaar Hamara*’ (January 25, 2021), Elocution and Poetry Competition. Through Slogan Writing and Quiz Competition, Martyr’s Day (January 30, 2022) was commemorated. A Poetry Competition was organised to pay tribute to the Martyrs of Pulwama Attack on February 13, 2022.

NSS volunteers cheered the players for Tokyo 2020 Olympics through videos (Cheer 4 India Victory Punch), and applauded the players for their victory through ten Appreciation Posters (August 01-08, 2021) and videos. Appreciation Poster drive(11) was also shared on social media handles for commending the para-Olympic winners (August 24- September 05, 2021) and celebrating National Sports Day (August 29, 2021). Volunteers also participated online in National Youth Award (August 12, 2021) organized by the Ministry of Youth Affairs and Sports and National Youth Festival 2022 organized by the Ministry of Youth Affairs and Sports (January 12, 2021).

- **NSS Day**

September 23, 2021, the 52nd NSS Day was celebrated as a 2-day event (September 23-24, 2021) Inter college Fest *UMANG*'21 which had many competitions like- Project Presentation Competition, Panel Discussion with Eminent Personalities", Group Discussion on 'Gandhian Approach towards Nature Cure' and Integrity Knowledge : A Relay Quiz followed by a Blood Donation Camp.

- **Promotion of Hindi and Sanskrit language**

To promote the mother tongue and official languages poster awareness was done on World Sanskrit Day on August 22, 2021 followed by a Group Discussion on 'Sanskrit and Science are Synonymous' on August 23, 2021. A poster highlighting the importance of Hindi language was shared on social media platforms on the occasion of Hindi Diwas, September 14, 2021. On February 21, 2022, International Mother Language Day was celebrated through Slogan Writing Competition which emphasized the importance of mother tongue in daily life and education. '

- **Sahyog Mela**

The absence of actual Diwali celebrations, brought in the concept of virtual 'mela' by assisting NGOs working for the differently abled in selling their products through Video Advertisements two weeks prior to Diwali 2021. The Project headed by Dr Sarita Agarwal helped these institutions to advertise and sell their home-made Diwali products for DU faculty and students. Diya Decorating and Rangoli Making Competition under Diwali Mela-Sahyog was also organised.

- **Harit Kranti**

World Environment Day (June 05, 2021) was celebrated with posters, reels, discussion on this year's theme of Ecosystem Restoration. Van Mohotsav was celebrated from July 01-07, 2021 which included several activities like discussion, quiz debate etc. A webinar on Health and Medicinal Plants was organised where Shri Rakesh Kumar gave knowledge about plants like Amrita Aloe Vera, Tulsi etc on August 04, 2021. This year, a project was initiated on July 15, 2021 called "Ek Ashiyana Inka Bhi" where importance of ecosystem of urban sparrows was highlighted through posters and discussion. World famous Mr Rakesh Khatri taught the volunteers how to make a nest on July 21, 2021. A Photography Competition on birds under Project 'Ek Aashiyana Inka Bhi' for sparrows was organized to further this cause. International Day for the Prevention of Ozone Layer (September 16, 2021) was observed by sharing posters on social media handles and an e-Poster competition was organized on September 17, 2021. Catch- A-sight photography contest was held on National Pollution Control Day. A massive plantation drive was undertaken in April where more than 100 plants (trees, herbs, shrubs) were planted.

- **Women and Girl Child**

An Article Writing Competition was organised on the occasion of International Day of Women and Girls in Science (February 11, 2022). International Women's Day was celebrated on March 08, 2022 on the theme 'Gender Equality Today for a Sustainable Tomorrow' through a group discussion. Savitribai Jyotirao Phule, the woman who helped set up the first school for girls in India was also remembered for her contribution on January 03, 2022.

- **Pride Month**

In June 2021 NSS ANDC for the first time celebrated Pride Month to celebrate lesbian, gay, bisexual, transgender, and queer (LGBTQ) social and self-acceptance, achievements, legal rights, and pride. Under this, a poster awareness drive with informative short videos and acceptance videos were made and spread through social media handles. One of the videos was seen by a vast audience of 2000+ views and 200+ engagement through likes and comments.

- **Miscellaneous**

Many small events were chipped in with mega programmes. Some of these are:

- 1 Calligraphy Competition on the occasion of Vasant Panchmi
- 2 Doodle Competition, Poster Making Competition on Safer Internet Day
- 3 Poster Making Competition on the occasion of World Day of Social Justice,
- 4 Picture Interpretation Competition on National Science Day
- 5 Online Live Quiz Competition on National Voter's Day.
- 6 Pledge to Vote on National Voter's Day
- 7 Poster, speech and extempore on National Youth Day with participation in National Youth Festival 2022 organized by the Ministry of Youth Affairs and Sports
- 8 Poster on National Constitution Day.
- 9 Story Writing Competition on the occasion of Children's Day.
- 10 Quiz Competition on Green Cracker, Team Development as a Leader - Project Ukiyo etc.

Appreciation/ Awards

- 1 Appreciation Certificate to NSS for IYD 2021 celebration by Aayush Ministry
- 2 Appreciation Certificate to NSS for IYD 2021 celebration to program officer.
- 3 Appreciation Certificate for maximum active participation in blood donation webinars and awareness drives from the Rotaract Club of Hansraj College.
- 4 Gift hampers for securing the second position for Nukkad Natak (on toxic parenting) at the cultural fest of NSS NSUT.
- 5 Plantation drive certificate to volunteers involved for their interest and dedication by the organization Life and Pursuit.
- 6 Certificate to volunteers involved in Thalassemia awareness drive by Khoon Khas Organization.
- 7 Other certificates from the governmental portal for participating in events like- Fitness run, singing the National Anthem marking the celebration of Azadi ka Amrut Mohatsav.

Induction of new office bearers:

To assure smooth functioning new office bearers were appointed:

President: Niharika Upadhyaya, B.Sc. (H) Biomedical Science III year

Vice President: Pratham Malik, B. Sc. Prog. Physical Science (Electronics), II year,

Secretary: Rajat Sharma, B. Sc. Prog. Physical Science (Computer Science), II year.

Media handling

The newly formed Insta handle (NSS_ANDC) with more than 1000 followers and twitter handle (@nss_andc_) with 50 + followers shows that NSS work is reaching out to a large audience. The Facebook response is also growing.

7.2.4 'Paritantra', Eco Club

Convenor: Prof. Gagan Dhawan (Biomedical Science)

The Eco-Club of the College 'Paritantra' is an affirmation of environmental concern and adaptation of healthy practices for sustainable development. The aim is to sensitize the society about the conservation and sustainability of the biotic as well as abiotic components of the environment. The Environment Society has taken up the task

of creating awareness amongst the youth about the growing environmental concerns. Slowly but surely, the society is evolving a mechanism for active, effective and target-oriented activities which strive to change the mindset of the people and make them more eco-friendly. It strategizes to spread awareness on environmental sustainability by organizing symposiums/conclaves/debates/group discussions and other competitive events as well as communicating through multimedia approaches. In past years, concerted efforts have been made in college to facilitate and safeguard a healthy and natural environment.

1 Efforts of carbon neutrality

The following measures have been in practice since the last 15 years:

- Use of one sided/ rough/ used paper for notices, results, attendance, etc.
- Most of the information, notices, minutes of the meeting and pay-slips are sent via e- mail, which reduces the consumption of paper to a great extent.
- Leave applications, joining letters, requisitions are dedicatedly truncated in size to further reduce the use of paper.

2 Hazardous waste management

- Use of disposables (Thermocol/plastic) is banned in the college canteen since 2016.
- Steps have been taken to stop even the use of disposable paper glasses so that we can save trees and the waste collected by these disposable paper glasses in the dust-bins could bereduced. In 2018, each student was provided steel glass and spoon to facilitate the initiative. This initiative was also took care of the problem of consuming the thin layer of wax on paper glasses. (<https://www.youtube.com/watch?v=rWolbN-RR2E>)

Activities held

A Enhancement of green cover

The college has adopted the practice of organizing plantation drives on the campus as well as donating plants to encourage the society for planting and enhancing the green cover.

i. Plantation Drive

a. This year the college plantation drive was held on September 07, 2021 in association with Rotaract Club of Ramanujan College. During this plantation drive, around 300 saplings of plants like Neem, Peepal, Aloe Vera, Curry Plant, Jamun and many more were planted in Shaheed Bhagat Singh Herbal Park, near Vasant Kunj, New Delhi.

b. Another plantation drive was organized in collaboration with the Eco Clubs of SGND Khalsa College, Sri Aurobindo College, Mata Sundri College and Ambedkar University on November 13, 2021. During this plantation drive, around 80 saplings of Snake Plant, Bougainvillea, etc. were planted at BhuliBhatiyari, Regional Park, near Jhandewalan Metro Station.

ii Diversity of flora

There is a significant diversity of plants which speaks for the overall richness in terms of flora in the College. There are almost 121 floral species available on the college campus.

B Plastic management

The Eco Club of the college has taken several concrete steps to bring the use of non-biodegradable disposables to almost negligible. Various recommendations have been made by the Eco Club and the following steps have been taken in this direction:

- The Eco-Club initiated the drive to stop the use of non-biodegradable disposables in the college canteen and other kiosks inside the College premises.

- The use of non-biodegradable disposables has been banned even during the various events/get-togethers held in the College.
- The use of flex banners for the events is banned.
- The college regularly organizes group discussions to spread the awareness on nonbiodegradable disposables/ Microplastics, i.e., tiny bits of polypropylene or polyethylene, which also poses a risk beneath the water.
- On April 21, 2021, the Eco Club organized a group discussion on ‘World Fish Migration Day’ and ‘Effect of Micro Plastics on Marine Life’. Many students from different colleges participated in this event and shared their views.

C Waste segregation and waste disposal

The Eco Club of the college keeps watch on waste disposal and its activities include the actions required to manage waste from its inception to its final disposal. The following points reflect the steps taken:

- Proper segregation of solid wastes: The Eco Club makes all efforts to deploy waste bins at suitable spots and for the proper segregation of solid wastes on the campus.
- Students regularly share messages to make aware and inspire the society for the proper segregation of waste material.

D Water, air and noise pollution

The Eco-Club organizes several activities periodically on pollution reduction, plantation drives, energy conservation campaigns etc.

Activities to Spread Awareness on Air Pollution: Even in the Covid period, the Eco-Club of the College organized numerous activities like

- Poster Making Competition on theme Ozone for Life on September 16, 2021
- A symposium on ‘Thoryvos: Noise Pollution a Cannonade on Living Organisms! How to Take the Edge off it?’ on April 10, 2021.

E Project on ‘Reduce Carbon Footprint’

A project on ‘Reduce Carbon Footprint’ has been initiated by the Eco-warriors of the college Eco-Club. The objective of the ‘project is to spread awareness about the ways to reduce the production of carbon footprint in day to day life. The working strategy includes adopting the 5Rs policy, dissemination of responsiveness about the benefits of renewable sources, reducing waste production, being more energy efficient, familiarizing everyone with low carbon goods and many more. Under this project, eco warriors initially collected data to gauge the people’s understanding about this topic. For this, a survey form was distributed and a good response was received. Subsequently the eco warriors organized various activities viz., quiz competitions, slogan writing competitions, workshops and other competitions to raise awareness among people. Additionally, regular posts were made on the Eco Club’s social media sites to widen the reach of the project and involve more people in this project.

F Promotion of urban farming

A Project on ‘Indigenous Materials and Plants’ is run by the Eco-warriors of the college. The aim of this project is to spread awareness and to familiarize people with indigenous materials and plants and use eco-friendly items to protect the environment. The emphasis is made on the use of indigenous materials, to know about the rich cultural heritage and to promote a sense of belongingness. Indigenous varieties of plants have a lot of ecological and medicinal benefits but since, most of their importance is unknown, so, under this project, the eco-warriors carry out awareness campaigns on indigenous materials and plants by engaging in online activities like online survey, quizzes, workshops and competitions.

G Other significant environmental issues

Events to mark the special days and spread the message of a safe festive season:

- A webinar entitled ‘Effects of Good Ozone and Bad Ozone on Human Life’ was organized on September 16, 2021. Dr Seema Sharma, Assistant Professor, Vivekananda College (University of Delhi) delivered a talk on this topic to summarize the impact of good and bad ozone.
- Awareness to celebrate safe and clean Diwali: ‘Say No to Fire Crackers’
- An Anti-Cracker Rally was organized to create awareness on how badly bursting of crackers impact the air quality of our surroundings among residents of nearby localities on November 01, 2021.
- Awareness to celebrate safe and clean Holi . A Holi awareness drive in slums and nearby areas near the college was conducted on March 16, 2022.
- The message of eco- friendly idol immersion in water was spread via social media. Various activities pertaining to awareness and environment sustainability were conducted throughout the year. The following Instagram channel of the Eco Club ‘*Paritantra*’ of the college can be visited for the same. Instagram channel: https://www.instagram.com/ecoclub_andc/?hl=en

H Collaboration with other institutions

The Eco-Club ‘*Paritantra*’ recognizes the value of collaboration in particular for wider community awareness. So, it has organized many activities in collaboration with the following institutes:

- The Eco Club organized Youth Panel Discussion to mark ‘World Environment Day- 2021’ in association with Vivekananda College, University of Delhi on June 05, 2021
- The Eco Club organized ‘Vigilance, Corruption and Transparency in Governance-A Re-Assessment’ on the occasion of Vigilance Awareness Week on November 01, 2021 in association with Vivekananda College, University of Delhi.
- The Eco-Club organized a quiz competition to celebrate ‘World Biodiversity Day in association with CMS VATAVARAN and Canadian High Commission in India on May 22, 2022.
- The Eco-Club celebrated ‘World Environment Day-2022’ in association with CMS VATAVARAN and Canadian High Commission in India on June 03, 2022. An inter-college poster making competition was organized on the theme ‘Living Sustainably in Harmony with Nature’ to mark the Day.

Prize winners in various events

- Mridula Rani, B.Sc. (H) Botany, II Year, won First position in slogan writing competition (Eco club) ANDC on October 25, 2021.
- Aishwary Kumar Chaturvedi, B. Sc (H) Botany, II Year, Won first position in Quiz competition on topic International Whales Shark Day by Eco Club ANDC on August 31, 2021.

7.2.5 Sashakt

Convenor: Dr Geetika Kalra (Botany)

- Keeping up with its responsibilities regarding women’s health, the Society organized a webinar by Dr Hansa Yogendra on ‘Managing Life in Covid Times: Yoga shows the way’ on June 29, 2021. The pandemic has reiterated the need for taking care of our body and mind as our supreme duty. The resource person, Dr Hansa Yogendra, from The Yoga Institute, Mumbai Maharashtra, is a very well-known personality in the field of yoga. She enlightened the members on the ways, good health, both physical and mental, can be maintained

by following simple food habits and yogic exercises. She emphasized on the need of pranayam in keeping the body healthy.

- Due to the ongoing pandemic, where students could be reached out to only in the online mode, the Society organized another webinar on ‘Empowerment through Legal Rights’ conducted by Vivel in collaboration with Josh Talks by Ms Karuna Nundy (Lawyer, Supreme Court of India) on June 09, 2021. She advised young minds to become agents of justice. They should know the law and use the power to transform the system for themselves and the society. She imparted awareness on various sections of the Indian Penal Code for sexual harassment, protection against domestic violence act, cyber safety which includes cyber stalking, bullying and how the law deals with it. In addition, the module concluded with the definition of consent as provided by the law. The objective of the webinar was achieved through an attempt to increase perceptiveness on gender-sensitive issues and building confidence through the knowledge of rights.
- The Society organized a logo making competition on November 26, 2021 and selected the best logo for the Society and the logo was launched on December 31, 2021 during an online meeting. The Society has a committed group of enthusiastic students who organized an interactive webinar on ‘Why Him, Why Not Her’ on January 24, 2022 by a budding author Riya Kushwaha who emphasized the need of equality between men and women in the society.
- Another webinar was organized on February 02, 2022 on the topic ‘Virtual Training on Stand Up Against Street Harassment’. The webinar was well attended by the students and was followed by a thought provoking group discussion.
- The colleges reopened and the Society organized an offline interactive talk by reiki master, Ms. Seema Sharma on the topic ‘Energy Work to Declutter and Re-energize’ on March 08, 2022. This was to address the mental health of our students who suffered quite a lot during the pandemic.
- Another exciting event was the inter-college poster making competition on International women’s day, March 08, 2022, on the topic ‘Gender Equality Today for a Sustainable Tomorrow’ which saw wide participation. A team of judges was appointed to select the best poster and was awarded a token of appreciation by the college.

7.2.6 Dhwani: Theatre – An enabling experience

Convenor: Dr Monica Misra (Zoology)

Dhwani - the Theatre Society allows the students to showcase their artistic talent and creative skills. Besides routine skits, street plays etc., *Dhwani* also nurtures personal growth by inculcating a sense of responsibility, trust and resourcefulness. It provides a platform for students to exhibit their acquired skill-set in the form of a mega Annual Theatre Production each year – the society has gained repute for putting up the most professional of productions among the theatre circles.

In order to empower students with self-confidence and effective communication skills, the college believes in

using theatre as an enabling medium. Theatre also allows one to hone skills to promote effective communication, dynamic leadership, critical thinking and decision-making, besides the ability to think creatively and act confidently through acting, improvisations, performances and scripting. The college has staged nine annual theatre productions - ‘*Sau Mein Laga Dhaga*’, ‘*Ye Daagh Ujala*’, ‘*Khul Ja Sim*’, ‘*Spartacus - The Broken Shadows*’, ‘*Kasauti- The Quest for Truth*’, ‘*Wajood - Men Without Shadows*’, ‘*Ajab Nagaria Gajab Tamasa*’, ‘*Tughlaq*’ and ‘*Leela*’ since 2011 to give students a platform for showcasing their acting skills. The participants have realized that theatre has helped them in building their confidence and overcoming hesitations and stage-fear, thus acquiring proficiency and dexterity, developing their personality overall.

Recently, *Dhwani* has also diversified into street play production as part of its repertoire. ‘*Jashn-e-Azaadi*’, an open mic was organized on the occasion of the 75th Independence Day. The Society organized an Open Mic Contest where the *contestants* were able to express what independence means to them in the form of art. The mime, ‘मौन’ (*Maun*), got selected in the finals of MOOD-I, the annual fest of IIT, Mumbai. Our recent stage production ‘एकशर्त’ was the second stage production to be selected in the finals of the IIT-Delhi event. The stage production ‘एकशर्त’ has been honoured with a special mention in ‘*UDGOSH*’, the Annual Stage Play Competition by Lal Bahadur Shastri Institute of Management. During the year a video ‘Trinity Institute of Traditional Indian Shaadi was made which was a satirical representation on norms to be followed by a married woman. The video got 2nd position in the Unlearn Studio’s Spoof Making Competition and it was also ranked 1st in Artistic Relay by RIT, Punjab University. This year, Dhawani marked the performance of two Annual Theatre Gallery. Despite Covid and lockdown, the team was able to pull off an exemplary performance. The first theatre gallery ‘63/4 रामभरोसेनिवास’ focused on atrocities against women in India and the second theatre gallery ‘कालाकागज़’ was based on the existential crisis and choices. Both the galleries received a great response from the audience. During the year, apart from participating in competitions and events, this society organized its own Annual Street Play Competition ‘साहिर’ during the college’s Annual Fest ‘Leiothrixx’, where many teams had participated and it was held in two stages: the prelims and the finals. Like always, *Dhwani* was in the limelight and prominent theatre personalities were invited as judges.

7.2.7 IT Committee

Convenor: Prof. Seema Makhija (Zoology)

- The website of the college has been developed on software based on FOSS namely, Code Igniter PHP MVC Framework, HTML5, CSS, JS, Java RESTful APIs for some of the modules. NGINX Web Server with caching, HTTPS SSL Implementation and Google Analytics.
- The website is bilingual, mobile responsive, easy to navigate and has a user friendly structure to enable ease of information access. Information is neatly organized in logical menu’s considering visitors in mind who can be students, faculty and other stakeholders from the academia and public domain. All the menus have sub menus which are very well thought. The information available on the website is complete and up to date. For visitors, the website provides an elegant visual interface and easy navigation through the search button. Site Map Facility is also available on the website which further helps in easy navigation. Visitor Counter is also integrated on the website. Students can pay fees, look at their time table, attendance and assignment marks etc. For administrative convenience, all the forms like leave forms, reimbursement forms etc are available under Download Forms. The Library Software (Koha) is also integrated into the website so that both faculty and students can check their account by simple Login. E-content created by students and faculty and national repositories is also made easily available on the website. This content was of great help during the pandemic. Facebook and YouTube Channel of the college are integrated with the website. This provides an easy means to circulate information to the students. A Google map is integrated with the college website to provide accurate location of the college. Digital annual report, annual magazine and prospectus are available on the website with digital reader incorporated.

- The website is regularly updated and this year, efforts were made to bring innovations in the website structure like:
 - During the COVID-19 pandemic, the college created the Virtual Lab platform which was integrated with the college website and it provides all the information related to the practical of four different domains (Physical Science, Chemical Science, Comput Science and Life Science). So far more than 15 simulators have been uploaded for the first time in the University on a college website
 - During the Annual Day, a digital annual report integrated with e-reader was made available on the website.
 - The admission process for the foreign language courses was completely done on the college website. This portal is dynamic and interactive.
 - The website is integrated with the college management system which includes fee pay GE options. Admin has the provision to generate Student ID, Faculty ID and Medical ID. The IDs can be generated by the website and college printer has access to the website. Therefore, it can be easily printed and distributed in the college.
 - The website also has light/dark mode feature to help provide a better experience for visitors with a specific preference.
- This year, the college organized a seven-day International Conference on Mitigating Contemporary Environmental Issues by Sustainable Approaches [ICMCESA-2022] from February 22-28, 2022. The conference website was integrated with the college website and all the payments for registration were done online through the website. The details of all the delegates, advisory committee members and schedule was available on the website.

7.2.8 Library Committee

Convenor: Prof. Seema Gupta (Chemistry)

Acharya Narendra Dev College Library organized an online webinar on ‘E- resources of Delhi University and inflibnet NList’ on July 31, 2021 on electronic resources available for the students and faculty. Dr Rajesh Singh, Librarian, Delhi University Library System, delivered the talk on “E-resources and Facilities Available through DULS”. The talk by Mr. Anand Prakash Yadav, Librarian, Lady Shri Ram College (University of Delhi) made the participants aware about the ‘E-resources of Inflienet N-List (National Library and Information Services Infrastructure for Scholarly Content)’.

Library Report:

Total No. of Books: 33589

Total No. of Magazines and Journals: 20

Orientation Programme

Due to the pandemic, the college was working in the online mode and the orientation about the library was provided through online mode to the first-year students. Students were motivated to take the membership of N-List to use the various e-resources like full text e-books and e-journals.

Remote Access Login

Remote Access login for using the E-Resources of Delhi University were created for the faculty members.

7.2.9 Sports Committee

Convenor: Mr. Ravinder Kumar Sagar (Zoology)

Building upon the success of the previous year and with the continued support of the Principal Professor Ravi Toteja, the sports committee of the college with the enthusiastic response of the students managed to take sports in our college to a new height. Dr Satyapal Singh (Assistant Professor, Department of Physical Education), the youngest Daronacharya awardee and the chief coach of ANDC with the help of Dr Ranjit Kaur (Assistant Professor, Department of Physical Education) train the students for enhancing sports activities in the college. To enhance the sports activities and for better coordination, a sports president and 13 team coordinators were made from amongst the students from each of the courses. The college was not running in the physical mode till February 16, 2022, due to the covid 19 pandemic. So, it was a challenge for the committee to do any sports activity. To overcome this hurdle, the sports teacher took fitness classes in the online mode, and from time to time motivated the students to play sports and also told how to avoid covid-19 epidemic by being fit and playing sports. Yoga Day was also celebrated online on June 21, 2021.

After the college opened on February 17, 2022 in the physical mode, a meeting of the Sports Committee was called on February 18, 2022 in which it was decided to organize **ANDC Intra College Sports Tournament 2021-22**. The tournament was held from March 04-09, 2022. The college celebrated the Annual Sports Day with great enthusiasm on March 10, 2022. The students gave an overwhelming response and more than 500 students participated in the event. Prof. Ravi Toteja, Principal, ANDC gave his best wishes to the students and asked them to enjoy the games with sportsmen spirit.

B. Com. (H) was the overall winner of the ANDC Intra College Sports Tournament-2021-22 and **B. Sc. (H) Mathematics** was the overall Runner-up.

The Annual Sports Day was graced with the presence of **Mr Praveen Kumar** as Chief Guest. He was a Silver Medalist at the Tokyo Paralympic Games-2020, an Arjuna Awardee, Asian record holder, the youngest (18 years) medal winner in the history of Indian sports and a student of Motilal Nehru College, University of Delhi. **Mr Ankur Dhama**, a totally blind para athlete, graced the occasion as Guest of Honour. Mr. Ankur Dhama is the first Indian blind athlete in Indian history to have participated in the Paralympic Games. He had Participated in the Rio Paralympic Games 2016. He is also the first Indian totally blind para athlete who won the Arjuna Award. He is the alumnus of St. Stephens College, University of Delhi. Honorable Principal Sir, along with the guests distributed prizes, trophies and certificates to the winners and runners-up. Sports Committee, ANDC, gave a vote of thanks to the chief guest. At the end of the event, lunch was organized for the whole college including students.

Chaitanya Goyal of B. Com (H) II Year won the bronze medal in the 81st Delhi State Athletics Championships 2021, held at Jawaharlal Nehru Stadium, Lodhi Road, New Delhi, from September 03-06, 2021.

The following students participated in Delhi University selection trial-2021-2022.

- **Judo (Men)**

Ujjwal, B. Sc. (H) Computer Science, III Year

- **Chess (Women)**

Rupali, B. Com (H) , III Year

Aliya, B. Sc. (Prog.) Physical Science (Computer Science), III Year

Soumya Srivastav, B. Sc. Physics (H) , III Year

Aditi, B. Sc. Electronic (H) , III Year

Prizes won in intra college events

- Aliya, B. Sc. (Prog.) Physical Science (Computer Science), II Year was women Chess Runner up in College Annual Sports Day, March 10, 2022
- Riya Bhasin, B.Com. (H), II Year won first position in Badminton Mixed Doubles in College Annual Sports Day and 2nd position in Badminton Girls Singles in College Annual Sports Day.
- Sambhav Rastogi, B.Com. (H), II Year won first prize in 100 m race in College Annual Sports Day.
- Pranshu Gupta, B.Com. (H), II Year won second position in Table tennis in College Annual Sports Day
- Yashendra Singh Kushwaha, B.Com. (H), II Year scored second position in Badminton singles and first position in Badminton Doubles in College Annual Sports Day.
- Arjun Suresh, Shivam Rajput, Ajeet Singh Rathore, Aatif Khan, Hitesh Dikshit and Kunal Bhatia, B.Com. (H), II Year won first position in volleyball in college annual sports day
- Rudra, Karan Jain, Shivambhardwaj, Utkarsh jain and Hitesh Dikshi, B.Com. (H), II Year, won first position in cricket in college annual sports day.
- Akshat Mishra, Amit Yadav, Lakshay Sagar and Ajeet Kumar, B.Com. (H), II Year, won second position in Relay Race in college annual sports day.
- Rishabh Shukla, B.Sc. (H) Physics, I Year, won 1st position in Inter department football competition.
- Soumya Srivastav, B.Sc. (H) Physics, I Year won first position in Inter Department Sports Tournament Chess (Girl)
- Divyansh Pratik, B.Sc. (H) Physics, I Year won first position in Football in the Fit India ANDC Intra College Sports Tournament 2021-22.

7.2.10 Alumni Affairs Committee

Convenor: Dr Rashmi Sharma (Botany)

It's the college's policy to keep in touch with our alumni. The Alumni Meet was organized on March 13, 2022 in the college premises. Students were very enthusiastic to come face to face with their teachers. They introduced themselves to the gathering, recalled their time spent in the college, shared their goals, played games and enjoyed the sumptuous lunch. Dr Aparna Sharma was the master of the ceremony and Dr Rashmi Sharma, Convenor of the function, delivered the vote of thanks. Many teachers and non-teaching staff members had come to meet the alumni along with the Principal, Prof. Ravi Toteja and bursar Prof. Geetu Gambhir.

7.2.11 The Photographic Society 'PicFie'

Convenor: Dr Manisha Jain (Chemistry)

The Photographic Society of the college was officially recognised in session 2021-22. The society was however unofficially being taken care of by a group of volunteers since session 2019-2020.

The office bearers for the session 2021-2022 are: Prajjwal Akash, B. Sc. (H) Chemistry, III Year (President), Akash Tiwari, B. Sc. (Prog.) Physical Science (Chemistry), III Year (Vice President), Nikhil Sharma, B. Sc. (Prog.) Life Science, III Year (Treasurer), Sant Kumar, B. Sc. (H) Computer Science, III Year (Secretary) and Sayantan Chatterjee, B. Sc. (Prog.) Life Science, III Year (Social Secretary)

The beginning of the session was marked with expansion of society by recruiting new members and conducting an orientation session for them. Weekly workshops were conducted by senior members, on different aspects of photography for the new members to improve their photography skills. The Instagram page of the society where members are sharing their creativity is <https://www.instagram.com/picfie.club1/>.

The photos clicked by members are uploaded by them periodically for open access for the society on google drive

with link: https://drive.google.com/drive/folders/1-9lMaLSPDozyqgYVAa_2N3GOGGo4oue33

Jointly with photographic society 'Polaroid' of DDUUC, PicFie organised an online workshop on Street Photography by Jayanth Sharma, professional wildlife photographer, on November 19, 2021.

PicFie members covered the college festival 'Leiothrixx 2022' for still photography and video recordings.

PicFie has organised photo walks in the month of February and March for its members to have a hands-on-experience on photography.

7.3 Departmental Activities

Department of Biomedical Science

TIC: Dr Sunita Jetly

- The Department of Biomedical Science under the patronage of Prof. Ravi Toteja, Principal, ANDC, organized a webinar on the topic 'Introduction to Digital Forensics and Electronic Evidences' on April 03, 2021 on Google Meet.
- Department of Biomedical Science, Botany, Mathematics and Zoology under the patronage of Prof. Ravi Toteja, Principal, ANDC, organized a two-week national workshop (online) on "Tools and Techniques in Statistical Analysis" from April 06-19, 2021 on Zoom from 4-6 pm every day.
- Acharya Narendra Dev College, in collaboration with Flow Cytometry Solutions Pvt. Ltd. organised a 5 day National Virtual Workshop from October 20-24, 2021. Eminent speakers from different renowned institutes were invited to deliver their talk on different aspects of Flow Cytometry and qPCR based analyses.
- A webinar was organized on 'Designing of a Novel Vector for One-Step Cloning and Expression in E.coli' on January 28, 2022.
- A webinar was organized on 'Introduction to BioNEST-UDSC and Bio entrepreneurship' on February 15, 2022. Mr. Vijay Kantharia, CEO, BioNEST-UDSC talked about the facilities available at the center and how the proposed bio-incubator will serve as a platform for the development of innovative technologies in the area of Life Science and promote bio-entrepreneurship.
- The Department organised the following invited talks

Invited Speaker	Title of Talk	Date	Affiliation
Dr Jason Gill	Phage Genome Annotation Pipelines in CPT Galaxy and WebApollo	April 06, 2021	Associate Professor, Department of Animal Science, Associate Director, Center for Phage Technology (CPT), Texas A&M University, USA.
Mr Shino James	Designing of a Novel Vector for One-Step Cloning & Expression in E.coli	January 28, 2022	IISER, Bhopal
Mr Vijay Kantharia	Introduction to BioNEST-UDSC & Bioentrepreneurship	February 15, 2022	CEO, BioNEST-UDSC
Ms Anuja Agarwala	Kitchen is Your Health Tool	April 18, 2022	Senior Dietitian, AIIMS and Member, FSSAI

Department of Botany

TIC: Dr Anita Narang (May 01, 2021 – 30 June 2021)

Prof. Charu Khosla Gupta (July 01, 2021 onwards)

- Organized a five day 'Hands-on-Workshop' on Laboratory techniques in Botany for the students of B.Sc. (H) Botany and B.Sc. (Prog.) Life Science from October 21-26, 2021. Students were able to have a hands on training for the handling of various equipment and get familiar with the classroom experiments which they missed due to the Covid pandemic lockdown.
- Organized a talk by Dr Dhanya Bhaskar, Associate Professor at Indian Institute of Forest Management, Bhopal on 'Biodiversity Conservation as if People and Ecosystem Matter' on October 28, 2021. This lecture was organized as an inaugural lecture of the Botanical Society '*Tarumitra*'. The delivered talk was an impetus for young minds to think about biodiversity conservation and the role of human activities in sustainable development.
- The department organized an educational excursion for the students of B. Sc. (H) Botany II and III Year to Forest Research Institute, Dehradun, Dhanaulti and Kanatal, Uttarakhand between March 23-26, 2022 to gain hands on knowledge about the ecology, herbarium, mushroom cultivation etc.
- '*Tarumitra*' the Botanical Society of Acharya Narendra Dev College, organized the valedictory talk by Prof Vishnu Bhatt, Department of Botany, University of Delhi on April 20, 2022 on 'Harnessing Apomixis to Preserve Hybrid Vigour'.
- A one-day workshop was organized for the non-teaching staff of the Department of Botany on April 26, 2022. In the workshop, laboratory staff were initially updated about the newly purchased equipment by the Department of Botany.
- Organized a virtual visit to 'Yakult' Industrial Plant at Sonapat, Haryana for the students of B.Sc. (H) Botany, III Year to apprise them about the industrial applications of microbes and processing of food material, on April 08, 2022.

Department of Chemistry

TIC: Prof. Dinesh Kumar Arya

- *Abhikriya*, (The Chemical Society) Department of Chemistry, Acharya Narendra Dev College organized two days online workshop on Computational Chemistry from October 06-07, 2021 under the aegis of IQAC and DBT STAR College Scheme in online mode.
- A four day workshop on 'Exploring and understanding Computational Chemistry using Gaussian: molecular builder and visualization tool' was held by *Abhikriya*, The Chemical Society of ANDC, under the aegis of DBT star scheme and IQAC on March 07-10, 2022 from 1:00 PM to 3:00 PM on Zoom. Dr Nikhil Aggarwal, Director, Centre for Advanced Computational Chemistry Studies, New Delhi was the speaker. He gave detailed description of the Gaussian Software. Around 20 participants from different Colleges and Universities attended the Event. On first day, Dr Nikhil Aggarwal gave an introduction of Introduction to Computational Chemistry, Difference between Quantum Chemical Calculation and Molecular Mechanical Calculation, Density Functional Theory, Molecular size vs. accuracy vs. Time factor, Basis Sets and Functionals, Equilibrium and Non-equilibrium Properties calculation, Solvent effect: Implicit model vs. explicit mode, Molecular Structure Building, Pre-optimization. On second day, he taught Geometry or Structure Optimization: stability, Dipole Moment & Solubility, Frequency (IR Spectrum), Visualization of Types of Vibrational Modes (Stretching vs Bending), Raman Spectrum Calculation, NMR Spectrum Calculation, Excited states and UV spectrum Calculation, Visualization of Types of Molecular Orbitals: HOMO vs. LUMO. On third day,

Single-Point Energy, Reaction mechanisms, Emission Spectrum: Fluorescence and Phosphorescence property Simulation Potential Energy Diagrams, Interaction Energies, Equilibrium and Transition State Structures, Excited States (Singlet and Triplet) Calculation: Jablonski Diagram, Orbital Contribution, Electron & Hole Density Distribution Maps, Charge Transfer: LMCT or MLCT. On fourth day, Basics of Molecular Docking, Software Installation on Windows, Online Database Exploration, Docking studies: Protein-Ligand interaction (Docked structure, Binding Energy) using Autodockwise software. There was question answer session after each session. Participants were quite satisfied with the information given and got positive feedback.

- “Synergiya” an annual fest was successfully organized by *Abhikriya*, (The Chemical Society) Department of Chemistry, Acharya Narendra Dev College on April 19, 2022 in the college. The event started with a very inspiring lecture by Ms Shreya Arora, who is currently working as reviewer selection Leader at Taylor Francis- an International Publication Unit. Students from other departments and other colleges also attended the full day program. The events organised by the students were Paper presentation, Quizomania, and Treasure hunt.

Department of Commerce

TIC: Dr Shalu Mahajan

- The Department of computer science in collaboration with Department of Commerce organised a webinar on the topic ‘Role of IT in Indian Banking system’ on July 14, 2021 under the DBT star scheme. The speaker was Prof. Madhu Vij, Former Professor in Finance, Faculty of Management Studies, University of Delhi. Prof. Vij delivered a very informative and enlightening talk on the topic. She talked about the growth of Indian banking sector in depth. She suggested that future of Indian Banking is about artificial Intelligence, Big data analytics and cyber security for solving problems pertaining to banks. Prof. Ravi toteja thanked Prof Madhu vij and both computer Science as well as Commerce Department for organising the webinar. Finally, Dr Shalu Mahajan delivered the Vote of Thanks.
- On September 11, 2021, *Bodhini-AERC*, Department of Commerce in collaboration with IQAC, ANDC organized a webinar on “An Insight into Currency Derivatives”. The resource person for the event was Ms Sugandha Sachdeva, the Vice President of Commodities and Currency Research at Religare Broking Limited. The webinar was extremely illuminating and educative. The speaker verbalized various issues relating to the topics and also announced the release of the second edition of the semi-annual Newsletter of the Department of Commerce “The Chronicles”.
- On October 09, 2021, Training, Learning and Placement Cell, Department of commerce in collaboration with IQAC, Career counselling and placement cell, ANDC organized a webinar on “Career Opportunities in MNCs by CA Sameer Mahajan, Vice President at Controller’s Division, Goldman Sachs. The event commenced with unveiling the logo of Training Learning and Placement Cell. CA Sameer Mahajan started the webinar and talked about MNC Banks and gave a good insight about the opportunities available there. He also answered the queries of the participants at the end of the session. Every participant felt enlightened by attending the webinar.
- *Bodhini AERC*, The Commerce Society organized a variety of programs and events throughout the academic session 2021-22, with the aim to nourish students’ knowledge and academic growth. The year 2022 commenced with a workshop series titled “ACE THE SKILL WEEK”. Under the ACE THE SKILL WEEK program, a 3-day workshop was conducted from February 04-06, 2022 by Dr Surinder Kaur and Mr Ayush Goyal, the joint secretary of Bodhini on “Canva”. It commenced with good wishes and encouraging words from our Principal, Prof. Ravi Toteja, followed by our resource person via google meet. Students from various colleges of Delhi University and other institutions registered and enthusiastically participated in the event and made it a great success. The workshop ended with a vote of thanks by Ms Shalu Mahajan, the teacher-in-charge of commerce department.
- *Bodhini AERC*, the Commerce Society organized a 3-day workshop from March 07-09, 2022 in the Seminar

Hall, Acharya Narendra Dev College on MS Excel by Dr Shalu Mahajan and Mr Tarush Bajra student member of the Bodhini under the academic ambit of “ACE THE SKILL WEEK”. ACE EXCEL workshop was inaugurated via the lamp lighting ceremony, and, was immediately followed by an enriching address from our Principal Professor Ravi Toteja. The doubts of the students were embraced cheerfully and attended to at the end of every day’s session by the chair. The workshop was flooded with a series of positive and appreciative feedback from the students and faculty members.

- The Department organised a seminar under In conversation with alumni series on “career options after graduation” by MR. Nitin Deveshvar MD, Founder, Mantec India Securicor Pvt. Ltd (alumni of the batch of 2001) on April 01, 2022. In the session, speaker informed the students about the number of opportunities that are available as career options after graduation. He also shared his life experiences and journey of being a founder of such a reputed company. In addition to it, he patiently resolved each and every query of the students.
- *Bodhini AERC*, the Commerce Society organized a 3-day workshop from April 06-08, 2022 in the Seminar Hall, Acharya Narendra Dev College via Google Meet on “ACE GOOGLE” by Dr Jitender Goel and Mr Ankit Kumar, president of Bodhini. They equipped the students with the knowledge of essential software tools like Google Sheets, Google Docs, Google Forms, etc. It was more of an interactive session with the students. The students got an opportunity to clear their doubts and a platform to ask the questions related to the topic. The whole session was really captivating and absorbing.
- A Workshop was organized by Department of Commerce in collaboration with IQAC on” Application of Cost accounting standards in the preparation of Cost statement by Prof. Rajiv Kumar Goel on April 20, 2022. Prof. Rajiv Kumar Goel started the workshop and discussed the difference between Financial statements and Cost sheets. He also addressed the relevance of cost accounting standards while preparing the cost sheet. In addition to it, he shared the format of a Cost Statement and gave some questions for practice. The participants got an opportunity to resolve their doubts. The session ended with a vote of thanks.

Department of Computer Science

TIC: Dr Sunita Narang

- Organized a two-Day online workshop on “HTML: A Prerequisite for MERN Stack” on October 06-07, 2021 by Mr. Rishi Sarbobhoum, Mr. Aditya Goyal, Mr. Devesh Yadav, Mr. Sushant Sharma, Students, ANDC, under DBT Star Scheme, 2021-2022
- Organized a two-Day online workshop on “Effective Presentation and Image Management for Success” on August 24-25, 2021 by Mrinal Gupta Virmani, Confidence Coach & Soft skills Trainer, Image Consultant & Chartered Accountant, under DBT Star Scheme, 2021-2022
- Organized a Webinar on “Role of IT in Indian Banking System” on July 14, 2021. Speaker was Prof. Madhu Vij, Former Professor in Finance, Faculty of Management Studies, University of Delhi, Delhi, under DBT Star Scheme, 2021-2022
- Organized an alumni meet on July 04, 2021 in online mode on google meet. Many Students and alumni from B.Sc.(H) Computer Sc. and B. Sc. (Prog.) Computer science and Faculty members were part of the meet. The alumni shared their college memories, experiences and motivated students with their knowledge. Some of them are doing masters, others are working in IT industry or have set up their own start-ups. It was a memorable event for everyone.
- Organized annual technical fest - Overload++ on April 15, 2021 in online mode. Various events such as: Tech Quiz, Valorant, Harry Potter quiz, Treasure hunt, Meme making, Coding Competition, The Binger’s tournament, were part of the fest. Around 60 students from different colleges including our college participated with great zeal and enthusiasm.
- Organized a webinar on June 15, 2020, on the topic Unravelling the Social Network of COVID-19 in India from January 30-April 06, 2020. Speaker was Dr Sarita Azad, Assistant Professor, School of Basic Science, IIT Mandi, Himanchal Pradesh.

Department of Electronics

TIC: Prof. Anju Agrawal

The following workshops/ conferences and Invited talks were organized by the Department of Electronics:

- Invited Talk on ‘Magnetic Nano- structures based Microwave Monolithic Signal Processing Devices’ by Prof. Bijoy Kumar Kuanr, Special Centre for Nanoscience, JNU, New Delhi on April 19, 2022.
- Hands on workshop organized to apprise the students with the basics of Arduino programming on June 01–02, 2021.
- Hands on workshop: on Cloud Computing in technical collaboration with industry partner M/s Brain Mentors Pvt. Ltd. on September 06-10, 2021.
- Workshop on Holography organized by the Department on March 14, 2022.
- Hands-on Workshop on Arduino and Sensor Interfacing in technical collaboration with industry partner Touch Techno Pvt. Ltd. on March 26, 2022.
- The Department also organized an Education visit to the Museum of Illusions, New Delhi on National Science Day, February 28, 2022.
- Workshop on Full Stack Web Development using MERN, March 05-09, 2022.
- An invited talk on use of Physics U Math for Imaging Arithmetic was delivered by Dr Gaurav Sharma, Professor of Electrical and Computer Engineering, University of Rochester, New York on June 29, 2021.
- An Outreach Program and workshop on Sensor Interfacing using Arduino and Tinker CAD simulation was organised by the Department on October 18-30, 2021.
- An Invited Talk on ‘Digital Transformation and its Impact on the Future after Covid-19 was delivered by DrAmita Kapoor, Associate Professor, Shaheed Rajguru College of Applied Science on July 07, 2021.
- International Day of Light 2021 celebrated on May 16, 2021.
- Hands on workshop: to apprise the students with basics of Arduino programming on June 01-02, 2021.
- The following two Workshops were conducted by the department for the non-teaching staff:
- Training workshop and demonstration of Control Lab with software and data acquisition and Universal Dev Board with FPGA and CPLD for teachers in collaboration with industry partner M/s Silicom Electronics on April 25, 2022.
- Training workshop and demonstration of lab equipment for teaching and non-teaching staff in collaboration with industry partner M/s Vijayanta Electronics on March 23, 2022.

Department of Mathematics

TIC: Dr Vatsala Kohli

Mr Srijit Mukherjee, an alumnus of Indian Statistical Institute, Kolkata, gave a talk on career prospects in Mathematical Science and data science on July 01, 2021

Department of Physics

TIC: Dr Shalu Dhanda (May 2021- July 2021); Dr Mamta Bhatia (July 2021-Novembe 2021); Sanjeeta Rani (November 2021-June 2022)

- On March 29, 2022 the Department organized its annual fest ‘NEBULA 2022’ under the aegis of *Physentropy*, the Physics Society and DBT, New Delhi. The fest included various activities like Rangoli Competition, Three-Legged Race, Arm Wrestling, Bohr Ring Dance, Quiz and a special lecture on astronomical observations. The main attraction of this fest was the ‘Bohr Ring Dance’, a new concept introduced by the students. In this event

a particular Physics related phenomenon was presented either in the form of dance (expression) or in terms of song.

- 10 students of B.Sc. (H) Physics VI semester with Dr Ambika Negi joined an online college level workshop at Inter University Accelerator Centre (IUAC, New Delhi) on February 28, 2022 to celebrate National Science Day. The workshop gave an exposure to young students of Physics to accelerator-based research National and International level.
- Dr Parminder Singh, Assistant Professor, Dronacharya Government College, Gurugram delivered a talk on ‘An Introduction to Astronomical Observations’ on March 29, 2022

Department of Zoology

TIC: Dr Monica Misra

- The first offline event after the Covid-19 Pandemic was a moment of happiness and nostalgia, both. *NICHE* – The Zoological Society of Acharya Narendra Dev College organized a Debating Competition on the topic ‘This House Believe that Mental Health is More Important than the Physical Health’ on March 03, 2022.
- *NICHE*- The Zoological Society of Acharya Narendra Dev College organized an online Article Writing Competition on February 06, 2022 on the topic ‘Covid-19: A Blessing in Disguise for Endangered Species’ and got many articles.



**ACHARYA
NARENDRA
DEV COLLEGE**
UNIVERSITY OF DELHI

INTERNAL COMPLAINTS COMMITTEE

Annual Report 2022



8 INTERNAL COMPLAINTS COMMITTEE

Members

1. Dr Geetika Kalra, Department of Botany (Presiding Officer)
2. Prof. Arijit Chowdhuri, Department of Physics
3. Prof. Charu Khosla Gupta, Professor, Department of Botany
4. Ms Namrata Arora, Officiating Librarian (Non-teaching representative)
5. Ms Swati Shukla, B.Sc. (H) Electronics III Year (Students' representative)
6. Ms Anjali Bhadana, B.Sc. (H) Biomedical Science III Year (Students' representative)
7. Ms Swati Maurya (Research Scholar)
8. Ms Leena Zaveri (External member), Advocate having 25 years of vast experience in corporate law across industries and who has been actively involved in various social issues including gender equality and sensitization.

The external member, Ms Leena Zaveri made the student members aware of POSH act. She explained the meaning of prohibition, redressal and prevention of harassment through counselling, seminars, workshops etc. The role of students in ICC was explained to them. A zero tolerance policy is in place and posters for the same may be placed at prominent places of the college with phone numbers and email ids of the members of ICC. She elaborated that the victim can complain to ICC and the same has to be dealt with as a civil act. The committee plans to organize workshops for legal awareness from July onwards when the college will open for all the semesters. The committee also plans to conduct a legal awareness course in the next

session.

Status Report of ICC as in March 2021

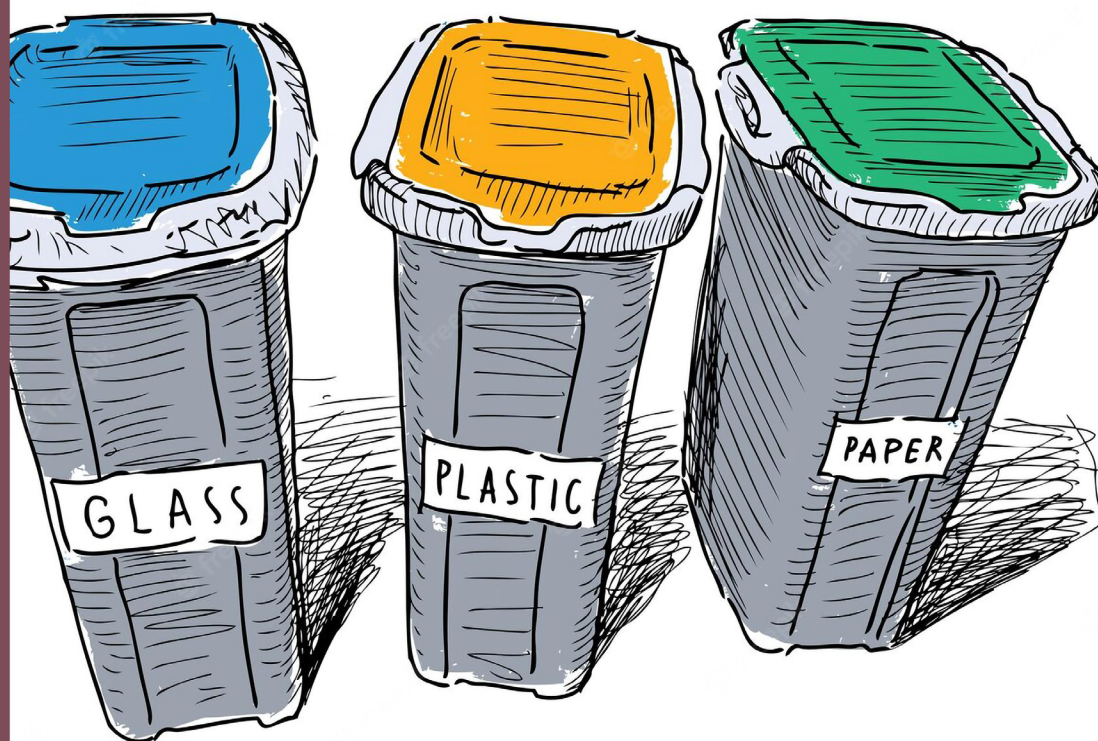
S. No.	Particulars	Number
1	No. of complaints of sexual harassment received in the year	NIL
2	Number of complaints disposed of during the year	NIL
3	Number of cases pending for more than 90 days	NIL



**ACHARYA
NARENDRA
DEV COLLEGE**
UNIVERSITY OF DELHI

INSTITUTIONAL BIOSAFETY COMMITTEE (IBSC)

Annual Report 2022



9 INSTITUTIONAL BIOSAFETY COMMITTEE (IBSC)

In accordance with the Notification of the Ministry and Forests vide Gazette Notification no. GSR 1037 (E) dated December 12, 1989 notified under the E.P. act 1986, the Department of Biotechnology (DBT) has evolved the “Regulations and Guidelines on Biosafety of recombinant DNA Research and Bio containment, 2017” for achieving personal and environmental safety in then use of genetically manipulated organisms in research, manufacture and applications. The constitution of the Institutional Biosafety committee (IBSC) is mandatory in R&D Centers at the institutions / universities / industries / any other organization which intends to carry out or are engaged in research activities involving genetic manipulation of genetic materials, microorganisms, plants and materials.

All the ongoing projects (extramural and intramural) in the college are assessed, reviewed and cleared by this committee. The project is presented in the prescribed format to the committee for its review. Project investigator appraises the committee on the nature of the experiments and the available lab facilities and safety measures. The IBSC of ANDC is constituted as per DBT, Government of India guidelines and its composition is as follows:

List of IBSC Members:

S. No.	Committee Composition	Name and affiliation
1	Chairman	Prof. Ravi Toteja, Officating Principal, Acharya Narendra Dev College
2	DBT Nominee	Dr Asif Mohammad, Group Leader and Scientist, Parasite Cell Biology Group, ICGB, New Delhi
3	Member Secretary	Prof. Urmi Bajpai, Department of Biomedical Science, Acharya Narendra Dev College
4	Outside Experts	Dr Geetha Vani Rayasam, Scientist H, Council of Scientific and Industrial Research (CSIR)
		Prof. Rama Chaudhry, Dean (Research), Head, Department of Microbiology, All India Institute of Medical Sciences, New Delhi
5	Biosafety Officer	Dr Mohammad Faruq, Principal Scientist, CSIR-Institute of Genomics and Integrative Biology (IGIB)
6	Internal Experts	Prof. Monisha Khanna Kapur, Department of Zoology, Acharya Narendra Dev College
		Prof. Seema Makhija Department of Zoology, Acharya Narendra Dev College
		Dr Sunita Jetly, Department of Biomedical Science, Acharya Narendra Dev College



**ACHARYA
NARENDRA
DEV COLLEGE**
UNIVERSITY OF DELHI

FOREIGN LANGUAGE COURSES

Annual Report 2022

10



10 FOREIGN LANGUAGE COURSES

The foreign language center of the college offers one-year part time certificate, diploma and advanced diploma courses in French, German, Spanish and Russian. This year online admissions were undertaken in the wake of ongoing pandemic and following courses are running in the current academic session.

S. No.	Course	Number of students admitted
1.	Certificate in French	24
2.	Certificate in German	19
3.	Certificate in Spanish	26
4.	Diploma in Spanish	22
5.	Diploma in German	15



**ACHARYA
NARENDRA
DEV COLLEGE**
UNIVERSITY OF DELHI

COLLEGE DEVELOPMENT

Annual Report 2022



11 COLLEGE DEVELOPMENT

11.1 Financial grants received

The college received following grants from Directorate of Higher Education, GNCTD in 2020-2021:

S. No.	Scheme	Amount (INR)
1	GIA salary	41,50,00,000/-
2	GIA other than salary	1,50,00,000/-

11.2 Medical Consultation and Psychologist/Counsellor Facility

College has provided the services of a Counsellor, Ms Niharika, in the college for the help of students so that they feel more productive with high self-esteem and positive thoughts. Students as well as staff members have benefited from this facility. Mentoring to the students is also available at each Department level. Students are allotted mentors in their parent department to consult their problems which may be personal or may be related to their academics. Students are also coming to the faculties for their problems and getting suitable solutions.



**ACHARYA
NARENDRA
DEV COLLEGE**
UNIVERSITY OF DELHI

CAREER COUNSELLING AND PLACEMENT CELL

Annual Report 2022



12 CAREER COUNSELLING AND PLACEMENT CELL

Convenor: *Dr Harita Ahuja (Computer Science)*

Placement Officer: *Mr Sanjay Vobra*

The College has an active Career Counselling and Placement Cell that tries to understand the career objectives of the students, keeping in mind the current trends in the corporate world. The scope of the cell extends from coordinating job hiring activities to organizing interactive career counselling seminars.

This time, final year students faced major challenges in their placement prospective because of the current pandemic. But on the brighter side, despite the covid-induced slump, few companies continued their recruitment drive. The students opted for online internships as well. The companies visiting ANDC campus this year were **Wipro, Royal Bank of Scotland, Purple Tutor, Workgen Solutions Pvt Ltd, Connection Media, Byju's and Leadsquared**. This year 28 students were selected via campus interviews so far.

Date	Company	No. of Students Selected
January 21, 2022	Royal Bank of Scotland	11
March 26, 2022	Connection Media	10
June 17, 2022	Byju's	1
February 23, 2022	Workgen Solutions Pvt Ltd	2
	Tata consultancy S	2
	Wipro	1
June 15, 2022	Princeton Healthcare Pvt Ltd	1



**ACHARYA
NARENDRA
DEV COLLEGE**
UNIVERSITY OF DELHI

ANNEXURES

Annual Report 2022



ANNEXURE I

Publications in Scopus indexed Journals

- 1 Das, R., Kotra, K., Singh, P., Loh, B., Leptihn, S. and **Bajpai, U.** (2021) Alternative Treatment Strategies for Secondary Bacterial and Fungal Infections Associated with COVID-19. *Infect Dis Ther* 11(1):53-78.
- 2 Arora, G., Taneja, J., Bhardwaj, P., Goyal, S., Naidu, K., Yadav, S. K., Saluja, D. and **Jetly, S.** (2022) Adverse events and breakthrough infections associated with COVID-19 vaccination in the Indian population. *J Med Virology*, 94(7), 3147-3154.
- 3 Yadav, S., Bhardwaj, P., Gupta, P., Saluja, D., **Jetly, S.** and Taneja, J. (2022) Association of gender, age, and comorbidities with COVID-19 infection in India. *Journal of Integrated Science and Technology*, 10(2), 61-66.
- 4 **Jetly, S.**, Bhardwaj, P., Arora, G., Saluja, D., Yadav, S. K., Naidu, K. P. and Taneja, J. (2022) Hesitancy and Acceptance of COVID-19 Vaccination Amidst the Second Wave of Pandemic in India: A General Population Study. *Asia Pac J Public Health*, 34(4), 446-449.
- 5 Jena, H., Ahmadi, Z., Kumar, P and **Dhawan, G.**(2022) Bioreducible polyethyleneimine core-shell nanostructures as efficient and non-toxic gene and drug delivery vectors. *Bioorganic and Medicinal Chemistry*, 69, 116886.
- 6 Saini, S., Agarwal, M., Pradhan, A., Pareek, S., Singh, A. K., **Dhawan, G.**, Dhawan, U and Kumar, Y. (2022) Exploring the role of framework mutations in enabling breadth of a cross-reactive antibody (CR3022) against the SARS-CoV-2 RBD and its variants of concern. *Journal of Biomolecular Structure and Dynamics*, 1-14.
- 7 **Dhawan, G.**, Singh, I., Dhawan, U., and Kumar, P. (2021) Synthesis and characterization of nanoselenium: A step-by-step guide for undergraduate students, *Journal of Chemical Education*, 98(9), 2982-2989.
- 8 Ahmadi, Z., Jena, H., Singh, M., **Dhawan, G.**, and Kumar, P. (2021) Self-assembled biodegradable core-shell nanocomposites of amphiphilic retinoic acid-LMW bPEI conjugates exhibit enhanced transgene expression in hepatocellular carcinoma cells with inherent anticancer properties. *Journal of Pharmaceutical Science*, 110(8), 3047-3060.
- 9 Yu, Y., Liu, A., **Dhawan, G.**, Mei, H., Zhang, W., Izawa, K., Soloshonok, V. A., and Han, J. (2021) Fluorine-containing pharmaceuticals approved by the FDA in 2020: Synthesis and biological activity, *Chinese Chemical Letters*, 32, 3342-3354.
- 10 He, J., Li, Z., **Dhawan, G.**, Zhang, W., Sorochinsky, A. E., Butler, G., Soloshonok, V. A. and Han, J. (2022) Fluorine-containing drugs approved by the FDA in 2021. *Chinese Chemical Letters*, In press.
- 11 **Chowhan, R. K.**, Hotumalani, S., Rahaman, H., and Singh, L. R. (2021) pH induced conformational alteration in human peroxiredoxin 6 might be responsible for its resistance against lysosomal pH or high temperature. *Scientific reports*, 11(1), 1-10.
- 12 Kumari, A., **Chowhan, R. K.**, Kakchingtabam, P., Shahnaj, S., Rahaman, H., Ansari, M. S., and Singh, L. R. (2021). Peroxiredoxin-6: A Guardian of Lung Pathophysiology. *Current Protein and Peptide Science*, 22(9), 666-674.

- 13 Batla, S. C., Gogna, M., Jain, P., Singh, N., Mukherjee, S., **Kalra, G.** (2021) Signaling mechanisms and biochemical pathways regulating pollen-stigma interaction, seed development and seedling growth in sunflower under salt stress. *Plant Signaling and Behaviour*, 16(11), 1958129.
- 14 Adit, A., **Singh, V. K.**, Koul, M., & Tandon, R. (2021). Breeding System and Response of the Pollinator to Floral Larceny and Florivory Define the Reproductive Success in *Aerides odorata*. *Frontiers in Plant Science*, 12, 767725-767725.
- 15 Chourasiya D., Gupta M. M, **Sahni S.**, Oehl F., Agnihotri R., Buade R., Maheshwari H. S., Prakash A. and Sharma M. P. (2021) Unraveling the AM fungal community for understanding its ecosystem resilience to changed climate in agroecosystems. *Symbiosis*, 84(3), 295–310.
- 16 Kohli, S., Rathee, G., **Hooda, S.**, and Chandra, R. (2021) $\text{Al}_2\text{O}_3/\text{CuI}/\text{PAN}$ nanocomposite catalyzed green synthesis of biologically active 2-substituted benzimidazole derivatives. *Dalton Transactions*, 50(22), 7750-7758.
- 17 Gupta, D., Samal, R. R., Gautam, D., **Hooda, S.**, and **Kumar, S.** (2021) Multifunctional activity of graphene oxide-based nanoformulation against the disease vector, *Aedes aegypti*. *Journal of Applied and Natural Science*, 13(4), 1265-1273.
- 18 Malik, V., Saya, L., Gautam, D., **Sachdeva, S.**, **Dheer, N.**, **Arya, D. K.**, **Gambhir, G.** and **Hooda, S.** (2022) Review on adsorptive removal of metal ions and dyes from wastewater using tamarind-based bio-composites. *Polymer Bulletin*, 80(1), 1-36.
- 19 Saya, L., Malik, V., Gautam, D., **Gambhir, G.**, Singh, W. R. and **Hooda, S.** (2021) A comprehensive review on recent advances toward sequestration of levofloxacin antibiotic from wastewater. *Science of the Total Environment*, 183, 152529.
- 20 **Gambhir, G.**, Gautam, D., Saya, L., Kumar, A., Kumar, S., Singh, A., Singh, S., Chandra, R. and **Hooda, S.** (2022) A Novel Terpolymer Membrane-Based Electrode Sensor for Selective Determination of Cd(II) Ions, *Asian Journal of Chemistry*, 34 (3), 749-756.
- 21 Bargujar, S., **Gambhir, G.**, Raigar, M. B., **Hooda, S.**, **Arya, D. K.** and **Bhatia, M.** (2022) A new polysaccharide-based ion-exchange resin for industrial wastewater treatment. *Polimery*, 67(5), 212-219.
- 22 Saya, L., Malik, V., Singh, A., Singh, S., Gambhir, G., Singh, W.R., Chandra, R. and **Hooda, S.** (2021) Guar gum based nanocomposites: Role in water purification through efficient removal of dyes and metal ions. *Carbohydrate Polymers*, 261, 117851.
- 23 Kumar, D., Kumari, K., Chandra, R., Jain, P., Vodwal, L., **Gambhir, G.** and Singh, P. (2021) A review targeting the infection by CHIKV using computational and experimental approaches. *Journal of Biomolecular Structure and Dynamics*, 40(17), 8127-8141.
- 24 Laxmi, V., Hussain, J., Husain, I., Vadiya, V. K. and **Gambhir, G.** (2022) Evaluation of Groundwater Suitability for Drinking and Irrigation in Gurugram Block of Gurugram district, Haryana, India. *Asian Journal of Chemistry*, 34(6), 1555-1564.
- 25 Khanna, L., Mansi, Yadav, S., **Misra, N.**, and **Khanna, P.** (2021) “In water” synthesis of bis (indolyl) methanes: a review. *Synthetic Communications*, 51(19), 2892-2923.
- 26 Singhal, S., **Khanna, P.**, and Khanna, L. (2021) Synthesis, comparative in vitro antibacterial, antioxidant and UV fluorescence studies of bis indole Schiff bases and molecular docking with ct-DNA and SARS-CoV-2 Mpro. *Luminescence*, 36(6), 1531-1543.

- 27 Yadav, S., **Misra, N., Khanna, P.**, Mansi, Batra, K., and Khanna, L. (2022) A DFT Study on Diels-Alder Reaction of Dibenzazepine and 2,5-Dimethylfuran Using Different Solvents and Temperature Conditions. *Polycyclic Aromatic Compounds*, 1-12.
- 28 Bhalla, P., Tomer, N., **Bhagat, P.**, and Malhotra, R. (2022) Chromone functionalized pyridine chemosensor for cupric ions detection. *Spectrochimica Acta Part A: Molecular and Biomolecular Spectroscopy*, 264, 120279.
- 29 Tomer, N., Goel, A., Bhalla, P., **Bhagat, P.**, and Malhotra, R. (2022) Chromone derived effective probe for the detection of metal ion (Cu^{2+}) and chemical explosive (p-nitrotoluene). *Journal of Photochemistry and Photobiology A: Chemistry*, 427, 113823.
- 30 **Thukral, R.**, (2021) Juvenile hormone analog(s) for controlling insect population and method for synthesis thereof, Patent (INDIA).
- 31 Meena, P. L., Kumar, Y., Bhardwaj, P., Genwa, M., **Arya, D. K.**, Verma, A., and Singh, S. P. (2022) Wet Chemical Growth of One Dimensional ZnO Film, *Rasayan Journal of Chemistry*, 15 (1), 423-431.
- 32 Singh, M. B., Jain, P., Tomar, J., Kumar, V., Bahadur, I., **Arya, D. K.**, Sing, P. (2022) An in-Silico investigation for acyclovir and its derivatives to fight the COVID-19: Molecular docking, DFT calculations, ADME and td-Molecular dynamics simulations, *Journal of the Indian Chemical Society*, 99(5), 100433.
- 33 **Malik, P.**, Thareja, R., Singh, J., and Kakkar, R. (2022) II-VI core/shell quantum dots and doping with transition metal ions as a means of tuning the magnetoelectronic properties of CdS/ZnS core/shell QDs: A DFT study. *Journal of Molecular Graphics and Modelling*, 111, 108099.
- 34 **Malik, P.**, and Kakkar, R. (2021) A DFT Study of Interaction of (CdSe) 3 Quantum Dots with Nucleobases. *Advanced Materials Letters*, 12(8), 1-11.
- 35 Singh, J., Thareja, R., **Malik, P.**, and Kakkar, R. (2021) Size-dependent structural and electronic properties of stoichiometric II–VI quantum dots and gas sensing ability of CdSe quantum dots: a DFT study. *Journal of Nanoparticle Research*, 24(2), 1-17.
- 36 **Kaushik, B.**, Yadav, S., Rana, P., Rana, P., Solanki, K., Rawat, D., and Sharma, R. K. (2022) Precisely engineered type II ZnO-CuS based heterostructure: A visible light driven photocatalyst for efficient mineralization of organic dyes. *Applied Surface Science*, 590, 153053.
- 37 Sharma, R. K., **Kaushik, B.**, Yadav, S., Rana, P., Rana, P., Solanki, K., and Rawat, D. (2022) Ingeniously designed Silica nanostructures as an exceptional support: Opportunities, potential challenges and future prospects for viable degradation of pesticides. *Journal of Environmental Management*, 301, 113821.
- 38 **Kaushik, B.**, Rana, P., Rawat, D., Solanki, K., Yadav, S., and Sharma, R. K. (2022) Magnetically separable type-II semiconductor based ZnO/MoO₃ photocatalyst: a proficient system for heteroarenes arylation and rhodamine B degradation under visible light. *New Journal of Chemistry*, 46(18), 8478-8488.
- 39 Rana, P., Gaur, R., **Kaushik, B.**, P. Rana, Yadav, S., Yadav, P., Sharma, P., Gawande M. B. and Sharma, R. K. (2021) Surface engineered Iridium-based magnetic photocatalyst paving a path towards visible light driven CH arylation and cyanation reaction. *Journal of Catalysis*, 401, 297-308.
- 40 Rana, P., **Kaushik, B.**, Gaur, R., Dutta, S., Yadav, S., Rana, P., Solanki, K., Arora B., Biradar A. V., Gawande M. B. and Sharma, R. K. (2022) An Earth-abundant cobalt based photocatalyst: visible light induced direct (het) arene C–H arylation and CO₂ capture. *Dalton Transactions*, 51(6), 2452-2463.
- 41 Rana, P., Dixit, R., Sharma, S., Dutta, S., Yadav, S., Arora, B., **B. Kaushik**, Rana, P. and Sharma, R. K. (2022) Magnetic Boron Nitride Nanosheets Decorated with Cobalt Nanoparticles as Catalyst for the Synthesis of 3, 4-Dihydropyrimidin-2 (1 H)-ones/thiones. *ACS Applied Nano Materials*, 5(4), 4875-4886.

- 42 Yadav, S., Dixit, R., Sharma, S., Dutta, S., Arora, B., Rana, P., **Kaushik, B.**, Adholeya, A., Gawande, M.B. and Sharma, R.K. (2021) Unlocking the catalytic potency of a magnetic responsive CoFe 2 O 4/Ni-BTC MOF composite for the sustainable synthesis of tri-and tetra-substituted imidazoles. *Materials Chemistry Frontiers*, 5(19), 7343-7355.
- 43 Rana, P., Dixit, R., Sharma, S., Dutta, S., Yadav, S., Sharma, A., **Kaushik, B.**, Adholeya, A. and Sharma, R.K. (2021) Enhanced catalysis through structurally modified hybrid 2-D boron nitride nanosheets comprising of complexed 2-hydroxy-4-methoxybenzophenone motif. *Scientific reports*, 11, 24429.
- 44 Yadav, S., Dixit, R., Sharma, S., Dutta, S., Arora, B., Rana, P., **Kaushik, B.**, Solanki, K. and Sharma, R.K. (2022) Unravelling the catalytic potential of a magnetic CoFe 2 O 4/Cu–ABDC MOF composite in the sustainable synthesis of 2 H-indazole motifs. *New Journal of Chemistry*, 46(22), 10829-10843.
- 45 Pasricha, S., Gahlot, P., **Mittal, K.**, Rai, D., Avasthi, N., Kaur, H., and Rai, S. (2022) Functionalized MCM-41: Versatile Catalysts for Organic Transformations. *ChemistrySelect*, 7(7), e202103674.
- 46 **Kaur, S.**, Gupta, A., and Saxena, R. (2021) Identifying Central Nodes in Directed and Weighted Networks. *International Journal of Advanced Computer Science and Applications*, 12(8), 905-914.
- 47 **Narang, S.**, Singhania, M., **Kaur, S.**, and **Mahajan, S.** (2021) Perception of youth on Digital India. *International Journal of Business Innovation and Research*, 25(3), 365-388.
- 48 Jain K., Bhatnagar V, **Prasad S.** and **Kaur S.** (2022) Coupling Fear and Contagion for Modeling Epidemic Dynamics in *IEEE Transactions on Network Science and Engineering*, 1-14.
- 49 Thukral, T., Varshney, A., and **Gaur, V.** (2021) Intensity quantification of public opinion and emotion analysis on climate change. *International Journal of Advanced Technology and Engineering Exploration*, 8(83), 1351.
- 50 Varshney, A., Kapoor, Y., Chawla, V., and **Gaur, V.** (2021) A novel framework for assessing the criticality of retrieved information. *International Journal of Computing and Digital System* 11, 1229.
- 51 Srivastava, S., Varshney, A., Katyal, S., Kaur, R., and **Gaur, V.** (2021) A smart learning assistance tool for inclusive education. *Journal of Intelligent and Fuzzy Systems*, 40(6), 11981-11994.
- 52 **Dhingra, V.**, Kumar, S., **Chowdhuri, A.**, and **Garg, A.** (2021) Varying sonication conditions to tailor surface morphology of GO thin films for enhanced gas sensing performance. *In AIP Conference Proceedings*, 2369(1), 020109.
- 53 Chugh, N., Kumar, M., Haldar, S., **Bhattacharya, M.**, and Gupta, R. S. (2022) Applicability of field plate in double channel GaN HEMT for radio-frequency and power-electronic applications. *Silicon*, 14(3), 1029-1038.
- 54 Ansari, A. A., **Narain, L.**, **Prasad, S. N.**, and Alam, M. (2022) Behaviour of motion of infinitesimal variable mass oblate body in the generalized perturbed circular restricted three-body problem. *Ital. J. Pure Appl. Math.* 47–2022 221–23
- 55 Boadh, R., **Aarya, D. D.**, Dahiya, M., Rathee, S., Kumar, A., Jain, S., Rajoria, Y. K. and Rani, S. (2022) Study and prediction of prostate cancer using fuzzy inference system. *Materials Today: Proceedings*, 56, 157-164.
- 56 **Aarya, D. D.**, Rajoria, Y. K., Gupta, N., Raghav, Y. S., Rathee, R., Boadh, R., and Kumar, A. (2022) Selling price, time dependent demand and variable holding cost inventory model with two storage facilities. *Materials Today: Proceedings*, 56(1), 245-251.
- 57 Verma, S.K., Rizwanullah, M. and **Singh, C.** (2021) Optimal ordering policy for deteriorating items with stock dependent demand, partial backlogging and trade credit period. *International Journal of Logistics*

- 58 Sethi, G., Yadav, A.S. and **Singh, C.**(2022) Two Ware-Houses Fuzzy Inventory Model For Deteriorating Items With Ramp Type Demand And Shortages. *Journal of Management Information and Decision Science*, 25(2), 1-22.
- 59 Aarya, S., **Kumar, P.**, **Bhatia, M.**, Kumar, S., and Sharma, J. **Siddhartha** (2021) Gamma rays induced modification in ultrahigh molecular weight polyethylene (UHMWPE). *Advances in Polymer Technology*, 2021, 7013154.
- 60 **Bhatia M.**, Bhatia S. and **Siddhartha**. (2022) Smart materials for cardiovascular devices, *Materials Today: Proceedings*, 53, 307-309.
- 61 Lamichhane, S., Sharma, S., Tomar, M., and **Chowdhuri, A.**(2022) Studies on Energy Storage properties of BFO/WO3 bilayer thin film capacitor. *Energy Storage*, e342.
- 62 **Joshi, R.** (2022) Double quantum ionization cross-sections for more general exponential cosine screened coulomb potential. *Spectroscopy Letters*, 55(6), 414-423.
- 63 **Joshi, R.** (2022) Micrometre double-quantum ionization of Rydberg hydrogen using linearly and circularly polarized light. *The European Physical Journal D*, 76(2), 37.
- 64 **Joshi, R.** (2022) High harmonic generation spectra for lithium embedded in plasma environment. *Spectroscopy Letters*, 55(3), 192-198.
- 65 Dabas, S., and **Joshi, R.** (2022) A numerical evaluation of Shannon entropy for modified Hulthen potential. *The European Physical Journal D*, 76(5), Article 95.
- 66 Hariwal, R. V., Malik, H. K., **Negi, A.**, and Asokan, K. (2022) Favourable tuning of optical absorbance, bandgap and surface roughness of ZnO thin films by C ion implantation at the critical angle. *Applied Surface Science Advances*, 7, 100189.
- 67 Hariwal, R. V., Malik, H. K., **Negi, A.**, and Asokan, K. (2022) Unravelling impacts of C ion implantations at polar angles in the physical properties of ZnO nanostructured thin films. *Materials Letters*, 308, 131200.
- 68 Singh, I., **Gupta, P. K.**, Uma, R. and Sharma, R. P. (2022) Spatiotemporal nonlinear evolution of the laser pulse and turbulence generation in laser produced plasmas. *Physics of Plasmas*, 29(4), 042114.
- 69 Khan Z. R., Alshammari A. S., Shkir Md., Bouzidi M., Mohamed M., Kumar M., **Sonker R. K.** (2022) Effect of Ag doping on structural, morphological and optical properties of CdO nanostructured thin films. *Physica B: Condensed Matter*, 632, 413762.
- 70 **Sonker R. K.**, Shastri R. and Johari R. (2021) Superficial Synthesis of CdS Quantum Dots for an Efficient Perovskite-Sensitized Solar Cell, *Energy and Fuels*, 35, 8430-8435.
- 71 Sankar, M. and **Kumar, S.** (2021) A systematic review on the eco-safe management of mosquitoes with diflubenzuron: An effective growth regulatory agent, *Acta Ecologica Sinica*, In Press.
- 72 Yadav, K. S., Samal, R. R., Sahgal, A. and **Kumar, S.** (2021) Indigenous plants demonstrating effective antioxidant properties, *Biology Bulletin*, 48 (3), 62-72.
- 73 Samal, R. R., Panmei, K., Lanbiliu, P. and **Kumar, S.** (2022) Reversion of CYP450 monooxygenase-mediated acetamiprid larval resistance in dengue fever mosquito, *Aedes aegypti* L. *Bulletin of Entomological Research*, 112 (4), 557-566.
- 74 Lall, Y., Samal, R. R., Sagar, S. K. and **Kumar, S.** (2021) Formulation of *Clitoria ternatea* leaves-mediated silver nanoparticles to control *Aedes aegypti* larvae. *Journal of Communicable Diseases*, 53(3), 190-200.

- 75 **Kumar, S.** Sharma, A. Samal, R. R., Kumar, M., Verma, V., **Sagar, R. K.**, Singh S. P. and Raghavendra K. (2022) Attractive sugar bait formulation for development of Attractive Toxic Sugar Bait for control of *Aedes aegypti* (Linnaeus). *Journal of Tropical Medicine*, 2022, 2977454.
- 76 Kumar, P., Chauhan, A., Kumar, M., Kuanr, B. K., Kundu, A., Solanki, R., and **Kapur, M. K.** (2021) In vitro and in silico anticancer potential analysis of Streptomyces sp. extract against human lung cancer cell line, A549. *3 Biotech*, 11(6), 1-12.
- 77 Kumar, M., Kumar, P., Das, P., Solanki, R., and **Kapur, M. K.** (2021) Proactive role of Streptomyces spp. in plant growth stimulation and management of chemical pesticides and fertilizers. *International Journal of Environmental Science and Technology*, 19, 10457–10476.
- 78 Somasundaram, S., Abraham, J. S., Maurya, S., **Toteja, R.**, Gupta, R., and **Makhija, S.** (2022) Molecular characterization and transcriptional modulation of stress-responsive genes under heavy metal stress in freshwater ciliate, *Euplotes aediculatus*. *Ecotoxicology*, 31(2), 271-288.
- 79 Sood, U., Dhingra, G. G., Anand, S., Hira, P., Kumar, R., Kaur, J., Verma, M., Singhvi, N., Lal, S., Rawat, C. D., **Singh, V. K.**, Kaur, J., Verma, H., Tripathi, C., Singh, P., Dua, A., Saxena, A., Phartyal, R., Jayaraj, P., **Makhija, S.**, Gupta, R., **Sahni, S.**, Nayyar, N., Abraham, J. S., Somasundaram, S., Lata, P., Solanki, R., Mahato N. K., Prakash, O., Bala, K., Kumari, R., **Toteja, R.**, Kalia, V. C., Lal, R. (2022) Microbial Journey: Mount Everest to Mars, *Indian J Microbiol*, 62, 323-337.
- 80 Maurya, S., Abraham, J. S., Somasundaram, S., Dagar, J., Gupta, R., **Makhija, S.**, **Bhagat, P.**, and **Toteja, R.** (2022) A Comparative Study of Physical and Chemical Parameters and Ciliate Diversity of Leachate Contaminated Soil from the Landfill and the Soil from the Human Inhabitant Land. *Eurasian Soil Sc.*, 55, 1161-1172.

Publications in Peer-Reviewed Journals

- 1 **Chaudhary, R. and Maurya, C. B.** (2021) Sightings of the Tailless Llineblue, *Prosotasdubiosa* (Insecta: Lepidoptera: Lycaenidae) in Delhi, India, *Bionotes*, 23, 171.
- 2 **Chaudhary, R.** (2021) Sighting of Plain Tiger (*Danaus chrysippus*, Linn., 1758) form *dorippus* in New Delhi, India, *Bionotes*, 23, 62.
- 3 **Chaudhary, R. and Kumar, V.** (2021) Genera of ants associated with larvae of Plains Cupid (*Chiladespan-dava*, horsfield, 1829) Insecta: Lepidoptera: Lycaenidae) infesting Cycas, in Delhi, India, and an insight into the nature of their interaction, *Bionotes*, 23, 88.
- 4 **Chaudhary, R.** (2021). Shelter building behaviour of *Hasorachromus* (cramer, 1780) larvae (Insecta: Lepidoptera: Hesperidae). *Bionotes*, 23(1), 11-15.
- 5 Varmani, S. G., **Chowhan, R. K.**, Sharma, I., and Narang, R. (2021). COVID-19 and cardiovascular disease: Clinical implications of biochemical pathways. *Journal of the Practice of Cardiovascular Science*, 7(2), 97-107.
- 6 **Narang, A.** (2022) In vitro micropropagation of *Acacia holosericea* a. cunn. ex g. don through cotyledons, *Intl. J. Multidisc. Edu. Res*, 11(7), 70-75.
- 7 **Narang, A. and Shukla, A.** (2022) Axenic propagation of a woody legume - *Prosopis cineraria* (L.) Duce through cotyledonary node explants, *Intl. J. Multidisc. Edu. Res*, 11(2), 16-21.
- 8 Raigar, M. B., **Hooda, S.**, and Bargujar, S. (2021) Synthesis, Characterization and Application of Novel Guar Gum-N,N-Dimethylaniline Resin for Waste Water Treatment, *International Journal of Recent Scientific Research*, 12 (6), 41932-41936.

- 9 Singh, R., **Gupta, S.** and Kumar, P. (2022) The Role of Nanotechnology in Antiviral Regime: An Overview, *Nano life*, 12, 2130011.
- 10 **Bhagat, H.** and Thakur, M. (2021) Perspectives on Affective Commitment, *Third Concept*, 35(414), 39–46.
- 11 Thakur, M., **Bhagat, H.**, Kumar, D. and Gambhir, C. (2021) A study of psychological empowerment and its impact on job engagement of visually- impaired employees during covid-19 lockdown, *IITM Journal of Business Studies*, 9(1), 20-28.
- 12 Singh, A. K., **Goel, S. K.**, Shrivastav, R. K., and Chahar, K. (2022) Linkages Between Credit Cards and Consumers' Impulsive Buying Behavior: An Empirical Analysis. *Arthshastra Indian Journal of Economics and Research*, 10(4), 8-23.
- 13 **Samal C. K.** (2021) Reliable Time Slot Allocation Scheme among Mobile Nodes in MANET, *International Journal of Computer Science Trends and Technology*, 9(5), 105-110.
- 14 **Prasad, S. N.**, Shalini, K., and Ansari, A. A. (2021) The Dynamical Study of Variable Mass Test Particle in Nonlinear Sense of Restricted 3-body Problem with Heterogeneous Primaries, *Applications and Applied Mathematics*, 16(2), 1274-1294.
- 15 **Chowdhuri, A., Saraswat, S. and Gupta, C. K.** (2021) Inclusion of environmental awareness as basic tenet of education in India for realization of sustainable practices, *Research Journal of Educational Science*, 9(1), 1-8.
- 16 **Joshi, R.**, Kumar, P., Jha, A. K., and Kumar, T. (2021) Pressure Ionization, Polarizability and Screening Constants in Confined Hydrogen Like Ions of Astrophysical Importance. *Journal of Atomic, Molecular, Condensed Matter and Nano Physics*, 8(2), 83-94.
- 17 Solanki, R., Anand, S., Anand, M., Kumar, P., Kumar, M. and **Kapoor, M. K.** (2022) Antibiotic Resistance: A Global Health Crisis, *Biosphere*, 1: 1-70, Pg 3-11.
- 18 Somasundaram, S., Dagar, J., Abraham, J. S., Maurya, S., Sandeep, **Makhija, S.** and **Toteja, R.** (2022). Role of abiotic and biotic components in remediating environmental pollutants: A review. *Biosphere*, 1: 1-70, Pg 49-60

Chapters in Books

- 1 S. and **Bajpai U.** (2022) Bacteriophages in the Treatment of Biofilms In *Bacteriophages: Interaction, Diversity and Applications*, Nova Science Publishers, Chapter 10. ISBN 9781685078607.
- 2 Agrawal N., Singh I., Khanna M., **Dhawan G.**, Kumar P. and Dhawan U. (2022) Understanding the pharmacology and pharmacotherapeutics for infectious diseases” In *Nanotechnology for Infectious Diseases*, Springer-Nature Publication Singapore, 53-81. ISBN 9789811691898.
- 3 **Singh M. K., Sahni S. and Narang A.** (2021) Impact of Climate Change on Functional AM Fungi in Rhizosphere In *Climate Change and the Microbiome, Sustenance of the Ecosphere*, Springer, 63, 397-418. ISBN 9783030768638.
- 4 **Singh M. K., Sahni S. and Narang A.** (2021) Production of liquid Biofuels from Lignocellulosic Biomass In *Energy: Crisis, Challenges and Solutions*, John Wiley and Sons Ltd., 208-230. ISBN 9781119741558.

- 5 **Sahni S., Singh M. K. and Narang A.** (2021) Sustainable Solution for Future Energy Challenges Through Microbes in *Energy: Crisis, Challenges and Solutions*, John Wiley and Sons Ltd., 231-249. ISBN 9781119741558.
- 6 Agnihotri A., **Sahni S.**, Sharma M. P. and Gupta M. M. (2022) Facets of AM Fungi Soil quality monitoring and control management in *Fungal diversity, ecology and control management*, Springer Singapore, 327-344. ISBN: 9789811688775.
- 7 Saya L. and **Hooda S.**(2021) Metal-Organic Frameworks (MOFs) as Versatile Detoxifiers for Chemical Warfare Agents (CWAs) In *Metal-Organic Frameworks (MOFs) as Catalysts*, Springer Singapore, 453-489. ISBN 9789811679582.
- 8 **Kumar S.**, Sharma A., Gautam D. and **Hooda S.** (2021) Characterization of Mesoporous Materials In *Advanced Functional Porous Materials: From Macro to Nano Scale Lengths*, Springer International Publishing, 893, 175-204. ISBN9783030853969.
- 9 Khanna L., Mansi and **Khanna P.** (2022) Nanocatalysis for Reduction /Hydrogenation Reactions In *Advanced Nanocatalysis for Organic Synthesis and Electroanalysis*, Bentham Books, 1, 96-113. ISBN 9789815040166.
- 10 Khanna L., Mansi and **Khanna P.** (2022) Graphene Based Nanomaterials as Catalyst in Reduction Reactions In *Graphene-Based Nanomaterial Catalysts*, Bentham Books, 1: 130-151. ISBN 9789815040494.
- 11 Meena R. K., **Arya D. K.**, Gaur A., Verma D., Singhal P., Aggarwal Y. and Saini A. (2022) Biological and Physical Applications of Silver Nanoparticles In *New Horizons in Life Science*, Vital Biotech Publication, 211-243. ISBN 9789392953002.
- 12 **Arya D. K.**, Verma A. and Rai G. J. (2022) The Impact of Climate Change on human health in India: An Overview In *New Horizons in Life Science*, Vital Biotech Publication, 244-250. ISBN 9789392953002.
- 13 Rawat D., **Kaushik B.** and Singhal R. (2021) Nanostructured inorganic–organic silica as green material for sustainable development of catalysts In *Applications of Advanced Green Materials*, Woodhead Publishing, 151-167. ISBN 9780128204849.
- 14 Bansal S. K. and **Rastogi A.**, Wealth Creation and Expected Pension in National Pension System, In *Research Analog*, 99-113. ISBN 9788195401062.
- 15 **Bhatia M.** (2021) Women in business and entrepreneurial roles: Get smarter with STEM In *Women entrepreneurship in India: Governance, sustainability and policy*, Routledge Taylor and Francis, 72-83, ISBN 9781003160786.
- 16 **Bhatia M.** (2021) Smart economics led by gender equality In *Women entrepreneurship in India: Governance, sustainability and policy*, Routledge Taylor and Francis, 29-37. ISBN 9781003160786.
- 17 Sao A.K., Singh J. P., Sharma B., Munjal S., Sharma A., Tomar M. and **Chowdhuri A.** (2022) CdS-SnO₂ Nanocomposite Sensor for Room Temperature Detection of NO₂ Gas In *Sensing Technology*, Springer, 283-289. ISBN 9783030988852.
- 18 Rahul, **Sonker R. K.**, Shukla P. K., Singh P. K., Khan Z. H. (2021) Experimental and Characterization Techniques In *Composite Materials*, CRC Press Taylor and Francis, Chapter 5. ISBN: 9781003080633.
- 19 Soonmin H., Paulraj I., Kumar M., **Sonker R. K.** and Nandi P. (2022) Recent Developments on the Properties of Chalcogenide Thin Films In *Chalcogenides - Preparation and Applications*, Intech open, Chapter 1. ISBN 9781803556628.

- 20 Gurav S. R., Waikar M. R., Rasal A. S., **Sonker R. K.**, Sonkawade R. G. (2022) Current Development and Challenges in Textile-Based Flexible Supercapacitors in *Smart and Flexible Energy Devices*, CRC Press Taylor and Francis, Chapter 29. ISBN: 9781003186755.

Publications in Conference Proceedings:

- 1 Laishram S. D., Singh, R.W. and **Hooda, S.** (2021) Natural Polysaccharide Based Graphene Oxide Semi-Synthetic Nano Composites as Potential Candidates in Waste Water Remediation in *Online International Conference Rethinking Science for Sustainable Development (RSSD - 2021)* organized by Department of Chemistry, Rajdhani College, University of Delhi , April 20-21, 2021, published in proceeding on pp 45.
- 2 Malik V. and **Hooda, S.** (2021) Tamarind - coated iron oxide nanocomposite as an effective adsorbent for Crystal violet dye in *Online International Conference Rethinking Science for Sustainable Development (RSSD-2021)* organized by Department of Chemistry, Rajdhani College, University of Delhi , April 20-21, 2021, published in proceeding on pp 50.
- 3 Panda, A., Varshney, A. and **Gaur, V.** (2021). Forecasting temperature anomalies of planet Earth: A Comparative Analysis of AI Models in *2021 9th International Conference on Reliability, Infocom Technologies and Optimization, ICRITO (Trends and Future Directions)* organized by Amity Institute of Information Technology, Amity University, Uttar Pradesh, India from September 03-04 published in IEEE proceedings on pp 1-6.
- 4 Jain, K., Bhatnagar, V. and **Kaur, S.** (2022) Collective Behavior in Community-structured Network and Epidemic Dynamics in *International Health Informatics Conference* organized by Sri University, Cuttack, Odisha, India during May 17-19, 2022.
- 5 **Ahuja, H., Narang, S.,** and Dixit, V. S. (2021). A Proposed Entropy based Recommender Framework for Disaster Management in *9th International Conference on Reliability, Infocom Technologies and Optimization, ICRITO (Trends and Future Directions)* organized by Amity Institute of Information Technology, Amity University, Uttar Pradesh, India from September 03-04 published in IEEE proceedings on pp 1-6.
- 6 Falswal, J., Dey, D and **Kumar, S.** (2021) Records of pollinator bees from Uttarakhand, India., In: *International Web Conference on Innovative and Current Advances in Agriculture and Allied Science (ICAAAS-2021)*, Meerut, Uttar Pradesh, July 19-21, 2021.
- 7 Deepa, Dhanker, R., Samal, R. R. and **Kumar, S.** (2021) Biocompatible Metal Nanoparticles from Kitchen Waste and Its Characterization in *World Environment Summit -2021 (WES 2021)*, Indian International Centre, New Delhi, October 3, 2021.
- 8 Sankar, M. and **Kumar, S.** (2021) Growth regulatory and fitness cost studies in *Aedes aegypti* on exposure to diflubenzuron, an insect growth regulator in *AHI EVRAN International Conference on Scientific Research*, Kırşehir Ahi Evran University, Turkey, November 30-December 2, 2021.

Presentations in Conferences

Faculty Name	Title of Lecture/Paper	Invited Lecture/ Resource Person /Paper presented	Details
Prof. Urmi Bajpai (Biomedical Science)	Isolation, Purification and Characterisation of Bacteriophages Specific To Mycobacterial Spp.	Oral presentation by the first author, received III prize.	National conference of Virology (virtual mode) on “Emerging and re-emerging viral diseases- climate change impacts and mitigation” (VIROCON 2021). organized by Department of Microbiology, AIIMS Bibinagar from March 26-28, 2022.
	Isolation and characterization of novel mycobacteriophages and their ability to inhibit or disrupt <i>M. smegmatis</i> biofilm mycobacteriophages	Poster Presentation	
Prof. Urmi Bajpai (Biomedical Science)	Isolation, Purification and Characterization of Mycobacteriophages From Native Environment”	Poster Presentation	6th Annual International Conference of Indian Network for Soil Contamination Research (INSCR), on Microbes in Sustainable Development, November 15-18, 2021 organized in virtual mode by INSCR, in association with colleges of University of Delhi, Magadh University, University of Allahabad and Patliputra University and PhiXgen Pvt. Ltd
Dr Anupama Shukla (Botany)	Report on the Indian Laboulbeniomyces	Oral Presentation	
Prof. Charu K. Gupta (Botany) Prof. Arijit Chowdhuri (Physics)	Soil quality monitoring using low-cost networked sensors: investigating the effect of climate change in real-time	Paper presented	
Dr Pooja Bhagat (Chemistry)	Biological importance of Heterocyclic Compounds	Poster presentation	

Dr Pooja Bhagat (Chemistry)	A comparative study of physico-chemical parameters and ciliate diversity of leachate contaminated soil from the landfill and the soil from human inhabitant land	Oral presentation	6th Annual International Conference of Indian Network for Soil Contamination Research (INSCR), on Microbes in Sustainable Development, November 15-18, 2021 organized in virtual mode by INSCR, in association with colleges of University of Delhi, Magadh University, University of Allahabad and Patliputra University and PhiXgen Pvt. Ltd
Dr Sumit Sahni (Botany)	Utilization of Lignocellulosic Agricultural Wastes for Mushroom Cultivation and Recovery of Lignocellulolytic Enzymes	Oral Presentation	
Prof. Sunita Hooda Prof. Geetu Gambhir (Chemistry)	Guar Gum Based Nanocomposites as Efficient Adsorbents for Dyes and Metal Ions from Waste Water	Paper Presented	
Prof. Sunita Hooda Prof. Geetu Gambhir (Chemistry)	Inclusive approach of innovative research with biopolymers as remediating agents in waste water treatment	Paper Presented	
Dr Rimpay Kaur Chowhan (Biomedical Science)	Understanding aggregation behavior of the brain antioxidant enzyme, Prdx6 and its relevance to neurodegenerative diseases of protein aggregation origin	Poster Presentation (Online)	Neurodegeneration: The Biological Pathways Driving the Future of Therapeutic Development organized by Keystone Symposia on Molecular and Cellular Biology during June 05-09, 2022
Prof. Sunita Hooda (Chemistry)	Environmental Sustainability	Paper Presented	Third International conference on Entrepreneurship, Research and Innovation for Environmental Sustainability and Planetary Health on April 07-08, 2022, organized by Research cell of Bhagini Nivedita College, University of Delhi, and secured 1 st position at Vasudhev Kutumakam-3 (VK3).

Prof. Suni- ta Hooda (Chemis- try)	Fabrication of CuI Nano Particles by Self Assem- bly Approach for the Synthesis of benzimid- azole	Paper Pre- sented	International conference on Recent Advances in Nano Medical Science (RANMS-2022) on June 16-17, 2022, Organized by Institute of Nano Medi- cal Science (INMS) and Institution of Eminence IOE), University of Delhi.
Prof. Rash- mi Thukral (Chemis- try)	Green Chemistry Ap- proaches To Acetylation	Paper pre- sented	International e-Conference on Recent Advancements in Chemical Science: Health, Environment and Society (ICRACS-2022) April 08-09, 2022 or- ganized by Department of Chemistry, Deshbandhu College, University of Delhi.
Dr Neeti Misra Prof. Pan- kaj Khanna (Chemistry)	DFT Study on [4+2] Cycloaddition reaction with furan derivatives at thermal conditions in different phase	Paper Pre- sented	International Conference on ‘Recent Trends in Drug Discovery and Devel- opment’ organized by the Department of Chemistry, Maitreyi College, Uni- versity of Delhi, from October 08-09, 2021 on a virtual platform.
Dr Nee- ti Misra (Chemistry)	Diels-alder reaction of dibenzazepine and 2,5-dimethylfuran: A DFT study’	Paper pre- sented	International seminar on Recent advances in Chemistry and Material Science (2021), Young Scientists Con- clave (2021) and Student Science Meet (2021) organized by Indian Chemical Society from August 01-03, 2021 and August 07-08, 2021
Prof. Dinesh Ku- mar Arya (Chemistry)	Green synthesis of Silver Nanoparticles by Phyllanthus emblicaplant extract and their Optical properties	Paper Pre- sented	International Conference on Renew- able Energy organized by Centre for non-conventional energy resource centre, University of Rajasthan, Jaipur, India, February 26, 2022
Mr Ankit Singh (Com- merce)	A Study of Factors related to Perceived Organizational Support: A Special Reference to IT sector	Paper Pre- sented	International Conference on Sustain- able Business: Revisiting Management Practices 2021, Faculty of Manage- ment and Commerce, Manipal Univer- sity, Jaipur, November 18-19, 2021
	A Perspective on Finan- cial Inclusion of People with Disability Through Micro Finance: In the Indian Context	Paper pre- sented	Recent Trends in Science, Technology, Management and Humanities, Jagan- nath University, Bahadurgarh, Hary- ana, March 29, 2022

Ms Hani-sha Bhagat (Com- merce)	A study of the relationship between ethical climate and psychological empowerment of visually challenged women employees at the workplace	Paper pre- sented	International Conference on Literature, Language, Translation and Gender Studies 2021, Red Talks International Research Division, Vijayawada, Andhra Pradesh, India, July 16-17, 2021
	A study of the relationship between Positive Organization Support(-POS) and well-being of visually challenged women employees at workplace	Paper pre- sented	
	A Study of factors related to Perceived Organizational Support: A special reference to IT Sector	Paper pre- sented	International Conference on Sustainable Business: Revisiting Management Practices 2021, Faculty of Management and Commerce, Manipal University, Jaipur, November 18-19, 2021
	Innovation for inclusion: A study on accessible advertising	Paper pre- sented	Innovative Strategies in Business Management and Technology in the Emerging Scenario MIMANSA 2021, Sri Balaji University, Pune, December 08-09, 2021
	A Perspective on Financial Inclusion of People with Disability Through Micro Finance: In the Indian Context	Paper pre- sented	Recent Trends in Science, Technology, Management and Humanities organized by Jagannath University, Bahadurgarh, Haryana on March 29, 2022
Prof. Sharanjit Kaur (Computer Science)	Improving the Effectiveness of e-Learning Videos By Capitalizing On Eye-Tracking Data	Paper Pre- sented	National conference on National Education Policy: Implementation, challenges, opportunities and probable outcomes organized by Deshbandhu College, University of Delhi on May 14, 2022
Dr Harita Ahuja (Computer Science)	A Proposed Entropy based Recommender Framework for Disaster Management	Paper Pre- sented	9th International Conference on Reliability, Infocom Technologies and Optimization (ICRITO) (Trends and Future Directions), organized by Amity Institute of Information Technology, Amity University, Uttar Pradesh, India September 03-04, 2021

Dr. Sarita Agrawal (Mathematics)	Homomorphism in Ternary Monoid	Paper presented	5 th International Conference on Current Scenario in Pure and Applied Mathematics held at Kongunadu Arts and Science College(Autonomous) Coimbatore on January 27-28, 2022 sponsored by Indian Science Congress Association, Coimbatore, India.
	Analytical Comparison of Road Space rationing (odd-even)	Paper presented	UGC-sponsored National Seminar-Application of Mathematics in Social Science, organized by Shyama Prasad Mukherji College for Women, University of Delhi from March 03-04, 2022
Dr Mamta Bhatia (Physics)	Women empowerment with the power of STEAM	Paper presented	International conference on “Empowering women entrepreneurs from grass root to global”; held at Entrepreneurship Development Institute of India(EDII), Ahmedabad, India, during February 24-25, 2022
Prof. Rachna Joshi (Physics)	Shannon entropy for Hydrogen in Plasma	Paper Presented (Online)	International Conference on Applied Mathematics and Science (ICAMS-22) organized by National Institute for Engineering and Research on May 21, 2022 at Mumbai, India

Prof. Ravi Toteja Prof. Seema Makhija (Zoology) Dr Pooja Bhagat (Chemistry)	A comparative study of physico- chemical parameters and ciliate diversity of leachate contaminated soil from the landfill and the soil from human inhabitant land	Paper presented	6th Annual International Conference of Indian Network for Soil Contamination Research (INSCR), on Microbes in Sustainable Development, November 15-18, 2021 organized in virtual mode by INSCR, in association with colleges of University of Delhi, Magadh University, University of Allahabad and Patliputra University and PhiXgen Pvt. Ltd
Prof. Ravi Toteja Prof. Seema Makhija (Zoology)	Recent advances in methods of species identification: DNA Barcoding	Paper presented	
	A study on role of abiotic and biotic components in bioremediation	Paper presented	
	In-silico characterization and molecular response of stress- responsive genes under heavy metal stress in freshwater ciliates	Paper presented	
	A study on dynamics of ciliate community structure to monitor water quality	Paper presented	
Prof. Monisha Khanna Kapur (Zoology)	Bioactive potential of Streptomyces spp. Against diverse Pathogenic fungi	Paper presented (oral)	
Ms Bhumi-ka Chauhan (Zoology)	Multi Omics Approach : A new Frontier in Parasitic Research	Paper Presented	Online International conference on Science and Society organized by Miranda House, February 23-25, 2022.

Annexure II

List of Governing Body Members (2022)

S.No.	Name	Designation
1	Mr. Anil Kumar Saini	Chairperson
2	Ms. Lalita Agarwal	Treasurer
3	Mr. Jitender Singh	Member
4	Mr. Md. Harun	Member
5	Ms. Poonam Tyagi	Member
6	Dr. (Ms) Vandana Bajaj	Member
7	Professor Dinesh Kumar	Member
8	Professor. Ranganath M.S.	Member
9	Dr. Pritam Baruah	Member
10	Dr. (Ms) Vaishali Singh	Member
11	Sr. Professor Mridula Gupta	University Representative
12	Professor Rajeev Kaul	University Representative
13	Dr. Sunita Jetly	Teacher Representative
14	Professor Gagan Dhawan	Teacher Representative
15	Professor Ravi Toteja	Officiating Principal (Member Secretary)
16	Mr. Diwakar Bhardwaj	Non Teaching Nominee (Special Invitee)

Annexure III

Staff council committees

<p>Admissions Committee</p> <ol style="list-style-type: none"> 1 Ms Anupama Rastogi (Convenor) 2 Prof. Seema Makhija (Convenor) 3 Dr Rashmi Sharma (Convenor) 4 All Teachers-in-Charges <p>Foreign Language</p> <ol style="list-style-type: none"> 1 Dr Geetika Kalra (Convenor) 2 Dr Vikrant Kumar 	<p>Workload and Time Table Committee</p> <ol style="list-style-type: none"> 1 Dr Sanjeeta Rani (Convenor) 2 Prof. Sharanjit Kaur (Co Convenor) 3 Prof. Subhash Kumar (Co Convenor) 	<p>Examination Committee</p> <ol style="list-style-type: none"> 1 Prof. Gagan Dhawan (Convenor) 2 Prof. Sunita Hooda 3 Dr Meenu Mohil 4 Prof. Seema Gupta (Chem) 5 Prof. Udaibir Singh 6 Mr Gaurav Sharma 7 Dr Sandeep Kumar Goel 8 Prof. Seema Makhija 9 Ms Anu Preveen <p>SOL</p> <ol style="list-style-type: none"> 1 Prof. Pankaj Khanna (Superintendent) 2 Dr Rajesh Chaudhary (Superintendent)
<p>Alumni Affairs Committee</p> <ol style="list-style-type: none"> 1 Dr Rashmi Sharma (Botany) (Convenor) 2 Ms Anupama Rastogi 3 Prof. Sarita Kumar 4 Dr Preeti Marwaha 5 Prof. Pankaj Khanna 6 Dr Meenu Mohil 7 Ms Anuradha Sarin 8 Prof. Anju Agrawal 9 Prof. Monisha Khanna Kapur 10 Dr Archana Pandey 11 Ms Sangeeta Relan 12 Mr. Brijendra Yadav 13 Dr Aparna Sharma 	<p>Sports Committee</p> <ol style="list-style-type: none"> 1 Mr Ravinder Kumar Sagar (Convenor) 2 Prof. Gagan Dhawan 3 Dr Priti Goyal 4 Prof. Rachna Joshi 5 Dr Sada Nand Prasad 6 Dr Ranjeet Singh 7 Dr Shallu Sachdeva 8 Dr Neelu Dheer 9 Mr Mahesh Kumar 10 Dr Satendra Singh 11 Mr Abhay Pratap Singh 12 Dr Rohtash Singh 13 Dr Rakesh Kumar Sonker 14 Dr Dinesh Kumar Verma 15 Dr Satyapal Singh 16 Dr V Bhasker Raj 17 Mr Namo Narayan Meena 18 Dr Deo Datta Aarya 19 Dr Ambika 20 Mr Dev Om 21 Ms Deepshikha 	<p>Library Committee</p> <ol style="list-style-type: none"> 1 Prof. Seema Gupta (Chem) (Convenor) 2 Prof. Geetu Gambhir (Bursar) 3 Dr Harita Ahuja 4 Dr Sunita Jetly 5 Prof. Amit Garg 6 Dr Surinder Kaur 7 Dr Roopesh Tehri 8 Dr Shalu Dhanda 9 Dr Monica Misra

College Development Committee 1 Prof. Laxmi Narain (Convenor) 2 Dr Chandra Kant Samal 3 Dr Roopesh Tehri 4 Dr Ranjeet Singh 5 Dr Archana Pandey 6 Prof. Anju Agarwal 7 Ms Sapna Yadav 8 Dr Sanjay Kumar 9 Dr Rohtash Singh 10 Dr Neeti Goel	SPICMACAY 1 Dr Shalu Mahajan (Convenor) 2 Dr Preeti Marwaha (Co-Convenor) 3 Ms Anu Preveen 4 Ms Priyanka Sharma Debating Society (Tark) 1 Dr Yasheshwar (Convenor) 2 Ms Poonam Chauhan 3 Dr Joita Dhar Rakshit 4 Dr Aparna Sharma 5 Mr Pawan Kumar	Fellowship Programs and Awards Committee 1 Dr Manisha Jain (Convenor) 2 Mr Vishal Dhingra 3 Ms Poonam Chauhan 4 Dr Mamta Bhatia 5 Dr Harita Ahuja 6 Prof. Monisha Khanna Kapur 7 Dr Rimpay Kaur Chowhan 8 Dr Kavita Mittal 9 Dr Neelakshi N K Borah 10 Mr Yash Sain 11 Dr Pradeep Kumar Gupta 12 Mr Prashant Pradhan
Proctorial Committee 1 Prof. Dinesh Kumar Arya (Proctor) 2 Dr Monica Misra 3 Dr Rajesh Chaudhary 4 Mr Pawan Kumar 5 Dr Udai Bir Singh 6 Dr Neelgagan Singh 7 Mr Dinesh Kumar 8 Mr Gurudatt Rao Ambedkar 9 Dr Narayan Singh 10 Dr Rimpay Kaur Chowhan 11 Dr Kalu Ram Meena 12 Dr Jitender Goel 13 Mr Vineet Girdharwal 14 Dr Aparna Sharma 15 Dr Namita Singh 16 Mr Prashant Pradhan	Canteen Committee 1 Dr Chandra Kant Samal (Convenor) 2 Prof. Vibha Gaur 3 Dr Chaman Singh 4 Prof. Laxmi Narain 5 Ms Poonam Chauhan 6 Ms Sadhna Gupta 7 Dr Manisha Verma 8 Ms Anuradha Sarin 9 Mr Gaurav Sharma 10 Mr Dinesh Kumar 11 Dr Narayan Singh 12 Ms Nishu Singh 13 Ms Gauri Ghai 14 Mr Brijendra Yadav	Social Outreach Programs Committee(NSS) 1 Dr Sunita Jetly (Convenor) 2 Dr Archana Pandey (Co-Convenor) 3 Dr Sarita Agarwal 4 Mr Pawan Kumar 5 Dr Ravneet Kaur 6 Mr Abhay Pratap Singh 7 Dr Ranjit kaur 8 Mr Vineet Girdharwal 9 Dr Pradeep Kumar Gupta

Garden Committee	Academic Events Management	Cultural Events Management Committee
1 Dr Vikrant Kumar (Convenor)	1 Dr Pooja Bhagat (Joint Convenor)	1 Dr Geetika Kalra (Joint Convenor)
2 Dr Chaman Singh	2 Prof. Seema Makhija (Joint Convenor)	2 Ms Seema Gupta (Joint Convenor)
3 Prof. Vibha Gaur	3 Dr Neeti Misra	3 Dr Neelgagan Singh
4 Dr Rajesh Chaudhary	4 Dr Surinder Kaur	4 Dr Manoj Kumar Singh
5 Dr Anupama Shukla	5 Dr Vineet Kumar Singh	5 Mr. Abhay Pratap Singh
6 Dr Sada Nand Prasad	6 Dr Sanjay kumar	6 Dr Shrankhla
7 Mr Ravinder Kumar Sagar	7 Dr Siddhartha	7 Mr Gurudatt Rao Ambedkar
8 Ms Rupali Pabreja	8 Dr Sumit Sahni	8 Dr Narayan Singh
9 Prof. Arijit Chowdhuri	9 Dr Pragati Malik	9 Dr Rahul Dev
10 Dr Vineet Kumar Singh	10 Dr Neelakshi N K Borah	10 Dr Neeti Goel
11 Dr Manoj Kumar Singh	11 Ms Vandita Grover	11 Dr Jitender Goel
12 Ms Hanisha Bhagat	12 Mr Ankit Singh	12 Ms Shiva Saini
13 Ms Sapna Yadav	13 Dr Namita Singh	13 Dr Pragati Malik
14 Dr Satyapal Singh	14 Dr Anita Thakur	14 Mr Brijendra Yadav
15 Dr Shashi Shekhar		15 Ms Sapna Yadav
16 Ms Deepshikha		16 Mr Yask Sain
		17 Mr Sanjay kumar
		18 Mr Ankit Singh
		19 Dr Anita Thakur
		20 Dr Deo Datta Aarya
		21 Dr Ambika

<p>Women Students; Affairs Committee - <i>Sashakt</i></p> <ol style="list-style-type: none"> 1 Dr Geetika Kalra (Convenor) 2 Dr Ravneet Kaur 3 Dr Rashmi Sharma 4 Dr Mamta Bhatia 5 Dr Shallu Sachdeva 6 Dr Neelu Dheer 7 Prof. Rashmi Thukral 8 Dr Yasheshwar 9 Ms Bhumika Chauhan 	<p>Committee for coordination with the Equal Opportunity Cell, University of Delhi</p> <ol style="list-style-type: none"> 1 Dr Vikrant Kumar (Convenor) 2 Ms Rupali Pabreja 3 Dr Sarita Agarwal 4 Ms Gunjan Rani 5 Ms Hanisha Bhagat 	<p>Editorial – Magazine + Annual Report</p> <p>Editorial I– Magazine</p> <ol style="list-style-type: none"> 1 Dr Joita Dhar Rakshit 2 Dr Anupama Shukla 3 Ms Sangeeta Relan 4 Dr Satendra Singh <p>Editorial II – Prospectus</p> <ol style="list-style-type: none"> 1 Prof. Arijit Chowdhuri (Convenor) 2 Prof. Pankaj Khanna 3 Dr Sweety Shrimali <p>Editorial III– Annual Report</p> <ol style="list-style-type: none"> 1 Dr Pooja Bhagat (Joint Convenor) 2 Prof. Seema Makhija (Joint Convenor) 3 Dr Manoj Kumar Singh 4 Dr Rimpay Kaur Chowhan 5 Dr Pragati Malik 6 Dr Joita Dhar Rakshit 7 Dr Monika Bhattacharya 8 Ms Vandita Grover 9 Dr Neelakshi N K Borah 10 Dr Jitender Goel 11 Mr Gurudatt Rao Ambedkar 12 Mr Abhay Pratap Singh
---	--	--

I.T. Committee – Website Distribution/Maintenance help of laptops. 1 Prof. Seema Makhija (Convenor) 2 Mr Mahesh Kumar 3 Mr Yash Mangla 4 Dr Kalu Ram Meena 5 Dr Dinesh Kumar Verma 6 Mr Rakesh Kumar Sonker 7 Ms Shiva Saini 8 Dr Siddhartha 9 Dr Sweety Shrimali 10 Dr Satya Prakash Yadav 11 Mr Namo Narayan Meena	Nodal Person for Students from the North East: 1 Prof. Subhash Kumar Nodal Person for Foreign Students: 1 Prof. Subhash Kumar	Placement 1 Dr Harita Ahuja (Convenor) 2 Dr Vishal Dhingra 3 Dr Sumit Sahni 4 Dr Kavita Mittal
Theatre Society (<i>Dhwani</i>) 1 Dr Monica Misra (Convenor) 2 Ms Gauri Ghai 3 Ms Bhumika Chauhan	Environment Society 1 Prof. Gagan Dhawan (Convenor) 2 Prof. Seema Gupta (Chem.) 3 Prof. Rachna Joshi 4 Dr Priti Goyal 5 Prof. Rashmi Thukral 6 Dr Sanjeeta Rani 7 Dr Yash Mangla 8 Mr Abhay Pratap Singh 9 Dr Rimpay Kaur Chowhan 10 Dr Sanjay Kumar 11 Dr Satya Prakash Yadav 12 Dr V Bhasker Raj 13 Dr Shashi Shekhar	Committee for Mentorship and Counselling 1 Prof. Sunita Hooda (Convenor) 2 Prof. Sarita Kumar 3 Dr Manisha Jain 4 Dr Roopesh Tehri 5 Ms Sadhna Gupta 6 Dr Manisha Verma
PicFie- The Photographic Society Dr Manisha Jain (Convenor)	Teacher Representative for provident fund committee Dr Sandeep Kumar Goel	Secretary, Staff council: Prof. Charu Khosla Gupta

Members of the Editorial Committee (Annual Report)

Prof. Rachna Joshi, Department of Physics (Convenor)

Dr Rimpay Kaur Chowhan, Department of Biomedical Science

Dr Kavita Mittal, Department of Chemistry

Dr Monika Bhattacharya, Department of Electronics

Dr Ambika Negi, Department of Physics

Dr Siddhartha, Department of Physics

Members of the Designing Team (Annual Report)

Anurag Ranjan, B.Sc. (H) Computer Science, II Year

Sujith Talakola, B.Sc. (H) Computer Science II Year

Dr Vineet Kumar Singh, Department of Botany

Special thanks to:

Prof. Seema Makhija, Department of Zoology





ACHARYA NARENDRA DEV COLLEGE
UNIVERSITY OF DELHI
Govindpuri, Kalkaji, New Delhi 110019

Contact us: <https://www.andcollege.du.ac.in>, tel: +91-(0)11-26294540

