

# वार्षिक प्रतिवेदन **ANNUAL REPORT** 2 0 1 4 - 2 0 1 5

(01 अप्रैल 2014 – 31 मार्च 2015)  
(01 April 2014 - 31 March 2015)



**दिल्ली प्रौद्योगिकी विश्वविद्यालय**  
**DELHI TECHNOLOGICAL UNIVERSITY**



Visitor

**His Excellency Shri Pranab Mukherjee**

President of India

Chancellor

**Hon'ble Shri Najeeb Jung**

Lt. Governor, Govt. of NCT, Delhi

Deputy Chief Minister and Minister for Training & Technical Education

**Hon'ble Shri Manish Sisodia**

Govt. of NCT of Delhi

Vice Chancellor

**Prof. Pradeep Kumar**

Pro-Vice Chancellor

**Prof. S. K. Garg**

### **Deans**

Dean Academic (UG)	<b>Prof. R. K. Sinha</b>
Dean Academic (PG)	<b>Prof. Vishal Verma</b>
Dean (IRD)	<b>Prof. A. Trivedi</b>
Dean (SW)	<b>Prof. Vikas Rastogi</b>
Dean (A & IA)	<b>Prof. H. C. Taneja</b>

Registrar

**Col. Neeraj Suri (Retd.)**



# Contents

## Vice Chancellor Report

## Photographs

### 1 Organization and Administration

1.1	Court	1
1.2	The Planning Board	1
1.3	Board of Management	2
1.4	Finance Committee	2
1.5	Academic Council	3
1.6	Administration	4

### 2 Academic and Non-academic Staff

2.1	Academic Staff	7
2.2	Non-academic Staff	7
2.3	Faculty Superannuated	9

### 3 Academic Programmes

3.1	Undergraduate Courses	11
3.2	Post Graduate Courses	12
3.3	Ph.D Programmes	13
3.4	TRFs and PDFs	13

### 4 Academic Departments

4.1	Department of Applied Chemistry	15
4.2	Department of Applied Mathematics	20
4.3	Department of Applied Physics	24
4.4	Department of Biotechnology	34
4.5	Department of Civil Engineering	45
4.6	Department of Computer Science and Engineering	48
4.7	Delhi School of Management	52
4.8	Department of Electronics and Communication Engineering	55
4.9	Department of Electrical Engineering	62
4.10	Department of Environmental Engineering	71
4.11	Department of Humanities	74
4.12	Department of Mechanical, Production & Industrial Engineering	80

<b>5</b>	<b>Centres and Other Units</b>	
5.1	TIFAC-Core	85
5.2	Solar Energy Centre	91
5.3	Kitchen Waste Plant	92
5.4	University Computer Centre	93
5.5	Central Library	94
5.6	Centres for Advanced Studies & Research in Automotive Engineering	96
<b>6</b>	<b>University Accounts</b>	
6.1	Balance sheet	99
6.2	Details of Plan Expenditure	100
6.3	Income & Expenditure	106
<b>7</b>	<b>Sponsored Research, Consultancy and Projects</b>	
7.1	Sponsored Projects	107
7.2	Consultancy Projects	111
7.3	TEQIP II Project	112
7.4	MOU Details	118
<b>8</b>	<b>Student Amenities and Facilities</b>	
8.1	Students Welfare Societies	119
8.2	Society of Automation Engineers (SAE)	120
8.3	National Service Scheme (NSS)	122
8.4	Cultural Council	124
8.5	Training and Placement	128
<b>9</b>	<b>Central Facilities</b>	
9.1	Auditorium	133
9.2	Sports and Gymnasium	133
9.3	Health Centre	133
9.4	Transport Office	134
9.5	Estate and Work	134
9.6	Purchase Office	148
<b>10</b>	<b>Other Facility</b>	
10.1	EDUSAT	149
<b>11</b>	<b>Annexure</b>	
	Research Publications	151

## ANNUAL REPORT : AT A GLANCE 2014-15

<b>DEPARTMENTS/CENTRES/UNITS</b>	
Academic Departments/Centres	12
Centres of Excellence	01
Service Centres/Other Units	06

<b>GRANTS</b>	
<b>Govt. of NCT of Delhi</b>	
Plan Grant	<b>57.00 crore</b>
UGC	<b>2.80 crore</b>
TEQIP	<b>6.25 crore</b>
<b>Total</b>	<b>66.05 crore</b>

<b>STUDENTS ADMITTED</b>	
B.Tech.	1699
PG Degree	551
Research Scholars	90
<b>Total</b>	<b>2340</b>

<b>STUDENTS STRENGTH</b>	
B.Tech.	6159
PG Degree	1718
Research Scholars	385
<b>Total</b>	<b>8262</b>

<b>NUMBER OF DEGREES AWARDED</b>	
B.Tech	1245
PG Degree	712
Ph.D.	01
<b>Total</b>	<b>1958</b>

<b>FACULTY/STAFF STRENGTH</b>	
Faculty in Position	230
Non-Teaching Staff in position	211
<b>Total</b>	<b>441</b>

<b>RESEARCH PAPERS</b>	
Journals/ Conference/Symposia	578
<b>Total</b>	<b>578</b>

<b>CONSULTANCY PROJECTS</b>	
Number of Projects	12
Outlay (Lacs of Rs.)	449.35

<b>SPONSORED RESEARCH PROJECTS</b>	
Number of Projects	37
Outlay (Lacs of Rs.)	1847.92





## Vice Chancellor's Report



The Delhi Technological University (Erstwhile Delhi College of Engineering) has a glorious past of more than 74 years and has been widely acclaimed for its excellence in education, research and training. DCE's transformation from a Polytechnic to a college and then finally to a University had taken a beautiful shape and the autonomy granted to it, spurred progress in several uncharted directions. The various transformations helped us to remain young and energetic in our academic excellence endeavour.

With a history of over 74 years in providing technical education within a modern educational environment, the Delhi Technological University (DTU), is strongly identified with engineering education in India. DTU is fully networked with industry, as well as academic/scientific community. It has partnerships with leading universities and industries in India and abroad. DTU has the alma matter of highly distinguished world class engineers and technologists, which include the father of Pentium Chip Vinod Dham, Promod Haque, the world's known venture capitalist, Raj Soin, the avionics

wizards of US and a top ranking techno entrepreneur of Ohio, Durgadas Agrawal, the renowned techno-entrepreneur of Houston, to name a few.

The DTU has the honour of being the pioneer of quality technical education, research and innovation. Our institution has kept the quality of education and research as its main focus of academic and professional activities and this has earned us a high reputation in the country and abroad as is evident from DTU figuring several times among the top ten engineering institutions in the country along with the IITs.

Delhi Technological University, has taken several new initiatives in restructuring and strengthening its academic programmes at postgraduate and undergraduate levels during the years. Introduction of new programs at the postgraduate level and a focus on research and development are the crucial factors that have helped in the recognition of DTU as a premier university for higher learning. The university has emerged as the leading technological university for technology education and research in the country. DTU continues to

be the most sought-after destination for undergraduate and postgraduate studies and attracts the top performers in national examinations such as JEE (Mains) and GATE. The fact lies that DTU is preferred over many Top ranked NITs and IITs as a destination of young buddies to fulfil their academic pursuit. Similar trends are observed for the candidates qualifying other examinations as well.

We are aware of the enhanced expectations of student community and public at large and strive to live up to our image that has been so persistently built up over the years. We at DTU are committed to achieve our goals to create an environment in which we can nurture our students to be knowledgeably capable, innovative and trained to work unceasingly to serve the nation and society. The development of the nation depends upon their technical competence and work ethics that they have imbibed during their formative years as students. We are focused to keep pace with the continual progress in the fields of science and technology.

The characteristics of the student population at the university are undergoing a significant change in the recent times. The university has responded pragmatically to the large increase in its intake by substantially reorienting itself academically, technologically and administratively and using it as a great opportunity to retain its leadership in engineering education in the country.

The undergraduate curriculum for engineering education was designed in such ways that it introduced a new rigor and methodology in undergraduate teaching, laying emphasis on developing analytical skills and challenging the students intellectually.

A special M.Tech. Programme in Power Electronics in Electrical Engineering Department is offered to employees of Delhi Metro Rail Corporation from the year 2014-2015.

## **Admissions**

In the year 2014-2015, with the initiative of Government of NCT of Delhi, admission to the B.Tech programmes at Delhi Technological University was conducted through common counselling as “Joint Admission Counselling, Delhi” along with two other technical universities/institutes viz. Indira Gandhi Delhi Technical University for Women (IGDTUW) and Indraprastha Institute of Information Technology Delhi (IIITD). In this way, total 1532 admissions to B.Tech. program at DTU were made through common counselling. It is a matter of pride that DTU has also offered 02 seats (supernumerary) to Prime Minister’s J&K Special Scholarship Scheme for 2014-15 sponsored by AICTE under MHRD funds. The scheme envisages building capacities of the youth of J&K to enable them to compete in the normal course in different parts of India. The admission to the category PIO/FN/NRI has been conducted through DASA.

The Ph.D. student strength has steadily been increased in the last 3 years. Presently, University is offering 87 Ph.D assistance ship besides JRF, NET and other sponsored category. All students involved in research in the University are given the opportunity to interact with research community at the national and international level by providing funds to attend international conferences through TEQIP-II. While the research scholars are the primary beneficiary of this scheme, a small number of other PG students and UG students have also been benefited. The

total number of Undergraduate students and Graduate students admitted in 2014-2015 were 1699 and 551 respectively.

### **Academic Infrastructure**

Department of Applied Chemistry was established as a subsidiary department to cater to the needs of engineering students. It continued as a helping department at old St. Stephens College at Kashmere Gate till 1986 when a new postgraduate course of M.E Polymer Technology was started in the department after the due approvals of then AICTE and Delhi University. In 1997, the department of Applied Chemistry was shifted to the new campus of Delhi College of Engineering. In 1998, the department had started a new four year course of B.E Polymer Science and Chemical Technology. The Department has 14 well – established laboratories in Applied Chemistry, Polymer Science and Chemical Technology along with two research laboratories and one CAD lab. Teachers and students of the Department often go abroad for presenting research papers in seminars/conferences/collaborations etc.

Department of Applied Mathematics offer courses to undergraduate and postgraduate students of various engineering disciplines. The syllabi have been designed in the areas of Applied Mathematics, Computational Techniques and Statistics to impart sound knowledge of various mathematical tools and their applications in the engineering disciplines. Research Activities & Full Time Ph.D. Programs A few full time Ph.D. scholarships are available in the above fields.

Applied Physics Department was established to support academic program offered by all engineering departments. Applied Physics Department is a major department of Delhi Technological

University providing cutting edge research, innovation and education in the emerging areas of science and technology. As a result, this department offers B.Tech. in Engineering Physics, M.Tech in Microwave and Optical Communication Engineering , M.Tech. Nanoscience and Technology and M.Tech. Nuclear Science and Engineering

Department of Biotechnology, founded in 2004 with a vision to make an impact through research and technology based training, is successfully conducting undergraduate and postgraduate programmes in various disciplines. The Department is running various programmes in Biotechnology, Bioinformatics, Biomedical Engineering and Industrial Biotechnology. Department of Biotechnology is also running research oriented Ph.D programme. The department has undertaken sponsored projects funded by ICMR, CSIR, DST, UGC, etc. The department has 10 state-of-the-art laboratories. The department conducts annual technical festival KARYON in which the students and experts from industry participate in academic deliberations to enhance Industry- University interactions.

Department of Civil Engineering offers one B. Tech Programme in civil engineering and M. Tech Programmes in Hydraulics and Flood Control, Structural Engineering, and Geotechnical Engineering. The department also provides opportunity to working engineers for upgrading their qualification under continuing education programme on part time basis, these programmes are: M. Tech. in daytime, and B.Tech. in evening time. The department is well equipped with laboratories related to Structure, Concrete Testing, Soil Mechanics, Highway Engineering, Experimental Stress Analysis, Computational Mechanics, Education Technology, Photogrammetric and GIS facilities, Environmental Engineering and

Hydraulics Laboratories. The department of Civil Engineering lays greater emphasis on quality research for industrial design and development. Excellent facilities are available to conduct research for the award of Ph.D. degree in the disciplines of Structural Engineering, Structural Dynamics, Earthquake Engineering, Water Resources Engineering, Environmental Engineering, Experimental Mechanics, Geotechnical Engineering and other interdisciplinary areas.

Department of Computer Science and Engineering endeavors to provide the thrill of a corporate R&D environment with a planned focus on industrially relevant projects and technology incubation. The curriculum defined, lays greater emphasis on design principles and development of system software for operating systems, database management systems, data mining, computer graphics and networks. Department has developed state-of-the-art laboratories in the various fields of Computer Engineering-Computer Architecture Lab, Network Lab, Web Designing Lab, Computation and programming Lab, Operating System Lab, Artificial Intelligence Lab and many others. Currently, the department offers doctorate, post-graduate & under-graduate courses in fields of Computer Engineering; Information Technology & Software Engineering & Technology. The department also has an active student chapter of Computer Society of India (CSI) and contributes significantly in professional activities undertaken by IEEE and IET students chapters.

Delhi School of Management (DSM) was established in 2009 with the upgradation of Delhi College of Engineering into Delhi Technological University. DSM was established with a vision of inculcating a penchant for innovation, research, and

experimentation in the aspiring managers. DSM aims at extending the seven-decade long legacy of DCE by incubating and developing techno-managers, who are adept at identifying pertinent and critical business problems and apply their technical skills and competencies in solving those issues.

Department of Electronics and Communication Engineering has seen considerable growth since its inception in 1976. This department offers UG/ PG and Ph.D programmes. Currently the Department has 11 well equipped curriculum laboratories and 4 research laboratories. Frontal areas of the advance level research in the department are Micro Strip Antenna Design, Sensor Networks, Image Processing and Analog and Digital System Design. The department regularly organizes seminars, workshops and training programs to keep pace with the new developments and recent trends in relevant technologies. The department plans to have center of excellence in the field of robotics, machine vision, medical electronics and VLSI in collaboration with industry. The department is planning to impart training program in cutting edge technologies for creating a talent hub to meet industrial manpower needs. The department is striving to utilize the power of brilliant minds at DTU and its networked institution/research laboratories for development of future electronics.

Department of Electrical Engineering has grown significantly since its inception in 1941. The goal of the department is to provide quality education at undergraduate and postgraduate levels and undertake cutting edge research in various areas of Electrical Engineering. The department has an annual intake of 150 and 100 students in the B.Tech programmes in Electrical Engineering and Electrical & Electronics

Engineering, respectively. The department is also offering B.Tech (Evening) with an intake of 46 students. At the post graduate level, the department is offering two M.Tech programmes in Control and Instrumentation and Power Systems with a combined intake of 48 students. The department is also running part time (evening) PG program in Power Electronic Systems for DMRC (under MOU) since 2012- 13. In addition to the above, the department offers regular Ph.D programmes in various areas of specialization in Electrical Engineering. These include Intelligent Control, Optimization, Power Quality, Renewable Energy Sources, Smart Grids, Power System Operation and Control, Power System Dynamics and Stability, Flexible AC Transmission (FACTS), Electric Drives and Hybrid Electric Vehicles. The department currently has 17 laboratories equipped with state-of-the art equipment and latest version of latest software platforms. Currently, sponsored projects from the DST and the AICTE amounting to more than Rs. 1.3 crores are underway in the department.

Department of Environmental Engineering was created in February-2012. The department at present is offering B.Tech, M.Tech and Ph.D programs. The department provides opportunity to working engineers for their academic up gradation by offering part time PG course. Department is actively involved in research and development. Department has well established laboratories in all the areas of environmental engineering.

Department of Humanities was established in the year 1941 with a view to impart necessary soft skills to the graduating engineering students. Initially courses in English, Economics and Accountancy were taught to the students. With the growing impetus on new courses like Econometrics,

Gender and Technology and timely revision of syllabi of subjects like Engineering Economics and Communication Skills, a crossover between technical and non-technical aspects of learning is facilitated. The main objective is to give the students a comprehensive idea of the competition and the emerging work culture to make them confident and market ready. To sensitize students towards technological need of poor and deprived for inclusive growth, B.Tech students of all the branches are compulsorily asked to visit slum and prepare an assignment on the problems of slum and how science and engineering can be used to improve life.

Department of Mechanical, Production & Industrial Engineering has seen considerable growth since its inception in 1941 with the intake rising from 30 to 328 (186 for Mechanical, 48 for Production & Industrial Engineering, and 94 for Automobile Engineering). The department also offers Post Graduate courses with specialization in Thermal Engineering, Production Engineering, Computational Design and Renewable Energy Technology. The Ph.D. Programs in all fields of Mechanical Engineering are also offered. In addition, the department also offers four years' B. Tech. Programme for working diploma holder. The department possesses modern laboratories equipped with latest experimental set-ups and research facilities for instrumentation, experimental stress analysis, strength of materials, fluid mechanics, IC-engines, automotive engineering, robotics, heat transfer, solar energy, flexible manufacturing system, computational fluid dynamics supported by software like view-flex, CAD-CAM and i.e. engine design. Cad Lab has softwares like NX-LAD, NXCAM, AUTOCAD Inventor, Catia, Techomatix, Abacus, Ladino, NX-Nastran, Hyper mesh, Hyper-works, MDADAMS,

Dynaform etc. Fluent software is available in the CFD Centre. Industrial Engineering lab has software: SPSS, Witness and Lingo-7. The department has developed eco-friendly technology using alternate refrigerants in the RAC lab for re-directing global warming and Ozone depletion. The research and development is facilitated by NT enabled workstations and competitive robots with digital controller. In addition, microprocessors, micro controllers, PIC, spectrum analyzer and logic analyzer are available for project work. The department has a modern workshop equipped with latest machinery in Fitting and Machine Shop. The facility of welding shop comprises of pulse TIG, ultrasonic welding and submerged arc welding. The students are given hands on experience on CNC Drilling, CNC Lathe Machine EDM & wire EDM.

### **Training and Placement of Students**

DTU because of the quality of its students and strong corporate relations entered the 2014-15 placement seasons with confidence. A total of 253 organizations have taken part in campus placements and have offered 1592 jobs. Students from Bachelor of Technology (B.Tech.), Master of Technology (M.Tech.), Master of Business Administration (MBA) programs in various fields of engineering and technology, participated in the placement process.

The highest salary in the campus placements for graduating batch of 2015 has gone up to \$108,000 p.a. by EPIC, US based software development MNC, while the domestic salary of Rs. 25 lakhs p.a. was offered by Amazon. Background of companies visiting the campus included core engineering industries, manufacturing industries, oil Industries and also IT and IT enabled services especially e-commerce start ups, finance, marketing, consultancy

firms, R & D laboratories and even NGOs. Major recruiters of the year includes Schlumberger, Amazon, Google, Microsoft, EPIC, Maruti Suzuki, Tata Motors, Hyundai, Honda, Bajaj, Mercedes Daimler, Oracle, Samsung, McKinsey, Deloitte, Flipkart, Jabong, Snapdeal, Adobe, Reliance, Godrej, Freescale, Sandisk, Larsen and Toubro, United Health Group, Bharti Airtel, Havels, TPDDL, Toshiba Japan, Turner Construction and ITC among others. Some government organizations such as C-DOT, Indraprastha Gas Limited, Indian Army, TRAI, TCIL, Indian Navy etc also visited the campus and recruited students.

### **Infrastructure Development**

In order to cope with the increased need of the students w.r.t their hostels, class rooms and laboratories, a proposal for construction of buildings under 'Phase-II Construction at DTU Campus' at a cost of Rs 256 Crore has been submitted to the government and it covers new constructions of boys and girls hostels, academic blocks for the newly added UG and PG programs, centre for innovation and techno-entrepreneurship.

Currently, 2 multipurpose halls are nearing completion, 4 SPS class rooms of 120 capacity each, and two halls of 225 student capacity are almost ready for possession. One nuclear science laboratory in the department of Physics and One in Biotechnology has been completed now. The construction of one disaster management laboratory in Civil and one library block in Mechanical is likely to be completed soon.

### **EDUSAT Network**

EDUSAT, a satellite specially designed for facilitating distance education in India has been launched in September 2004. It is planned to setup high capacity satellite based interactive network to meet the requirements of various user

in education sector across the country and to run it as an application project for implementing distance education. Live and recorded lectures are broadcasted on the daily basis from the EDUSAT to different remote sites. The students of different institutes can interact with the teacher and ask their queries related to the subject simultaneously other remote sites can interact. A large number of recorded lectures are available and it is being telecasted time to time. Complete courses on different subjects taught by renowned faculties of I.I.T, Delhi are also available in the HUB. Live as well as recorded lectures are telecasted on the daily basis from the HUB to different Engineering Institutes, Management Institutes, Diploma Institutes, Industrial Training Institutes of Delhi state. Lectures are being telecasted from EDUSAT delivered by experts and renowned faculty from educational institutes/industries. Apart from that lectures/conferences of renowned scientists and eminent experts from different specialization are being recorded under "Distinguish Public Lecture Series: by EDUSAT and all are telecasted through network.

### **Sports and Gymnasium**

The students of Delhi Technological University are provided with excellent facilities are encouraged to take part in the tournaments held in and around NCR Delhi, particularly, engineering institutions. Delhi Technological University is having 450 m track, ground for Football, Hockey, Cricket, two courts for Volley Ball, two courts for Basketball, three courts for Tennis and five courts for Badminton. The Table Tennis rooms, Chess rooms, Carom rooms and Gyms are also available in the each hostel of the DTU campus. The sports council of DTU has organized several tournaments during 2014 - 15 academic sessions. The

university has well equipped gymnasium with the modern equipments. The university students, faculty and staffs utilise this facility. There are two full gymnasium in the university, one is situated in the sports ground and yet another is situated in the faculty residential area which is generally used by the girls students also.

### **Health Centre**

The DTU is having a modest Health Centre manned by well experience medical Doctors. Services of five medical practitioners are available to the students through the day and evening. The university health centre is also visited by specialized medical practitioners for ENT, Eye, Dental care etc. for expert advice and treatment. The university is also having tie up with nearby leading hospitals for emergency. A new sports medicine-cum-physiotherapy centre has been added to provide the necessary expert advice.

### **Students Technical Societies and Achievements**

The university not only concentrates on academic activities, but also places an emphasis on an all round development of its students. The Institute has therefore, created excellent infrastructure for a variety of co-curricular and extra-curricular activities and various technical societies are functioning in the University under the faculty advisors and mentors. The DTUSA along with its different technical societies of various department generally plan, organize and manage the various student activities throughout the year. The various societies working in the University are:

Computer society of India, DTU Chapter, The Institution of Engineering and Technology, IET, DTU Chapter, Robotics Society, SR-DTU, IEEE, DTU, Society of Manufacturing

Engineering, DTU, SAE, DTU Chapter, ASME, DTU Chapter, International Society for Optical Engineering (SPIE), Society for Experimental Mechanics (SEM), American Society of Heating, Refrigerating and Air-Conditioning Engineers (ASHRAE), DTU Chapter, Society of Plastics Engineers (SPE) DTU, American Society of Civil Engineers (ASCE), DTU Chapter and Society for Environmental Engineering, DTU

The various societies have organised their annual function in Jan-Feb, 2015 and later they have also organised the Technical festival from 13-15 February, 2015. The national level event was organised by ASME, DTU Chapter as “ ASME Human Powered Vehicle Challenge-2015”. ASCE-International President Dr. R.D. Stevens visited Delhi Technological University on 5th March 2015 along with delegates to explore the areas of mutual interest among the DTU and ASCE international student chapter. During a well attended address he praised the engineering activities and talked about the report cards prepared by ASCE.

ASME Human Powered Vehicle Challenge India 2015 at DTU New Delhi, January 21, 2015 Delhi Technological University continued its streak of excellence in technological endeavours by organizing the event. The ASME organized a national level competition in collaboration with Delhi Technological University as hosts starting from 16th January. Top engineering students from across India rolled out new concept designs in pedal powered transportation. With 55 teams competing from colleges across India including the IIT's, NIT's in this year's competition. The race was flagged off by Chief Judge Mr. Nathan Taylor. It is a symbol of DTU's technical strength that a team by 3rd year students of DTU became the overall winners

of the 2015 HPVC India by ranking 1st, 5th and 3rd in design, drag and endurance event respectively. The vehicle developed by the DTU team was able to achieve a top speed of 60km/hr based solely on human power. Delhi Technological University students continued to shine the University name by demonstrating both technical and managerial adroitness having both in organisation and having won such a prestigious competition.

The SAE World Congress & Exhibition 2014 was held in the historic city of Detroit, Michigan, USA. The city was the epicenter for industrial revolution in the automotive world and was the birthplace for historic companies like Ford, General Motors, Chrysler, Tesla and many more. The congress was a conclave of automotive engineers, industry experts, management teams, engineers, executives, and students. The World Congress was held from April 8-10, 2014 in Detroit, MI.

### **National Service Scheme (NSS)**

The overall aim of NSS-DTU is to give an extended dimension to the higher education system and orient the students towards community service while they are studying in the institution, more precisely, to establish a meaningful linkage between the campus and the community so that their interaction with the common villagers and slum dwellers will expose the students to the harsh realities of poverty-stricken life and bring about a change in their social perception. Some of the highlights of NSS are as below:

NSS Cleanathon: In the wake of recent developments in the field of cleanliness and hygiene Prime Minister, Shri Narendra Modi, NSS DTU organized cleanliness drive in shahbad village, Delhi under the guidance of Registrar and Faculty Advisor,



NSS DTU. The cleanathon was conducted over a span of two days of which the first day, 11th October 2014, focused on cleaning a park and few streets in the area with 40 volunteers. This was followed by an awareness drive on 12th October 2014. NSS has adopted 5 villages of Delhi for their cleanliness drive.

NSS Organised a NSS camp from 25 December, 2014-1st January, 2015 at Village Shikarpur, Muzaffarnagar (U.P.).

Clean Yamuna Drive: NSS Organised a clean Yamuna Drive on 13th April, 2015 at Wazirabad Yamuna Ghats.

Donation Drives: In the wake of joy of giving a week-long cloth donation drive was conducted during the month of October 2014 in the DTU campus itself. In this campaign the students were urged to donate their old clothes for the needy. These clothes were then donated to the NGO- Centre for Social Responsibility and Leadership (CSRL) for distribution in Uttarakhand.

NSS-DTU team got the opportunity to pursue summer internship for social welfare in Prachi Education Society (PES) from July 14, 2014 to August 1, 2014. Region covered: Slums of Chhatarpur, near Mandi Gaon, New Delhi. The team surveyed each house of Shanti Colony, Jawahar Colony, Bapu and Sapera Basti and collected data on number of girls below 18, their education, sanitary and health problems. This gave them an account of the daily problems that slum dwellers face. Major problems include - water scarcity, sanitation- toilets and waste disposal, transportation, proper housing, basic civilian rights, education, gender inequality, under age marriage and poor quality of education in schools around the area.

Drug Awareness Programme: Youth is one of the biggest strength of any progressive country and India too has expectations from its youth. But what happens if suddenly some uninvited & undesirable thing starts damaging. The power of youth diverts them from the right path and forces them to a place from where they can never get back in an easy manner. Yes, we have such kind of problems around us and we are getting falling to them easily and that is "DRUGS". To make sure that no student may fall in darkness of this dangerous thing, NSS DTU organised a drug awareness programme at Dr B R Ambedkar Auditorium, in August collaboration with Narcotics Control Bureau, Ministry of Home Affairs, Govt. of India. The programme was graced by Shri Rohit Sharma, Zonal Director NCB Delhi Unit, and Col.(Retd.) Neeraj Suri, Registrar Delhi Technological University. The keynote address was delivered by Dr Yatanpal Singh, Psychiatry Department All India Institute of Medical Sciences. The event witnessed a huge audience including the volunteers, other students and faculty members.

Teach INDIA Programme: This programme aims to teach every person who wants to learn. To pursue this purpose, NSS DTU feels proud to be a part of The Times of India initiative "Teach India Programme-English for Employability". Study materials are provided by TOI group and quality teaching is ensured by NSS volunteers. The classes are held on daily basis at evening for two hours. Apart from tenses and verbs, volunteers also teach them about some practical things like business cards, replying and sending an email, how to greet customers in shop and many more real life scenarios. There are orphanage visits by NSS team regularly to teach the orphan students.

## **TEQIP – II : A World Bank Project**

TEQIP-II Project started in DTU in July 2013 with an overall funding of Rs. 12.5 Crore. The main objectives of TEQIP-II project at DTU are: to strengthen PG education, research and innovation, to promote industry partnership in education and research, to build quality faculty capacity. The details of the achievements of various objectives are given in the report.

## **Outreach Programmes**

CEP (Continuing Education Programme), QIP (Quality Improvement Programme), CDP (Curriculum Development Programme) and FDP (Faculty Development Program) activities continued to attract wide interest from industry, academia and from our own faculty. The CEP courses at DTU, aimed at working professionals, sustained its significant activity despite the challenging industrial scenario prevailing throughout this period. The FDP programs, sponsored by TEQIP-II at DTU are generally meant for teachers working in universities and are fully funded by TEQIP-II. These courses were very popular, and a large number of college teachers were benefited from them. With a view to having more interaction between industry professionals and teachers, special attempts were made to open up the FDP programs to college teachers and to industry professionals. And this has been found to be a very worthwhile experience by the teachers and the industry personnel.

## **National and International Collaboration**

The DTU has signed 18 MoU with various universities / institutions/ organizations. This year the DTU has signed two MoUs with the following institutes/universities/ organizations for academic interactions, students and faculty exchange, and collaborative R&D work namely University

of South Florida, U.S.A, and Chaoyang University of Technology, Taiwan. Also the MoU with TCS is renewed.

## **Convocation**

Delhi Technological University (DTU) organized second convocation on November 12, 2014. His Excellency Shri Najeeb Jung, Lt. Governor of Govt of Delhi and Chancellor of DTU presided over the ceremony. Shri Mangu Singh, Managing Director of Delhi Metro Rail Corporation (DMRC) was the chief guest and delivered the convocation address. Shri Anindo Majumdar, IAS, Principal Secretary, Training and Technical Education, Govt of Delhi was the guest of honor.

His Excellency Lt. Governor and Chancellor of university Shri Najeeb Jung congratulated all degree recipients of the university and motivated the students to serve the country. This country needs services of bright students like them to take the country to further heights. He awarded Chancellor's Medals to overall topper of under graduate and post graduate student of each batch.

In the convocation address Shri Mangu Singh, Managing Director of Delhi Metro Rail Corporation, said, "The first step for achieving "Make In India" campaign launched by Hon'ble Prime Minister of India starts with your brilliant vision, innovation and intellectual property you generate and its sustenance bank upon your actions and deeds in this globally competitive world". He motivated the students to achieve the same by building competency and practicing punctuality along with discipline and integrity.

In the convocation-2014, 72 medals were awarded to the graduates and post graduates students. A total of 1947 students of Delhi Technological University were

conferred degree, which includes one Ph.D., 592 M. Tech., 120 M. B.A. 1172 B.Tech. 73 B.Tech. (Evening). In addition to this 1460 degrees were distributed to graduated of Delhi College of Engineering.

The president of Alumini association DCE-DTU, Shri Karnal Singh, IPS, along with other alumni members graced the occasion.

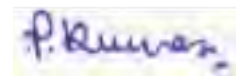
### **Acknowledgment**

The DTU places on record its grateful acknowledgment of the financial support provided by GNCTD, MHRD, DST, AICTE, UGC, CSIR, DBT and DRDO. Sincere thanks are due to all faculty members, employees, students and alumni of the university for their devotion and hard work in taking the DTU to greater heights. With their continued support, it is hoped that DTU will continue to contribute significantly to the national cause of providing excellent technical education.

I am deeply indebted to the Hon'ble Chancellor Shri Najeeb Jung, Lieutenant Governor of NCT of Delhi, Hon'ble Shri Arvind Kejriwal, Chief Minister, Hon'ble Shri Manish Sisodia, Deputy Chief, Minister, and Minister of Higher and Technical Education, for their guidance, support and co-operation in making DTU move towards attaining its goal. I take this opportunity to thank Chief Secretary, Principal Secretary (Finance) and Secretary (Higher Education), Director TTE, for their continued cooperation in providing grants and for their interest in the development of DTU. .

I place on record my sincere gratitude to the Members of Board of Management, Finance Committee, Planing Board, Academic Council and other Committees of the DTU for their valuable contributions towards making DTU to realize its mission. I compliment the Editorial team of the Annual Report for their untiring efforts in compiling this report.

With best wishes.



(Pradeep Kumar)



Convocation-2014



Lt. Governor Shri Najeeb Jung awarding Chancellor's Medal





MOU Signed between USF and DTU



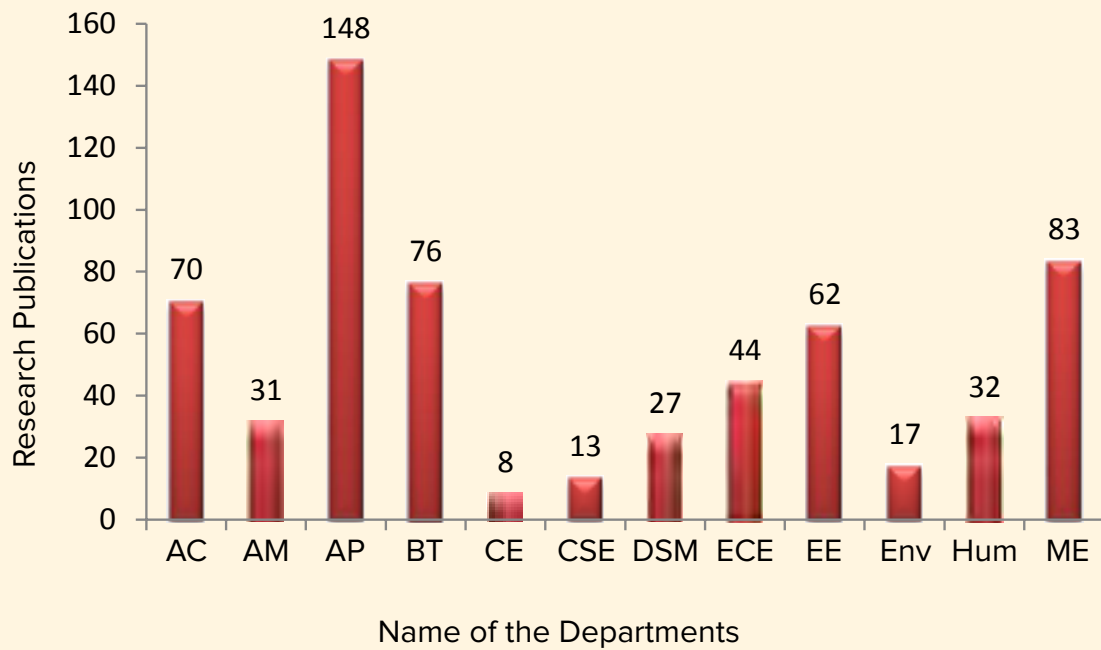
Inauguration of Technical Festival 2015

## Ranking of India's best Engineering College/Institutions

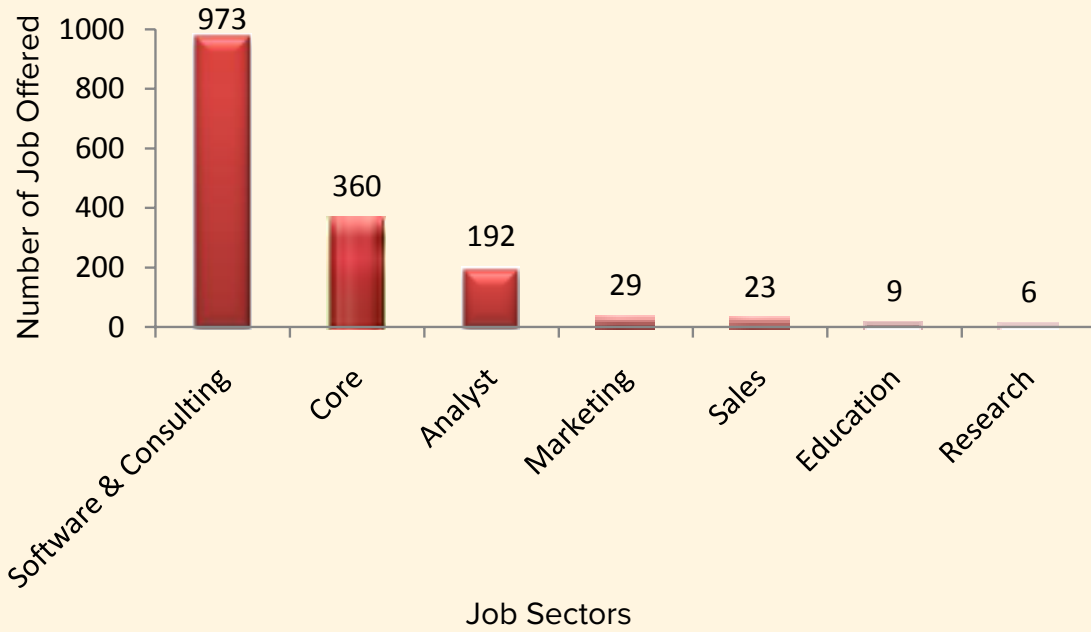
1. IIT, Kanpur
2. IIT Kharagpur
3. BITS Pilani
4. IIT, BHU
- 5. DTU, Delhi**
6. VIT
7. IIT, Guwahati



## Research Publication by the Departments in 2014-2015



## Sector Wise Job Offers in 2014-2015



## Sponsored & Consultancy Projects

