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1.0 INTRODUCTION

National Institute of Technology Jalandhar was established in the year 1987 as Regional Engineering College and was given the status of National Institute of Technology by the Government of India under the control of Ministry of Human Resource Development, New Delhi on October 17, 2002. As National Institute of Technology, the institute has a responsibility of providing high quality education in Engineering and Technology to produce competent technical manpower for the country. The institute offers B Tech program in twelve disciplines of Engineering and Technology along with research programs leading to M.Sc, M Tech and Ph D. The institute acquires a national character having 50% student intake from the State of Punjab and the rest from other states/union territories of the country.

1.1 Mission Statement

To become a leading and unique institution of higher learning, offering state-of-the-art education, research and training in engineering and technology to students who are able and eager to become change agents for the industrial and economic progress of the nation. To nurture and sustain an academic ambience conducive to the development and growth of committed professionals for sustainable development of the nation and to accomplish its integration into the global economy.

1.2 Objectives

To build a rich intellectual potential embedded with interdisciplinary knowledge, human values and professional ethics among the youth, aspirant of becoming engineers and technologists, so that they contribute to society and create a niche for a successful career

1.3 Education System

- To develop technical human resource of excellence suitable for global requirements.
- To ensure good quality academic and industrial research programmes in different areas of engineering, technology and sciences.
- To generate industry-institute synergy for shaping technical education to meet the requirement of industry.

1.4 New Initiatives

- Restructuring of existing non faculty cadre has been implemented.
- The process of recruitment of vacant post of non teaching employees has been initiated.
- Accreditation process for various departments is in process.

2.0 AN OVERVIEW

2.1 Historical Background

National Institute of Technology Jalandhar was established in the year 1987 as Regional Engineering College and was given the status of National Institute of Technology (Deemed to be University) by the Government of India under the control of Ministry of Human Resource Development, New Delhi on October 17, 2002. Since its attaining the status of National Institute of Technology in October 2002, the institute is marching ahead and building on its strengths like modernizing the institutes laboratories, upgrading the faculty sponsoring them for higher studies & short terms training programmes, strengthening interface with industries leading to more and more jobs offers for our students, modernization of the institute library, planning the new institute buildings and so on.

2.2 Location

Jalandhar is an important railway station on Delhi- Amritsar sections of Northern Railways and is situated at about 370 kms north of Delhi. It is also well connected through road route (situated at NH-1). It is renowned industrial centre for sports goods, leather goods and hand tools. The institute is located on GT road, Bye-Pass (leading towards, Amritsar). It is situated at a distance of about 12 kms from Jalandhar Bus Stand, 10 kms from Jalandhar city Railway station and 15 kms from Jalandhar cantt. Railway station and is well accessible through local buses and auto-rikshaw.

2.3 Campus

The institute campus is spread over an area of 154 acres on picturesque land scape. It is a harmonious mix of natural beauty with state of art architecture. The campus is fully residential and having sufficient number of residents for faculty and staff and hostels for students. There are eight numbers of boy's hostels and three number of girls hostels. Besides this the campus is also having a cricket field, a football ground, volley ball & tennis court, badminton hall, track, table tennis tables and ancillary arrangements for sports activity. In addition to that one Table Tennis table is provided in each hostel. The campus is self contained having shopping complex, computerized Banks, Post office, Faculty Club, Students Activity Center, Guest House, Dispensary and other facilities essential for community living.

2.4 Administration

Dr B R Ambedkar National Institute of Technology, Jalandhar is an autonomous institution under the aegis of Central Government. The institute functions under the overall control and guidance of the Board of Governors, the other authorities of the institute are the Finance Committee, Building and Works Committee and the Senate. The constitutions of the Board of Governors, Finance Committee, Building Works and other Committees are given at Annexure 11.2, 11.3 respectively. The administration of various departments /centers in the institute is looked after by respective head of the departments/Prof-in-charge.

2.5 Academic Programs

In addition to Bachelor's programmes in Engineering, institute also offers Master's and Doctorate programmes in Engineering, Humanities & Management and Sciences. The academic programs offered by the institute are listed below:-

1. Bachelor of Technology(BTech)
2. Master of Technology (MTech)

3. Master of Technology (Part-time)
4. Master of Science(MSc)
5. Doctorate of Philosophy(PhD)
6. Doctorate of Philosophy(Part-Time)

Academic session

Odd semester 07 July, 2014 to 16th December, 2014

Even semester 06th January 2015 to 05th June, 2015

Working hours

During the period under review the institute observed the working hours as under:

Working hours 8.30 a m to 5.30 p m

(Monday to Friday)

Lunch break 12.30 p m to 1.30 p m

2.6 Courses Offered

There are twelve engineering departments three Sciences Departments and a Humanities & Management department. The courses offered are given at the section 4.1.

2.7 Admission Procedure**Under Graduate Programme**

The admission to undergraduate programmes is provided on the basis of the merit of AIEEE conducted by CBSE through the Central Counselling Board Constituted by MHRD, Government of India. The reservation policy is as per the decision of the MHRD. The eligibility for admission under the home state quota is 10+2 pass in the discipline approved by AICTE from an institution located in Punjab.

Post Graduate Programme**Ph D Programme****Ph D Programmes for Regular Candidates**

Master's degree in Engineering/Technology in relevant areas with first class or minimum 60% marks (CGPA 6.5) with valid GATE score, or Master's degree in appropriate branch of Science/Humanities/Social Sciences with first class or minimum 60% marks (CGPA 6.5) with valid GATE score or UGC/CSIR/NET qualified.

Ph D Programmes for Internal Candidates

Faculty/Technical/Scientific staff of NITJ having teaching/industrial experience of more than two years and possessing the same academic qualifications as that for PhD full time scheme is eligible to apply for PhD Programmes. A valid GATE score of UGC/CSIR fellowship is not required.

Ph D Programmes for External Candidates

External candidates specified by Industry/Institute having R & D facility recognized by DST or equivalent/NITJ with industrial experience of two years or more and having same academic qualifications as that for "Ph D programmes for regular candidates" are eligible to apply for PhD Programmes. The valid GATE score of UGC/CSIR fellowship is not required.

Ph D Programmes for Staff under Projects

The project staff working under the projects sponsored by MHRD/DST/UGC or some other government agency and coordinated by the institute's faculty as certified by the Principal Investigator/Coordinator and having the same academic qualifications as that for Ph D Full Time programme are eligible to apply for admission to Ph D Programme provided an adequate financial support for the period of Ph D degree is ensured from project employment or other sources. A valid GATE score of UGC/CSIR fellowship is not required.

2.8 Students

Detail of student's admitted during 2014-15, at section 4.3

2.9 Examination and Evaluation

The academic system at NIT, Jalandhar is framed on a credit based semester examination system. The credit system envisages a continuous evaluation of student's performance, and provides flexibility for academic progress at an optimum pace based on individual ability and convenience, subject to the constraint of the minimum requirements for continuation in the academic programme. (Details are provided under section 4.8)

2.10 Placement

Placement of final year students (2011-2015 batch)

Campus Interviews were arranged for the final year B.Tech students. A large number of reputed Industrial houses in the country visited the Institution and selected/short listed the final year students as Engineers/Management Trainees. Some of the Companies invited the students to their Corporate Offices for the interviews. (Details are provided under section 4.9)

2.11 Games and Sports

The students entering in the Institute are required to undergo the following non-credit mandatory requirements towards completion of their degree:-

1. N.S.O. (National Sports Organization)
2. N.S.S. (National Service Scheme)

The students have to opt for one of these activities based on the Enrolment procedure and their choice. A total of 100 hours of prescribed activities are to be completed after registration in the first year. In case the requirements are not met in the first year, the same shall be completed in the second year i.e. end of the 4th Semester. If a student does not obtain a satisfactory grade in the respective registered course within the first two years of his/her stay at the Institute, he/she will not be registered for the higher semester after second year.

The students will be satisfactorily allowed to register in sports activities of the institute for completing their National Sports Organization requirement in the first year. (Details are provided under section 4.6)

2.12 Staff Position**List of Faculty as on 31.03.2015**

S.No.	Name	Designation	Deptt
1.	I K Bhatt	Director	
Department of Bio Technology			
1.	Dr. A.K.Jana	Professor	Bio Tech
2.	Dr. Nitai Basak	Associate Professor	Bio Tech
Department of Chemical Engineering			
1.	Dr. M. K. Jha	Professor	Chemical
2.	Dr. Ajay Bansal	Associate Professor	Chemical
3.	Dr. Renu Gupta	Associate Professor	Chemical
4.	Dr. Poonam Gera	Associate Professor	Chemical
5.	Dr. Sangeeta Garg	Associate Professor	Chemical
6.	Dr. S. Bajpai	Associate Professor	Chemical
7.	Mr. N. K. Srivastava	Associate Professor	Chemical
8.	Ms. Rubal Preet	Assistant Professor	Chemical
9.	Dr. Jatinder Kumar	Assistant Professor	chemical
10.	Dr. Neetu Divya	Assistant Professor	Chemical
Department of Chemistry			
1.	Dr. N. C.Kothiyal	Professor	Chemistry
2.	Dr. Balbir Singh Kaith	Professor	Chemistry
3.	Dr Rajeev Jindal	Associate Professor	Chemistry
4.	Dr. Harsh Kumar Manchanda	Associate Professor	Chemistry
5.	Dr. Sangeeta Obrai	Associate Professor	Chemistry
6.	Dr. Jaspreet Kaur	Associate Professor	Chemistry
7.	Dr. Virender Singh	Assistant Professor	Chemistry
8.	Dr. Uma Shankar	Assistant Professor	Chemistry
Department of Civil Engineering			
1.	Dr. S.P.Singh	Professor	Civil Engineering
2.	Dr. A.K.Agnihotri	Professor	Civil Engineering
3.	Dr. Partap Singh	Professor	Civil Engineering
4.	Dr. A.P.Singh	Professor	Civil Engineering
5.	Mr Davinder Singh	Assistant Professor	Civil Engineering
6.	Ms Shailja Bawa	Assistant Professor	Civil Engineering
7.	Dr. Rizwan A Khan	Assistant Professor	Civil Engineering
Department of Computer Science & Engineering			

1.	Dr. Ajay Kumar Sharma	Professor	Computer Science(on deputation at NIT Delhi)
2.	Dr. A. L. Sangal	Professor	Computer Science
3.	Mr D. K. Gupta	Associate Professor	Computer Science
4.	Dr. Renu Dhir	Associate Professor	Computer Science
5.	Dr. Harsh Verma	Associate Professor	Computer Science
6.	Dr. Geeta Sikka	Associate Professor	Computer Science
7.	Mr Rahul Aggarwal	Assistant Professor	Computer Science
8.	Mrs Rajneesh Rani	Assistant Professor	Computer Science
9.	Dr. Paramvir Singh	Assistant Professor	Computer Science
Department of Electronics& Communication Engg			
1.	Dr. R. K. Sarin	Professor	Electronics & Comm Engg
2.	Dr. Mamta Khosla	Associate Professor	Electronics & Comm Engg
3.	Dr Arun Khosla	Associate Professor	Electronics & Comm Engg
4.	Dr. B. S. Saini	Associate Professor	Electronics & Comm Engg
5.	Dr. Indu Saini	Assistant Professor	Electronics & Comm Engg
6.	Dr. Ramesh Sunkaria	Assistant Professor	Electronics & Comm Engg
7.	Ms Deepti Kakkar	Assistant Professor	Electronics & Comm Engg
8.	Dr Neetu sood	Assistant Professor	Electronics & Comm Engg
9.	Dr. Ashish Raman	Assistant Professor	Electronics & Comm Engg
10.	Dr. Balwinder Raj	Assistant Professor	Electronics & Comm Engg
Department of Humanities & Management			
1.	Dr. S. J.S. Bedi	Associate Professor	Humanities & Management
2.	Dr. Jagwinder Singh	Assistant Professor	Humanities & Management
3.	Dr. Aditya Prakash	Assistant Professor	Humanities & Management
4.	Dr. Kumar Parag	Assistant Professor	Humanities & Management
Department of Industrial & Production Engineering			
1.	Dr. Arvind Bhardwaj	Professor	Industrial & Production Engg
2.	Dr. R. K. Garg	Professor	Industrial & Production Engg
3.	Mr. R. K. Bansal	Associate Professor	Industrial & Production Engg
4.	Dr. Sarabjit Singh Bal	Associate Professor	Industrial & Production Engg
5.	Dr. Vishal S. Sharma	Associate Professor	Industrial & Production Engg
6.	Dr Anish Sachdeva	Associate Professor	Industrial & Production Engg
7.	Dr. Lakhwinder Pal Singh	Assistant Professor	Industrial & Production Engg
8.	Dr. Shailendra Singh Bhadauria	Assistant Professor	Industrial & Production Engg
9.	Dr. Ajay Gupta	Associate Professor	Industrial& Production Engg
Department of Instrumentation & Control Engineering			

1.	Dr. A. K. Jain	Professor	Instrumentation & Control Engg
2.	Mr. Narinder Singh	Associate Professor	Instrumentation & Control Engg
3.	Dr. Dilbag Singh	Associate Professor	Instrumentation & Control Engg
4.	Dr. S.K.Pahuja	Associate Professor	Instrumentation & Control Engg
5.	Dr. Roop Pahuja	Associate Professor	Instrumentation & Control Engg
6.	Dr. Sheela Tiwari	Associate Professor	Instrumentation & Control Engg
7.	Dr. Kuldip Singh Nagla	Associate Professor	Instrumentation & Control Engg
8.	Mr. Rajesh Singla	Associate Professor	Instrumentation & Control Engg
Department of Mathematics			
1.	Dr.Jaspal Singh	Professor	Mathematics
2.	Dr.Sheo Kumar	Professor	Mathematics
3.	Dr. Damanjit Kaur	Associate Professor	Mathematics
4.	Dr. Geeta Partap	Associate Professor	Mathematics
5.	Mrs Alka Bhalla	Associate Professor	Mathematics
6.	Dr Raghav R. Sinha	Assistant Professor	Mathematics
Department of Mechanical Engineering			
1.	Dr. Joseph Anand Vaz	Professor	Mechanical Engineering
2.	Dr. Rakesh Chandra	Professor	Mechanical Engineering
3.	Dr. Subash Chander	Associate Professor	Mechanical Engineering
4.	Dr. R.S. Bharij	Associate Professor	Mechanical Engineering
5.	Dr. Rajeev Kukreja	Associate Professor	Mechanical Engineering
6.	Dr. Pramod Kumar	Associate Professor	Mechanical Engineering
7.	Mr. Ajay Trehan	Associate Professor	Mechanical Engineering
8.	Dr. D.K.Shukla	Associate Professor	Mechanical Engineering
9.	Dr. Raman Bedi	Associate Professor	Mechanical Engineering
10.	Mr. S. K. Tiwari	Associate Professor	Mechanical Engineering
11.	Dr. Sarbjot Singh Sandu	Assistant Professor	Mechanical Engineering
Department of Physical Edu.			
1.	Dr. Gurmej Singh	Associate Professor	Ph.Edu
Department of Physics			
1.	Dr. Arvinder Singh	Professor	Physics
2.	Dr.Sarabjit Singh	Professor	Physics
3.	Dr. H. M. Mittal	Associate Professor	Physics
4.	Dr. Jyoti Bharij	Associate Professor	Physics
5.	Dr. Rohit Mehra	Associate Professor	Physics
6.	Dr Harleen Dahiya	Assistant Professor	Physics

7.	Dr Praveen Malik	Assistant Professor	Physics
8.	Dr. Abhinav Partap Singh	Assistant Professor	Physics
9.	Dr. Arvind Kumar	Assistant Professor	Physics
Department of Textile Technology			
1.	Dr. S. Ghosh	Professor	Textile Technology
2.	Dr. J. N. Chakraborty	Professor	Textile Technology
3.	Dr. S.K.Sinha	Professor	Textile Technology
4.	Dr. A.Mukhopadhyay	Professor	Textile Technology
5.	Dr. N.Bhowmick	Associate Professor	Textile Technology
6.	Mr. M.D.Roy	Associate Professor	Textile Technology
7.	Dr. A.Chatterjee	Associate Professor	Textile Technology
8.	Dr. A.K.Chowdhary	Associate Professor	Textile Technology
9.	Dr. Vinay Midha	Associate Professor	Textile Technology
10.	Dr. Monika Sikka	Associate Professor	Textile Technology
11.	Dr.K.V.P. Singh	Assistant Professor	Textile Technology
Department of Training & Placement			
1.	Mr.Rajiv Trehan	Assistant Professor	Training &placement

Sanctioned & Filled:-**FACULTY POSITION-2014-15 as on 31.03.2015**

Total Sanctioned Strength of Faculty(category-wise)						Faculty in Position (Category- wise)**				
Post Category /	Gen.	SC	ST	OBC	Total	Gen.	SC	ST	OBC	Total
Professor	41	-----	-----	-----	41	24	-----	-----	-----	24
Associate Professor	82	-----	-----	-----	82	51	01	-----	-----	52
Assistant Professor	24	43	21	77	165	18	08	-----	04	30
Grand Total	147	43	21	77	288	93	09	-----	04	106 +1(D)

Non Teaching Staff:**Administrative Staff (as on 31.03.2015)**

Sr. No	Name	Designation
1.	Sh. Ajit Singh	Registrar
2.	Sh. Harpreet Singh	Assistant Engineer (SG-I)
3.	Sh. Anup Gupta	Assistant Engineer (SG-I)
4.	Dr. TarunSehgal	Medical Officer
5.	Ms Harsh Malhotra	Superintendent (SG-I)
6.	Sh RakeshKakkar	Superintendent (SG-I)
7.	Sh Anand Kumar	Superintendent (SG-I)
8.	Ms PoonamArora	Superintendent (SG-I)
9.	Sh ChamanLal	Superintendent (SG-I)
10.	Ms Sarita	Superintendent (SG-II)
11.	Sh Rajiv Arora	Superintendent (SG-II)
12.	Sh MilapDogra	Superintendent (SG-II)
13.	Sh Sudesh Kumar	Superintendent (SG-II)
14.	Sh Jatinder Singh	Senior Secretary (SG-II)
15.	Sh Pankaj Sharma	Senior Secretary (SG-II)
16.	Sh Sunil Kumar	Senior Superintendent
17.	Sh Bhupinder Singh	Senior Superintendent
18.	Sh. Suresh Kumar	Senior Superintendent
19.	Ms RaminderKaur	Senior Superintendent

20.	Ms Anita	Senior Superintendent
21.	Ms Anju	Senior Superintendent
22.	Sh M. S. Bhalla	Senior Superintendent
23.	Ms Sangeeta	Senior Superintendent
24.	Sh Sansar Chand	Senior Superintendent
25.	Ms Renu	Senior Superintendent
26.	Sh Rajesh Sharma	Senior Superintendent
27.	Sh Abhay Sharma	Senior Superintendent
28.	Ms Nisha Shukla	Senior Superintendent
29.	Sh Balbir Singh	Senior Secretary
30.	Sh Bhisham Arora	Senior Secretary
31.	Ms Sunita Rani-I	Senior Secretary
32.	Ms Parveen Kumari	Senior Secretary
33.	Sh Ranjit Singh	Senior Secretary
34.	Ms Kulwinder Kaur	Senior Secretary
35.	Ms Dimple	Superintendent
36.	Sh Sanjeev Kumar	Superintendent
37.	Ms Pratibha	Superintendent
38.	Ms Anshu	Superintendent
39.	Sh Harmesh K. Bhatt	Superintendent
40.	ShYash Pal	Superintendent
41.	Sh Pargat Singh	Superintendent
42.	Sh Narinder Kumar	Superintendent
43.	Ms Sunita-II	Secretary
44.	Ms Asha Rani	Secretary
45.	Sh Amarjeet Singh	Secretary
46.	Sh Hardeep Singh	Secretary
47.	Sh Jai Dev	Secretary
48.	Sh Umesh Ram	Assistant SG-II
49.	Sh Rajinder Kumar	Assistant SG-II
50.	Ms Rajni	Assistant SG-II
51.	Sh Mathura Parsad	Senior Assistant
52.	Sh Ram Pal	Senior Assistant
53.	Sh KrishanGir	Senior Assistant
54.	Sh Parvinder Kumar	Senior Assistant
55.	Ms Balwinder Kaur	Senior Assistant
56.	Sh Satnam Singh	Attendant (SG-I)
57.	Mr Tejvinder Singh	Attendant (SG-I)
58.	Mr Palvinder Singh	Attendant (SG-I)
59.	Sh Ashok Kumar	Attendant (SG-I)
60.	Sh Ram Parsad	Senior Attendant (SG-I)
61.	Ms Raj Rani	Senior Attendant (SG-I)
62.	Sh Bhullar Parsad	Senior Attendant (SG-I)
63.	Ms Sudarshna	Senior Attendant (SG-I)
64.	Sh Kamta Parsad	Senior Attendant (SG-I)
65.	Sh Santokh Kumar	Senior Attendant (SG-I)
66.	Sh Ram Nath	Senior Attendant (SG-I)
67.	Sh Ram Kewal	Senior Attendant (SG-I)
68.	Sh Jagdish Kumar	Attendant (SG-II)
69.	Ms Taro Devi	Senior Attendant
70.	Sh. Sandeep Kumar	Attendant

Technical Staff:(as on 31.03.2015)

Sr. No	Name	Designation	Department
1.	Dr SarbrinderKaur	Librarian	Central Library
2.	Ms DaljeetKaur	System Analyst	Computer Centre
3.	Sh S K Syal	SAS Assistant (SG-II)	Physical Education & Sports
4.	Sh Jaswant Singh	Technical Assistant SG-I	MechEngg.
5.	Sh SubashYadav	Technical Assistant SG-I	On Deputation at NIT, Delhi
6.	Sh Ashwani Kumar	Technical Assistant SG-I	Computer Centre
7.	Sh HemantThapar	Technical Assistant SG-I	Computer Centre
8.	Sh Manjit Singh -I	Technical Assistant SG-II	Textile
9.	Mr Navneet Sharma	Technical Assistant SG-II	Textile
10.	Sh Kamoj Kumar	Technical Assistant SG-II	Chemical
11.	Sh Vijay KumarTakhi	Technical Assistant SG-II	Instrumentation & Control Engg
12.	Sh Mahesh Kumar	Technical Assistant SG-II	Instrumentation & Control Engg
13.	Sh R K Bhardwaj	Library Information Assistant (SG-II)	Library
14.	Sh Amit Kumar	Technical Assistant SG-II	Estate Office
15.	Sh R K Shukla	Technical Assistant SG-II	Workshop
16.	Sh Sukhwinder Singh-II	Technical Assistant SG-II	Workshop
17.	Sh Bahadur Chand	Technical Assistant SG-II	Workshop
18.	Sh Gurbachan Singh	Technical Assistant SG-II	Industrial and Production Engg
19.	Sh Sukhwinder Singh-I	Technical Assistant SG-II	Workshop
20.	Sh Rachhpal Singh	Technical Assistant SG-II	Workshop
21.	Sh Ramesh Kumar	Senior Technical Assistant	Physics
22.	Mr Sukhminder Singh-I	Senior Technical Assistant	Estate Office
23.	Sh Gurpreet Singh	Senior Technical Assistant	Instrumentation & Control Engg
24.	Sh Hardial Singh	Senior Technical Assistant	Civil
25.	Sh Sunil Joshi	Senior Technical Assistant	Estate Office
26.	Sh Surinder Singh - I	Senior Technical Assistant	Chemistry
27.	Mr Ish Kumar	Senior Technical Assistant	Mechanical
28.	Sh Ravinder Singh	Senior Technical Assistant	Mechanical
29.	Sh Ravi Kumar	Senior Technical Assistant	Industrial & Production
30.	Sh Surinder Singh-II	Senior Technical Assistant	Civil
31.	Sh Gian Chand	Senior Technical Assistant	Electronics
32.	Sh Malkiat Singh - I	Senior Technical Assistant	Bio Technology
33.	Sh Jagir Singh	Senior Technical Assistant	Mechanical
34.	Sh Darshan Ram	Senior Technical Assistant	Computer Science
35.	Sh Nachhattar Singh	Technical Assistant	Chemistry
36.	Sh Paramjit Singh	Technical Assistant	Physics
37.	Sh Ajay Kumar	Technical Assistant	Instrumentation & Control Engg
38.	Mr Sukhminder Singh-II	Technical Assistant	Instrumentation & Control Engg
39.	Mr V N Khanna	Technical Assistant	ECE
40.	Sh Tirlok Kumar	Technical Assistant	Computer Centre
41.	Sh Pardeep Kumar	Technical Assistant	Computer Science
42.	Sh Gurnam Singh	Technical Assistant	Dispensary
43.	Mr Sudhir Kumar	Laboratory Assistant SG-I	Bio-Technology
44.	Mr TarsemLal	Laboratory Assistant SG-I	Chemical
45.	Sh Mohinder Pal	Laboratory Assistant SG-I	Industrial & Prod. Engg
46.	Sh Harendra Ram	Laboratory Assistant SG-I	Accounts
47.	Sh Kuldeep Singh	Laboratory Assistant SG-I	Electronics & Communication Engg
48.	Ms ManjeetKaur	Laboratory Assistant SG-I	Computer Centre
49.	Ms Bimla	Laboratory Assistant SG-I	Computer Centre
50.	Sh Vijay Kumar-I	Laboratory Assistant (SG-I)	Humanties& Management
51.	Sh Khushpal Singh	Laboratory Assistant SG-I	CivilEngg
52.	Sh Malkit Singh - II	Laboratory Assistant SG-I	Industrial & Prod. Engg
53.	Sh Gurmail Singh	Laboratory Assistant SG-I	Physics
54.	Sh Swinder Singh	Laboratory Assistant SG-I	Electronics & Communication Engg

55.	Ms Aruna Rani	Laboratory Assistant SG-I	Chemical
56.	Sh Rajinder Kumar	Laboratory Assistant SG-I	Electronics& Communication Engg
57.	Sh Harvinder Singh.	Laboratory Assistant SG-I	Bio-Technology
58.	Sh Sher Singh	Laboratory Assistant (SG-I)	Mathematics
59.	Sh Bikram Chand	Library Information Assistant	Computer Science &Engg
60.	Sh Davinder Kumar	Library Information Assistant	Library
61.	Sh Mani Ram Yadav	Library Information Assistant	Library
62.	Ms JeevanLata	Library Information Assistant	Library
63.	Sh Kulwinder Singh	Work Assistant SG-I	Library
64.	Sh RajinderPathak	Technician SG-I	EPBAX
65.	Sh Manjit Singh - II	Technician SG-I	Estate Office
66.	Sh Joga Singh	Work Assistant (SG-I)	Estate Office
67.	Sh Balkar Singh	Technician SG-II	Estate Office
68.	Sh Shinder Pal Singh	Work Assistant Carpenter SG-I	Workshop
69.	Sh Avtar Chand	Work Asstt(Driver) SG - 1	Store
70.	Sh SatishWalia	Work Asstt(Driver) SG - 1	Store
71.	ShGurdeep Singh	Work Asstt(Driver) SG - 1	Store
72.	Sh Sant Singh	Work Asstt(Driver) SG - 1	Store
73.	Sh Rajbir Singh	Work Assistant –Guest House	Guest House
74.	Ms Shakuntla	Work Assistant/Technician-II	Accounts
75.	Sh R K Mishra	Work Assistant/Technician-II	Library
76.	Sh Vijay Kumar-II	Work Assistant/Technician-II	Estate Office
77.	Sh DevDutt	Work Assistant/Technician-II	Workshop
78.	Sh Bikram Singh	Work Assistant/Technician-II	MechanicalEngg
79.	Sh A K Tiwari	Work Assistant/Technician-II	Chemical
80.	Sh Daljit Singh	Work Assistant/Technician-II	Workshop
81.	Sh Ram Kirpal	Work Assistant/Technician-II	Academic
82.	Sh Sunil Kumar	Work Assistant SG-II	Electronics & Communication Engg
83.	Sh Jaswant Singh	Work Assistant SG-II	Library
84.	Sh MadanLal	Work Assistant (SG-II)	Controller of Examination
85.	Sh Ramesh Chand	Work Assistant (SG-II)	Registrar Office
86.	Sh Ganesh Parsad	Work Assistant (SG-II)	Registrar Office
87.	Ms Soma	Work Assistant (SG-II)	Library
88.	Sh Ranbir Singh	Work Assistant (SG-II)	Central Workshop
89.	Sh KulwantRai	Laboratory Assistant (SG-II)	Computer Science
90.	Sh Arun Ram	Laboratory Assistant (SG-II)	Accounts
91.	Sh MohdAlim	Laboratory Assistant (SG-II)	Electrical Engg
92.	Sh Shiv Kumar	Lab Assistant SG-II	Chemical Engg
93.	Ms ChhinderpalKaur	Sr. Lab Assistant	Electronics & Communication Engg
94.	Sh Talwinder Singh	Technician SG-II	Estate Office
95.	Sh Tejinder Singh	Senior Work Assistant	Computer Centre
96.	Sh J. S. Rana	Senior Work Assistant	Mathematics
97.	Sh Surinder Kumar	Work Assistant	Estate Office
98.	Sh UdhayBhan	Senior Attendant (Sports)	Physical & Sports
99.	Ms Sunita Rani	Laboratory Assistant	Computer Science
100.	Sh Satish Kumar	Work Assistant	Estate Office
101.	Ms SukhjitKaur	Work Assistant(Nursing)	Dispensary

Sanctioned & Filled:-**Non-Teaching Staff -2014-15 as on 31.03.2015**

SrNo	Name of post	Sactioned Posts	Filled Posts	Vacant posts
1	Officers	29	4	25
2	Ministerial Staff	119	67	52
3	Technical Staff	169	99	70
Total		317	170	147

2.13 Notable Achievements

(Details at sections 10)

3.0 THE STAFF**3.1 Academic Staff (Teaching)**

(Details at sections 2.12)

Faculty and staff (Details at sections 2.12)**CENTRES and Other Facility** (Details at sections 9.0)**Hostel Administration**

There are 8 boys and 3 girls' hostels which are looked after by respective wardens. However the overall administration rests with the chief warden. The hostel administration is looked after by the faculty as under:

SrNo:	Wardens	Hostel No	Email
1	Dr. Anish Sachdeva	Chief Warden	asachdeva@nitj.ac.in
2	Dr. Uma Shankar	Hostel No. 1, Warden	shankeru@nitj.ac.in
3	Dr. Shailendra Badhuria	Hostel No.2, Warden	bhaduriass@nitj.ac.in
4	Dr. AditiyaParkash	Hostel No.3, Warden	prakasha@nitj.ac.in
5	Dr. Abhinav Partap Singh	Hostel No. 4, Warden	jaiswarsinghap@nitj.ac.in
6	Dr. Kumar Parag	Hostel No. 5, Warden	paragk@nitj.ac.in
7	Dr Harsh Manchanda	Hostel no. 6, Warden	manchandah@nitj.ac.in
8	Dr. Rizwan Khan	Hostel No. 7 and Dy Chief Warden	khanar@nitj.ac.in
9	Dr. Praveen Malik	Mega Boys Hostel Block 'B', Warden	malikp@nitj.ac.in
10	Prof.Ashish Raman	Mega Boys Hostel Block 'A', Warden	ramana@nitj.ac.in
11	Dr. Virender Singh	Mega Boys Hostel Block 'F', Warden	singhv@nitj.ac.in
12	Dr. JaspreetKaur	Hostel No. GH-1, Warden	rajputj@nitj.ac.in
13	Dr. Sangeeta Garg	Mega Girls Hostel, Warden	gargs@nitj.ac.in
14	Dr. Sarbrinder Kaur	Hostel No. G H-2 and Dy Chief Warden	kaur@nitj.ac.in

Dispensary

The institute health needs were looked after by the medical staff as under:

Sr. No.	Designation	Actual
1	Medical Officer	01
2	Staff Nurse	01
3	Lab Technician Health	01

Estate office

Sr. No.	Name	Designation
1	Er Harpreet Singh	Assistant Engineer (SG-I)
2	Er Anup Kumar	Assistant Engineer (SG-I)

3.2 Non-Academic Staff (Non-teaching)

Detail at Section 2.12

3.3 Training Status**3.4 Placement of staff for Academics excellence**

No provision for long leave but they are allowed for short duration courses.

4.0 TEACHING PROGRAMMES**4.1 Courses Offered****Undergraduate Programmes**

Four year Bachelor of Technology (B Tech) Programmes:

- Bio Technology
- Chemical Engineering
- Civil Engineering
- Computer Science and Engineering
- Electronics and Communication Engineering
- Electrical Engineering
- Industrial and Production Engineering
- Information and Technology
- Instrumentation and Control Engineering
- Mining Engineering
- Mechanical Engineering
- Textile Technology

Post Graduate and Research Programmes:**Two year regular M Tech Programmes**

- Chemical Engineering
- Computer Science and Engineering
- Control and Instrumentation Engineering
- Electronics and Communication Engineering
- Manufacturing Technology
- Mechanical Engineering
- Structural and Construction Engineering
- Textile Engineering and Management
- VLSI
- Information security

Three and half year Part-time M Tech Programmes

- Chemical Engineering
- Computer Science & Engineering
- Control and Instrumentation Engineering
- Industrial & Production Engineering
- Mechanical Engineering
- Structural and Construction Engineering
- Textile Technology

Two year regular M Sc Programmes

- Chemistry
- Physics
- Mathematics

Ph D Programmes

The Institute offers Ph D programmes (Part Time and Full time) in all the departments in various disciplines.

4.2 Awarding of institute medals and Degrees

Total Degree Awarded	
B Tech (Old Batches)	33
B.Tech(2010 batch)	599
B.Tech(2009 Batch)	553
M.Tech.(Full time) 2011-13	111
M Tech (Full time) 2012-14	183
M.Tech(Part time)	58
M Sc Old Batch	01
M.Sc. 2011 Batch	34
M. Sc 2012 Batch	39
Ph.D.	39

List of Topper Student**Institute Gold Medal for Highest overall CGPA BTech (2010-2014)**

S No	Roll No	Name	Branch	CGPA
1	10106065	Ritika Khanna	ECE	9.33

2010-2014

S No.	Roll NO.	Name Of Student	Branch	CGPA
1	10106065	Ritika Khanna	ECE	9.33
2	10111005	Ankita	BT	9.23

3	10106084	Sumrit Satija	ICE	9.21
4	10103004	Akanksha Sharma	CSE	9.03
5	10112016	Gaurav	CH	8.86
6	10102051	Milind Sharma	CE	8.78
7	10113071	Vikas Aggarwal	IPE	8.66
8	10110040	Rewa	TT	8.62
9	10109020	Ashish Kumar	ME	8.60

Institute Gold Medal for Highest overall CGPA B.Tech- (2009-2013)

S.No	Roll No	Name	Branch	CGPA
1	09104064	Raghav Aggarwal	EC	9.49

B.Tech- 2009-2013Batch

S.No	Roll No	Name	Branch	CGPA
1	09102047	Mayusha Khullar	CE	8.66
2	09103065	Raju Mittal	CS	9.17
3	09104064	Raghav Aggarwal	EC	9.49
4	09106051	Prashant Jain	IC	9.21
5	09109017	Arpit	ME	9.22
6	09110006	Pawandeep Singh	TT	8.72
7	09111004	Nandini	BT	8.58
8	09112040	Nidhi Talwar	CM	8.46
9	09103025	Gitesh Aggarwal	IP	9.25

List of Topper Student M.TECH- (2012-2014)

Sr No	Roll No	Name of Student	Branch	CGPA
1	12201106	Kashish Mehta	CH	9.35
2	12206116	Mudita Juneja	CI	9.22
3	12204023	Vivek Venugopal	EC	9.15
4	12203025	Surabhi Midha	CS	9.11
5	12202122	Shishir Upadhyay	SCE	8.75
6	12210113	Swati	TT	8.58
7	12204108	Priya Bansal	VLSI	9.35
8	12209014	Palani Naga Surya Harish	ME	8.62
9	12203109	Utsav Upadhyay	IS	8.46
10	12205209	Jagmeet Saini	MT	8.86

List of Topper Student M.TECH: (2011-2013) BATCH

SNo	Roll No	Name	Branch	CGPA
1	11201111	Sumit Singh Arora	CH	9.38
2	11202106	Jitendra Singh Yadav	SCE	8.58
3	11203012	Jaspal Kaur Saini	CSE	9.11
4	11204011	Prerna Saxena	ECE	9.55
5	11204102	Deepika Gupta	VLSI	8.68
6	11205207	Jaspreet Singh	MT	9.14
7	11206105	Haseena B A	CI	9.09
8	11209010	Renu Sharma	ME	8.73
9	11210001	Amandeep Kaur	TT	8.42

M.Sc Programme:(2012-2014)

S. No	Roll No	Name of Student	Branch	CGPA
1	12311113	Rupinder Kaur	Chemistry	9.00
2	12313104	Himani Gupta	Physics	8.77
3	12312102	Ishu Bhardwaj	Mathematics	8.49

MSc Programme-(2011-2013)

S. No	Roll No	Name of Student	Branch	CGPA
1	11313101	Deeksha	Physics	9.01
2	11311103	Arjuna Katal	Chemistry	8.29

4.3 Admission Statistics – UG/PG Programmes, Course wise with sex, caste break up

Students Intake- 2014-2015										
Total Sanctioned intake of Students at UG & PG level*(category-wise)						Total Actual Admission at UG & PG level (category-wise)**				
Course / Category	Gen.	SC	ST	OBC	Total	Gen.	SC	ST	OBC	Total
PG	123	37	18	66	244	113	34	10	61	218
UG	442	131	66	237	876	417	122	55	227	821
Grand total	565	168	84	303	1120	530	156	65	288	1039

B.Tech Total Students Erolled During 2014-15 Batch																	
S. No:	Branch	Intake	OP			OBC			SC			ST			TOTAL		
			B	G	T	B	G	T	B	G	T	B	G	T	B	G	T
1	CE		42	05	47	22	03	25	11	02	13	05	01	06	80	11	91
2	CSE		40	09	49	19	06	25	11	02	13	05	01	06	75	18	93
3	ECE		21	18	39	17	06	23	10	02	12	06	02	08	54	28	82
4	ICE		33	14	47	16	07	23	10	03	13	05	01	06	64	25	89
5	ME		45	01	46	23	01	24	13	02	15	08	00	08	89	04	93
6	TT		29	10	39	20	04	24	09	03	12	03	01	04	61	18	79
7	BT		13	08	21	06	03	09	03	01	04	01	01	02	23	13	36
8	CH		31	13	44	21	04	25	08	04	12	03	03	06	63	24	87
9	IP		41	04	45	22	03	25	13	01	14	04	00	04	80	08	88
10	EE		08	05	13	07	01	08	02	02	04	02	00	02	19	08	27
11	IT		10	04	14	06	02	08	03	02	05	01	01	02	20	09	29
12	MIN		13	00	13	08	00	08	05	00	05	01	00	01	27	00	27
Total			326	91	417	187	40	227	98	24	122	44	11	55	655	166	821

M. Tech (Full-Time) Total Students Erolled During 2013-14 Batch																	
S. No:	Branch	Intake	OP			OBC			SC			ST			TOTAL		
			B	G	T	B	G	T	B	G	T	B	G	T	B	G	T
1	CH		9	5	14	5	1	6	1	1	2	0	0	0	15	7	22
2	CS		10	2	12	4	3	7	2	2	4	1	0	1	17	7	24
3	IC		10	3	13	7	1	8	3	1	4	1	0	1	21	5	26
4	EC		10	4	14	8	0	8	2	2	4	1	1	2	21	7	28
5	IS		4	0	4	2	0	2	2	0	2	1	0	1	9	0	9
6	MT		13	0	13	7	0	7	3	0	3	2	0	2	25	0	25
7	ME		11	1	12	9	0	9	4	0	4	0	1	1	24	2	26
8	SCE		9	4	13	9	0	9	4	0	4	1	0	1	23	4	27
9	TT		11	3	14	3	1	4	4	0	4	0	0	0	18	4	22
10	VLSI		3	1	4	1	0	1	1	2	2	1	0	1	6	3	9
Total			90	23	113	55	6	61	26	8	34	8	2	10	179	39	218

M. Tech (Part-Time) Total Students Erolled During 2014-15 Batch																	
S. No:	Branch	Intake	OP			OBC			SC			ST			TOTAL		
			B	G	T	B	G	T	B	G	T	B	G	T	B	G	T
1	CS		5	5	10	0	0	0	1	2	3	0	0	0	6	7	13
2	IE		4	0	4	0	0	0	1	0	1	0	0	0	5	0	5
3	SCE		6	1	7	3	0	3	0	0	0	0	0	0	9	1	10
Total			15	6	21	3	0	3	2	2	4	0	0	0	20	8	28

MSc Total Students Erolled During 2014-15 Batch																	
S. No:	Branch	Intake	OP			OBC			SC			ST			TOTAL		

		B	G	T	B	G	T	B	G	T	B	G	T	B	G	T
1	CY	3	11	14	0	3	3	0	3	3	0	0	0	3	17	20
2	PHY	3	10	13	1	4	5	0	2	2	0	0	0	4	16	20
3	MA	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Total		6	21	27	1	7	8	0	5	5	0	0	0	7	33	40

MBA Total Students Erolled During 2014-15 Batch																		
S. No:	Branch	Intake	OP			OBC			SC			ST			TOTAL			
			B	G	T	B	G	T	B	G	T	B	G	T	B	G	T	
1	MBA		6	8	14	4	2	6	1	3	4	0	0	0	11	13	24	
Total			6	8	14	4	2	6	1	3	4	0	0	0	11	13	24	

		PhD (Part-Time) Total Students Erolled During 2014-15 Batch															
S. No:	Branch	Intake	OP			OBC			SC			ST			TOTAL		
			B	G	T	B	G	T	B	G	T	B	G	T	B	G	T
1	CH		0	01	1	0	0	0	0	0	0	0	0	0	0	1	1
2	CS		02	01	03	0	1	1	0	0	0	0	0	0	2	2	4
4	EC		2	1	3	0	0	0	0	0	0	0	0	0	2	1	3
5	IP		2	0	2	0	0	0	0	0	0	0	0	0	2	0	2
6	ME		0	0	0	2	0	2	0	0	0	0	0	0	2	0	2
7	CE		1	1	2	0	0	0	1	0	1	0	0	0	2	1	3
8	IC		1	0	1	0	0	0	0	0	0	0	0	0	1	0	1
9	PH		2	2	4	0	0	0	0	0	0	0	0	0	2	2	4
10	CY		0	1	1	0	0	0	0	0	0	0	0	0	0	1	1
Total			10	7	17	2	1	3	1	0	1	0	0	0	13	8	21

4.4 The Hostels

There are eight numbers of boy's hostels and two number and one number mega hostel for girls.

4.5 Scholarships/Assistance-ship

(Refer Annexure 11.9)

4.6 Games and Sports**Faculty & Staff**

Name	Designation	Qualification	E-Mail
Dr. G. S. Dhaliwal	Associate Professor & Head	B.A., D.P.Ed, M.P.Ed, N.I.S (Athletics) & Ph.D (GNDU)	dhaliwalgs@nitj.ac.in
Sh. S. K. Syal	Physical Training Officer	(D. P. Ed.)	Syal_59@yahoo.com

1. SPECIAL REQUIREMENT FOR DEGREE

The students entering in the Institute are required to undergo the following non-credit mandatory requirements towards completion of their degree:-

- i. **N.S.O. (National Sports Organization)**
- ii. **N.S.S. (National Service Scheme)**

The students have to opt for one of these activities based on the enrolment procedure and their choice. A total of 100 hours of prescribed activities are to be completed after registration in the first year. In case the requirements are not met in the first year, the same shall be completed in the second year i.e. end of the 4th Semester. If a student does not obtain a satisfactory grade in the respective registered course within the first two years of his/her stay at the Institute, he/she will not be registered for the higher semester after second year.

The students will be satisfactorily allowed to register in sports activities of the institute for completing their National Sports Organization requirement in the first year.

Sports are an important activity for overall development of the students. It has to be carried out in order to promote spirit of Sportsmanship amongst the students and is essentially an activity, which encourages sense of healthy competition feeling of love and to work in unison. Further the sports calendar crowded with sporting games/events is promoting enthusiasm in the day-to-day campus life of the students. The Department of Physical Education and Sports is geared to achieve the following motives

- a) Healthy mind in a healthy body
- b) Fit people Fit Nation
- c) Make-sports a way of life
- d) Every human being has a fundamental right to access to physical education and sport, which are essential for the full development of his personality. The freedom to develop physical, intellectual and moral powers through physical education and sport must be guaranteed both within the educational system and in other aspects of social life.

By: - The UNESCO

- e) *Health and physical education and sports should be an integral part of the learning process and be included in the evaluation performance.*

By :- The National Policy on Education

The institute at present is providing facilities in number of outdoor and indoor games to be the budding engineering students.

2. OUTDOORS GAMES FACILITIES (BOYS & GIRLS)

SR. NO.	OUTDOOR GAMES	FACILITIES AVAILABLE
1	Athletics	400 meter Standard Track & Field
2	Cricket	Standard Cricket ground
3	Football	Standard Football ground
4	Basket ball	Two Basket Ball Standard Cemented Courts with Full Flood Lights & Sitting Arrangement
5	Volley ball	Three Volleyball standard grounds with Full Flood Lights & Sitting Arrangement
6	Lawn Tennis	Two Lawn Tennis Cemented courts With Full Flood Lights

3. INDOOR GAMES FACILITIES (BOYS & GIRLS)

SR. NO.	INDOOR GAMES	FACILITIES AVAILABLE
1	Badminton	Four Wooden Badminton Courts With Light, Sitting Arrangement and Specific Gym Equipments in Badminton Indoor Hall
2	Table Tennis	T.T. Table is available in each hostel in addition to that Six tables are available in the Indoor Badminton hall with Lights.
3	Carom	Covered space is available in each hostel in addition to that Carom Boards are available in the Indoor Badminton Hall with Lights.
4	Chess	Covered space is available in each hostel in addition to that Chess Boxes are available in the Indoor Badminton Hall with Lights.

4. WEIGHT TRAINING GYM. FACILITY

1	Multipurpose Modern Training facilities	Weight training gymnasium is available in the students Activity Centre, fully equipped with Modern Weight Training equipments.
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5. UPCOMING GAME FACILITIES:-

1. Sports Stadium
2. New Building of Physical Education & Sports Deptt.
3. Squash Courts – Two
4. Shooting Range
5. Synthetic Lawn Tennis Courts – Two
6. Addition of Cricket & Football Play Grounds

6. RESEARCH AND DEVELOPMENT

The Faculty member of the department are actively engaged in guiding research in the areas of Olympics games, Asian Games, Commonwealth Games, National Games, State Games, Inter-University Games, Inter-College Games (Men and Women) in the topic of comparative study, Analytical study, variables study, Low and High Performance Study, Kinanthropometric Study, Psychology Study, Physiology Study, Kingalogy Study, Heart Rate Variability Study, Measurement Study, Height Weight and Strength Study and Physical Fitness etc. in different games. Details of research contribution are as under:-

(i) Paper Publication in International Journal

Name of the author(s)	Title of the Paper	Name of the journal/Conference Volume/ Proceedings	Year
Dr. Baljinder Singh Bal Mr. Nishan Singh Deol Dr. Gurmej Singh Dhaliwal	Half Man & Half Women: Their Duality Of The Sexes on Sports in Sports Concern for the 21 st Century	International Journal of Motor Learning & Sport Performance.Vol. 03, No. 01, PP 17-21	2014

(ii) Research Paper Presentation in International Conference

Name of the author (s)	Title of the Paper	Name of the Conference & Venue	Pages (from- to)	Date & Year
Dr. Mohit Sharma Dr. Gurmej Singh Dhaliwal Ms. Parminderjeet Kaur	A Comprehensive Study of Physical Characteristics of Punjab and Haryana Boxers	International Conference on Physical Education Health & Sports Sciences (GLOPHESS-2013) Guru Nanak Dev University, Amritsar	24-27	January 24-26, 2014

Dr. Gurmej Singh Dhaliwal Dr. Mohit Sharma	A Comprehensive Study of Physiological Characteristics of Punjab and Haryana Boxers	International Conference on Physical Education Health & Sports Sciences (GLOPHESS-2013) Guru Nanak Dev University, Amritsar	28-30	January 24-26, 2014
Dr. Sucha Singh Dhesei Dr. Gurmej Singh Dhaliwal	Investigation of The Personality Traits of Athletes in Team Sports	International Conference on Physical Education Health & Sports Sciences (GLOPHESS-2013) Guru Nanak Dev University, Amritsar	407-411	January 24-26, 2014
Dr. Gurmej Singh Dhaliwal Dr. Brij Bhushan Yadav Dr. Satinder Kumar	Raising Norms for Strength, Power and Endurance Abilities as an Extent for Sports Selection among Hockey Players.	International Conference on Sports, Health and Sports Economics Sri Guru Granth Sahib World University, Fatehgarh Sahib	108-112	March 03-04 2015
Dr. Satinder Kumar Dr. Pritam Singh Dr. Gurmej Singh Dhaliwal	Constructing Norms for Basic Movement Pattern as Measure for Sports Selection among Softball Players	International Conference on Sports, Health and Sports Economics Sri Guru Granth Sahib World University, Fatehgarh Sahib	119-123	March 03-04 2015
Dr. Manjit Singh Dr. Gurmej Singh Dhaliwal Dr. Brij Bhushan Yadav	Norms for Basic Movements Pattern and Neuromuscular Abilities of Inter-University Baseball Players for Guru Nanak Dev University, Amritsar	International Conference on Sports, Health and Sports Economics Sri Guru Granth Sahib World University, Fatehgarh Sahib	140-145	March 03-04 2015
Dr. Gurmej Singh Dhaliwal Ms. Parminderjeet Kaur Mr. Sachin	A Comparative Analysis of Anthropometric Characteristics between Volleyball and Handball Players	International Conference on Sports, Health and Sports Economics Sri Guru Granth Sahib World University, Fatehgarh Sahib	492-495	March 03-04 2015

(iii) **Research Paper Presentation in National Conference**

Name of the author (s)	Title of the Paper	Name of the Conference & Venue	Pages (from- to)	Date & Year
Dr. Gurmej Singh Dhaliwal Dr. Baljinder Singh Bal	Effect of 6-weeks Yogasana on Physiological Fitness Status of Female Young Athletes	International Conference on Wellness Through Physical Activity: Future Respective. Punjabi University Patiala	01-07	January 17-18, 2014
Dr. Mohit Sharma Dr. Gurmej Singh Dhaliwal Sh. S. K. Syal	A Comprehensive Study of Anthropometric Characteristics of Punjab and Haryana Boxers	International Conference on Wellness Through Physical Activity: Future Respective. Punjabi University Patiala	21-25	January 17-18, 2014
Dr. Onkar Singh Dr. Gurmej Singh Dhaliwal Ms. Parminderjeet Kaur	Comparative Study of The Achievement Motivation Locus of Control And Aspiration of University Level Individual and Team Games Players	International Conference on Wellness Through Physical Activity : Future Respective. Punjabi University Patiala	87-90	January 17-18, 2014
Dr. Sucha Singh Dhesei Dr. Gurmej Singh Dhaliwal	Investigation of The Personality Traits of Athletes in Individual And Team Sports	International Conference on Wellness Through Physical Activity : Future Respective. Punjabi University Patiala	489-492	January 17-18, 2014

7. SPORTS ACHIEVEMENTS AT INTER - NIT's, IIT's & UNIVERSITIES LEVEL

Sr. No.	Name of Tournament	Game	Date	Position
1	Inter – Technology University Badminton (Boys) tournament held at NIT, Jalandhar	Badminton (Boys)	14/09/14 to 15/09/14	Winner
2	Inter – Technology University Badminton (Girls) tournament held at NIT, Jalandhar	Badminton (Girls)	14/09/14 to 15/09/14	Winner
3	Inter – Technology University Chess (Girls) tournament held at NIT, Kurukshetra	Chess (Girls)	14/09/14 to 15/09/14	First Runner up
4	Inter – Technology University Chess (Boys) tournament held at NIT, Kurukshetra	Chess (Boys)	14/09/14 to 15/09/14	Second Runner up
5	IIT Mandi Rann Neeti Sports Fest '14' Football (Boys) tournament held at IIT, Mandi	Football (Boys)	19/09/14 to 21/09/14	Winner
6	IIT Mandi Rann Neeti Sports Fest '14' Table Tennis (Girls) tournament held at IIT, Mandi	Table Tennis (Girls)	19/09/14 to 21/09/14	Winner

7	IIT Mandi Rann Neeti Sports Fest '14' Badminton (Boys) tournament held at IIT, Mandi	Badminton (Boys)	19/09/14to21/09/14	Winner
8	IIT Mandi Rann Neeti Sports Fest '14' Badminton (Girls) tournament held at IIT, Mandi	Badminton (Girls)	19/09/14to21/09/14	First Runner up
9	IIT Mandi Rann Neeti Sports Fest '14' Volleyball (Boys) tournament held at IIT, Mandi	Volleyball (Boys)	19/09/14to21/09/14	Second Runner up
10	IIT Mandi Rann Neeti Sports Fest '14' Volleyball (Girls) tournament held at IIT, Mandi	Volleyball (Girls)	19/09/14to21/09/14	Participation
11	IIT Mandi Rann Neeti Sports Fest '14' Cricket (Boys) tournament held at IIT, Mandi	Cricket (Boys)	19/09/14to21/09/14	Participation
12	IIT Mandi Rann Neeti Sports Fest '14' Basketball (Boys) tournament held at IIT, Mandi	Basketball (Boys)	19/09/14to21/09/14	Participation
13	Inter – Technology University Football (Boys) tournament held at Thapar University, Patiala	Football (Boys)	10/10/14to11/10/14	Winner
14	Inter – Technology University Table Tennis (Boys) tournament held at PEC, Chandigarh	Table Tennis (Boys)	10/10/14to11/10/14	Second Runner up
15	Inter – Technology University Table Tennis (Girls) tournament held at PEC, Chandigarh	Table Tennis (Girls)	10/10/14to11/10/14	Second Runner up
16	Inter – Technology University Basketball (Boys) tournament held at NIT, Jalandhar	Basketball (Boys)	13/02/15to14/02/15	Winner
17	Inter – Technology University Basketball (Girls) tournament held at NIT, Jalandhar	Basketball (Girls)	13/02/15to14/02/15	First Runner up
18	Annual Athletic Meet (Boys & Girls) 2008-09 organized by Sports Department, NIT Jalandhar	Annual Athletics Meet	07/11/08 to 08/11/08	Successful Organized
19	Inter – Technology University Cricket (Boys) tournament held at PEC, Chandigarh	Cricket (Boys)	10/04/15to12/04/15	First Runner up
20	National Level Sports Fest "URJA-2014" Badminton (Boys) held at Thapar University, Patiala	Badminton (Boys)	17/04/15to 19/04/15	Winner
21	National Level Sports Fest "URJA-2014" Lawn Tennis (Boys) held at Thapar University, Patiala	Lawn Tennis (Boys)	17/04/15to 19/04/15	First Runner up
22	National Level Sports Fest "URJA-2014" Table Tennis (Boys) held at Thapar University, Patiala	Table Tennis (Boys)	17/04/15to 19/04/15	Fourth
23	National Level Sports Fest "URJA-2014" Athletics (Boys) held at Thapar University, Patiala	Athletics 800 m	17/04/15to19/04/15	Gold Medal
24	National Level Sports Fest "URJA-2014" Athletics (Boys) held at Thapar University, Patiala	Athletics 400 m	17/04/15to 19/04/15	Bronze Medal
25	National Level Sports Fest "URJA-2014" Athletics (Boys) held at Thapar University, Patiala	Shot Put	17/04/15to 19/04/15	Silver Medal
26	National Level Sports Fest "URJA-2014" Athletics (Boys) held at Thapar University, Patiala	Discus Throw	17/04/15to 19/04/15	Silver Medal
27	National Level Sports Fest "URJA-2014" Athletics (Boys) held at Thapar University, Patiala	4x 100 m Relay	17/04/15to 19/04/15	Bronze Medal
28	National Level Sports Fest "URJA-2014" Athletics (Boys) held at Thapar University, Patiala	Athletics 100 m	17/04/15to 19/04/15	Gold Medal
29	National Level Sports Fest "URJA-2014" Athletics (Boys) held at Thapar University, Patiala	Athletics 200 m	17/04/15to 19/04/15	Bronze Medal
30	National Level Sports Fest "URJA-2014" Athletics (Boys) held at Thapar University, Patiala	Athletics 400 m	17/04/15to 19/04/15	Bronze Medal
31	National Level Sports Fest "URJA-2014" Athletics (Boys) held at Thapar University, Patiala	Shot Put	17/04/15to 19/04/15	Gold Medal
32	National Level Sports Fest "URJA-2014" Athletics (Boys) held at Thapar University, Patiala	Discus Throw	17/04/15to 19/04/15	Bronze Medal
33	National Level Sports Fest "URJA-2014" Athletics (Boys) held at Thapar University, Patiala	4x 100 m Relay	17/04/15to19/04/15	Silver Medal

INTER – YEAR TOURNAMENTS

Sr. No.	Name of Game	Date	Year	Position
1	Inter –Year Cricket (Boys) Tournament	23/09/2014to25/09/2014	Second Year Third Year Final Year	Winner Runner- up Third
2	Inter –Year Volleyball (Boys) Tournament		Third Year Final Year Second Year	Winner Runner- up Third
3	Inter –Year Lawn Tennis (Girls)	23/09/2014to25/09/2014	Final Year	Winner

	Tournament		Third Year Second Year	Runner- up Third
4	Inter – Year Badminton (Boys & Girls) Tournament	23/09/2014to25/09/2014	Third Year Final Year First Year	Winner Runner- up Third
5	Inter – Year Badminton (Boys) Tournament	23/09/2014to25/09/2014	Third Year Final Year First Year	Winner Runner- up Third

INTER – BRANCH TOURNAMENTS

Sr. No.	Name of Game	Date	Branch	Position
1	Inter –Branch Cricket (Boys) Tournament	26/08/2014 to 28/08/2014	Civil IPE TT & Bio	Winner Runner- up Third
2	Inter –Branch Table Tennis (Boys) Tournament	26/08/2014 to 28/08/2014	CSE ECE Civil	Winner Runner- up Third
3	Inter –Branch Table Tennis (Girls) Tournament	26/08/2014 to 28/08/2014	CHE Textile ICE	Winner Runner- up Third
4	Inter –Branch Basketball (Boys) Tournament	26/08/2014 to 28/08/2014	ME/ICE/CSE ECE/Civil CHE/IPE	Winner Runner- up Third
5	Inter –Branch Badminton (Boys) Tournament	26/08/2014 to 28/08/2014	Civil CHE Civil	Winner Runner- up Third
6	Inter-Branch Badminton (Girls) Tournament	26/08/2014 to 28/08/2014	IPE ECE CSE	Winner Runner- up Third
7	Inter-Branch Football (Boys) Tournament	16/09/2014 to 18/09/2014	IPE CIVIL CSE	Winner Runner- up Third
8	Inter-Branch Volleyball (Boys) Tournament	16/09/2014 to 18/09/2014	Civil CHE IPE	Winner Runner- up Third
9	Inter-Branch Chess (Boys) Tournament	16/09/2014 to 18/09/2014	Civil CSE ECE	Winner Runner- up Third

ANNUAL TOURNAMENTS

Sr. No.	Name of Game	Date	Name of Team	Position
1	Super 9 Cricket Tournament(Boys)	18-19 Jan, 2014&25-26 Jan, 2014	Superb 9 Royal Crackers Invincibles	Winner Runner- up Third
2	Mixed Volleyball Tournament	22 – 25 April, 2014	Konkrash Assings Spartan	Winner Runner- up Third
3	Super 9 Cricket Tournament(M)	26/01/2015 To 28/01/2015	Shareefs DJ Smokers Thunderbirds	Winner Runner- up Third

8. ATHLETICS FEST 2014-15

The Athletics Fest of the Institute was organized from 13-14 March, 2015. In all, 12 formal events for Boys, 10 events for Girls and Special Events for Boys & Girls were held. **Dr. Arvind Agnihotri**, Acting Director of the Institute as a Chief Guest inaugurated the fest on 13 March, 2015.

Mr. Mahesh Kumar 3rd year student, Department of Civil Engineering and **Ms. Anjali Kumari** Final year student Department of Instrumentation & Control Engineering were adjudged the Best Athletes. *At the time of closing ceremony NIT Director, Prof. & Dr. I. K. Bhat was chief guest. Medals and Trophies were given by Worthy Director to the winners.*

Overall Team Championship Result's of Annual Athletics Fest:

1st Place	: Third year with 78 Points	-----	Champion	
2nd Place	: First year with 71 Points	-----	Runner-up	
3rd Place	: Second year with 36 Points	-----	Third Position	

14. N.S.S (NATIONAL SERVICE SCHEME)

The overall aim of National Service Scheme (N.S.S) is to provide an extension dimension to the higher education system and orient young students to community service while they are in the institution.

The broad objectives of N.S.S in the institute are:

1. To make the students understand the community to which they belong

2. To identify the needs and problems of the community and to involve themselves in problem solving process
3. To develop among them a sense of social and civic responsibility
4. To utilize their knowledge in finding practical solution to individual and community problems

4.7 Awards

4.8 Examination Details

The academic system at NIT, Jalandhar is framed on a credit based semester examination system. The credit system envisages a continuous evaluation of student's performance, and provides flexibility for academic progress at an optimum pace based on individual ability and convenience, subject to the constraint of the minimum requirements for continuation in the academic programme.

The student is awarded a letter grade from the prescribed grading system in each course registered by him. For each pass grade, the students accumulate the course credits as earned credits. The academic performance of the student is indicated in terms of the number of credits that he/she earns and the weighted grade point average. A specified minimum number of credits should be acquired on semester or session basis in order to qualify for continuation in the academic programme and the award of degree.

Credits

Each lecture/tutorial hour per week per semester is assigned one credit. Each laboratory hour per week per semester is assigned half credit. However, some courses are preparatory in nature and have half the credit weightage of a normal course. The courses without credit are termed as noncredit (NC) courses.

Grades

In grading system, the evaluation in terms of marks is replaced by the award of letter grades. The structure and guidelines for award of grades is given.

Grade	Points	Description of Performance	Recommended Cut Off marks *
S	10	Outstanding	90
A	09	Excellent	80
B	08	Very Good	70
C	07	Good	60
D	06	Average	50
E	05	Marginal	40
U	-	Unsuccessful	-
I	-	Incomplete	-
W	-	Withheld due to shortage of attendance or withdraw	-
NP	-	Audit Pass	-
NF	-	Audit Fail	-

Subject to confirmation based on standard deviation, if the sample size is greater than 20, and is flexible to the recommendation of the individual course coordinators with proper justification.

The grades will be awarded to a student in each registered course including a laboratory course, based on his/her performance evaluated through a prescribed scheme of evaluation. In theory courses the evaluation is weighted on class tests, tutorial work, home assignment and semester examinations in prescribed proportions. The recommended weightage for class tests is 30%-40%, assignments/tutorial work is 10%-20% and End Semester Exam is 50%. In the laboratory and practical classes, it would be weighted equally on the basis of regular practical work and an examination conducted for the purpose. The credits for the courses in which a student has obtained "E" (minimum passing grade for a course) or a higher grade will be considered as credits earned by him/her. In addition, courses up to a maximum of 8 credits in case of B Tech students in which a student has got "NP" grade will also count towards his/her earned credits. Any course in which a student obtained "W" or "NF" grade will not be counted towards his/her earned credits.

For the other (elective) courses in which "U" or "W" grade have been obtained, the student may take the same course or any other course from the same category when it is offered next. Further, "U" grades secured in any course stay permanently on the grade card. The weightage of these grades is not counted in the calculation of the SGPA and CGPA.

An "I" grade denotes incomplete performance in any course due to absence at the end of semester. Upon completion of all course requirements, the "I" grade is converted to a regular grade.

These grades (NP and NF) are awarded in a course that the student opts to audit. Audit applications are allowed during the first four weeks of a semester. The audit pass (NP) grade is awarded if a minimum "E" grade is obtained in the course and attendance is above 75% in the classes. If either of these requirements is not fulfilled, the audit fail (NF) grade is awarded. In courses, where NP grade is obtained, the corresponding course credits are counted towards earned credits. The grades obtained in a n audit course are not considered in the calculation of SGPA or CGPA.

A "W" grade is awarded in a course where the student has opted to withdraw from the course. Withdrawal from a course is permitted until one week after the class test-I.

Grade Point Averages

The performance of a student will be evaluated in terms of two indices, viz. the Semester Grade Point Average (SGPA) which is the Grade Point Average for a semester and Cumulative Grade Point Average (CGPA) which is the Grade Point Average for all the completed semesters at any point of time. The SGPA is calculated on the basis of

grades obtained in all courses, except audit courses, registered for in the semester.

$$\text{SGPA} = \frac{(\text{Course credits} \times \text{Grade point}) \text{ except audit courses}}{(\text{Course credits}) \text{ except audit courses Sem.}}$$

The CGPA is calculated on the basis of all pass grades, except audit courses obtained in all completed semesters.

$$\text{CGPA} = \frac{(\text{Course credits} \times \text{Grade point}) \text{ for courses with pass grade except audit Sem. courses}}{(\text{Course credits}) \text{ of courses with pass grade except audit courses Sem.}}$$

Degree Requirements

For obtaining a degree in a 4 year B Tech programme, the following requirements are to be satisfied:-

1. Earn required 200 credits in all
2. Obtain a minimum Cumulative Grade Point Average (CGPA) of 5.0
3. Complete the requirements of all courses under different categories as prescribed in the Syllabi.
4. Complete the prescribed practical training satisfactorily.
5. Complete the requirement of attending NCC/NSS/NSO activities in their first year or at best by the end of 2nd year (4th semester) satisfactorily.
6. Must have earned the pass grade in discipline courses.

Rules and Regulations for B. Tech Programmes

Registration

Registration is an important procedural part of the academic system which ensure the willingness of the student to continue in the course of study in the institute. No credit is given to the student who attends a course without a formal registration. The name of the registered student only appears on the roll list of the courses registered. Pre-registration for each semester will be done according to a specified schedule prior to the end of the previous semester and paying the requisite tuition fee to the institute. In absentia registration will be allowed only in rare cases at the discretion of Dean (Academic Programme). In case of illness or absence during registration, the student should intimate the same to the Dean (Academic Programme). Each student will be given a Registration Record which will be an official record of courses registered. Add, Drop, Withdrawal and Audit will be marked on this sheet itself by the Academic Section. The Registration Record should be retained by the student until he/she gets the Semester Grade Card for the corresponding semester.

Advice on Courses

At the time of completing the Registration Form, each student should consult his/her HOD concerned to finalize the academic programme, keeping in view minimum/maximum numbers of total and lecture credits, past performance, backlog of courses, SGPA/CGPA, workload and students interests. Special provisions exist for academically weak students.

Limits on Registered Credits

A student must register for a minimum of 15 credits and a maximum of 30 credits in a semester wherein theory credits registered by a student should not be less than 9 credits. There is a minimum number of student registration required to run an elective course and will be decided by the department concerned from time to time.

Late Registration

1. For those students who were not on campus during the period of registration in the previous semester, registration procedure will be completed on a later date with permission of the Dean, Academic Programmes.
2. For reasons beyond his/her control, if a student is not able to register or send an authorized representative with a medical certificate, he/she may apply to the Dean (Academic Arrairs) for late registration. The Dean will consider and may approve late registration in genuine cases on payment of an extra fee of Rs.500/-. Late registration is allowed until one week after the start of the semester.

Addition, Deletion, Audit and Withdrawl from Courses

1. Add and Drop: A student has the option to add or delete courses from his/her registration during the first week of the semester.
2. Audit: A student may also apply for changing a credit course to an audit one within one week of the end of the first class test.
3. Withdrawal: A student who wants to withdraw from a course should apply on a prescribed form within one week of the end of the first class test. A withdrawal grade (W) will be awarded in such cases.

Attendance Requirement

1. All students must attend every lecture, tutorial and practical class. However, to account for late registration, sickness or other such contingencies, the attendance requirement will be a minimum of 75% of the scheduled classes.
2. A student with less than 75% attendance in a course during a semester, will be awarded a W grade in that course irrespective of his/her performance in the tests. The Course Coordinator, while awarding the grades, will take into account the consolidated attendance record for the whole semester. Students who are deficient in attendance shall be awarded W grade, by the course coordinator.
3. In order to maintain the attendance record of a particular course, a roll call will be taken in every scheduled lecture, tutorial and practical class.
4. For the purposes of attendance, every scheduled practical class will count as one unit irrespective of the

number of contact hours

5. The Course Coordinator will consolidate the attendance record for the course from the beginning of the semester up to class test-I to class test-II and to the end of the semester. The teacher offering the course shall notify the students having less than 75% attendance with an intimation of the same to the concerned Head of the Department and Dean (Academic Programmes).
6. Every faculty offering a course will take attendance till three calendar days before the last instruction day in the semester. The percentage of attendance, calculated up to this instruction, will be indicated in a code number/letter as follows: Attendance rounded to Code No/letter 95% and above H 85% to 94% 9 75% to 84 % 8 Below 75% L A student who has attendance code letter L will not be allowed to sit for end semester examination in the course in which the short fall exits.

Absence during the Semester

1. A student must inform the Dean (Academic Affairs) immediately of any instance of continuous absence from classes.
2. A student who is absent due to illness or any other emergency, up to a maximum of two weeks, should approach the Course Coordinator for make-up in quizzes, assignments and laboratory work.
3. A student who has been absent from a class test due to illness should approach the Course Coordinator for a make-up test on return to class. This request should be supported with a Medical Certificate from the Institute Medical Officer. A Certificate issued by a registered medical practitioner will also be acceptable in those cases where a student is normally residing off-campus; in such cases the registration number of medical practitioner should explicitly appear in the medical certificate. Prior to approaching the Course Coordinator, the student must file a copy of the medical certificate with the Academic Section.
4. In case of absence on Medical grounds or other special circumstances, before or during the end semester examination, the student can apply for I-grade. 75% attendance in a course is necessary for being eligible for request of I-grade in that course. An application requesting an I-grade should be made at the earliest, but not later than the last day of the end semester examination. This application should be made to the concerned Head of Department, depending on the merits of the case, will grant the approval. The Head of the concerned Department will inform all the concerned Course Coordinators and Dean (Academic Programmes). The student should, subsequently, complete all course requirements according to the prescribed schedule.
5. In special situations arising due to the student's inability to be present at the institute during the stipulated period, the period for conversion of I grade can be extended to the beginning of the next semester. Approval for this extension is granted by Dean (Academic Programmes), on the recommendations of the concerned Head of the Department of the student, the Course Coordinator(s), and the Chief Warden in case of a boarder. A request to this effect should be included in the application for I-grade.
6. In case the period of absence on Medical grounds is more than 20 working days during the semester, a student may apply for withdrawal from the semester i.e. withdrawal from all courses registered in that semester. Such an application must be made as early as possible and latest before the start of the end semester examinations. No application for semester withdrawal will be considered after the end semester exams have commenced. Each application for semester withdrawal will be examined by the Dean (Academic Programmes) and depending on the merit of the case an appropriate recommendation will be made. Partial withdrawal from courses registered in a semester is not allowed.

4.9 Training and Placement

(Annual Report: Year 2014-15)

The Centre of Training & Placement of Dr.B.R.Ambedkar National Institute of Technology, Jalandhar, which started its activities in Dec., 1990 serves as a Central facility for all the Departments.

FACULTY

S.No.	Name	Designation	Qualifications
1.	Dr. Partap Singh	Professor & Head	Ph.D.
2.	Sh. Rajeev Trehan	Asstt. Professor	M.Tech. (N.I.T.J.)

***Dr Partap Singh is a Professor in Department of Civil Engineering.**

A. PLACEMENT OF FINAL YEAR STUDENTS(2014-2015 Batch)

Campus Interviews were arranged for the final year B.Tech. students. A large number of reputed Industrial houses in the country visited the Institution and selected the final year students as Engineers/Management Trainees. Some of the Companies invited the students to their Corporate Offices for the interviews.

Discipline	No. of Eligible Students	No. of Job Offers	No. of Double Job offers	No. of Students Actually Placed
ECE	79	107	28	79
CSE	81	101	24	77
CHE	69	76	20	56
ICE	70	100	30	70

CIVIL	72	58	11	47
IPE	82	102	37	65
ME	74	100	32	68
BT	31	34	6	28
TT	49	56	7	49
Total	607	734	195	539

Highest Pay package = 75 Lacs by Epic Research.

The following Industrial houses have visited the Institute for 2014-2015 batch

1	Amazon	53	DRDO
2	EXL	54	Shiva Group
3	Infoedge	55	Virtusa
4	Oracle	56	Gurdatta Institute Nasik
5	Pay TM One97	57	Snap Deal
6	Maruti	58	Emerson
7	Unisys	59	SAP Lab
8	U Trade Soluation	60	Resonance
9	Google	61	Sokrati
10	ITC	62	SKECI
11	Power2Sme	63	IGL
12	Aricent	64	Avanti (Online)
13	Future First	65	Winsom Textile
14	Alstom	66	Sawraj (SML)
15	L&T ECC	67	Naukri .com
16	Polaris	68	Newgen
17	Sapient	69	Nokia
18	Nagaro	70	Bunge
19	TCS	71	Ashok Leyland
20	Infosys	72	Honda Cars
21	Belzabar	73	Vidyamandir Classes
22	Mu-sigma	74	EvalueServe
23	Paytm	75	Nahar Fibers
24	Indian Navy	76	Bhushan Steel
25	Compro Technologies	77	KISCO India Pvt. Ltd.
26	Nucleus Software	78	ERA Group
27	Ericsson	79	Housing.com
28	Technip	80	United Breweries Ltd.
29	IBM	81	DESL Energy
30	Samsung Engineering	82	BPCL
31	Tech mahindra	83	Texas Instruments
32	Hero Motocorp.	84	CoCubes(Online)
33	Daimlar	85	ITDC
34	A.K. Vidyamandir	86	OmCareers
35	Accolite	87	Aaghaz Education Pvt. Ltd.
36	Reliance Jioinfocomm	88	Fundamental Education
37	Drishti Soft	89	Al Faraa
38	Tata Motors	90	Cubastion
39	ACC	91	Delhivery
40	JSW	92	Root Analysis
41	Kayako Software	93	Punj lolyed
42	PineLabs	94	Practo Technology
43	Saint Gobain	95	GlaxoSmithKline
44	Authorzen	96	Jaeco Rebuilding
45	Orient Electronic	97	Ways2Capital
46	Amdocs	98	Siemens
47	Navyug	99	Delhivery
48	Sms Seimg	100	Capitalvia
49	Vardhman	101	BORL
50	Akash Institute	102	we are Holiday
51	Ralson Iudhiana	103	IOL Chemicals And Pharmaceuticals Ltd.
52	Subros	104	Indian Glycol limited

B. INDUSTRIAL SUMMER TRAINING OF STUDENTS

In the year 2015, 650 students in the various disciplines have been sent to various Industries of repute in different parts of the country for two months practical training from May to July 2015. Arranging the training involved close interaction with the concerned Industry, the preparation for which started much in advance. After the completion of training, each student will be evaluated on the basis of various evaluation components – Seminar, Group discussion, Daily diary, viva voce examination (Internal & External).

Prominent Industries and Research Centres for Industrial Practical Training:

The list of prominent industries and research centres where students have undergone Practical training during last couple of years are the following:

Aarti International Ltd.	Alok Industries
Accenture Services Pvt. Ltd	Alstoms Projecs India Pvt. Ltd.
Advance Technology Pvt. Ltd.	Ambuja Cement
Afcons Infrastructure Limited	Anest Iwata Mortherson Ltd.
Airports Authority of India	Arikav Fab Pvt. Ltd.
AKS IT Services Pvt. Ltd.,	Arvind Mills Ltd.
Alcatel India	Asea Brown Boweri
All India Institute of Medical Science	Ashok Leyland
Asian Paints	BFL, Bharat Heavy Electricals
Associated Cement Companies Ltd.	Bhabha Atomic Research Centre
Auro Dyeing	Bharat Electronics Limited
Auro Spinning Mills	Bharat Heavy Electricals Ltd.
Avake Technology (I) Pvt. Ltd.	Bharat Petro Chemical Ltd.
Avents Pharma Ltd.	Bharat Sanchar Nigam Ltd.
AVP Construction	Bharti Systels
Bajaj Tempo	Bharti Airtel Ltd.
Ballarpur Industries Limited	Bharti Teletech Limited
Bawa Skin Company	Bhilai Steel Plant,
Birla Technical Services	Cummins India Ltd.
BL Kashyap Construction Limited	Daffodil Software Ltd.
British Oxygen Company Ltd.	Daurala Organics Ltd.
Cadence Design Systems	Defence Research & Development Organization
C-DOT	Diac Spaa Technologies Pvt. Ltd.
CE Info Systems (P) Ltd.	DLF Limited
Central Electronics Engg. Research Institute	Dr.Reddys Labs Ltd.
Central Leather Research Institute	Durgapur Steel Plant
Central Public Works Department	Eicher Motors Ltd.
Central Public Works Department	Eicher Tractors
Central Scientific Instruments Organisation	EKO India Financial Services Pvt. Ltd.
Centre for Electronics Designing Technology of India	Engineers India Ltd.
Centre for Artificial Inteligence& Robotics	Escom Consultants Pvt. Limited
Chawla Tanneries Pvt. Limited	Escorts Mahle
Clariant (I) Ltd.	Evereaday Industries
CMC Ltd.	Forms & Gears
Compro Technologies Pvt. Ltd.	Fortel Jain Projects Pvt. Limited
Continental Device India	Freescale Semiconductor India Pvt. Ltd.
Converge Labs Corporation	Gammon India Ltd.
Birla Technical Services	Garg Acrylics Ltd.
Global Mobile Infrastructure Pvt. Limited	Hindustan Aeronautics Ltd.
Goetez (India) Ltd.	Hindustan Machine Tools
Grasim Industries	Hindustan Motors Ltd.
Grauer & Well India Ltd.	HLS Asia Ltd.
Grindwell Norton	Honda Siel Cars India Ltd.
Gujarat State Electricity Corporation Ltd	Hutch Essar South Ltd.
Gupta Construction Pvt. Ltd.	I2 Technologies India Pvt. Ltd.
Hankel Teroson India Ltd.	India Sugar and General Engg. Corporation
Havells India Pvt. Ltd.	Indian Airlines
HCL Comnet	Indian Institute of Petroleum
HCL Infosystems	Indian Oil Corporation Ltd.
HCL Technologies Ltd.	Indian Petrochemicals Corporation Ltd.
Heavy Engg. Corporation Ltd.	Indian Telephone Industries Ltd.
Hero Honda Motors	Infinite Computer Solutions (I) Ltd.

Hewlett Packard	Interra Systems India Pvt. Ltd.
ITC Ltd	Khanna Paper Mills
J C T , Phagwara	Kollace
J.K. Industries	Kota Thermal Power Corporation
Jagatjit Industries Ltd.	Krebs Biochemicals
Jaiprakash Associates Limited	Kwality Photonics Pvt. Ltd.
JAIV Technologies Pvt. Ltd.	Larsen & Toubro Ltd.
Jayshree Textiles	Leader Valves Ltd.
K.K. Tanner's	LG Electronics India Pvt. Ltd.
Madura Garments Exports Ltd.	N.S. Associates Pvt. Ltd.
Mahindra & Mahindra Ltd	Nagarro Software Ltd.
Maruti Suzuki India Ltd.	Nahar Industrial Enterprises Ltd.
Maruti Udyog Ltd.	National Aviation Company of India Ltd.
MECON India Ltd.	National Engg. Industries.
Metro Railway	National Fertilizers Ltd.
MICO	National Highway Authority of India
Microsoft IT Ltd.	National Informatics Centre
Millennium Construction Pvt. Limited	National Productivity Council
Mind Q Systems Pvt. Ltd.	Nestle India Ltd.
Mindarika Pvt. Ltd.	Netweb Technologies
MoMagic Technologies Pvt. Ltd	New Holland Tractors
Morpen Laboratories	NIIT Technologies Ltd.
Motherson Sumi	Nirma
Motorola India Pvt. Ltd.	NISTADS
Nokia Siemens Networks Private Ltd	Punjab Remote Sensing Centre
OCM India Ltd	Punjab Tractors Ltd.
Oil and Natural Gas Corporation Ltd.	Purolator India
Okaya Industries	Quick Logic Controls
Oracle Financial Services Software Ltd	Rail Coach Factory
Orient Craft Ltd	Ranbaxy Laboratories Ltd.
Orion Holiday Resorts Ltd.	Raymond Ltd.
Paharpur Cooling Towers Limited	Reliance Engg. Associates Pvt. Ltd.
Patni Computers	Reliance Industries
PFIZER	Reliance Infocomm Ltd.
Polaris Software Labs Ltd.	Rieter LMW
Power Grid Corporation of India Ltd.	rites Ltd.
Precision Tech Enterprises	Rockwell Automation India Ltd.
Punj Lloyd Ltd.	Royal Sales Corporation
Punjab Communications Ltd.	Ruchi Soya Industries Limited
Safaltek Software Pvt. Ltd	SPANN Ltd.
Saha Institute of Nuclear Physics	Spice Net Ltd.
Sarup Tanneries Ltd.	SPL Industries Ltd.
SEL Manufacturing Co. Ltd	Sporting India Ltd.
Semiconductor Complex Ltd.	ST Microelectronics
Shriram Group	Steel Authority of India Limited
Siemens Public Communications Networks Pvt. Ltd.	Subros Ltd.
Simon Carves India Ltd.	Syngenta India Ltd.
Solid State Physics Laboratory	Tata Consultancy Services Ltd.
Sona Koya Steering Systems	Tata Honeywell
Southern Railways	Tata Infotech Ltd.
Tata Institute of Fundamental Research	TVS Infotech
Tata International Ltd.	TVS Suzuki
Tata Motors Ltd.	U.P.State Bridge Corporation Ltd.
Tata Teleservices Ltd.	Vardhman Textiles Ltd.
Telecommunications Consultants India Ltd.	Virtual Solutions Ltd.
TeleMune Software Solutions Pvt. Ltd.	Volvo India Ltd.
Tellabs Communication	Walchemist Pvt. Ltd.
Texas Instruments	Wep Peripherals Ltd.
TriCAD Design Consultants Pvt. Ltd.	Whirlpool
Trident	Winsome Textile
Winsome Yarns Limited	Xansa
Wipro Infotech Ltd.	Yamaha Motor India Pvt. Ltd.

5.0 RESEARCH AND DEVELOPMENT ACTIVITIES**5.1 Ph.D Programmes- Existing and Proposed**

Existing Ph.D Programmes
Bio Technology
Chemistry
Mathematics
Physics
Chemical and Bio Engineering
Civil Engineering
Computer Science and Engineering
Electronics and Communication Engineering
Industrial Engineering
Instrumentation and Control Engineering
Textile Technology
Management
Mechanical Engineering

5.2 Details of Ph. D done so far: 83**5.3 Proposed Plan for research**

Interdisciplinary Research and Development Centre is being set up for which space and finance is has been sanctioned.

5.4 Institute- Industry Collaboration : NIL**5.5 Innovations and Technology transfer**

Department is planning to tie up with other institutes and renowned industries under TIFAC for new innovative ideas and technology transfer.

6.0 THE COUNCIL, BOG AND OTHER COMMITTEES**6.1 Institute's Council**

(Refer Annexure 11.1)

6.2 Board of Governors

(Refer Annexure 11.2)

6.3 Finance Committee

(Refer Annexure 11.3)

6.4 Building & Works Committee

(Refer Annexure 11.3)

6.5 SENATE

(Refr Annexure 11.3)

6.6 OTHER COMMITTEES

(Refr Annexure 11.3)

7.0 CONCESSIONS FOR SC's, ST's HANDICAPPED STUDENTS**7.1 Concessions Provided for Students**

As per government norms

7.2 Concessions Provided for Staff Nil**8.0 FINANCIAL STATUS****8.1 Analysis of Plan and Non-Plan Grants****Plan Grant**

Plan grant is meant for capital nature expenditure. The expenditure on construction of buildings, purchase of equipments and other facilities. The other facilities include the following subheads:-

- Furniture and fixture
- Library (Books and equipment)
- Transport
- Office equipment
- Providing AC in the Lab
- Medical equipment
- Telephone exchange
- Audio and visual teaching aids
- Sports amenities
- Up gradation of classroom

Non Plan Grant

The expenditure of revenue nature i.e. salary and allowances, TA/DA, medical reimbursement, training cost, campus maintenance, library expenses and other contingent expenditure are met from the Non Plan Grant. Normally the whole grant is being utilized for the purpose for which it is sanctioned and the utilization certificate is sent to the ministry

accordingly.

8.2 Sources of Funds

The whole Plan and Non plan grants are being received from the Ministry of Human Resource Development (MHRD), New Delhi.

During the year under report a sum of Rs.1500.00 lacs and Rs.2700.00 lacs under Plan & Non Plan grant were received respectively.

The expenditure for the year 2014-15 is Rs 1329.01 Lacs and Rs 4342.78 Lacs under Plan and Non Plan respectively.

8.3 Expenditure position for last three years

Year	Plan	Non Plan
2012-13	4371.13	3441.95
2013-14	5364.05	4135.38
2014-15	1329.01	4342.78

9.0 CENTRAL FACILITIES AND SERVICES

9.1 Annual Report 2014-2015

9.2 Workshops

9.3 Library

Introduction:

Digital revolution and flood of print literature on our academic scene has enhanced the value and responsibilities of our libraries. This scenario on the one hand has enhanced the responsibilities of the Library officers and on the other hand has given liberty to the users to use the library from remote locations as well. A library exists to support teaching and research programs of an educational Institute, to provide facilities for general reading and to disseminate information according to the requirements of its users. Keeping in view all these things Central Library, Dr. B. R. Ambedkar National Institute of Technology was established in 1987 (the same year this institute was established). Since then this center of learning has been functioning with the aim of encouraging self-learning and to supplement academics, boost research and development activities and to promote consultancy activities. The Institute possesses a growing Library. At present central library is housed in a multistoried air-conditioned building situated in the midst of all departments and hostels and is easily accessible to all. For smooth functioning of the library it has been divided into different sections and readers have been allowed open access to the library holdings.

Librarian's Profile:

Name	Academic/Professional qualifications	Post held	Specialization
Dr. Sarbrinder Kaur	Ph.D (Library and Information Science)	Librarian	Reference/ Information service

Library Hours

The Library remains open throughout the year except on Gazetted holidays and any other holidays declared as a special holiday. It remains open from 9.00 A.M. to 9.00 P.M. from Monday through Saturday and during Minor and Major examinations up to 12.00 mid-night.

Library Resources

• **Collection**

The central Library, NIT, Jalandhar has a strong collection pertaining to engineering and technology, biotechnology, computer and information technology, and management.

The collection of the Library has grown to 1, 29,320 as on 31st March, 2014 including books (both print and digital format), bound volumes of journals, standards, technical reports, video cassettes and DVDs /CDs. The Library has approximate collection over 12000 books under Text and Book Bank schemes to support undergraduate studies. The reference collection in the Library is maintained separately and is categorized into atlases, bibliographies, handbooks, directories, dictionaries, encyclopedias and Technical data. The Library provides access to more than 2300 online electronic journals and standards, and caters to the demand-based procurement of specialized documents such as patents, standards and specifications and other literature required for teaching and research purpose.

• **Video Library**

The Library is equipped with video viewing facility consisting 29" TV, VCP, Multimedia projector. It has a collection of more than 1,620 videocassettes and CDs and other virtual information resources.

• **Reference Collection**

The Library maintains a separate reference collection consisting of encyclopedias, dictionaries, handbooks, technical data, almanacs, atlases, bibliographies, etc. The reference collection is further organized in sub-categories

- **Electronic Journals and Online Bibliographic Databases**

The library subscribes to a good number of current journals in print. Besides, the institute has access to over 2200 full-text electronic journals. Through the INDEST-AICTE Consortium bibliographic database of the holdings (Periodical publications) of all IITs, IIMs, IISc is available to the Institute through JCCC- J-Gate Custom Contents for Consortia. Members of this Institute are entitled to get hard copy of any article / paper from periodical publications available with IITs and IIMs free of any Charges. For this they just need to submit an online requisition to the institute holding that particular publication.

- **Computer and Networking Infrastructure**

The library has its own Sub-LAN, which, in turn, is connected to the Campus LAN. Database of the library holding is accessible to all in the Institute campus.

Library Services and Facilities

- **Reader's Assistance**

The Library provides assistance to its users ranging from ranging from location of a book to finding specific information required by a user.

- **Untraceable publication register:-**

Untraceable publication register is kept on each floor for users to note down the bibliographic details of the publications not found on shelves. Members are intimated about the status of their request on phone or personally.

- **Reservation of publications: -**

All registered library members are entitled to avail reservation facility however only one title is reserved at a time and the concerned reader is informed immediately on receipt of the reserved title in the library.

- **Suggestions:**

Suggestions and complaints from library members are always welcome. They can make such suggestions/complaints orally or in writing directly to the librarian.

- **Circulation of Books and Library Membership**

The library members, according to their borrowing category can borrow stipulated number of books at a time. During the period under report about 98,000 volumes were borrowed by the members of the Library from general collection. The membership of the Library for different categories of readers is as below:

Undergraduates	3181
Postgraduates	584
Research Scholar	63
Faculty	209
Non-Teaching Staff	180
Total	4217

In addition, consultation facilities were extended to around 232 users including students, research scholars and faculty members belonging to other academic institutions.

- **Inter Library Loan (ILL) and Resources Sharing Facility**

The Library arranges to procure books and journals from other libraries on Inter Library Loan (ILL) and Document Delivery Services (DDS). Xerox copies of research articles are also arranged from other IITs under a resource sharing agreement signed by all IITs. Demand based procurement of research publications, photocopies of research articles etc. was done from other IITs and institutions in Delhi as well as from other parts of India.

- **Document Delivery service:-**

Under this service faculty and scholars of the Institute are entitled to get reprints/photocopies of research papers from the Institute library. Under this facility information is procured from all over India through NISCAIR (National Institute for Science Communication and Information Resources) NIT is maintaining a permanent account with NISCAIR to ensure uninterrupted supply of required information to the faculty. This service is being provided free of cost to the faculty. The JCCC interface, made available through the INDEST Consortium that facilitates inter-Library loan and document delivery amongst IITs and IISc, was used extensively.

- **Book Bank Facilities**

The Book Bank holds multiple copies of selected textbooks for making them available to the students for the entire duration of a semester. Students are being given this facility free of any charges. 3500 new books were added to book bank under the grant received from SC & ST welfare department, Government of Punjab. During the year under review, 2930 students (including SC/ST students) availed the benefit of the Book Bank Scheme. A total number of 10000 volumes were borrowed by students from book bank. Apart from regular lending of books to members, providing reading room facility, and reference service, central library provides the following services: -

- **Internet Facility/ access to online learning resources: -**

All library members are allowed to use this facility.

- **Media resource center/Audio –visual section:-**

Central library has a good collection of videocassettes and CDs. Video shows are organized from time to time. Media resource center is equipped with the equipments as detailed below:-

- Television with 29" screen
- Video cassette player (VCP)
- Pentium IV based system
- Multimedia projector and projection screen

Library Visitors data

Average number of users per day over the last two semesters : 323

Average number of books issued per day over the last two semesters : 300

Virtual library:

A virtual library under the name of **INDEST**-Indian National Digital Library in Sciences and Technology provides desktop access to more than two third of the worlds periodical literature to all members of this library. These web based electronic resources has expedited the delivery of information to the researchers. Under this virtual library following resources are available for NIT:

IEL- IEE / IEEE ELECTRONIC LIBRARY: Periodical publications of IEE & IEEE

ASME ONLINE: Periodical publications of American Society of Mechanical Engineers.

ASCE ONLINE: Periodical publications of American Society of Civil Engineers.

ACM DIGITAL LIBRARY: Periodical publications of Americans Society for Computing Machinery.

SCIENCE DIRECT: Periodical publications of Elsevier Science and Academic press.

SPRINGER VERLAG: Periodical publications of Springer Verlag

Nature Online: A Multidisciplinary Journal

Indian Standards (IS) Total collection of Indian Standards published by Bureau of Indian Standards has become available online to the institute w.e.f. January, 2004

(It is an intranet version)

ASTM standards and journals: All ASTM standards and journals are available online.

Emerald online journals in various fields of engineering and management

EBESCO- Textile Technology Complete- a database in the field of Textile Technology

JCCC -J- Gate Custom contents for Consortia: It is a bibliographic database of the holdings (periodical publications only) of all IITs and IIMs. Members of this Institute are entitled to get hard copy of any article / paper from periodical publications available with IITs and IIMs. For this they just need to submit an online requisition to the institute holding that particular publication.

Membership Eligibility:

1.	Individual Members	Regular students and faculty of the institute
2.	Project staff	All officers and staff engaged in project and any other such activity.
3.	Special members	The visiting Faculty with the approval of the competent authority
4.	Temporary permission	Researchers /Scholars from other Institutes/Universities whom advisory services are rendered by the faculty of NIT, Jalandhar are permitted to use the library resources on producing identity slip duly signed by the respective faculty member.

Members Entitlement:

Category	Maximum number of documents	Refundable security, if any
Faculty/ Academic staff	12 (6 on long term)	
Non- Academic officers and staff-depending upon the category	1-10	
Students:		
B. Tech	02	
Book bank (weaker section)	02-04 (for full semester)	
Book bank (General) (For all students)	02-04 (for full semester)	Rs.1000.00

M,Tech	06	For full degree course
Research Scholars	06	
Visiting faculty	05	
Special members	According to category	
Project staff	As per requirement	

Duration of loan:

Type of Document	Type of Loan	Duration of loan
Books and monographs	Short term	14 days
	Long Term	one semester
Documents purchased under project grants	Long Term	Till the completion of the project
Electronic/Digital documents viz: CDs, DVDs, cassettes etc.	Short term	1day
<ul style="list-style-type: none"> ➤ Individual members ➤ Dept./Centers 		1 week

Procurement of books:-

Books / other documents are procured in the library against the suggestion/recommendations received from the departments/centers in the prescribed form available in the library. Student's suggestions are also incorporated while finalizing the purchase decision.

- Till the year ending March 2015 Library had a collection of 1, 28,500 volumes comprising of Books, Standards, theses, CD ROM, bound volumes of Journals and video cassettes pertaining to various disciplines of Science, Engineering and Technology. Library holds a balanced collection of both print and electronic/digital media. During the year ending March 31st, 2015 library provided access to E- books and e-journals from the major publishers like- Elsevier, IEEE,IET, ASME- American Society of Mechanical Engineers , ASCE-American Society of Civil Engineers, ACM- American society of Computing Machinery, ASTM- Journals and standards, EBSCO host. Library is having a rich Book bank and is lending text books to SC/ST and General Category student for the whole session.
- Library is using LibSys Software for automation of in-house activities of Library and OPAC services to its users. For overall supervision and surveillance whole of the library building is under 24 hour surveillance of CCTV cameras.

During the financial year central library NIT Jalandhar was sanctioned an amount of Rs.325 lacs for purchase of learning resources in both print and digital formats I addition to the other infrastructural requirements.

9.4 Laboratories (Further details at 43-135)**Department of Biotechnology**

- Biochemistry Laboratory
- Bioprocess Engineering Laboratory
- Molecular Biology and Genetic Engineering Laboratory
- Immunology Laboratory
- Cell and Tissue Culture Laboratory
- Separation Process in Biotechnology Laboratory
- Bioinformatics Laboratory
- Bioprocess Modelling and Simulation Laboratory
- Environmental Biotechnology Laboratory

Department of Chemical Engineering

- Computational and Simulation Lab
- Mass Transfer Lab
- Heat Transfer Lab
- Mechanical Operation Lab
- Pollution Abatement Lab

- Fluid Mechanics Lab
- Chemical Technology Lab
- Rubber Technology Lab
- Pollution Abatement Lab
- Post Graduate Research Lab
- Instrumentation Analysis Lab

Department of Chemistry

- UG Lab
- PG Organic Lab
- PG Inorganic Lab
- PG Physical Chemistry Lab
- ICA (instrumental Chemical Analysis) Lab
- R&D Lab
- CCL(Computational Chemistry Lab)

Department of Civil Engineering

- Concrete Technology
- CAD Laboratory
- Environmental Laboratory
- Hydraulics laboratory
- Geotechnical Laboratory
- Materials Testing Laboratory
- Structural Analysis Laboratory
- Surveying Laboratory

Department of Computer Science and Engineering

- Information and Security Lab under ISEA by MCIT, New Delhi.
- Software Engineering & Operating Systems Laboratory
- RDBMS & Programming Language Laboratory
- Data Communication & Computer Networks Laboratory
- Microprocessor & Digital Circuit & Logic Design Laboratory
- Wireless Sensor Networks Laboratory
- Embedded System Laboratory
- Image Processing and Pattern Recognition Laboratory
- Computer Graphics Lab.
- Natural Language and Pattern Recognition Lab.
- Project Lab. For M Tech.
- Wireless and Optical Networks Lab.
- Microprocessor Lab.

Department of Electronics and Communication Engineering

- VLSI Design Lab
- Microwave Engineering Lab
- Digital Signal Processing Lab
- Emerging Technologies Lab
- Biomedical Signal Processing & Telemedicine Lab
- Medical Imaging and Computational Modeling of Physiological Systems- Research Laboratory
- Nan electronics Research Laboratory
- Basic Electronics Lab
- Communication System Lab
- Digital Electronics Lab
- Embedded System Lab
- Devices & circuit Lab

Department of Humanities and Management

- English Communication Laboratory
- Computer Laboratory

Department of Industrial Engineering

- Metrology and Mechanical Measurements
- Work Study and Ergonomics Lab
- Computational and CAD Laboratory
- Modern Tool Room /Non Traditional Machining Methods Laboratory
- Statistical quality and control Laboratory
- CAM & Automation laboratory (CAMAL)
- Metallurgy and Heat Treatment Laboratory

Department of Instrumentation and control Engineering

- Analytical Instrumentation Laboratory
- Biomedical Instrumentation Laboratory
- Control Engineering Laboratory
- Electrical Machines Laboratory
- Fabrication Unit and Transducers Laboratory
- Measurement and Circuit Laboratory
- Microprocessor based Instrumentation Laboratory
- Computing Laboratory
- Process Control Instrumentation Laboratory
- Robotics Laboratory
- Signal Processing Laboratory
- Virtual Instrumentation Laboratory
- Human Machine Interface Laboratory
- Wireless Networks Laboratory

Department of Mathematics

Department of Mechanical Engineering

- Fluid Machinery
- Heat Engines
- Vibrations
- Refrigeration and Air Conditioning
- Theory of Machines
- Mechanical Measurement
- Automation and Mechatronics
- Experimental Stress Analysis
- Automobile Engineering

Department of Physics

Under Graduate Laboratories

- Applied Physics Laboratory
- Material Science Laboratory

Post Graduate Laboratories

- Fiber Optics and Laser Laboratory
- Electronics Laboratory
- Scientific Computation Laboratory
- Solid State Physics Laboratory
- Nuclear Physics Laboratory
- Plasma Physics Laboratory
- Spectroscopy Laboratory

Research Laboratories

- Radiation Research Laboratory
- Computational and High Energy Laboratory
- Liquid Crystal Research Laboratory

Department of Textile Technology

- Yarn Manufacture Laboratory
- Fabric Manufacture Laboratory
- Textile Chemical Processing Laboratory
- Textile Testing Laboratory

9.5 Dispensary, Post Office, Shopping Centre

The campus is self contained having shopping complex, computerized Banks, Post office, Dispensary and other facilities essential for community living.

9.6 Physical Facilities

Faculty Club, Students Activity Center, Guest House

9.7 Games and Sports Facilities

Outdoors Games Facilities

SR. NO.	OUTDOOR GAMES	FACILITIES AVAILABLE
1	Athletics	400 meter Standard Track & Field
2	Cricket	Standard Cricket ground
3	Football	Standard Football ground
4	Basket ball	Two Basket Ball Standard Cemented Courts with Full Flood Lights & Sitting Arrangement
5	Volley ball	Three Volleyball standard grounds with Full Flood Lights & Sitting Arrangement
6	Lawn Tennis	Two Lawn Tennis Cemented courts With Full Flood Lights

Indoor Games Facilities

SR. NO.	INDOOR GAMES	FACILITIES AVAILABLE
1	Badminton	Four Wooden Badminton Courts With Light, Sitting Arrangement and Specific Gym Equipments in Badminton Indoor Hall.
2	Table Tennis	T.T. Table is available in each hostel in addition to that Six tables are available in the Indoor Badminton hall with Lights, Sitting Arrangement and Specific Gym Equipments.
3	Carom	Covered space is available in each hostel in addition to that Carom Boards are available in the Indoor Badminton Hall with Lights Sitting Arrangement and Specific Gym Equipments in Badminton Indoor Hall.
4	Chess	Covered space is available in each hostel in addition to that Chess Boxes are available in the Indoor Badminton Hall with Lights Sitting Arrangement and Specific Gym Equipments in Badminton Indoor Hall.

Weight Training Gymnasium Facility

1	Multipurpose Modern Training facilities	Weight training gymnasium is available in the students Activity Center, fully equipped with Modern Weight Training equipments.
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9.8 Other Facilities like Hostels, Messes, Staff Quarters and Adminstration etc

- Guest House
- Community Centre
- Hostels: 8 Boys, 3 Girls
- Messes:9
- Staff Quarters

10 NOTABLE ACHIEVEMENTS**DEPARTMENT OF INDUSTRIAL & PRODUCTION ENGINEERING (IPE)**

No. of Journal publications(International)	14	No of PhD students completed till date	09
No. of Journal publications(National)	01	No. of new PhD students enrolled	06
No. of STC/ Workshops conducted	02	No. of M. Tech students completed	27
No of expert talks delivered by faculty	13	No. of M. Tech guidance in progress	23
No. of STC/ Workshops/conferences attended	02	No. of new M. Tech students enrolled	31

DEPARTMENT OF HUMANITIES AND MANAAGEMENT

No. of Journal publications(International)	01	No. of New PG students enrolled	23
No. of STC/ Workshops/Seminar conducted	01		

DEPARTMENT OF PHYSICS

No. of Journal publications(International)	31	No. of PhD completed	01
No. of Journal publications(National)	04	No. of new PhD students enrolled	04
No. of International Conferences attended	00	No. of New PG students completed	19
No. of National Conferences attended	02	No. of New PG students enrolled	19
No. of STC/ Workshops conducted	01	No. of expert talks organized	01
No of expert talks delivered by faculty	07		

DEPARTMENT OF CHEMISTRY

No. of Journal publications(International)	67	No. of PhD completed	5
No. of Journal publications(National)	9	No. of new PhD students enrolled	21
No. of National Conferences attended	16	No. of New PG students completed	11
No. of STC/ Workshops conducted	19	No. of New PG students enrolled	16
No of expert talks delivered by faculty	12		

DEPARTMENT OF BIOTECHNOLOGY (BT)

No. of Journal publications(International)	01	No. of PhD completed	02
No of expert talks delivered by faculty	02	No. off faculty members Upgraded qualifications	01
No. of expert talks organized	01		

DEPARTMENT OF CHEMICAL ENGINEERING (CH)

No. of Journal publications(International)	16	No. of PhD completed	03
No. of Journal publications(National)	03	No. of new PhD students enrolled	03
No. of International Conferences attended	07	No. of New PG students completed	27

No. of National Conferences attended	01	No. of New PG students enrolled	20
No. of STC/ Workshops conducted	04	No. of faculty members enrolled for higher qualifications	Nil
No of conferences conducted	01	No. off faculty members Upgraded qualifications	02
No of expert talks delivered by faculty	04	Any other important information	
No. of expert talks organized	04		

DEPARTMENT OF CIVIL ENGINEERING

No. of Journal publications(International)	5	No. of PhD completed	03
No. of Journal publications(National)	1	No. of new PhD students enrolled	05
No. of STC/ Workshops conducted	01	No. of New PG students completed	27
No of expert talks delivered by faculty	03	No. of New PG students enrolled	27
		No. of faculty members enrolled for higher qualifications	02

DEPARTMENT OF ELECTRONICS AND COMMUNICATION ENGINEERING (ECE)

No. of Journal publications(Inter.)	36	No. of expert talks organized	08
No. of STC conducted	04	No of PhD students completed	05
No. of Mtech students completed	26	No of new PhD students enrolled	14
No of New MTech students enrolled	32	No of conferences/STC attended	15

INSTRUMENTATION AND CONTROL ENGINEERING

No. of Journal publications (International)	14	No. of PhD completed	02
No. of Journal publications (National)	05	No. of new PhD students enrolled	05
No. of International Conferences attended	08	No. of New PG students completed	22
No. of National Conferences attended		No. of New PG students enrolled	25
No. of STC/ Workshops conducted	02	No. off faculty members Upgraded qualifications	02
No of expert talks delivered by faculty	06	No. of expert talks organized	03

COMPUTER SCIENCE AND ENGINEERING

No. of Journal publications(Inter.)	15	No. of expert talks organized	-
No. of Journal publications(Nat.)	01	No of PhD students completed	02
No. of STC conducted	01	No of new PhD students enrolled	09
No of workshops/ conferences conducted	01	No of New M Tech students enrolled	30
No. of M Tech students completed	34	No of conferences attended	10

11 ANNEXURES**11.1 Insitute's Council****The Council**

- (1) With effect from such dated as the Central Government may, by notification, specify in this behalf, there shall be established for all the Institutes specified in column (3) of the Schedule, a central body to be called the Council.
- (2) The Council shall consist of the following members, namely:-
 - (a) The minister in charge of the Ministry or Department of the Central a Government having administrative control of the technical education, ex officio, as Chairman;
 - (b) The Secretary to the Government of India in charge of the Ministry or Department of the Central Government having administrative control of the technical education, ex officio, as Vice-Chairman;
 - (c) The Chairperson of every Board, ex officio;
 - (d) The Director of every Institute, ex officio;
 - (e) The Chairman, University Grants Commission, ex officio;
 - (f) The Director General, Council of Scientific and Industrial Research, ex officio;
 - (g) Four Secretaries to the Government of India to represent the Ministries or Departments of the Central Government dealing with biotechnology, atomic energy, information technology and space, ex officio;
 - (h) The Chairman All India Council for Technical Education, ex officio;
 - (i) Not less than three, but not more than five persons to be nominated by the Visitor, at least one of whom shall be a woman, having special knowledge or practical experience in respect of education, industry, science or technology;
 - (j) Three members of Parliament, of whom two shall be chosen by the House of the People and one by the Council of States;
 - (k) Two Secretaries to the State Government, from amongst the Ministries or Departments of that Government dealing with technical education where the Institutes are located, ex officio;
 - (l) Financial Advisor, dealing with the Human Resource Development Ministry or Department of the Central Government, ex officio;

(m) One offer not below the rank of Joint Secretary to the Government of India in the Ministry or department of Central Government having administrative control of the Technical Education, ex officio, as Member-Secretary.

11.2 Board of Governors

CONSTITUTION OF BOARD OF GOVERNORS		
Sr. No	To whom Represented	Name of the Hon'ble Member
1.	The Chairperson to be nominated by the Visitor	Mr. Rajiv Mehrotra, Founder & Chairman, Shyam Telecommunications Group & Vihaan Networks Limited, 21-B, Sector-18, Udyog Vihar, Gurgaon, Haryana- 122015
2.	Director of the Institute	Professor I K Bhat, Director, Dr B R Ambedkar NIT, Jalandhar
3.	Director of Indian Institute of Technology to be nominated by the Central Government.	Professor M. K. Surappa, Director, Indian Institute of Technology Ropar, Nangal Road, Rupnagar, Punjab-140001
4.	Nominee of the MHRD, Govt. of India.	Sh Amarjeet Sinha, Additional Secretary (T), Ministry of Human Resource Development, Department of Higher Education, Government of India, Shastri Bhawan, New Delhi-110001.
5.	Nominee of the MHRD, Govt. of India.	Sh Yogendra Tripathi, Joint Secretary and Financial Advisor, Integrated Finance Bureau, Ministry of Human Resource Development, Government of India, Shastri Bhawan, New Delhi-110001.
6.	Nominee of the Institute' Senate	Professor M K Jha, Department of Chemical Engineering, Dr B R Ambedkar NIT, Jalandhar.
7.	Nominee of the Institute' Senate	Sh M D Roy, Associate Professor, Department of Textile Technology, Dr B R Ambedkar NIT, Jalandhar
8.	Section 18 Clause (2)	Sh Ajit Singh, Registrar & Secretary (Board of Governors), Dr B R Ambedkar NIT, Jalandhar.

CONSTITUTION OF FINANCE COMMITTEE		
Sr.No	To whom Represented	Name of the Hon'ble Member
1.	Ex-officio, who shall be the Chairman of the Committee	Mr. Rajiv Mehrotra, Founder & Chairman, Shyam Telecommunications Group & Vihaan Networks Limited, 21-B, Sector-18, Udyog Vihar, Gurgaon, Haryana-122015
2.	Director, Ex-officio member	Professor I K Bhat Director, Dr B R Ambedkar National Institute of Technology, Jalandhar.
3.	Joint Secretary dealing with NIT or his nominee and Financial Advisor (Human Resource Development) or his nominee members;	Sh Yogendra Tripathi, Joint Secretary and Financial Advisor, Integrated Finance Bureau, Ministry of Human Resource Development, Government of India, Shastri Bhawan, New Delhi-110001.

4.	Ex-officio Member Secretary	Sh Ajit Singh, Registrar & Secretary (Board of Governors), Dr B R Ambedkar NIT, Jalandhar.
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INSTITUTE' SENATE

Sr.No	To whom Represented	Name of the Hon'ble Member
1.	Ex-officio, Chairman of the Senate	Professor I K Bhat Director, Dr B R Ambedkar NIT, Jalandhar
2.	Representing the field of Science	to be nominated
3.	Representing the field of Engineering	to be nominated
4.	Representing the field of Humanities	to be nominated
5.	The Professors appointed or recognized as such by the institute for the purpose of imparting instructions in the institute	All Professors of NIT, Jalandhar.
6.	Member Secretary	S Ajit Singh, Registrar & Member Secretary, Dr B R Ambedkar National Institute of Technology, Jalandhar.

MEMBERS OF BUILDING & WORKS COMMITTEE

Sr. No	To whom Represented	Name of the Hon'ble Member	Contact No. and e-mail address, if any.
1	Ex-officio, who shall be the Chairman of the Committee	Professor I K Bhat, Director & Chairman, BWC Dr B R Ambedkar National Institute of Technology, Jalandhar.	0181-2690802(O) 0181-2690301, 2690453 Ext.1000/1001 (O) 0181-2690932 (Fax) director@nitj.ac.in
2	Nominated by the Central Government not below the rank of Director or Deputy Secretary	The Director, (NITs) Ministry of Human Resource Development, Department of Higher Education, Shastri Bhawan, New Delhi.	011-23070177 (O) 011-23384345(Fax) technicalsection3@yahoo.co.in
3	Dean, Planning and Development	Dr Arvind Agnihotri, Dean, Planning & Development, Dr B R Ambedkar National Institute of Technology, Jalandhar-144011	0181-2690301, Ext:2304
4	Nominee of the CPWD of the PWD (Civil Wing)	Er S S Wahist, Superintending Engineer (Civil) Jalandhar Central Circle, CPWD, 448, GTB Nagar, Jalandhar-144003	0181-2440804 (O) 0181-2440047 Fax 08146520999 (M) eejld@yahoo.com
5	Nominee of the CPWD of the PWD(Electrical Wing)	Er Rajeev Sao, Superintendent Engineer(Electrical), CPWD, Jammu Central Electrical Circle, Kendrya Sadan, Sector-9 A, Chandigarh -160009	0172-2791401 0172- 2792401 0172 -2795401 (Fax)
6	Ex-Officio Member Secretary	S Ajit Singh, Registrar & Member Secretary, Dr B R Ambedkar National Institute of Technology, Jalandhar.	0181-2690324(O) 0181-2690320(Fax) registrar@nitj.ac.in

11.3 OTHER COMMITTEES**11.4 Research Projects and Consultation Jobs****Students Participation in Co-curricular Activities**

- Fellowship/Awards

- One INSPIRE fellowship
- **Technical Event (techNiti-2015)**

Student of NIT Jalandhar organized Technical Event (techNiti-2105) from 27, February 2015 to 1 march 2015. The events in techNiti15 were mainly aimed at improving the technical skills of students and prove to be the ultimate test of grit, knowledge and skill and also provide a perfect platform for the best brains to interact and compete with each other. 'techNiti15' has a rich mixture of technical as well as non-technical events, so there is always something for anyone.

Cultural Event (Utkansh)

Student of NIT Jalandhar organized Cultural Event (Utkansh) in 20-22 March 2015. Utkansh15 is the annual cultural fest of NIT Jalandhar.

Expert Lectures organized/delivered (2014-2015)

Sr No.	Title	Deptt.	Delivered by	Organized by	Date
1	Role of Indian Institute of Chemical Engineers towards growth of Chemical Engineering Students	Chem. Engg	Dr. M K Jha	Expert Lecture	August 30, 2014
2	Exploration and Production of Hydrocarbon Industry	Chem. Engg	Dr. M K Jha	Expert Lecture	August 09, 2014
3	Fossil fuels viz a viz environmental issues	Chem. Engg	Dr Ajay Bansal	Recent Advances in Energy Technology at NIT Jalandhar	June 2-6, 2014
4	Studies on the Properties of Partially Biodegradable Polymers	Chem. Engg	Dr. Sangeeta Garg	Recent Advances in Energy Technology at NIT Jalandhar	June 2-6, 2014
5	Fracture Mechanics for Mechanical Engineers and Researchers	IPE	Dr Shailendra Singh Bhaduria	Sagar Institute of Research & Technology Bhopal	5 th Feb 2015
6	Condition monitoring-A case study for Wind Turbines	IPE	Dr. Vishal S Sharma	STC on Fundamentals of Tribology, Mechanical Engineering, NIT Hamirpur	28 th May 2014
7	How To Write A Research Proposal	IPE	Dr. Shailendra Singh Bhaduria	Oriental Institute of Science & Technology Bhopal	7 th Feb 2015
8	a. Quality Function Deployment b. MCDM Techniques	IPE	Dr Anish Sachdeva	TEQIP-II Sponsored Short Term Course "Quality Management System Issues, Tools and Implementation aspects" held at NIT Hamirpur from July 12-16, 2014	July 14, 2014
9	Keynote address and expert talk on Design of Experiments	IPE	Dr R K Garg	STC of Design of Experiments and its applications in Research at PEC Chandigarh	12 th January 2015
10	Quality Audit	IPE	Prof R K Bansal	Application of Six Sigma in Indian Industry at NIT Jalandhar	June 11, 2014
11	Lean Six Sigma	IPE	Dr L P Singh	Application of Six Sigma in Indian Industry at NIT Jalandhar	June 12, 2014
12	Probability Distribution & hypothesis testing significance	IPE	Dr Anish Sachdeva	Application of Six Sigma in Indian Industry at NIT Jalandhar	June 12, 2014
13	Theory of Constraints & Six Sigma	IPE	Dr Ajay Gupta	Application of Six Sigma in Indian Industry at NIT Jalandhar	June 13, 2014
14	Case Analysis	IPE	Dr S S Bal	Application of Six Sigma in Indian Industry at NIT Jalandhar	June 13, 2014
15	Industrial Engineering	IPE	Dr L P Singh	LPU, Phagwara	11 th Feb, 2015
16	Fundamental concepts of Theory of constraints	IPE	Ajay Gupta	Inter- disciplinary workshop at Global Institute Amritsar	Jan -2015

17	Fundamentals of Electrodynamics	PHY	Dr. Arvinder Singh	Invited Lecture for P. G Students	13/02/2015
18	Flame Synthesis of Carbon Nanotubes using Domestic Fuels	PHY	Dr..Jyoti Bharaj	Second International Conference on Nanostructured Materials and Nanocomposites	20.12.2014
19	Nanotechnology: A route to Carbon Nanotubes	PHY	Dr..Jyoti Bharaj	Talk for Students at Rayat Bahra Institute at Hoshiarpur	17.3.2015
20	Health Risk Assessment Due To Natural Radionuclides In Environs	PHY	Dr Rohit Mehra	Expert talk at Arni University, Kathgarh, Himachal Pradesh	05/11/2014
21	Introduction to Nano technology its synthesis and characterization	PHY	Dr Rohit Mehra	Expert Talk at ACET, Amritsar, Punjab.	17/10/2014
22	Nuclear Radiations and Particle Detectors	PHY	Dr Rohit Mehra	Expert Talk at Baba Farid College, Bathinda, Punjab	10/10/2014
23	Assessment of Radiological Risks due to Radionuclides in the Environs	PHY	Dr Rohit Mehra	Extension Lecture at KMV, Jalandhar	01/08/2014
24	Smart Materials	PHY	Dr Rohit Mehra	STC on Innovation and Futuristic Trends in Advance Manufacturing and Nanotechnology at DAVIET, Jalandhar	09/07/2014
25	Optical wave Guiding-Light Propagation, Modes and Fibre Configuration	PHY	Dr Rohit Mehra	STC on Advances in OFC Technology, organized by NITTR at MIMIT, Malout	07/07/2014
26	Use of Engineering Materials for measurement of natural Radioactivity.	PHY	Dr Rohit Mehra	Seminar Under TEQIP-II at GZS-PTU Campus , Bathinda	07/03/2014
27	Flavor and Spin Structure of the Baryons	PHY	Dr. Harleen Dahiya	Recent Advances in High Energy Physics Workshop	26 Feb 2015
28	Big Bang, God's Particle and The Large Hadron Collider	PHY	Dr. Harleen Dahiya	Invited lecture	25 March 2015
29	Liquid Crystal Displays: Recent Advances	PHY	Dr Praveen Malik	Expert talk for B.Tech Students Organized by Amritsar college of engineering and Technology, Amritsar	17-3-2015
30	Frontiers in Chemical Sciences and Technology	CY	Dr. B.S. Kaith	NIT Jalandhar	December 08, 2014
31	Recent Advances in Energy Technology	CY	Dr. B.S. Kaith	NIT Jalandhar	June 2 – 6, 2014
32	Recent Advances in Energy Technology	CY	Dr. B.S. Kaith	NIT Jalandhar	June 2 – 6, 2014
33	Graphine oxides as a low cost composite with cement matrix as new building material	CY	Dr N C Kothiyal	Annual National Conference of HIM Science Congress Association, HP Science Emerging Scenario & Future Challenges II, 17-18 May 2014, HFRI Shimla	18 May 2014
34	CNT Cement Nanocomposite	CY	Dr N C Kothiyal	UGC Refresher course GNDU, Amritsar	27 May 2014
35	Food Adulterants	CY	Dr N C Kothiyal	UGC Refresher course GNDU, Amritsar	27 May 2014
36	Hydro processing of non edible oil at alternative bio fuel	CY	Dr N C Kothiyal	One Week Short Term Course on Frontiers in Chemical Sciences and Technology	08 December 2014
37	Organic Reactions in Water or on Water	CY	Dr Virender Singh	National Seminar on Green Chemistry, G.H.G. Khalsa College, Guruser Sadhar, Ludhiana	25-26th March 2015,
38	"Organic Reactions and Reagents"	CY	Dr Virender Singh	Baba Farid Engineering Institute, Bathinda, Punjab	Sept. 16, 2014.
39	Quantum Chemistry	CY	Dr Harsh Kumar Manchanda	Frontiers in Chemical Sciences and Technology	14/12/2014
40	Solution Thermodynamics and Ideal Mixing Laws	CY	Dr Harsh Kumar Manchanda	Frontiers in Chemical Sciences and Technology	14/12/2014
41	Solution Thermodynamics of binary liquid mixtures and and Ideal Mixing	CY	Dr Harsh Kumar Manchanda	7th National Conference on Recent Advances in Chemical, Biological	31/01/2015

	Laws			and Environmental Science	
42	HRV Analysis	ECE	Dr. B S Saini	Biomedical Signal Processing	Jan 03-14, 2015
43	Type-2 Fuzzy Logic Systems	ECE	Mamta Khosla	FDP on "Modeling and Simulation Methodologies of Artificial Intelligence in Engineering Applications" held at CT institute of Technology & Research.	March, 23, 2015
44	Classification of ECG Signals	ECE	Indu Saini	Short Term Course on Biomedical Signal Processing at NIT Kurukshetra	6-11-2014
45	Nanoscale Semiconductor Devices	ECE	Dr. Balwinder Raj	Guest Lecture, for B.Tech Electronics and Computer at Universal Institute of Engineering and Technology, Universal Group of Institutions, Lalru, Punjab	18 th March 2015.
46	Low Power Nanoscale Memories Design	ECE	Dr. Balwinder Raj	Guest Lecture for M.Tech, Ph.D Scholars and faculty at Guru Nanak Dev Engineering College, Ludhiana	23 Feb 2015
47	Challenges and Opportunities in VLSI Devices and Technology	ECE	Dr. Balwinder Raj	STC in ECE Dept., NIT Hamirpur, H.P	25 th June, 2014
48	Numerical techniques for engineers	ICE	Dr Dilbag Singh	Inaugural address for AICTE STC on at Amritsar College of Engineering and Technology, Amritsar	30/06/2014
49	Challenges in Bio-medical Engineering	ICE	Dr Dilbag Singh	Dr BR Ambedkar NIT Jalandhar	10/12/2014
50	Robotics: Focused on sensors Fusion	ICE	Dr KS Nagla	At LPU Jalandhar	18/01/2014
51	Recent Trends on Robotics an Overview	ICE	Dr KS Nagla	DAV Institute of Engineering and Technology Jalandhar	17/10/2014
52	Recent Trends on Robotics	ICE	Dr KS Nagla	Dr BR Ambedkar NIT Jalandhar	09/12/2014
53	Recent Trends on Robotics	ICE	Dr KS Nagla	NITTTR Chandigarh	20/02/2015
54	Hydrogen- Energy	ME	S.S. Sandhu	PTU-PITTTR Sponsored FDP on, "Advances in Renewable Energy Technologies" (May 25- 29, 2015) organized by AIET, Faridkot.	25 th May 2015
55	Hydrogen Economy	ME	S.S. Sandhu	PTU Sponsored FDP on, "Emerging Trends in Mechanical Engineering (ETME-15)" (June 8-12, 2015) organized by RIET, Ropar	12 th June 2015
56	Photofermentative biohydrogen production: as effective technology for renewable Bioenergy March	BT	Dr Nitai Basak	1 st International Conference on Recent Advances in Bio-Energy Research ICRABR 2015", held at SSS-NIRE, Kapurthala,	14-17, 2015.
57	Cellulosic ethanol: Alternative energy, , June	BT	Dr A K Jana	sourceShort term training program in 'Recent advances in energy technology' organized by Department of Chemical Eng, NIT Jalandhar sponsored by TEQIP – II	02-06, 2014
58	Reinforced Soil foundations	CE	Dr Arvind K Agnihotri	STC	May 28, 2013
59	Geotechnical Considerations in Earthquake resistant design of structures	CE	Dr Arvind K Agnihotri	STC	May 30, 2014
60	Performance Evaluation of Bamboo Reinforced Concrete	CE	Rizwan A Khan	Short Term Course	29May 2014

11.5 Faculty Positions (available at Sr. No. 2.12)

11.6 Administrative position (available at Sr. No. 2.12)

11.7 Staff Members deputed/Sponsored for Workshop/training, learning

A. Faculty members sponsored for International Conferences Abroad (2014-2015)

Sr. No	Name of Faculty	Designation	Deptt.	Title of the Event	Date
1	Dr. Harsh Kumar Manchanda	Associate Professor	CY	International Conference on "Green Chemistry : Catalysis Energy & Environment" held at Goa University, Goa	22-01-2015 to 24-01-2015
2	Dr. A. Mukhopadhyay	Professor	TT	International Conference of FITECH-2015 held at Cologne, Germany	22-02-2015 to 29-02-2015
3	Dr. A.K Choudhary	Associate Professor	TT	International Conference of FITECH-2015 held at Cologne, Germany	22-02-2015 to 29-02-2015

B. Faculty members sponsored for International Conferences within India (2014-2015)

Sr. No	Name of Faculty	Designation	Deptt.	Title of the Event	Date
1	Dr. KVP Singh	Assistant Professor	TT	Technical Textiles and Nonwovens (ICTN-2014) at IIT, Delhi	05-11-2014 to 09-11-2014
2	Dr. Monica Sikka	Associate Professor	TT	International Conference on Nonwovens and Technical Textiles at IIT, Delhi	06-11-2014 to 08-11-2014
3	Dr. Monica Sikka	Associate Professor	TT	"Nonwovens and Technical Textiles" held at IIT, Delhi	06-11-2014 to 08-11-2014
4	Dr. Lakhwinder Pal Singh	Assistant Professor	IPE	International Ergonomics Conference HWWQ-2014 at IIT , Guwahati	02-12-2014 to 05-12-2014
5	Dr. R S Bharj	Associate Professor	ME	Second International Conference on Nanostructured Materials and Nano Composites (ICNM-2014) at Mahatma Gandhi University, Kottayam, Kerala	19-12-2014 to 21-12-2014
6	Ms. Jyoti Bharj	Associate Professor	PH	Second International Conference on Nanostructured Materials and Nano Composites (ICNM-2014) at Mahatma Gandhi University, Kottayam, Kerala	19-12-2014 to 21-12-2014
7	Ms. Jyoti Bharj	Associate Professor	PH	"Second International Conference on Nanostructured Materials and Nano composites (ICNM) at Kottayam, Kerala , India	19-12-2014 to 21-12-2014
8	Dr. R S Bharj	Associate Professor	ME	"Second International Conference on Nanostructured Materials and Nano composites (ICNM) at Kottayam, 9Kerala , India	19-12-2014 to 21-12-2014
9	Dr. Shailendra Singh Bhadauria	Assistant Professor	IPE	International Conference on "Recent Innovations in science engineering & technology- ICRASET held at Hotel Manvins, Municipal Gardens (East), Church square , Panjim, Goa	28-12-2014
10	Dr. Raghav Raman Sinha	Assistant Professor	MA	"Modeling , Simulation and Optimizing Techniques (ICMSOT-2015) held at DAV College, Jalandhar	12-02-2015 to 14-02-2015
11	Dr. Geeta Partap	Associate Professor	MA	"Modelling , Simulation and Optimizing Techniques (ICMSOT-2015) held at DAV College, Jalandhar	12-02-2015 to 14-02-2015
12	Dr. Ajay Bansal	Associate Professor	CE	Recent Advances in Bio Energy Research held at NIRE Kapurthala	16-03-2015

C. Faculty members sponsored for Short Term Courses/Workshops/National Conferences (2014-2015)

Sr. No	Name of Faculty	Designation	Deptt.	Title of the Event	Date
1	Dr Harsh Kumar	Associate Professor	CY	INSA Visiting Fellowship Programme 2014 at Gujarat	One month
2	Dr. Balbir Singh Kaith	Professor	CY	Workshop on "Developments in Academics and Researches in Engineering Systems at	23-06-2014 to 25-06-2014
3	Dr. Anish Kumar Sachdeva	Associate Professor	IPE	Workshop on "Developments in Academics and Researches in Engineering Systems at	23-06-2014 to 25-06-2014

4	Dr. Vishal S Sharma	Associate Professor	IPE	Training on HPA 711-Electro Hydraulic Automation with PLC at Pune	15-12-2014 to 19-12-2014
5	Dr. Kuldeep Singh Nagla	Associate Professor	ICE	Workshop on "Developments in Academics and Researches in Engineering Systems at	23-06-2014 to 25-06-2014
6	Dr. Dilbag Singh	Associate Professor	ICE	Workshop on "Developments in Academics and Researches in Engineering Systems at	23-06-2014 to 25-06-2014
7	Dr. Sharvan Kumar Pahuja	Associate Professor	CH	Advances in Solar Energy Technologies	09-12-2014 to 15-12-2014
8	Dr. Dinesh Kumar Shukla	Associate Professor	ME	Rooftop Solar and Solar Pumps for Irrigation at New Delhi	19-03-2014 to 20-03-2014
9	Dr. Subhash Chander	Associate Professor	ME	Workshop on "Developments in Academics and Researches in Engineering Systems at	23-06-2014 to 25-06-2014
10	Dr. Rajeev Kukreja	Associate Professor	ME	QIP Workshop at IIT, Guwahati	29-12-2014 to 31-12-2014
11	Dr. Sarbjot Singh Sandhu	Assistant Professor	ME	Workshop on Genetic Algorithms for Engineering Optimization at IIT, Guwahati	29-12-2014 to 31-12-2014
12	Dr. Sarbjot Singh Sandhu	Assistant Professor	ME	"Genetic Algorithms for Engineering Optimization" held at IIT, Guwahati	29-12-2014 to 31-12-2014
13	Dr. Harsh Kumar Manchanda	Associate Professor	CY	National Conference on Fiftyfirst Annual Convention of Chemists 2014 at Kurukshetra	9-12-2014 to 12-12-2014
14	Dr. Harsh Kumar Manchanda	Associate Professor	CY	"Fiftyfirst Annual Convention of Chemists 2014" held at Kurukshetra University 09-12-	09-12-2014 to 12-12-2014
15	Dr. Harsh Kumar Manchanda	Associate Professor	CY	National Conference on "17 th CSRI National Conference held at NCL Pune	06-02-2015 to 08-02-2015
16	Dr. Balwinder Raj	Assistant Professor	EC	"18 th Punjab Science Congress" held at Deth Bhagat University , Mandi Gobindgarh	07-02-2015 to 09-02-2015
17	Dr Harleen Dahiya	Assistant Professor	PY	Workshop on Recent Advances in HEP being held at University of Hyderabad, School of	26 Feb-28 Feb 15 (03 days)
18	Dr. Uma Shanker	Assistant Professor	CY	Symposium on Innovations in Chemical Sciences at Department of Chemistry	20 March-21 March 15
19	Dr. Uma Shankar	Assistant Professor	CY	Symposium on innovation in Chemical Sciences" at Dept. of Chemistry, Punjab	20-03-2015 to 21-03-2015
20	Dr. Sangeeta Garg	Associate Professor	CH	Symposium on Sustainability of Engineering Education at NIT Jalandhar	26 March - 27 March 2015
21	Dr Rajeev Kukreja	Associate Professor	ME	National Workshop on Research Perspective in Solar PV Systems at PSG College of	26 Mar-29 Mar 15 (04 days)

D. Conferences/Workshops/Training Programmes Attended/Organized under TEQIP-II (2014-2015)

S. N	Name & Designation	Department	Title of the Event & Country	Duration of visit
01	Dr Dilbag Singh	ICE	41st International Congress on Electrocardiology, Slovakia	04.06.2014 to 07.06.2014
02	Dr Sarwan Kumar Pahuja	ICE	41st International Congress on Electrocardiology, Slovakia	04.06.2014 to 07.06.2014

11.8 Courses and Admission

Name of Programme	Batch Year	Actual number of Students (FT + PT)	Boys	Girls
B. Tech	2014	821	655	166
M. Tech (FT)	2014	218	179	39
M. Tech (PT)	2014	28	20	8
M.Sc	2014	40	33	7
MBA	2014	24	11	13
Ph.D(FT+PT)	2014	62	46	16
Total:		1154	902	252

11.9 Scholarship and Awards

SCHOLARSHIP RECEIVED DURING THE YEAR (01.04.2014 to 31.03.2015)

S.No	Name of Student	Roll No	Branch	Amount	Source
1	Shruti Rawat	11112079	CH	18000/-	Indian Oil Scholarship, Delhi

2	Abhishek Bairwa	11112001	CH	18000/-	Indian Oil Scholarship, Delhi
3	Abhishek Bairwa	11112001	CH	122140/-	Ministry of Social Justice and Empowerment, Delhi
4	Kunji Lal Meena	11112042	CH	48000/-	
5	Shruti Rawat	11112079	CH	18000/-	Indian Oil Scholarship, Delhi
6	Deepak Raj	10113024	IP	55100/-	District Welfare Office, Sitagarh, Bihar
7	Pawan Kumar	11109059	ME	39200/-	District Welfare Office, Saran, Chapra, Bihar
8	Parminder Raju	11112050	CH	25000/-	Foundation of Academic Excellence & Access, Delhi
9	Narinder Kumar meena	11106039	IC	122140/-	Ministry of Social Justice and Empowerment, Delhi
10	Nahar Singh Meena	11110055	TT	122140/-	Ministry of Social Justice and Empowerment, Delhi
11	Manoj Kumar Meena	11102048	TT	122140/-	Ministry of Social Justice and Empowerment, Delhi
12	Narinder Kumar meena	11106039	IC	76900/-	Ministry of Social Justice and Empowerment, Delhi
13	Nahar Singh Meena	11110055	TT	76900/-	Ministry of Social Justice and Empowerment, Delhi
14	Manoj Kumar Meena	11102048	TT	76900/-	Ministry of Social Justice and Empowerment, Delhi
15	Ravi Kain	11113065	IP	32350/-	Tribal Development Office, Gwalior
16	Neeraj Saini	11110056	TT	50000/-	Chief Minister Relief Fund office, Punjab
17	Ravi Kant	11106056	IC	122140/-	Ministry of Social Justice and Empowerment, Delhi
18	Amit Kumar Singh	11110007	TT	122140/-	Ministry of Social Justice and Empowerment, Delhi
19	Abhishek Bairwa	11112001	CH	122140/-	Ministry of Social Justice and Empowerment, Delhi
20	Pardeep Kumar Jajoriya	11112054	CH	122140/-	Ministry of Social Justice and Empowerment, Delhi
21	Raman Kumar	11110068	TT	122140/-	Ministry of Social Justice and Empowerment, Delhi
22	Kanak Kumar Khatik	11112036	CH	122140/-	Ministry of Social Justice and Empowerment, Delhi
23	Ravi Kant	11106056	IC	79640/-	Ministry of Social Justice and Empowerment, Delhi
24	Amit Kumar Singh	11110007	TT	79640/-	Ministry of Social Justice and Empowerment, Delhi
25	Abhishek Bairwa	11112001	CH	79640/-	Ministry of Social Justice and Empowerment, Delhi
26	Pardeep Kumar Jajoriya	11112054	CH	79640/-	Ministry of Social Justice and Empowerment, Delhi
27	Bonathu Mohan	11110019	TT	82000/-	District Welfare Office, Warangal
28	Daljeet Singh	11109025	ME	59732/-	Chandigarh
29	Haider Ali	11109033	ME	49250/-	District Welfare Office, Bihar
30	Suman Saurav	11102081	CE	75000/-	District Welfare Office, Bihar
31	Ravi Prakash	11112065	CH	77900/-	District Welfare Office, Bihar
32	Arshad Ali	11109053	ME	49350/-	District Welfare Office, Jharkhand
33	Sukha Ram Meena	11106074	IC	39250/-	Delhi
34	Nitish Kumar	11113052	IP	75000/-	Patna
35	Naval Kumar Nirmal	11113045	IP	15000/-	Manav Sahyog Soceity, Jalandhar
36	Anmol Ojha	11113009	IP	12500/-	Manav Sahyog Soceity, Jalandhar
37	Amit Kumar	12102008	CE	44650/-	District Welfare Office, Jamui, Bihar
38	Aziz Ansari	12109047	ME	57100/-	Bihar State Minorities Financial Corp, Patna
39	Mokarram Iqbal	12109048	ME	53500/-	Bihar State Minorities Financial Corp, Patna
40	Prvin Kumar	12102053	CE	41500/-	District Welfare Office, Aurangabad, Bihar
41	Manoj Kumar	12111022	BT	55100/-	District Welfare Office, Jamui, Bihar
42	Prabhjot Singh	12112050	CH	36000/-	Indian Oil Corp, Noida
43	Harendra Lega	12106037	IC	36000/-	Indian Oil Corp, Noida
44	Pallavi	12102050	CE	36000/-	Indian Oil Corp, Noida
45	Kamatam venkata Koti Linga Rao	12111016	BT	36000/-	Indian Oil Corp, Noida

46	Neha Meena	12111024	BT	36000/-	Indian Oil Corp, Noida
47	Prabhjot Singh	12112050	CH	18000/-	Indian Oil Corp, Noida
48	Neha Meena	12111024	BT	18000/-	Indian Oil Corp, Noida
49	Harendra Lega	12106037	IC	18000/-	Indian Oil Corp, Noida
50	Vikas Kumar	12103084	CS	78850/-	National handicapped finance and Dev Corp, Faridabad
51	Kamatam venkata Koti Linga Rao	12111016	BT	31000/-	National handicapped finance and Dev Corp, Faridabad
52	Kamatam venkata Koti Linga Rao	12111016	BT	40000/-	National handicapped finance and Dev Corp, Faridabad
53	Rajesh Kumar Meena	12102060	CE	121900/-	Ministry of Social Justice and Empowerment, Delhi
54	Sanjay Kumar Meena	12102073	CE	121900/-	Ministry of Social Justice and Empowerment, Delhi
55	Rishabh Vats	13102047	CE	36000/-	Indian Oil Educational Scholarship, Delhi
56	Krishan	10102044	CE	47750/-	Post Matric Scholarship Scheme, Chandigarh
57	Jaswant Rai	10104035	EC	47750/-	Post Matric Scholarship Scheme, Chandigarh
58	Vikas	10104087	EC	49250/-	Post Matric Scholarship Scheme, Chandigarh
59	Ruby Salma	10106068	IC	49250/-	Post Matric Scholarship Scheme, Chandigarh
60	Gurwinder Singh	10109035	ME	49250/-	Post Matric Scholarship Scheme, Chandigarh
61	Bishnu Mahesh	10110009	TT	47750/-	Post Matric Scholarship Scheme, Chandigarh
62	Malkeet Singh	10110025	TT	49250/-	Post Matric Scholarship Scheme, Chandigarh
63	Malkeet Singh	10110026	TT	49250/-	Post Matric Scholarship Scheme, Chandigarh
64	Shinder Kumar	10112063	CH	49250/-	Post Matric Scholarship Scheme, Chandigarh
65	Harmanpreet Singh	10113031	IP	49250/-	Post Matric Scholarship Scheme, Chandigarh
66	Jatinder Kumar	10113034	IP	47750/-	Post Matric Scholarship Scheme, Chandigarh
67	Rahul	11102062	CE	49250/-	Post Matric Scholarship Scheme, Chandigarh
68	Sunil Kumar	11102083	CE	49250/-	Post Matric Scholarship Scheme, Chandigarh
69	Rajni Bala	11104062	EC	49250/-	Post Matric Scholarship Scheme, Chandigarh
70	Aminish Banger	11110006	TT	47750/-	Post Matric Scholarship Scheme, Chandigarh
71	Harish Kumar	11110030	TT	49250/-	Post Matric Scholarship Scheme, Chandigarh
72	Raman Kumar	11110068	TT	47750/-	Post Matric Scholarship Scheme, Chandigarh
73	Suresh Kumar	11111033	BT	49250/-	Post Matric Scholarship Scheme, Chandigarh
74	Rohit	11112069	CH	49250/-	Post Matric Scholarship Scheme, Chandigarh
75	Rohit	11112070	CH	47750/-	Post Matric Scholarship Scheme, Chandigarh
76	Sawanpreet Kaur	12102074	CE	49250/-	Post Matric Scholarship Scheme, Chandigarh
77	Ajay Kumar	12103002	CS	47750/-	Post Matric Scholarship Scheme, Chandigarh
78	Karandeep	12104040	EC	49250/-	Post Matric Scholarship Scheme, Chandigarh
79	Sanjeev Kumar	12106071	IC	49250/-	Post Matric Scholarship Scheme, Chandigarh
80	Harshul Karra	12110028	TT	49250/-	Post Matric Scholarship Scheme, Chandigarh
81	Kamal Kumar	12110031	TT	47750/-	Post Matric Scholarship Scheme, Chandigarh
82	Mukesh Singh	12110045	TT	47750/-	Post Matric Scholarship Scheme, Chandigarh
83	Gupreet Singh	12111011	BT	47750/-	Post Matric Scholarship Scheme, Chandigarh
84	Desh Raj	12112015	CH	49250/-	Post Matric Scholarship Scheme, Chandigarh
85	Hardeep Singh Bhatti	13102025	CE	49250/-	Post Matric Scholarship Scheme, Chandigarh
86	Amandeep Singh	13102055	CE	49250/-	Post Matric Scholarship Scheme, Chandigarh
87	Karanvir Singh	13104078	EC	49250/-	Post Matric Scholarship Scheme, Chandigarh
88	Puneet Sondhi	13106034	IC	47750/-	Post Matric Scholarship Scheme, Chandigarh
89	Shubham Thapa	13110031	TT	47750/-	Post Matric Scholarship Scheme, Chandigarh
90	Akanksha	13111022	BT	49250/-	Post Matric Scholarship Scheme, Chandigarh
91	Michal	13112019	CH	49250/-	Post Matric Scholarship Scheme, Chandigarh
92	Chetanpreet Singh	13113006	IP	47750/-	Post Matric Scholarship Scheme, Chandigarh
93	Gaurav Chaunkaria	13113019	-IP	47750/-	Post Matric Scholarship Scheme, Chandigarh
94	Ajay Kumar	13113069	IP	47750/-	Post Matric Scholarship Scheme, Chandigarh
95	Jigyasa	13320019	M.Sc/C hemistry	47750/-	Post Matric Scholarship Scheme, Chandigarh
96	Gurwinder Kaur	13321010	M.Sc/ Math	47750/-	Post Matric Scholarship Scheme, Chandigarh
97	Balvir	11205205	M.Tech	47750	Post Matric Scholarship Scheme, Chandigarh
98	Aman Preet Kaur	10103006	CS	47750/-	Post Matric Scholarship Scheme, Chandigarh
99	Neeraj	10112032	IP	47750/-	Post Matric Scholarship Scheme, Chandigarh
100	Rahul	10112044	CH	47750/-	Post Matric Scholarship Scheme, Chandigarh

101	Inderjit Kumar	10113033	IP	49250/-	Post Matric Scholarship Scheme, Chandigarh
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11.10 Training & Placement Statistics

Discipline	No. of Eligible Students	No. of Job Offers	No. of Double Job offers	No. of Students Actually Placed
ECE	79	107	28	79
CSE	81	101	24	77
CHE	69	76	20	56
ICE	70	100	30	70
CIVIL	72	58	11	47
IPE	82	102	37	65
ME	74	100	32	68
BT	31	34	6	28
TT	49	56	7	49
Total	607	734	195	539

11.11 Department wise-details**DEPARTMENT OF INDUSTRIAL & PRODUCTION ENGINEERING (IPE)****DEPARTMENTAL SUMMARY**

No. of Journal publications(International)	14	No of PhD students completed till date	09
No. of Journal publications(National)	01	No. of new PhD students enrolled	06
No. of STC/ Workshops conducted	02	No. of M. Tech students completed	27
No of expert talks delivered by faculty	13	No. of M. Tech guidance in progress	23
No. of STC/ Workshops/conferences attended	02	No. of new M. Tech students enrolled	31

1. Faculty

Sr. No.	Name	Position	Qualifications
1	Dr R K Garg	Professor	Ph. D
2	Prof R K Bansal	Associate Professor	M. Tech
3	Dr Sarbjit Singh	Associate Professor	Ph. D
4	Dr Anish Sachdeva	Associate Professor	Ph. D
5	Dr Ajay Gupta	Associate Professor	Ph. D
6	Dr Vishal Sharma	Associate Professor	Ph. D
7	Dr L P Singh	Assistant Professor	Ph. D
8	Dr Shailendra Singh Bhadauria	Assistant Professor	Ph. D

2. Academic Programmes**Undergraduate Programmes**

- B. Tech. in Industrial & Production Engineering

Postgraduate Programmes

- M. Tech in Manufacturing Technology
- M. Tech in Industrial Engineering (Part Time)
- **Development of Laboratories:** Metrology and Mechanical Measurements
- Work Study and Ergonomics Lab
- Computational and CAD Laboratory
- Modern Tool Room /Non Traditional Machining Methods Laboratory
- Statistical quality and control Laboratory
- CAM & Automation laboratory (CAMAL)
- Metallurgy and Heat Treatment Laboratory

Research and Development activities: ONGOING**PhD guidance**

Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor
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			candidate	
Sumit Jain (PT)	Managing Continuity and Change for Competitiveness in Indian Industry	Awarded 2013	Joint	Dr RK Garg, Dr Sushil
Monu Dogra (PT)	Investigation of Tool wear and Surface Quality in Hard Turning	Awarded 2012	Joint	Dr Vishal Sharma, Dr Anish Sachdeva, Dr NM Suri
Sharanjit Singh (FT)	Parameterization and Characterization of Selective Laser Sintered parts	Awarded 2012	Joint	Dr Anish Sachdeva, Dr Vishal Sharma
Lakhwinder Pal Singh (PT)	An investigation into Occupational Health of Industrial workers in SME	Awarded 2012	Joint	Dr Arvind Bhardwaj, Dr KK Deepak
Ajay Gupta (PT)	Performance evaluation and improvement of Production systems using Theory of Constraints	Awarded 2012	Sole	Dr Arvind Bhardwaj
Sarbjit Singh (PT)	Green Supply Chain Management in Indian Industry	Awarded 2013	Sole	Dr Arvind Bhardwaj
Kuldeep Ojha (FT)	Experimental study PMEDM process for different tool electrode shape designs	Awarded 2012	Joint	Dr RK Garg, Dr KK Sigh
Rajesh Gupta(PT)	Impact of logistic services and logistic outsourcing on economic development: A study in Indian context	Awarded 2014	Joint	Dr A Bhardwaj, Dr Anish Sachdeva
Manjindar Singh(PT)	Studies on the Role of Total Productive Maintenance in Enhancing Manufacturing Performance of Indian Industry	Awarded 2014	Joint	Dr Anish Sachdeva, Dr A Bhardwaj
Gaurav Tejpal (PT) 8405202	Impact of Flexibility, Trust & Information Technology on Supply Chain performance for Indian Industry.	Thesis Evaluated (Viva pending)	Joint	Dr Anish Sachdeva, Dr RK Garg
Ravinder Pal Singh (PT) 9405202	Some investigations on SAW of high strength low alloy steel	Comprehensive done	Sole	Dr RK Garg
Vivek Aggarwal (PT) 9405203	Parametric studies on machining characteristics with Wire EDM	Comprehensive done	Joint	Dr RK Garg, Dr Sehij Pal Singh
Amit Chopra(PT) 9405231	Productivity Enhancement in Indian Process Industry through Reliability Centred Maintenance (RCM)	Pre Submission Pending	Joint	Dr Anish Sachdeva, Dr Arvind Bhardwaj
Rajeev Trehan (PT) 9405232	Study of cost of Quality (COQ) practices in Indian Engineering Industry	Thesis Submitted	Joint	Dr Anish Sachdeva, Dr RK Garg
Gautam Kocher (PT) 9405233	Occupational Health Hazards of workers in Small and medium Enterprises	Comprehensive Pending	Sole	Dr Arvind Bhardwaj
Harbir Singh (PT) 10405232	Ergonomic Investigation with respect to the development of occupational stress and Musculoskeletal Disorders among the insurance office employees	Comprehensive done	Sole	Dr LP Singh
GurRaJ Singh (FT) 12405201	Machining of metals using minimum quantity lubrication.	Comprehensive done	Sole	Dr Vishal Sharma
Harjit Singh (FT) 12405202	Information sharing and coordination in industrial supply chain.	Comprehensive done	Joint	Dr Anish Sachdeva, Dr RK Garg
Rohit Sharma (FT) 12405203	Impact of lean manufacturing practices on organization performance in automobile sector.	Comprehensive done	Joint	Dr Anish Sachdeva, Dr Ajay Gupta
Ruchin Kacker (FT) 12405204	Investigation of Stress Triaxiality and Anisotropy using Unified Strength Theory	Comprehensive done	Sole	Dr Shailendra Singh Bhadauria

Sheetal Soda (FT) 12405205	Optimizing Original Gains by reinforcing Green Supply Chain Management measuring in Power Companies of Punjab	Comprehensive done	Joint	Dr RK Garg, Dr Anish Sachdeva
Satnam Singh (PT) 12405236	Investigation into occupational safety of industrial workers.	Comprehensive Submitted	Sole	Dr LP Singh
Amit Sharma (PT) 12405231	Energy Analysis in Manufacturing Industry	In Process	Joint	Dr Ajay Gupta, Dr Vishal Sharma
Ishwar Chander Ramola (PT) 12405233	Experimental investigation of machining of tantalum/tantalum alloy with EDM	Comprehensive Submitted	Sole	Dr Ajay Gupta
Ankur Behl (PT) 12405232	Performance modeling of a distillery plant using petrinets and dempster shaker theory of evidence	Comprehensive done	Joint	Dr Anish Sachdeva, Dr RK Garg
Rajinder Kumar Moom (PT) 12405235	To investigate the occupational Factors affecting the performance of bank employees	Comprehensive Submitted	Sole	Dr LP Singh
Surjit Kumar Gandhi (FT) 13513001	Impact of service quality attributes in the supply chain of Indian Small & medium Manufacturing enterprises	Questionnaire Being Finished	Joint	Dr Anish Sachdeva, Dr Ajay Gupta
Johny khajuria (FT) 13513002	Ergonomics & Occupational Health	Comprehensive Submitted, viva pending	Joint	Dr LP Singh, Dr Sarbjit Singh
Arjan Singh (FT) 13534001	An ergonomic investigation of occupational Health and related factors of workers engaged in grinding task in manufacturing Industry	Comprehensive done	Joint	Dr LP Singh, Dr Arvind Bhardwaj
Rahul Mor FT) 13513003	Supply Chain Management	In Process	Joint	Dr Sarbjit Singh, Dr Arvind Bhardwaj
Somvir Arya (PT) 13813003	Reverse Supply Chain Management	In Process	Joint	Dr Ajay Gupta, Dr Arvind Bhardwaj
Viney Jain (PT) 13813005	Reverse Supply Chain Management	In Process	Joint	Dr Ajay Gupta, Dr Arvind Bhardwaj
Pranshu (PT) 13813002	Energy Efficient Solar System	Comprehensive Submitted, Viva pending	Joint	Dr. Vishal Sharma, Dr. Ajay Gupta
Harpinder Sigh (PT) 13813004	Minimum quantity lubrication	In process	Joint	Dr Vishal Sharma, Dr Manu Dogra, Dr Sarbjit Singh
Jaivir Singh (PT) 13813006	Tool condition monitoring	In process	Joint	Dr Vishal Sharma, Dr RK Garg
Mahipal Singh (PT) 13813007	Ergonomics	In process	Sole	Dr LP Singh
Navin Kumar (PT) 13813008	Supply Chain Management	In Progress	Joint	Dr Arvind Bhardwaj, Dr Sarbjit Singh
Rohit Uppal (PT) 13813009	Supply Chain Management	In Progress	Joint	Dr Sarbjit Singh, Dr Arvind Bhardwaj
Shiv Dev Singh (FT) 14513002	Machining/welding	In Process	Sole	Dr Ajay Gupta
Manish Dev (FT) 14513001	Ergonomics & Occupational Health	In Process	Joint	Dr Arvind Bhardwaj, Dr Sarbjit Singh
Amandeep Singh	Ergonomics & Occupational Health	In Process	Joint	Dr LP Singh,

(FT) 14513003				Dr Sarbjit Singh, Dr Harvinder Singh
Gurpartap Singh(FT) 14513004	Manufacturing Technology	In Process	Joint	Dr Sarbjit Singh, Dr Rupinder Singh
AnubhavTaheem (PT)14813002	Maintenance engineering	In Process	Joint	Dr Vishal Sharma, Dr Anish Sachdeva
Guravtar Singh Maan (PT) 14813001	Machining	In Process	Sole	Dr LP Singh

M. Tech guidance**a. M Tech in Industrial Engineering**

Name of Candidate	Title	Status	Sole or joint candidate	Name of supervisor(s)
Amandeep Singh (11205231) Part Time	Techno Economic Feasibility Analysis and designing of Solar PV Power Plant	Completed	Joint	Dr Anish Sachdeva & Dr R K Garg
Jaswant Singh (11205232) Part Time	Heat Transfer characteristics of pair of interacting dual swirling flame impinging on a flat surface	Completed	Joint	Dr Anish Sachdeva & Dr Subhash Chander
Naresh Kumar (11205233) Part Time	Experimental Investigation of burnishing process parameters on C40E steel	Completed	Joint	Dr Anish Sachdeva & Dr L P Singh
Sachin Kapur (11205234) Part Time	Ergonomic assessment of the lifting tasks performed by North Indian Workers in LPG cylinder Distribution Supply Chain	Completed	Joint	Dr L P Singh & Dr Anish Sachdeva
Surinder Kumar (11205235) Part Time	Machining on EDM machine with different electrodes	Completed	Joint	Dr L P Singh & Dr Vishal Sharma

b. M Tech in Manufacturing Technology (2012-14 batch)

Name of Candidate	Title	Status	Sole or joint candidate	Name of supervisor(s)
Amit Kumar (12205201)	To implement quality costing system through process cost model	Completed	Joint	Dr Ajay Gupta, Prof Rajeev Trehan
Ankur Gupta (12205202)	Mathematical modelling for stress triaxiality and strain energy density factor under mixed mode fracture using unified strength theory	Completed	Joint	Dr SS Bhadauria, Dr Sarbjit Singh
Arun Lal (12205203)	vibration and heat stress exposure analysis in textile industry: A case study	Completed	Joint	Dr L P Singh, Dr Sarabjit Singh
Balbir Singh Negi (12205204)	Techno-economic Analysis of solar photovoltaic plant for NIT Jalandhar Hostel	Completed	Joint	Dr Anish Sachdeva, Mr Rajeev Trehan
Bashista Kumar Mahanta (12205205)	Finite element analysis of orthogonal cutting forces in machining AISI 1020 steel by using a carbide tip tool	Completed	Joint	Dr Vishal Sharma, Dr Sarbjit Singh
Charchil Badaya (12205206)	Determination of stresses and shakedown limit of cracked thick pr. Vessel using UST	Completed	Joint	Dr SS Bhadauria, Dr Sarbjit Singh
Dalbir Singh (12205207)	An experimental investigation during fabrication of micro holes through ECDM	Completed	Joint	Dr Sarbjit Singh, Dr Vishal Sharma
Deepak Kumar Naik (12205208)	Experimental Investigation of the powder mixed electric discharge machining of nickel free austenitic stainless steel : A promising Coronary stent material	Completed	Joint	Dr R K Garg, Dr Anish Sachdeva
Jagmeet Saini (12205209)	Parametric optimization and surface modification of Ti-NB-Fe alloy by powder mixed electric discharged machining using response surface methodology	Completed	Joint	Dr R K Garg, Dr Anish Sachdeva
Kuldeep Singh (12205210)	Reliability analysis of a milk plant by using markov model	In process	Joint	Dr Anish Sachdeva, Dr Sarbjit Singh

Name of Candidate	Title	Status	Sole or joint candidate	Name of supervisor(s)
Labeeb Mohammed (12205211)	Comparison of Indian and European automotive standards for battery operated electric vehicle	Completed	Joint	Dr Vishal Sharma, Dr Sarbjit Singh
Mandeep Kumar (12205212)	Comparison of Arima and Artificial neural network models to predict annual atmospheric CO ₂ concentrations	Completed	Joint	Dr Anish Sachdeva, Dr L P Singh
Nitul Sharma (12205214)	Comparison of Indian and American Automotive standards for battery operated electric vehicle	In progress	Joint	Dr Vishal Sharma, Dr Sarbjit Singh
Pushkal Badoniya (12205215)	Two link planar robot manipulator mechanism analysis with MATLAB	Completed	Joint	Dr Vishal Sharma, Dr Sarbjit Singh
Rahul Bansal (12205216)	Biosorption of fluoride ions using activated Tamarind fruit shell and MnO ₂ coated Tamarind	Completed	Joint	Dr Sarbjit Singh, Dr L P Singh
Sandeep Kumar (12205218)	Optimisation of process parameters of GTAW on IS:2062 mild steel using RSM	Completed	Joint	Dr R K Garg, Dr Dinesh Kumar Shukla
Sandeep Kumar (12205219)	Cost of quality: a case study in process industry	Completed	Joint	Dr Ajay Gupta, Prof Rajeev Trehan
Sanjay Kumar (12205220)	Comparative study of surface grinding operation in dry, flooded and MQL environment	Completed	Joint	Dr Vishal Sharma, Dr Sarbjit Singh
Shekhar Srivastava (12205221)	Process parameter Optimization of gas metal arc welding on IS:2062 mild steel using response surface modeling	Completed	Joint	Dr R K Garg, Dr Dinesh Kumar Shukla
Sunil Kumar Yadav (12205222)	Reliability and availability analysis of a distillery plants by using petri nets	Completed	Joint	Dr Anish Sachdeva, Dr R K Garg
Sunil Negi (12205223)	CFD based flow analysis of solar air heater duct provided with artificial roughness	Completed	Joint	Dr Ajay Gupta, Dr Subhash Chander
Vishesh Saraswat (12205224)	Maintenance criticality analysis with fuzzy risk priority rank	Completed	Joint	Dr Anish Sachdeva, Dr Sarbjit Singh
Vivek Malik (12205225)	3PL Service provider selection using fuzzy AHP and rating scale	Completed	Joint	Dr L P Singh, Prof Rajeev Trehan
Vivek Rao (12205226)	CFD based heat transfer analysis of solar air heater duct provided with artificial roughness	Completed	Joint	Dr Ajay Gupta, Dr Subhash Chander

c. M Tech in Manufacturing Technology (2013-15 batch)

Name of Candidate	Title	Status	Sole or joint candidate	Name of supervisor(s)
Anuj Vats (13216001)	Investigation on Parameters Controlling burr height	In progress	Sole	Dr Vishal Sharma
Dilnawaz Anwar (13216003)	A study on BRASS Micro-machining using Microorganism	In progress	Sole	Dr Sarbjit Singh
Akash Chourasia (13216004)	Evaluation of satisfaction and performance of ERP system	In progress	Sole	Dr L P Singh
Challa Ravi Teja (13216005)	An Improved forecasting technique to reduce Bullwhip Effect and Net stock amplification	In progress	Sole	Dr L P Singh
Manoj Kumar (13216006)	Effect of poisson ratio on crack initiation angle of an edge crack in sheet metal plate	In progress	Sole	Dr SS Bhaduria
Irshad Ansari (13216007)	Effect of machining parameters on hole diameter accuracy and position accuracy in dry drilling process	In progress	Joint	Prof Rajeev Trehan Dr L P Singh
Deshraj Hathiwal (13216009)	Experimental investigation of Ti alloy by using cryogenic electrode with the help of Taguchi technique	In progress	Joint	Dr R K Garg Dr Anish Sachdeva

Name of Candidate	Title	Status	Sole or joint candidate	Name of supervisor(s)
Bommididi Ram Suresh (13216011)	Converting qualitative data to quantitative data for Reliability Analysis	In progress	Sole	Dr Anish Sachdeva
Dhrmender Singh (13216013)	Feasibility of solar powered tube well	In progress	Sole	Dr Anish Sachdeva
Ramendra Gangwar (13216014)	Chip Morphology of Titanium Alloy	In progress	Sole	Dr Vishal Sharma
Vijander Kumar (13216015)	Optimization of Process parameter of Gas Tungsten Arc Welding	In progress	Sole	Dr Ajay Gupta
Jeetendra Kumar (13216016)	Application of SiO ₂ , Cr ₂ O ₃ & TiO ₂ in 304 Stainless steel using TIG welding equipment	In progress	Sole	Dr R K Garg
Akhilesh Singh Chauhan (13216017)	Fracture analysis of laminated composite materials (carbon/epoxy)	In progress	Sole	Dr SS Bhaduria
Jai Singh (13216019)	Fracture analysis of laminated composite materials	In progress	Sole	Dr SS Bhaduria
Jignesh Kumar Makani (13216020)	A study on Micro-machining of BRONZE using Biomachining	In progress	Sole	Dr Sarabjit singh
Surinder Pal (13216021)	To study & analyze the gate valve by using the casting simulation	In progress	Sole	Dr Ajay Gupta
Ramesh Sepat (13216022)	Effect of Aging on machinability of aluminium alloy	In progress	Sole	Prof. Rajeev Trehan
Ajay Verma (13216023)	Study on two link manipulator using MATLAB tool sim mechanics	In progress	Sole	Dr Vishal Sharma
Anand Kumar (13216024)	Optimisation of process parameter of near dry electric discharge machining	In progress	Joint	Prof. R.K.Bansal, Dr Vishal Sharma
Sangram Singh (13216025)	Demand forecast with ANN & N-F models : a comparative analysis	In progress	Sole	Dr Anish Sachdeva
Sahil Kumar (13216026)	Stress on night shift worker	In progress	Joint	Dr Sarabjit Singh, Prof. Rajeev trehan

Research Publications (International journals)

S. No.	Title of paper	Journal Name	Volume Number	Page No	Publication year	Authors as on the article
1	Investigation of tool geometry effect and penetration strategies on cutting forces during thread milling	International Journal of Advanced Manufacturing Technology	Volume 74, Issue 5-8	963-971	2014	Vishal S. Sharma, Guillaume Fromentin, Gérard Poulachon, Romain Brendlen
2	SCADA data based condition monitoring of wind turbines	Advances in Manufacturing	Volume 2	:61–69	2014	Ke-Sheng Wang, Vishal S. Sharma, Zhen-You Zhang
3	Effect of Strain Ratio on Stress Triaxiality subjected to Mode I Fracture	International Journal of Mechanical and Production Engineering	Vol. 03 Issue: 02	Pp 53-57	2015	S. S. Bhadauria Ruchin Kacker Vishal Parashar
4	Optimization of Surface Roughness using Taguchi method in End Milling of Steel Grade EN19 with Tin coated carbide tool	International Journal of Mechanical and Production Engineering	Vol. 03 Issue: 02	Pp 53-57	2015	Vishal Parashar S. S. Bhadauria Yogesh Sahu
5	Relationship of Reliability Centered Maintenance (RCM) with Safety, Environment and Morale of employees in Indian	VIVECHAN- International Journal of Research	Vol. 5, Issue 2,		2014	Amit Chopra, Dr. Anish Sachdeva, and Dr. Arvind Bhardwaj

	Process Industry					
6	General Maintenance Scenario in Indian Process Industry	International Journal of Research in Management Science & Technology	Vol. 2, No. 3	117-120	2014	Amit Chopra, Dr. Anish Sachdeva, and Dr. Arvind Bhardwaj,
8	Productivity Enhancement using Reliability Centered Maintenance in Process Industry	International Journal of Industrial and Systems Engineering	(accepted for publication)		2015	Amit Chopra, Dr. Anish Sachdeva, and Dr. Arvind Bhardwaj
9	Literature Review of multi-aspect Research Works carried out on the concept and implementation of GSCM	Int. J. of Industrial and Systems Engineering (IJISE)	Accepted for publication		2014	Sheetal, Dr R K Garg and Dr Anish Sachdeva
10	Effect of wire materials on cutting performance of WEDM for machining of Inconel superalloy	Advanced Mechanics and Materials	Aug-Sept 2014	Vol 624,	Page 124-128	Vivek Aggarwal, Dr Sehiipal Singh and Dr R K Garg
11	Parametric modeling and optimization for wire electrical discharge machining of Inconel 718 using response surface methodology	Int Journal of Advanced Manufacturing Technology	28 January 2015	DOI 10.1007/s00170-015-6797-8		Vivek Aggarwal, Dr Sehiipal Singh and Dr R K Garg
12	Technological Innovations in Machining of Inconel 718: A State of the Art	International Journal of Manufacturing, Materials, and Mechanical Engineering,	April-June 2015	Vol 5, Issue 2	Pp 16-42,	Vivek Aggarwal, Dr Sehiipal Singh and Dr R K Garg
13	Simulation of robotized MIG welding using Robostudio	International Journal of science and research	Vol. 03 Issue: 05	Pp 523-528	2014	Rohit Sharma, Parveen Kalra, Ajay Gupta
14	A Comprehensive Review of Cost of Quality	VIVECHAN-International Journal of Research	Accepted for publication		2015	Rajeev Trehan, Dr R K Garg and Dr Anish Sachdeva

Research Publications (National journals)

S. No	Title of paper	Journal Name	Volume Number	Page No	Publication year	Authors as on the article
1	Analysis and validation of sand casting process using Procast	Journal of basic and applied Engineering Research	Vol. 02 Issue: 04	278-281	2015	Surinder Pal, Ajay Gupta, Rahul Kapoor

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	organizers	Dates/Faculty	Funded by
International Conference on Recent Innovations in Science, Engineering and Technology	Institute of Research and Journals	28 th Dec. 2014 Dr. S S Bhaduria	From CPDA
Workshop Series in Research Perspectives on Solar PV Systems	PSG College of Technology, Coimbatore	March 26-29, 2015 Dr. Anish Sachdeva	TEQIP - II

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
e-Foundry: Casting Design and Simulation	NIT Jalandhar	9 th April 2014	IIT Bombay, MSME and NKN New Delhi
Application of Six Sigma in Indian Industry	NIT Jalandhar	June 09-13, 2014	TEQIP – II

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk
Fracture Mechanics for Mechanical Engineers and Researchers	Dr Shailendra Singh Bhaduria	Sagar Institute of Research & Technology Bhopal	5 th Feb 2015

Condition monitoring-A case study for Wind Turbines	Dr. Vishal S Sharma	STC on Fundamentals of Tribology, Mechanical Engineering, NIT Hamirpur	28 th May 2014
How To Write A Research Proposal	Dr. Shailendra Singh Bhadauria	Oriental Institute of Science & Technology Bhopal	7 th Feb 2015
c. Quality Function Deployment d. MCDM Techniques	Dr Anish Sachdeva	TEQIP-II Sponsored Short Term Course "Quality Management System Issues, Tools and Implementation aspects" held at NIT Hamirpur from July 12-16, 2014	July 14, 2014
Keynote address and expert talk on Design of Experiments	Dr R K Garg	STC of Design of Experiments and its applications in Research at PEC Chandigarh	12 th January 2015
Quality Audit	Prof R K Bansal	Application of Six Sigma in Indian Industry at NIT Jalandhar	June 11, 2014
Lean Six Sigma	Dr L P Singh	Application of Six Sigma in Indian Industry at NIT Jalandhar	June 12, 2014
Probability Distribution & hypothesis testing significance	Dr Anish Sachdeva	Application of Six Sigma in Indian Industry at NIT Jalandhar	June 12, 2014
Theory of Constraints & Six Sigma	Dr Ajay Gupta	Application of Six Sigma in Indian Industry at NIT Jalandhar	June 13, 2014
Case Analysis	Dr S S Bal	Application of Six Sigma in Indian Industry at NIT Jalandhar	June 13, 2014
Industrial Engineering	Dr L P Singh	LPU, Phagwara	11 th Feb, 2015
Fundamental concepts of Theory of constraints	Ajay Gupta	Inter- disciplinary workshop at Global Institute Amritsar	Jan -2015

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr R K Garg	Life membership	Indian Institution of Industrial Engg	SM 10372 (99)
Prof R K Bansal	Life membership	The Indian Society for Technical Education	LM 13576
Dr Sarbjit Singh Bal	Honorary Co-Chairman	International Ergonomics Association TC ,USA	-----
Dr Vishal S Sharma	Life member	Institution of Engineers(India)	M131075-5
	Life member	The Indian Society for Technical Education	LM 27900
Dr Anish Sachdeva	Life membership	ISTE	LM 96677
	Life membership	Indian Institution of Industrial Engg.	SM 10373 (99)
	Life membership	International Association of Engineers (IAENG)	108639

3. Consultancy services completed/ongoing: NIL

4. Projects Completed/On Going/sponsored projects:

- a. Submitted - DST sponsored project titled "Unified crack tip constraint and strain energy density function under mixed mode fracture using Unified Strength Theory" under Fast Track Scheme for Young Scientists. The overall cost of the project is Rs. 23,38,800/- (including overhead charges). Principal Investigator- Dr. Shailendra Singh Bhadauria
- b. Submitted - DST sponsored project titled "Supply Chain System Design for Plastic Recycling of city garbage in Punjab" under TSD programme for Rs. 36,00,000/- approx. Investigators- Prof. R K Garg & Prof. Anish Sachdeva.

10. Details of faculty, who have Upgraded qualifications: NIL

11. Details of faculty who have enrolled for higher qualifications: NIL

12. Any other significant achievement:

- a. Advances in Manufacturing Journal (Springer) awarded certificate for top 10 downloaded articles in last two years for the article "SCADA data based condition monitoring of wind turbines" – Dr. Vishal Sharma
- b. Won Excellent Paper Award for Effect of Strain Ratio on Stress Triaxiality subjected to Mode I Fracture in the International Conference on Recent Innovations in Science, Engineering and Technology, organized by Institute of Research and Journals on 28th Dec. 2014 – Dr. Shailendra Singh Bhadauria

**DEPARTMENT OF HUMANITIES AND MANAGEMENT
DEPARTMENTAL SUMMARY (1st April 2014- 31st March 2015)**

No. of Journal publications(International)	01	No. of New PG students enrolled	23
No. of STC/ Workshops/Seminar conducted	01		

FACULTY

Name	Position	Qualifications
Dr. S Ghosh	Head of Department	PhD
Dr. S. J. S. Bedi	Associate Professor	PhD, MBA, MSc (Chemistry)
Dr. Jagwinder Singh	Assistant Professor	PhD, MBA
Dr. Kumar Parag	Assistant Professor	PhD, MA
Dr. Aditya Prakash	Assistant Professor	PhD, MPhil, MA

ACADEMIC PROGRAMMES**Undergraduate Programs**

The department offers Core and Elective courses to the B. Tech. students of all Engineering disciplines. The compulsory courses in the B. Tech new scheme are:

1. Introduction to Management Human Values and Behavior
2. English Communication
3. English Communication Laboratory
4. Engineering Economics and Industrial Management
5. Entrepreneurship Development & Management
6. Human Resource Management and Industrial Relations
7. Soft Skills and Personal Interviews
8. Marketing Management
9. Financial & Cost Accounting

The Open Elective courses offered by the Department are:

1. Engineering Economics and Industrial Management
2. Human Resource Management and Industrial Relations
3. Entrepreneurship Development & Management
4. Business Environment
5. Organizational Behavior
6. Logistics and Distribution Management
7. Marketing Management
8. Business Ethics
9. Managerial Economics
10. Financial and Cost Accounting

POSTGRADUATE PROGRAMME

Two-year full-time MBA Programme (specialization in Marketing Management, Human Resource Management, Financial Management, Operations Management and Information Technology).

DOCTORAL PROGRAMME

The Department offers PhD Programme in the following areas:

- Human Resource Management
- Marketing Management
- Entrepreneurship Development & Management
- English Literature
- Linguistics

List of Laboratories:

1. English Communication Laboratory
2. Computer Laboratory

Laboratory development:

Sr no	Item purchased	Laboratory	Price	Laboratory in charge
1.	Air Conditioners	English Communication Laboratory		Dr. Kumar Parag Dr. Aditya Parkash

RESEARCH AND DEVELOPMENT ACTIVITIES (Faculty wise)**Faculty 1: Dr. Sarabjit Singh Bedi****PhD guidance:**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
11415001	Amit Kumar LaL	Identification of Consumer Decision Making Style of	Pre-submission Viva completed,	Sole	NIL	August, 2011

		Young Adults in Shopping Malls in India	Thesis writing in Progress			
13536001	Sukhwinder Kaur	Understanding Antecedents of Online Purchase Intention	Comprehensive Exam completed	Sole	NIL	August, 2013
13836001	Arjun Pandit	Brand Marketing (Yet to be Finalized)	Course Work Completed	Sole	NIL	August, 2013
13536005	Taranjit Kaur	Women Leadership (Yet to be Finalized)	Course work in progress.	Sole	NIL	January, 2014

Faculty 2: Dr. Jagwinder Singh
PhD guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
11415002	Shivani Saini	Role of consumer Experience Management Versus Consumer Relationship Management in Consumer Loyalty	Thesis writing in progress	Sole	NIL	August, 2011
13536002	Lovekesh Sarda	Influence of Personal Values on Rural Consumer Buying Behaviour (Yet to be Finalized)	Course-work Completed	Sole	NIL	October, 2013
13536003	Payal	Futuristic Model For Teachers' Competence Development: A study of Technical Education Institutes of Punjab (Yet to be Finalized)	Course-work completed	Sole	NIL	October, 2013

Faculty 3: Dr. Kumar Parag
PhD guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
11415031	Anand Bajaj	Marginalized Voices in the Select Works of Rohinton Mistry, Arundhati Roy and Taslima Nasrin: A Postcolonial Perspective	Comprehensive Exam Completed	Sole	NIL	August, 2011
13536004	Shubhra	Social Exclusion and Ignominy of the oppressed: Recasting Pain into Resistance in select Dalit Women Autobiographies (Yet to be Finalized by the Expert)	Course Work Completed	Sole	NIL	January, 2014

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Identification of CDMS of Youth in Shopping Malls	Asia Pacific Journal of Management Research and Innovation	10	219-224	2014	Dr.S.J.S. Bedi Mr. Amit K. Lal

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
Investor Awareness Programme	Department of Humanities and Management	26.02.2015	Bombay Stock Exchange

DEPARTMENT OF PHYSICS
DEPARTMENTAL SUMMARY (1st April 2014- 31st March 2015)

No. of Journal publications(International)	31	No. of PhD completed	01
No. of Journal publications(National)	04	No. of new PhD students enrolled	04
No. of International Conferences attended	00	No. of New PG students completed	19
No. of National Conferences attended	02	No. of New PG students enrolled	19
No. of STC/ Workshops conducted	01	No. of expert talks organized	01

No of expert talks delivered by faculty	07	
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FACULTY

Name	Position	Qualifications
Dr Arvinder Singh	Professor	Ph. D.
Dr Sarabjeet Singh	Professor	Ph. D.
Dr H M Mittal	Associate Professor	Ph. D.
Ms Jyoti Bharj	Associate Professor & Head	M.Sc., Ph. D. Pursuing
Dr Rohit Mehra	Associate Professor	Ph. D.
Dr Harleen Dahiya	Assistant Professor	Ph. D.
Dr Praveen Malik	Assistant Professor	Ph. D.
Dr Abhinav Partap Singh	Assistant Professor	Ph. D.
Dr Arvind Kumar	Assistant Professor	Ph. D.

ACADEMIC PROGRAMMES**Undergraduate Programmes**

- B. Tech.

Postgraduate Programmes

- M. Sc. Physics
- M. Tech. (Full Time) in Nuclear Science and Engineering
- M. Tech. (Part Time) in Material Science and Engineering
- Full and part Time Ph D Programme in various disciplines of Physics viz. Laser Plasma Interaction, Electromagnetic Field Theory, Nuclear Physics, Radiation Physics, Particle Physics, Liquid Crystal, Condensed Matter Physics

LIST OF LABORATORIES**Under Graduate Laboratories**

- Applied Physics Laboratory
- Material Science Laboratory

Post Graduate Laboratories

- Fiber Optics and Laser Laboratory
- Electronics Laboratory
- Scientific Computation Laboratory
- Solid State Physics Laboratory
- Nuclear Physics Laboratory
- Plasma Physics Laboratory
- Spectroscopy Laboratory

Research Laboratories

- Radiation Research Laboratory
- Computational and High Energy Laboratory
- Liquid Crystal Research Laboratory

RESEARCH AND DEVELOPMENT ACTIVITIES (Faculty wise)**Faculty 1: Dr Arvinder Singh****PhD guidance: Guided: 03, Ongoing: 02**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12413102	Naveen Gupta	Theoretical Investigation of Some Nonlinear Phenomenon in Preformed Plasma Channel	Ongoing (Full Time)	Sole	N/A	31-07-2012
12413134	Joyti Rajput	Laser Induced electron acceleration in Vacuum and Plasma	Ongoing (Part Time)	Joint	Dr Nitikant	27-07-2012

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12313111	Ms. Pawanpreet	Optical Guiding of Cosh-Gaussian Laser Beam in Axially Non-Uniform Collisionless Plasma Channel	Completed	Sole	Dr. Arvinder Singh	26-05-2014
12313114	Ritu Sharma	Optical Guiding of Cosh-Gaussian Laser Beam in Axially	Completed	Sole	Dr. Arvinder Singh	26-05-2014

		Non-Uniform Relativistic Plasma Channel				
13322001	Rajpreet Kaur	Optical Guiding of Dark Hollow Laser Beam in Axially Nonuniform Relativistic Plasma Channel (Paper Presented in National Conference)*	Ongoing	Sole	Dr. Arvinder Singh	
13322023	Gaganpreet Kaur	Optical Guiding of Dark Hollow Laser Beam in Axially Nonuniform Collisional Plasma Channel (Paper Presented in National Conference)*	Ongoing	Sole	Dr. Arvinder Singh	

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	Effect of self-focusing of gaussian laser beam on second harmonic generation in relativistic plasma	Optic, International Journal for Light and Electron Optics, Elsevier	33	83-87	2014	Keshav Walia and Arvinder Singh
2	The effect of plasma channel on the self-distortion of laser pulse propagating through the collisionless plasma channel	Journal of Nonlinear Optical Physics & Materials, World Scientific	23	3	2014	Navpreet Singh and Arvinder Singh
3	The effect of plasma channel on the self-distortion of laser pulse propagating through the collisional plasma channel	Optic, International Journal for Light and Electron Optics, Elsevier	DOI: 10.1016/j.ijleo.2014.07.141		2014	Navpreet Singh and Arvinder Singh
4.	Higher Harmonic Generation by Self Focused q-Gaussian Beam in Preformed Collisionless Plasma Channel	Laser and Particle Beams, Cambridge University Press. USA	32	621	2014	Arvinder Singh and Naveen Gupta
5.	Second harmonic generation by relativistic self-focusing of q-Gaussian laser beam in preformed parabolic plasma channel	Physics of Plasmas, American Institute of Physics (AIP)	22	013102	2015	Arvinder Singh and Naveen Gupta
6	Second Harmonic Generation of Self Focused Cosh-Gaussian Laser Beam in Collisionless Plasma	<i>Contributions to Plasma Physics</i> , Wiley-VCH Verlag	DOI: 10.1002/ctpp.201400071	-	2015	Arvinder Singh and Naveen Gupta

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk	Event/STC/Seminar/Workshop
Fundamentals of Electrodynamics	Dr. Arvinder Singh	Invited Lecture for PG Students	13/02/2015	Invited Lecture for PG Students (PAU, Ludhiana)

Faculty 2: Dr Sarabjeet Singh**PhD guidance: Guided: 02, Ongoing: 01**

Name of Candidate	Title	Status	Sole or joint	Name of other Supervisor(s)
Mr Harleen Singh	Study of Nuclear Radiation Detection using DSP Techniques	On going	Sole	-

Mr Harjeet Pal Singh	Performance Evaluation and Voice Quality Improvement of VOIP System using DSP Techniques	Completed	Joint	Professor Jasvir Singh, GNDU Amritsar
Mr Navdeep Singh	Analysis and Design of Low Profile MTM and EBG based Planar Antennas	Completed	Sole	-

M Tech Guidance

Name of Candidate	Title	Status	Sole or joint	Name of other Supervisor(s)
Mr Abhay Goyal		ongoing	joint	Professor R K Sarin, NIT, Jalandhar
Ms Perna Saxena	Study of Microstrip based Metamaterial structure for Patch Antenna array applications.	Completed	joint	Professor R K Sarin, NIT, Jalandhar

Research publication**International Journal**

S No.	Title	Journal	Vol	Page no	Year	Authors
1	Study of Patch Antenna Array using Single Negative Metamaterial Structure	International Journal of Pure and Applied Research in Engineering and Technology	1(8)	46-53	2013	Perna Saxena, Sarabjeet Singh, R K sarin

National Journal

S No.	Title	Journal	Vol	Page no	Year	Authors
1.	A Wavelet Based Method for digital Discrimination of Neutron and Gamma radiation	Proceeding of DAE Symposium on Nuclear Physics	58	862-863	2013	Harleen Singh, Sarabjeet Singh

2. Membership to professional bodies

Member, IEEE.

Life member AIP, USA

Faculty 3: Dr H M Mittal**PhD guidance: Guided: 02, Ongoing: 04**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment /Completed
12413103	Parveen Kumari	Global and systematic study of Nuclear Structure of even-even nuclei of A=100-200 mass region	On going	Sole	-----	Aug. 2012
12413132	Amit Bindra	Systematic study of Nuclear Structure of A=100-200 mass nuclei	On going	Sole	-----	Aug. 2012
13522001	Rajan Jakhu	Measurements of Natural Radionuclides for the assessment of the radiation dose in the environs of Jaipur and Ajmer districts of Rajasthan	On going	Joint	Dr Rohit Mehra	Aug. 2013
14822004	Ms. Honey	Study of Superdeformed nuclei	On going	Sole	-----	Aug. 2014

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/Completed
12313104	Himani Gupta	Quantum phase transitions in the shape of atomic nuclei	Completed	Sole	-----	June 2014
12313106	Karanpreet	Reanalyzation and updation of the data of interband B(E2) ratios in the rigid triaxial model	Completed	Sole	-----	June 2014

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Existence of structural effects in band moment of inertia of SD bands in A=190 mass region", (2014) 1305-1310	International Journal of Applied Engineering Research	9 Iss. 11	1305-1310	2014	Neha Sharma and H.M. Mittal
2.	Systematic study of the subshell effect at Z=64 and the neutron discontinuity at N=88-90	International Journal of Nuclear Energy Science & Technology	9 No.1	35-41	2015	H.M. Mittal and Parveen Kumari

Research Publications (National journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Nuclear Structure of the neutron-deficient ¹³² Ce	Innovations & Research in Physico-Chemical Sciences-A Step towards Sustainability	9	63-67	2014	Parveen Kumari and H.M. Mittal

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Recent Trends in Civil Engineering	Dr. B.R. Ambedkar National Institute of Technology Jalandhar	May 26-30, 2014	TEQIP-II
Recent Advances in Energy Technology	Dr. B.R. Ambedkar National Institute of Technology Jalandhar	June 02-06, 2014	TEQIP
Data Analysis and Soft Computing	Dr. B.R. Ambedkar National Institute of Technology Jalandhar	June 09-13, 2014	TEQIP

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr H M Mittal	Life member	Indian Society for Technical Education (ISTE)	LM 28414
Dr H M Mittal	Life member	Indian Association of Physics Teachers (IAPT)	2721 LM 4042
Dr H M Mittal	Life member	Indian Physics Association (IPA) Membership	GEN/LM/13018

Projects Completed/On Going/sponsored projects

S.No	Title	Year	Agency	Coordinator /Dept.	Project cost
1.	Some Universal Features of Nuclear Structure in Superdeformed Nuclei	2014	Department of Science and Technology (DST) Government of India	Physics	13,67880.00

Faculty 4: Ms Jyoti Bharj**Research Publications**

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	"Biogas: A Natural and Renewable Source for Carbon Nanotubes."	International Journal of Research in Advent Technology	Vol 2 No3		2014	Bharj Jyoti, Singh Sarabjit, Chander Subhash and Singh Rabinder
2.	Experimental Study on compressive strength of cement-CNT composite paste	Indian Journal of Pure and Applied Physics	Vol 52	35-38	2014	Bharj Jyoti, Singh Sarabjit, Chander Subhash and Singh Rabinder

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Second International Conference on Nanostructured Materials and Nanocomposites	Mahatma Gandhi University Kottayam Kerala	19.12.2014 to 21.12.2014	

Expert talks delivered:

Title of talk	Event of talk delivered	Date of talk	Event/STC/Seminar/Workshop
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Flame Synthesis of Carbon Nanotubes using Domestic Fuels	Second International Conference on Nanostructured Materials and Nanocomposites	20.12.2014	International Conference
Nanotechnology: A route to Carbon Nanotubes	Talk for Students at Rayat Bahra Institute at Hoshiarpur	17.3.2015	

Faculty 5: Dr Rohit Mehra**PhD guidance: Guided: 05, Ongoing: 07**

Sr. No.	Name of Student	Full Time/ Part Time (FT/PT)	Thesis Title	Other supervisor (s) (if any), name & department	Completed/ Ongoing
01	Komal Badhan	FT	Measurement of Natural Radioactivity for Assessment of Radiological Risk in Doaba Region of Punjab	Dr. RG Sonkawade IUAC, New Delhi	Completed 06/07/2012
02	Sandeep Kansal	PT	Natural Radiation Studies in the Environs of Western Haryana	Dr. NP Singh, Dean PTU Jalandhar	Completed 29/04/2013
03	Ashok Chaudhary	FT	Dielectric and Electro-Optic Studies of Nanomaterials Doped Ferroelectric Liquid Crystal Materials	Dr. Parveen Malik, NIT Jalandhar Dr. KK Raina, Thapar University, Patiala	Completed 02/09/2013
04	Pankaj Bala	FT	Measurement of Natural Radioactivity in the Building Materials and in the Environs of Una and Hamirpur District of Himachal Pradesh		Completed 13/06/2014
05	Vikas Duggal	FT	Assessment of radiological risk due to natural radionuclides in the environs of northern Rajasthan	Dr. Asha Sachdeva PTU Jalandhar	Thesis Submitted 24/11/2014
06	Pargin Bangotra	PT	Estimation of naturally decaying nuclides in the environs of Mansa & Muktsar districts of Punjab		Ongoing Comprehensive exam held on 04/12/13
07	Kirandeep Kaur	PT	Assessment of naturally occurring disintegrating radionuclides in the vicinity of Bathinda and Faridkot districts of Punjab		Ongoing Comprehensive exam held on 04/12/13
8	Rajan Jakhu	FT	Assessment of the radiation dose in the environs of Jaipur and Ajmer districts of Rajasthan	Dr. H. M. Mittal, NIT Jalandhar	Ongoing Comprehensive exam held on 05/01/15
9	Sudhir Mittal	PT	To be Finalized by RDC of PTU after Comprehensive exam	Dr. Asha Sachdeva PTU Jalandhar	Ongoing
10	Sumit Sharma	PT	To be Finalized by RDC of NIT Jalandhar after Comprehensive exam	Dr. Ajay Kumar Sharma GNDU, Amritsar	Ongoing
11	Manpreet Kaur	PT	To be Finalized by RDC of NIT Jalandhar after Comprehensive exam	Dr. Ajay Kumar Sharma GNDU, Amritsar	Ongoing
12	Anamika	FT	To be Finalized by RDC of NIT Jalandhar after Comprehensive exam	Dr. Parveen Malik, NIT Jalandhar	Ongoing

PG guidance: 02

Sr. No.	Title of Project/Thesis	Names of Student	Year
	Measurement of Radon and Thoron Concentration with Pin Hole Cup Dosimeter in the environs of Jalandhar District.	Swati Thakur	2014-15
	Measurement of Radon Concentration in water using Rad7	Palki	2014-15

Research Publications (International journals)

S. No.	Year	Title of the Paper alongwith all authors Vol. /Page No.	Publishers
1.	2014	Estimation of annual effective dose due to Radon level in indoor air and soil gas in Hamirpur district of Himachal Pradesh. Rohit Mehra, Pankaj Bala. Journal of	Elsevier

		Geochemical Exploration. Volume 142, July 2014, Pages 16–20.	
2.	2014	Assessment of natural radioactivity levels and associated dose rates in soil samples from northern Rajasthan, India. Vikas Duggal; Asha Rani; Rohit Mehra. Radiation Protection Dosimetry, vol.158(2): 235-240. doi:10.1093/rpd/nct199	Oxford Journal
3.	2014	Analysis of radon concentration in drinking water in Hanumangarh district of Rajasthan, India. Vikas Duggal, Rohit Mehra, Asha Rani Radiation Protection and Environment, 36 (2), 1-6. IARP Publication.	IARP Publication
4.	2014	Determination of some carcinogenic PAHs with toxic equivalency factor along roadside soil within a fast developing northern city of India. Vaneet Thakur, N.C Kothial, Saruchi, Rohit Mehra, A Parkashc, RR Sinha, SK Tayagie, R Gabaa. J. Earth Syst. Sci. 123, No. 3, April 2014, pp. 479–489.	Springer publication
5.	2014	A study of seasonal variations of radon levels in different types of dwellings in Sri Ganganagar district, Rajasthan. Vikas Duggal, Asha Rani, Rohit Mehra. Journal of Radiation Research and Applied Sciences, (Accepted) ELSEVIER Publications.	ELSEVIER Publications
6.	2014	Measurement of ^{222}Rn Concentration in Drinking Water in Northern Rajasthan, India. Vikas Duggal, Asha Rani, Rohit Mehra. International Journal Engineering Research and Technology, (Accepted) ESRSA Publication.	ESRSA Publication
7.	2014	Monitoring of metal contaminations in groundwater in Northern Rajasthan, India. Vikas Duggal, Asha Rani, Rohit Mehra. Journal of Environmental and Occupational Science, (Accepted).	Journal of Environmental and Occupational Science
8.	2014	Distribution of natural radioactivity in soil samples and radiological hazards in building material of Una, Himachal Pradesh. Pankaj Bala, Rohit Mehra, R.C. Ramola. Journal of Geochemical Exploration, 142 (2014) 11–15. http://dx.doi.org/10.1016/j.gexplo.2014.02.010 .	Elsevier Publishers
9.	2014	Long-term simultaneous measurement of indoor concentration of radon and thoron progeny in the dwellings of Una and Hamirpur district of Himachal Pradesh. Pankaj Bala, Rohit Mehra, Indoor and Built Environment, DOI: 10.1177/1420326X14537006	Sage Publications
10.	2011	Measurements of indoor radon and thoron levels in dwellings and radon concentrations in drinking water by using RAD7, Komal Badhan, Rohit Mehra, R G Sonkawade. International Journal of Low Radiations (submitted)	Inderscience Enterprises
11.	2014	Study of variation of $^{222}\text{Rn}/^{220}\text{Rn}$ and their progeny concentration in dwellings using Single Entry Pin hole based Diffusion Chambers, Rohit Mehra, Kirandeep Kaur, Pargin Bangotra, BK Sahoo, Indoor and Built Environment. (accepted in press)	Sage Publications
12.	2014	Magnetic studies of river sediments and its variation with different physiographic regions of Bharathapuzha River, southwestern India. N. Krishnamoorthy, S. Mullainathan, R. Mehra, Marcos A. E. Chaparro and Mauro A. E. Chaparro. Studia Geophysica et Geodaetica. (submitted)	Springer publication
13.	2015	Variation of naturally occurring radionuclides, dose rate and mineral characteristics with particle size and altitude in bottom sediments of a river originating from Anamalai hills in the Western Ghats of India. N. Krishnamoorthy, S. Mullainathan, R. Mehra, Marcos A. E. Chaparro and Mauro A. E. Chaparro. Environmental Earth Sciences	Springer publication

Research Publications (National journals) :

S. No.	Year	Title of the Paper alongwith all authors Vol. /Page No.	Publishers
1	2014	Assessment of indoor radon concentration in air using RAD 7 and radon exhalation rate measurement in soil samples, Sandeep Kansal and Rohit Mehra, ISST Journal of Applied Physics Vol./Issue-05/02 pp: 80-84.	ISST, India

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Recent Trends in Civil Engineering	Dr. B.R. Ambedkar National Institute of Technology Jalandhar	May 26-30, 2014	TEQIP-II
Recent Advances in Energy Technology	Dr. B.R. Ambedkar National Institute of Technology Jalandhar	June 02-06, 2014	TEQIP-II
Data Analysis and Soft Computing	Dr. B.R. Ambedkar National Institute of Technology Jalandhar	June 09-13, 2014	TEQIP-II

Expert talks delivered:

Title of talk	Event of talk delivered	Date of talk
Health Risk Assessment Due To Natural Radionuclides In Environs	Expert talk at Arni University, Kathgarh, Himachal Pradesh	05/11/2014
Introduction to Nano technology its	Expert Talk at ACET, Amritsar, Punjab.	17/10/2014

synthesis and characterization		
Nuclear Radiations and Particle Detectors	Expert Talk at Baba Farid College, Bathinda, Punjab	10/10/2014
Assessment of Radiological Risks due to Radionuclides in the Environs	Extension Lecture at KVM, Jalandhar	01/08/2014
Smart Materials	STC on Innovation and Futuristic Trends in Advance Manufacturing and Nanotechnology at DAVIET, Jalandhar	09/07/2014
Optical wave Guiding-Light Propagation, Modes and Fibre Configuration	STC on Advances in OFC Technology, organized by NITTR at MIMIT, Malout	07/07/2014
Use of Engineering Materials for measurement of natural Radioactivity.	Seminar Under TEQIP-II at GZS-PTU Campus, Bathinda	07/03/2014

Membership to professional bodies

Life Member International Geo-Hazards Research Society, Dresden, Germany.

Associate of International Congress for Chemistry and Environment.

Life Member Indian Society for Radiation Physics, BARC, Mumbai.

Life Member Nuclear Track Society of India, BARC, Mumbai

Life Member Indian Society for Technical Education.

Life Member Indian Society of Information Theory & its Applications.

Member International Radiation Physics Society.

Projects Completed/On Going/sponsored projects

Sr. No.	Year	Name of the Project	Sponsoring Agency	Role	Amount
1	2010	Establishment of Virtual Class Room for National Knowledge Network under National Mission on Education through Information and Communication Technology	Ministry of ICT, Govt. of India	Coordinator	Rs.40 Lakh
2	2011	National Mission on Education through Information and Communication Technology	Ministry of ICT, Govt. of India	Coordinator	Rs.10 Lakh
3	2011	Measurement of Radon, Thoron and progeny distribution in different type of houses in Bathinda, Mansa, Muktsar and Faridkot district of Punjab.	BRNS, BARC, Department of Atomic Energy, Govt. of India	Principal Investigator	Rs.30 Lakh
4	2014	Measurement of Radon, Thoron and their Progeny Distribution in the Different Type of Houses and Natural radioactivity in soil in Hanumangarh, Churu and Sri Ganganagar Districts of Rajasthan	BRNS, BARC, Department of Atomic Energy, Govt. of India	Co-Principal Investigator	Rs.35 Lakh
5	2014	Measurement of Terrestrial Natural Radionuclides in the environs of Moga and Ferozepur districts of Punjab.	SERB,DST, Govt of India	Principal Investigator	Rs.40 Lakh

Faculty 6: Dr. Harleen Dahiya**PhD guidance: Three**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12413136	Narinder Kumar	Phenomenological study of Generalized Parton Distributions	Ongoing (Part-time)	Sole	-	July 2012
12413131	Aarti Girdhar	Study of some aspects of Large Hadron Collider	Ongoing (Part-time)	Joint	Biswarup Mukhopadhyaya	July 2012
14822003	Harpreet Singh	To be decided in RAC	Ongoing (Part-time)	Joint	Arvind Kumar	July 2014

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/Completed
12313115	Rupanjali Ganguly	The Neutrino: An Elusive Particle	Completed	Sole	--	2014
12313107	Manuja	Modern Perception of the Light	Completed	Sole	--	2014

Research Publications (International journals)

S. No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
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1	Electromagnetic and gravitational form factors in simulated QED and Yukawa model	Mod. Phys. Lett. A	29	1450 118	2014	Narinder Kumar and Harleen Dahiya
2	Axial-vector form factors for the low lying octet baryons in the chiral quark constituent model	Phys. Rev. D	90	0740 01	2014	Harleen Dahiya and Monika Randhawa
3	Charge and magnetization densities in transverse coordinate and impact parameter space	Phys. Rev. D	90	0940 30	2014	Narinder Kumar and Harleen Dahiya
4	Generalized Parton Distributions of proton for nonzero skewness in transverse and longitudinal position spaces	Int. Jol. of Mod. Phys. A	30	1550 010	2015	Narinder Kumar and Harleen Dahiya
5	Transverse distortion of a relativistic composite system in impact parameter space	Eur. Phys. J. A	51	19	2015	Narinder Kumar and Harleen Dahiya

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Data Analysis and Soft Computing	Dr. B.R. Ambedkar National Institute of Technology, Jalandhar	09-13 June 2014	TEQIP-II
XXI DAE-BRNS High Energy Physics Symposium 2014	Indian Institute of Technology, Guwahati	December 08-12, 2014	Department of Atomic Energy and SERB
Recent Advances in High Energy Physics	University of Hyderabad	February 26-28, 2015	UGC

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
Seminar on "Neutrino Physics-A Historical Perspective"	Dr. Harleen Dahiya	Sept 03, 2014	TEQIP-II

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk	Event/STC/Seminar/Workshop
Flavor and Spin Structure of the Baryons	Dr. Harleen Dahiya	Recent Advances in High Energy Physics	26 Feb 2015	Workshop
Big Bang, God's Particle and The Large Hadron Collider	Dr. Harleen Dahiya	Invited lecture	25 March 2015	Seminar

Projects Completed/On Going/sponsored projects

S.No	Title	Year	Agency	Coordinator /Dept.	Project cost
1.	Chiral Constituent Quark Model and Proton Spin Problem	Completed 2008	Scientific Engineering and Research Board (SERB), Department of Science and Technology (DST)	Dr. Harleen Dahiya	Rs.10,31,000/-
2.	Hyperon Semi-leptonic Decays in the Chiral Constituent Quark Model	Completed 2013	Scientific Engineering and Research Board (SERB), Department of Science and Technology (DST)	Dr. Harleen Dahiya	Rs.10,69,400/-
3.	Electromagnetic Structure of Hadrons at low-Q ²	Completed 2014	Board of Research in Nuclear Sciences (BRNS), Department of Atomic Energy (DAE)	Dr. Harleen Dahiya	Rs.12,02,050/-
4.	Generalized and Transverse Momentum Dependent Parton Distributions	Ongoing (2014-2017)	Scientific Engineering and Research Board (SERB), Department of Science and Technology (DST)	Dr. Harleen Dahiya	Rs.13,32,000/-

Faculty 7: Dr Praveen Malik**PhD guidance: Guided- 1, Ongoing- 5**

Roll No	Name of	Title	Status	Sole	Name of joint	Date of
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	Candidate			or joint	supervisor	Enrolment/ Completed
090413101	Ashok Chaudhary	Dielectric and Electro-Optic Studies of Nanomaterials Doped Ferroelectric Liquid Crystal Materials	FT	Joint	Dr. Rohit Mehra , NIT Jalandhar Dr. KK Raina, Thapar University, Patiala	Completed 02/09/2013
11413131	Arshdeep Singh	Studies of blue phases and their stabilizing in chiral nematic liquid crystals	PT Comprehensive Held	Sole	-	July,2011, In progress
13822001	Divya Jayoti	Investigations in nanomaterial doped polymer –liquid crystal composites	PT	Sole	-	Aug 2013 ,In progress
12413133	Barjinder Kaur	Study of rare earth hexaferrite	PT Comprehensive Held	Sole	Dr Abhinav Pratap Singh NIT Jalandhar	In Progress
13820003	Amit Sharma	Proposed- physical studies in nematic liquid crystals in IPS modes	PT	Sole	Dr. Pankaj Kumar, Chitkara University, Patiala	In Progress
14522001	Km Anamika Chauhan	Proposed – Radiation/ Liquid crystals	Regular	joint	Dr. Rohit Mehra , NIT Jalandhar	In Progress

PG guidance: Guided-02

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12313102	Dimple	Dielectric study of iron oxide nanoparticles doped ferroelectric liquid crystal mixtures	completed	Sole	-	June 2014
12313116	Shakti Bharat	Study of spontaneous polarization and dielectric parameters of ferroelectric liquid crystal mixture	completed	Sole	-	June 2014

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	Properties of Ferroelectric Liquid Crystal/Multiwall Carbon Nanotube Doped Composite	Integrated Ferroelectrics, Taylor and Francis	158	123 - 130	2014	Khushboo, Praveen Malik, Divya Jayoti, Rohit Mehra, K K Raina, Ashok Chaudhary
2	Phase Transition and Electro-Optic Studies in Polymer Stabilized Blue Phase Liquid Crystal	Macromolecular Symposia, Wiley VCH Verlag	Accepted (In Press)	-	2015	Arshdeep Singh, Praveen Malik
3	Polymer concentration dependent morphological and electro-optic properties of polymer dispersed ferroelectric liquid crystal composites	Macromolecular Symposia, Wiley VCH Verlag	Accepted (In Press)	-	2015	Divya Jayoti, Praveen Malik

Research Publications (National journals) :

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	Field Induced Studies In Carbon Nanotube Doped Nematic Liquid Crystal Mixture	Journal of advances in physics	4 (3)	565-570	2014	Khushboo, Praveen Malik, Ashok Chaudhary

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
International Conference on Soft Materials.	MNIT Jaipur	6-10 October 2014.	-

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk	Event/STC/Seminar/Workshop
Liquid Crystal Displays: Recent Advances	Dr Praveen Malik	Expert talk for B.Tech Students	17-3-2015	Organized by Amritsar college of engineering and Technology, Amritsar

Membership to professional bodies

Life Member of Indian liquid crystal society (L-253)

Life Member of International liquid crystal society (ILCS-1751)

Projects Completed/On Going/sponsored projects

S.No	Title	Year	Agency	Coordinator /Dept.	Project cost
1	Electro-optic and dielectric properties in nanomaterials dispersed ferroelectric liquid crystals	2012-2015	DST, Delhi	Physics	27.0

Faculty 8: Dr. Abhinav Pratap Singh**PG guidance: 02**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/Completed
12313113	Rimpy Mehra	Synthesis and characterization of cobalt doped cerium oxide thin films	Completed	Sole	NA	May, 2014
12313110	Nisha	Synthesis And Characterization Of Nickel Doped Cerium Oxide Thin Films	Completed	Sole	NA	May, 2014
13322003	Sarabjot Kaur	Synthesis and characterization of carbon nanotubes	ongoing	Sole	NA	July, 2014
13322020	Sunil Bassi	Ni-doped ZnO thin films using accelerator techniques	ongoing	Sole	NA	July, 2014
13322018	Harmandeep Kaur	Using multiplet calculation for the simulation of L-edge of transition metal ions	ongoing	Sole	NA	July, 2014

Faculty 9:Dr. Arvind Kumar**PhD guidance:**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/Completed
14822003	Harpreet Singh	To be decided by RAC	On-going	joint	Dr. Harleen Dahiya	July 2014

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/Completed
12313112	Ranveer Kaur	Kaons and Antikaons in Asymmetric Nuclear medium	Completed	Sole	N.A	June 2014
12313109	Navdeep Kaur	Kaons and Antikaons in Hot and Dense Nuclear Medium	Completed	Sole	N.A	June 2014
12313101	Anshul Dadwal	Lambda (1405) Resonance in Chiral Dynamics	Completed	Sole	N.A	June 2014
13322011	Karan Sharma	D mesons in Strange Hadronic Matter	On-going	Sole	N.A	July 2013

13322004	Gagan Deep Kaur	Antikaon Condensation In Neutron Stars	On-going	Sole	N.A	July 2013
13322015	Satvir Kaur	D mesons in Asymmetric Nuclear Matter	On-going	Sole	N.A	July 2013

Research Publications (International journals)

S. No	Title of paper	Journal Name	Vol. No.	Page No/Article ID	Publication year	Authors as on the article
1	Heavy scalar, vector and axial-vector mesons in hot and dense nuclear medium	Advances in High Energy Physics	2014	549726	2014	Arvind Kumar

Projects Completed/On Going/sponsored projects

S.No	Title	Year	Agency	Coordinator /Dept.	Project cost (in Rs)
1.	Strangeness and Charmness in Heavy-Ion Collision Experiments	2014	DST, Govt of India	Dr. Arvind Kumar, Physics Department	11 28 000.00

DEPARTMENT OF CHEMISTRY
DEPARTMENTAL SUMMARY (1st April 2014- 31st March 2015)

No. of Journal publications(International)	67	No. of PhD completed	5
No. of Journal publications(National)	9	No. of new PhD students enrolled	21
No. of National Conferences attended	16	No. of New PG students completed	11
No. of STC/ Workshops conducted	19	No. of New PG students enrolled	16
No of expert talks delivered by faculty	12		

FACULTY

Name	Position	Qualifications
Dr B S Kaith	Professor	Ph.D
Dr. N. C Kothiyal	Professor	Ph.D
Dr. Rajeev Jindal	Associate Professor	Ph.D
Dr. Sangeeta Oberai	Associate Professor	Ph.D
Dr. Jaspreet Kaur	Associate Professor	Ph.D
Dr. Harsh Manchanda	Associate Professor	Ph.D
Dr. Uma Shankar	Assistant Professor	Ph.D
Dr. Virender Singh	Assistant Professor	Ph.D
Dr Mithu Maithi (Contract Faculty)	Assistant Professor	Ph.D
Dr. Anand Kumar (Contract Faculty)	Assistant Professor	Ph.D
Dr Vikas Saw (Contract Faculty)	Assistant Professor	Ph.D
Dr Jaspreet Kaur Bhatia (Contract Faculty)	Assistant Professor	Ph.D
Dr Shikha Narang (Contract Faculty)	Assistant Professor	Ph. D

ACADEMIC PROGRAMMES**Undergraduate Programmes**

- B. Tech - I
- IDX-101,
- CYX-101,
- CYX-102

Postgraduate Programmes

- M.Sc. in Chemistry
- Ph.D. in Chemistry

LIST OF LABORATORIES

- UG Lab
- PG Organic Lab
- PG Inorganic Lab

- PG Physical Chemistry Lab
- ICA (instrumental Chemical Analysis) Lab
- R&D Lab
- CCL(Computational Chemistry Lab)

Laboratory development

Sr. No.	Items Purchased	Laboratory	Price	Laboratory Incharge
1.	Rotary Evaporator		6 Lacs	Dr Virender Singh
2.	Nitrogen Gas Cylinder		15,000/-	Dr Virender Singh
3.	WI-FI Router and Internet Hub	Computational Chemistry Lab(CCL)	15,000/-	Dr N C Kothiyal

RESEARCH AND DEVELOPMENT ACTIVITIES (Faculty wise)**Faculty : Dr. B.S. Kaith****PhD guidance:**

S.No.	Name of Candidate	Title	Date of Enrolment/ Completed
1	Dr Kshama Sharma	Synthesis of Conducting Gum ghatti-PANI based Interpenetrating Networks and their applications as controlled drug delivery devices.	2014
2	Dr Suruchi	Chemical and Enzymatic Synthesis of Gum tragacanth based Biodegradable Hydrogels: Their Evaluation as Controlled Drug and Fertilizer Release Devices	2015
3	Ms Rachna Sharma	Hydrogels (Title to be decided)	--
4	Mr Jitender Dhiman	Composites (Title to be decided)	--
5	Ms Reena Sharma	Conducting Gels (Title to be decided)	--
6	Ms Sukriti Sharma	Smart materials (Title to be decided)	--
7	Ms Jaya Hatta	Smart materials (Title to be decided)	--
8	Ms Preeti Mehta	Smart materials (Title to be decided)	--
9	Mr Jitender Sharma	Smart materials (Title to be decided)	--
10	Mr Amit Kumar Sharma	Smart materials	--

PG guidance:

Reg No.	Name of Candidate	Title	Status	Name of joint supervisor
12311119	Ms Vidhu	Conversion of Biodegradable Flax into Hydrophobic Reinforcing Material and its Application in Civil Engineering	completed	Dr B S Kaith
12311105	Ms Harpreet Kaur	Conversion of Biodegradable Flax into Reinforcing agent – Its Application in Civil Engineering	completed	Dr B S Kaith
12311104	Ms Gurjit Kaur	Chemical Modification of Flax Biomass and its utilization in the Preparation of Green Building Materials	completed	Dr B S Kaith
13320025	Ms Surbhi Sethi	Comparative studies of removal of Methylene Blue Dye using Xanthum-Psyllium based Hybrid Hydrogel and Nano-composites	Project under progress	Dr B S Kaith
13320022	Ms Tajinder Kaur	Synthesis of Potassium Zinc Hexacyanoferrate Nano-particles Reinforced Hybrid Gel Composites-Removal of Malachite Green Dye from Waste Water	Project under progress	Dr B S Kaith

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year
1.	Green synthesis of potassium zinc	RSC Advances	5	26141-	2015

	hexacyanoferrate nanocubes and its potential application in photocatalytic degradation of organic dyes.			26149	
2.	Preparation and Application of Grafted Holarrhena Antidycentrica Fiber as Cation Exchanger for Adsorption of Dye from Aqueous Solution.	Journal of Environmental Chemical Engineering	--	--	2015
3.	Biodegradation of Gum tragacanth acrylic acid based hydrogel and its impact on soil fertility.	Polymer Degradation and Stability	--	--	2015
4.	Induction of Morphological Changes in Soy Protein Concentrate through Pressure Induced Graft copolymerization and Evaluation of Chemical and Thermal Properties.	Iranian Journal of Science and Technology (Sciences) Manuscript	--	--	2015
5.	Guar gum based biodegradable, antibacterial and electrically conductive hydrogels.	International Journal of Biological Macromolecules	--	--	2015
6.	Gum ghatti-based biodegradable and conductive carriers for colon-specific drug delivery.	Colloid and Polymer Science	--	--	2015
7.	Adsorption of crude oil from aqueous solution using Gum tragacanth polyacrylic acid based hydrogen.	Petroleum Science and Technology	--	--	2015
8.	RSM optimized soy protein fibre as a sorbent material for treatment of water contaminated with petroleum products.	Desalination and Water Treatment	--	--	2014
9.	Synthesis, characterization and evaluation of property profile of hybrid ion exchanger.	Advanced Materials Research	--	--	2014
10.	Optimal response surface design of Gum tragacanth based poly[(acrylic acid)-co-acrylamide] IPN hydrogel for controlled release of antihypertensive drug losartan potassium	RSC Advances	4 (75)	39822 - 39829	2014
11.	Response surface methodology and optimized synthesis of guar gum-based hydrogels with enhanced swelling capacity	RSC Adv	4	40339	2014
12.	Flocculation and adsorption properties of biodegradable gum-ghatti-grafted poly(acrylamide-co-methacrylic acid) hydrogels	Carbohydrate Polymers	115	617–628	2015
13.	Effects of O^{7+} and Ni^{9+} swift heavy ions irradiation on polyacrylamide grafted Gum acacia thin film and sorption of methylene blue.	Vacuum	111	73-82	2015
14.	Synthesis and flocculation properties of gum ghatti and poly(acrylamide-co-acrylonitrile) based biodegradable hydrogels.	Carbohydrate Polymers	114	321–329	2014
15.	A study of the biodegradation behaviour of poly(methacrylic acid/aniline)-grafted gum ghatti by a soil burial method.	RSC Adv	4	25637-25649	2014
16.	Synthesis and biodegradation studies of gamma irradiated electrically conductive hydrogels.	Polym. Degrad. Stab	107	166-177	2014
17.	Water retention and dyes adsorption behaviour of Gg-cl-poly(acrylic-aniline) based conducting hydrogels.	Geoderma	--	232-234 45-55	2014
18.	Gum ghatti based novel electrically conductive biomaterials: A study of conductivity and surface morphology.	Express Polym. Lett.	8	267-281	2014
19.	A comparative study of the effect of Ni^{9+} and Au^{8+} ion beams on the properties of poly(methacrylic acid) grafted gum ghatti films.	Radiat. Phys. Chem.	97	253–261	2014
20.	Fabrication and characterization of gum ghatti-polymethacrylic acid based electrically conductive hydrogels.	Synth. Met.	187	61–67	2014
21.	Effects of swift heavy ion beam irradiation on the structural and morphological properties of poly(methacrylic acid) cross-linked gum ghatti films.	Vacuum	101	166-170	2014
22.	Synthesis, characterization and evaluation of	Journal of the Chinese	2(1)	40-52	2014

	Gum tragacanth and acrylic acid based hydrogel for sustained calcium chloride release-enhancement of water holding capacity of soil.	Advanced Materials Society			
23.	Synthesis of Gum tragacanth and acrylic acid based hydrogel: its evaluation for controlled release of antiulcerative drug pantoprazole sodium, Journal of the Chinese Advanced Materials Society.	Journal of the Chinese Advanced Materials Society	2	110-117	2014
24.	Fabrication and characterization of gum ghatti-polymethacrylic acid based electrically conductive hydrogels.	Synthetic Metals	187	61-67	2014

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

S.No.	Title of course	Name of organizer	Dates
1.	Science: Emerging Scenario and Future Challenges	Vallabh Govt. College, Mandi	April 12, 2015
2.	A Journey through Green Revolution" under Faculty Development Program entitled "New Approaches of Applied Sciences for making better Engineers	CT Institute of Engineering Management and Technology, Shahpur, Jalandhar (Punjab)	March 28, 2015
3.	Green Chemistry-II	GHG Khalsa College, Gurusar Sadhar	March 25, 2015
4.	Materials of Biomedical Significance	Lovely Professional University (LPU), Jalandhar	February 28, 2015
5.	Expert Talk "Eco-friendly Materials of Biomedical Significance" National Seminar on "Recent Advances in Chemical Sciences-2015"	Khalsa College Amritsar	February 07, 2015
6.	Exploring Basic and Applied Sciences for Next Generation Frontiers [EBAS-2014]	LPU-Jalandhar (Punjab)	November 14-15, 2014
7.	Innovations in Emerging, Pharmaceutical, Legal and Management Sciences	Bahara University, Shimla Hills.	May 30, 2014
8.	Science: Emerging Scenario and Future Challenges	Himalyan Forest Research Institute (HFRI), Shimla	May 17-18, 2014
9.	Gamma-radiation induced synthesis of super-absorbents and impact of swift heavy ions bombardment on the physico-chemical properties	IUAC-New Delhi	December 16-18, 2014

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates
Frontiers in Chemical Sciences and Technology	Department of Chemistry NIT- Jalandhar	December 08-14, 2014

Expert talks delivered:

Title of talk	Date of talk	Event/STC/Seminar/Workshop
Frontiers in Chemical Sciences and Technology	December 08, 2014	NIT Jalandhar
Recent Advances in Energy Technology	June 2 – 6, 2014	NIT Jalandhar
Recent Advances in Energy Technology	June 2 – 6, 2014	NIT Jalandhar

Faculty : Dr N C Kothiyal**Ph D guidance: 02 (In Progress)**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12411106	Snigdha Sharma NIT Jalandhar (Full Time)	Cement Nano Composite	Final Stage	Sole	Nil	27 July, 2012
12411131	Mohammad Aslam NIT Jalandhar (Part Time)	Hydro processing of non edible seed oils into transportation fuels.	Final Stage	Joint	Dr A K Sharma (Dr SS S Nire)	27 July, 2012
CH12D02	Divya Gupta Shoolini University, HP	Biopolymer Immobilized Green Synthesis of Nanocomposites	Final Stage	Joint	Dr Deepak Pathania	July, 2012

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or	Name of joint supervisor	Date of Enrolment/
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				joint		Completed
13320007	Swati Mahajan	Synthesis of Graphine Oxide and its application Cement Mortar	Final	Sole	Dr N C Kothiyal	14 June, 2013
13320021	Prabhjot	De-contamination of Chromium from Leather Industry waste by use of Organic Chelates	Final	Sole	Dr N C Kothiyal	14 June, 2013

Research Publications (International journals)

S. No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Use of cellulose acetate-tin (IV) phosphate composite (CA/TPC) in highly effective removal and recovery of heavy metal ions	Ind J. Ind. Chem., Springer	DOI: 10.007/s40090-015-0031-2	On line	Feb 2015	Surirti Sharma, Navin Chandra Kothiyal et al
2.	Synthesis of chitosan-g-poly(acrylamide)/ZnS nanocomposite for controlled drug delivery and antimicrobial activity	International Journal of Biological Macromolecules, Elsevier	74	547-557	2015	Divya Gupta, Devender Singh, N.C Kothiyal et al
3.	Nanocomposite pectin Zr(IV) selenotungstophosphate for adsorptional/photocatalytic remediation of methylene blue and malachite green dyes from aqueous system	Journal of Industrial and Engineering Chemistry	21	957 – 964	2015	Vinod Kumar Gupta, Gaurav Sharma, Deepak Pathania, N.C. Kothiyal
4.	True Boiling Point Distillation and Product Quality Assessment of Biocrude obtained from MesuaferreaL. seed oil via Hydroprocessing	Clean Technologies and Environmental policy, Springer	17	175-185	2014	Mohammad Aslam, N.C. Kothiyal, A. K. Sarma
5.	Nanocomposite pectin Zr(IV) selenotungstophosphate for adsorptional/photocatalytic remediation of methylene blue and malachite green dyes from aqueous system	Journal of Molecular Liquids, Elsevier	190	139 – 145	2014	Vinod Kumar Gupta, Deepak Pathania, N.C. Kothiyal, Gaurav Sharma
6.	Fabrication, characterization and antimicrobial activity of polyaniline Th(IV) tungstomolybdophosphate nanocomposite material: Efficient removal of toxic metal ions from water	Chemical Engineering Journal, Elsevier	251	415-421	2014	Gaurav Sharma, Deepak Pathania, Mu. Naushad, N.C. Kothiyal

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
One Week Short Term Course on Frontiers in Chemical Sciences and Technology	Dr. N C Kothiyal – As coordinator Dr. B S Kaith – As coordinator Dr. Jaspreet Kaur Rajpur Dr. Sangeeta Oberai Dr. Uma Shankar Dr. Virender Singh	December 08-14, 2014	Self Financed

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk	Event/STC/Seminar/Workshop
Graphine oxides as a low cost composite with cement matrix as new building material	Dr N C Kothiyal	Annual National Conference of HIM Science Congress Association, HP Science Emerging Scenario & Future Challenges II, 17-18 May 2014, HFRI Shimla	18 May 2014	HSCA 2014
CNT Cement	Dr N C	UGC Refresher course GNDU, Amritsar	27 May 2014	Refresher

Nanocomposite	Kothiylal			Course
Food Adulterants	Dr N C Kothiylal	UGC Refresher course GNDU, Amritsar	27 May 2014	Refresher Course
Hydro processing of non edible oil at alternative bio fuel	Dr N C Kothiylal	One Week Short Term Course on Frontiers in Chemical Sciences and Technology	08 December 2014	Self financed STC Course

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr N C Kothiylal	Life Member	Indian Society for Surface Science and Technology, Calcutta	
Dr N C Kothiylal	Life Member	Indian Thermal Analysis Society, BARC, Mumbai	
Dr N C Kothiylal	Life Member	Indian Council of Chemists, Agra	LF/1553
Dr N C Kothiylal	Fellow Member (F.I.C.E.R)	Journal of Environmental Research and Development (JERAD), Nagpur	Jan 03, 2011
Dr N C Kothiylal	Life Member	Indian society for Technical Education, New Delhi	
Dr N C Kothiylal	Life Member	Hindi Vigyan Sahitya Prishad, BARC, Mumbai	

Any other significant achievement:

- (1) Assigned Administrative Duty of DFW with Effect From : February 2015.
- (2) Member Technical Committee Sardar Swaran Singh National Institute of Renewable Energy, Jalandhar Kapurthala Road, Kapurthala (Punjab)
- (3) Member Selection Committee Kendriya Vidyalaya CRPF, Suranassi, Jalandhar (August 2014).
- (4) Member VMC Kendriyal Vidyalaya CRPF Suranassi, Jalandhar.
- (5) Expert Ph. D Thesis Evaluation Punjab Technical University, Jalandhar and Barkatullah University Bhopal etc.

Faculty: Dr. Jaspreet Kaur**PhD guidance:**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/C completed
07411101	Deepali Sharma	--	Completed	Joint	Dr. B S Kaith	
09411101	Gagandeep Kaur	Development of novel catalysts and their studies for various organic transformations	Completed	Sole	Nil	2015
12411103	Priya Arora	Functionalized magnetic iron oxide Nanoparticles: Synthesis, characterization and their potential applications	Ongoing	Sole	Nil	--
13520003	Harminder Singh	Functionalized ferrite Nanoparticles: Synthesis, characterization and their potential applications	Ongoing	Sole	Nil	--

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12311116	Sukhjeet Kaur	Reformatsky-Azadiene Cycloaddition-Leading to Synthesis of Novel Pyridin-2(1H)-one derivatives	Completed	Sole	Nil	2012-14
12311108	Jugraj Singh	TCR and Gas Sensing behaviour of Nanocomposites derived from $M^3O@Fe_2O_3$ Nano particles and polyaniline derivatives	Completed	Sole	Nil	2012-14
13320019	Jigyasa	Development of $Fe_3O_4@$ Chitosan @ Co(II) based sandwiched catalyst for the synthesis of substituted 1,5 Benzo diazapines	Project work ongoing	Sole	Nil	2013
13320017	Alisha	One pot synthesis of $Fe_3O_4@TiO_2@Cu$ and its use in	Project work ongoing	Sole	Nil	2013-

		photocatalytic degradation of Dyes				
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Research Publications (International journals)

S. No	Title of paper	Journal Name	Vol. No.	Page No	Publication year
1	POMANI-Mn 3 O 4 based thin film NTC thermistor and its linearization for overheating protection sensor.	Materials Chemistry and Physics	156	150-162	2015
2.	CuFe ₂ O ₄ Magnetic Heterogeneous Nanocatalyst: Low Power Sonochemical-Coprecipitation Preparation and Applications in Synthesis of 4H-chromene-3-carbonitrile Scaffolds.	Ultrasonics Sonochemistry	26	229-240	2015
3.	HCl/CSA doped POT-Mn ₃ O ₄ nanocomposites based conformable thin film temperature sensor for prosthetic hand gloves.	Journal of Materials Science: Materials in Electronics		1-15	2014
4.	Keggin-type Bronsted dodecatungstophosphoric acid: a quasi homogenous and reusable catalyst system for liquid phase Beckmann rearrangement.	Tetrahedron Letters	55	1136-1140 2	2014
5.	Single Step In Situ Synthesis and Optical Properties of Polyaniline/ZnO Nanocomposites.	The Scientific World Journal			2014
6.	Synthesis and applications of CoFe 2 O 4 nanoparticles for multicomponent reactions.	Catalysis Science & Technology	4 (1)	142-151 11	2014

Faculty: Rajeev Jindal**PhD guidance:**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
1	Meenu Singla	Solution Thermodynamics	Ongoing	Sole	-	17/04/2015
2	Saruchi		Complete	Joint	Dr. B.S Kaith	
3	Pooja Sharma	Polymer chemistry	Ongoing	Sole		
4	Rachna Sharma		Ongoing	Joint	Dr. B.S Kaith	
5	Savneet	Polymer Chemistry	Ongoing	Sole	-	July 2014
6	Sukriti		Ongoing	Joint	Dr. B.S Kaith	

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Date Enrolment/Completed
1	Deepika	Synthesis and Characterization of Gum dammar-acrylamide copolymer based Nano composite and investigation of their antibacterial activity.	Ongoing	Sole	June 2015
2	Amarjot	Synthesis and Characterization of hydrogels based iron oxide Nanocomposite and study their antibacterial activity.	Ongoing	Sole	June 2015

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Co-authors as on the article
1	Synthesis characterization and evaluation of Gum tragacanth and acrylic acid hydrogels for sustained calcium chloride release-enhancement of water holding capacity of soil	Journal of the Chinese Advanced Materials Society	2	40-52	2014	Saruchi, Kaith, B.S., Kapur, G.S., Kumar
2	Synthesis of Gum tragacanth and acrylic acid based hydrogel: its evaluation, for	Journal of the Chinese Advanced	2	110-117	2014	Saruchi, Kaith, B.S., Kapur,

	controlled release of antiulcerative drug pantoprazole sodium, characterization and evaluation of Gum tragacanth and acrylic acid hydrogel for sustained calcium chloride release-enhancement of water holding capacity of soil"					G.S.
3	Adsorption of different petroleum fraction saline emulsion from Gt-cl-poly(AA-ip-AAm) interpenetrating polymer network hydrogel	Proceeding of the International Multi Track Conference on Sciences, Engineering & Technical Innovations	2	373-375	2014	Saruchi, Kaith, B.S.,
4	Optimal response surface design of Gum tragacanth based poly[(acrylic acid)-co-acrylamide] IPN hydrogel for controlled release of antihypertensive drug losartan potassium"	(Royal Society of Chemistry), RSC Adv., 4 (75),	2	39822 – 39829	2014	Saruchi, Kaith B. S., Kumar Vaneet, Bhatti M.
5	Adsorption of crude oil from aqueous solution using Gum tragacanth polyacrylic acid based hydrogel	Petroleum Science and Technology Accepted			2014	Saruchi, Kaith B. S, Kumar Vaneet
6	Volumetric Properties of Glycine, L-Alanine, and L-Valine in Aqueous Triammonium Citrate Solutions at Different Temperatures	Monatsh Fur Chem	145	567-575	2014	Kumar Harsh, Singla Meenu
7	Viscosities of Glycine, Glycine, L-Alanine, and L-Valine in (0.2,0.4, 0.6 and 0.8) mol.kg Aqueous Trosodium Citrate Solutions at Different Temperatures	J Chem Eng.	Data 59	419-425	2014	Kumar Harsh, Singla Meenu
8	Volumetric, acoustic and UV absorption studies on solute-solvent interactions of dipeptides of glycine with aqueous amoxicillin solutions	Thermochim Acta	591	140-151	2014	Singla, M. Kumar H
9	Solvation behaviour of some biologically active compounds in aqueous solutions of trilithium citrate at different temperatures	J Mol. Liq.	197	301-314	2014	Kumar, H., Singla, M.
10	Investigation of solute-solvent interactions of amino acids in aqueous solutions of sodium dehydrogen phosphate at different temperatures	Monatsh Fur Chem	145	1063-1082	2014	Kumar, H., Singla, M.
11	Solvation behaviour of biologically active compounds in aqueous solutions of antibacterial drug amoxicillin at different temperatures	J Thermodyn Chem.	76	100-115	2014	Singla, M., Kumar, H.
12	Flocculation and adsorption properties of biodegradable gun-ghatti-grafted poly (acrylamide-co-methacrylic acid) hydrogels	Carbohydrate polymers	115	617-628	2014	Mittal, H.,Kaith. B S., Maity A., Ray, S.S
13	Synthesis and evaluation of the properties of gum ghatti and poly (acrylamide-co-acrylonitrile) based biodegradable flocculants	Carbohydrate polymers	114	321-329	2014	Mittal, H., Kaith. B S., Maity A., Ray, S.S

Faculty: Dr Virender Singh

PhD guidance:

Name of Candidate	Title	Status	Sole or joint
Nisha Devi	Design and Synthesis of Biologically Active Indole and Pyrazole Fused Frameworks	Ongoing	Sole

PG guidance:

S.No.	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor
1.	Honey	Design and Synthesis of β - carboline substituted imidazopyridine	Completed (2014)	Sole	NIL

		derivatives via GBB reaction.			
2.	Manpreet Kaur	Synthesis of substituted ethyl 4-formyl-1H-pyrazole-3-carboxylate derivatives and exploration of Mortia-Baylis-Hillman Chemistry.	Completed (2014)	Sole	NIL
3.	Rahul Thakur	Design and Synthesis of Isooxazole substituted imidazopyridine derivatives via GBB reaction.	Ongoing (2015)	Sole	NIL
4.	Neha Gupta	Design and Synthesis of β -carboline substituted sooxazole, pyrazole and quinoline derivatives via Pictet Spengler reaction.	Ongoing (2015)	Sole	NIL

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	Diversity Oriented Synthesis of Fused-imidazole Derivatives via Groebke-Blackburn-Bienayme Reaction: A Review.	<i>Tetrahedron</i>	71	183-232	2015	N. Devi, R. K. Rawal and Virender Singh*.

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Managing Yourself".	National Institute of Technical Teacher's Training (NITTTR) Chandigarh	16-20 March 2015. Media Centre and Continuing Education Centre	NITJ (TEQIP-II)
"Emerging Trends of Research in Electronics and Communication.	Department of Electronics and Communication Engineering, Dr. B. R. Ambedkar National Institute of Technology, Jalandhar.	01-05 Dec 2014.	NITJ
"Recent Advances on Hydrocarbon Engineering.	Department of Chemical Engineering, Dr. B. R. Ambedkar National Institute of Technology, Jalandhar	11-15 Sept 2014.	NITJ
"Data Analysis and Soft Computing".	. Department of Computer Science & Engineering, Dr. B. R. Ambedkar National Institute of Technology, Jalandhar	June. 9-13 th 2014	NITJ
Recent Advances in Energy Technology,	Department of Chemical Engineering, Dr. B. R. Ambedkar National Institute of Technology, Jalandhar	June 2-6 th 2014.	NITJ
Recent Trends in Civil Engineering,	Department of Civil Engineering, Dr. B. R. Ambedkar National Institute of Technology, Jalandhar.	May 26-30 th 2014.	NITJ

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
One Week Short-Term Course on "Frontiers in Chemical Sciences and Technology (FCST), organized by Department of Chemistry, NIT Jalandhar,	Dr Virender Singh as Convener	December 08-14, 2014.	Self Financed

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk	Event/STC/Seminar/Workshop
Organic Reactions in Water or on Water	Dr Virender Singh	National Seminar on Green Chemistry, G.H.G. Khalsa College, Gurusar Sadhar, Ludhiana	25-26 th March 2015,	National Seminar
"Organic Reactions and Reagents"	Dr Virender Singh	Baba Farid Engineering Institute, Bathinda, Punjab	Sept. 16, 2014.	Baba Farid Engineering Institute, Bathinda, Punjab

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
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Dr Virender Singh	Life time Member	Him Science Congress Association, Solan, Himachal Pradesh, India.	LM-194
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Projects Completed/On Going/sponsored projects

S.No	Title	Year	Agency	Coordinator /Dept.	Project cost
1.	Application of Building Blocks from MBH Chemistry for the Synthesis of Privileged Scaffolds.	2013 36 Month	DST, New Delhi	Dr. Virender Singh	23.70 Lacs
2.	Natural Product Inspired Design, Synthesis, and Anticancer Evaluation of β -Carboline Derivatives.	2015 36 Month	CSIR, New Delhi	Dr. Virender Singh and Dr B S Kaith	15 Lacs

Faculty : Dr Harsh Kumar Manchanda**PhD guidance:**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/Completed
14520001	Isha	Yet to be decided in RAC	Ongoing	Sole	Dr Harsh Kumar Manchanda	August 2014

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/Completed
12311106	Heena	Volumetric, acoustic and viscometric behaviour of disodium hydrogen phosphate and dipotassium hydrogen phosphate in aqueous solutions of N-acetylglycine at different temperatures	Completed	Sole	Dr Harsh Kumar Manchanda	June 2014
12311113	Rupinder Kaur	Thermodynamic and spectroscopic studies of mixtures containing imidazolium based ionic liquid with triammonium citrate and trilithium citrate	Completed	Sole	Dr Harsh Kumar Manchanda	June 2014
13320001	Khyati	Effect of pH on volumetric properties of paracetamol and ascorbic acid using phosphate buffers	Ongoing	Sole	Dr Harsh Kumar Manchanda	--
13320009	Manu Gautam	Solvation behaviour of acetaminophen (paracetamol) with aqueous solutions of glycine and its dipeptide at different temperatures	Ongoing	Sole	Dr Harsh Kumar Manchanda	--
13320006	Yesleen Gupta	Thermodynamic studies of amino acids in ionic liquid 1-butyl-3-methyl imidazolium tetrafluoro borate [C ₄ mim][BF ₄] aqueous solutions	Ongoing	Sole	Dr Harsh Kumar Manchanda	--

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	Densities, Sound Speed and UV Absorption Studies of Trisodium citrate and Tripotassium Citrate in	Journal of Chemical and Engineering Data	59	4049-4061	2014	HarshKumar, Chanda

	Aqueous Solutions of 1-Hexyl-3-Methylimidazolium Chloride [C ₆ mim][Cl]					Chadha
2.	Interactions of amino acids in aqueous triammonium citrate solutions at different temperatures: A viscometric approach	Journal of Molecular Liquids	199	385-392	2014	Harsh Kumar, Meenu Singla, and Rajeev Jindal
3.	Solute-Solvent Interactions of Alkyl Acetoacetates in Aqueous {1-Butyl-3-Methylimidazolium Chloride [bmim][Cl]} Ionic Liquid Solutions in the Temperature Interval (288.15 - 308.15) K	Journal of Chemical and Engineering Data	59	2367-2376	2014	Amalendu Pal, Harsh Kumar, Ritu Maan, Harish Kumar Sharma
4.	Volumetric, acoustic and UV absorption studies on solute-solvent interactions of dipeptides of glycine with aqueous amoxicillin solutions	Thermochimica Acta	591	140-151	2014	Meenu Singla, Rajeev Jindal and <u>Harsh Kumar</u>
5.	Solute-Solvent Interactions of Glycine, L-Alanine, and L-Valine in Aqueous 1-Methyl-3-Octylimidazolium Chloride Ionic Liquid Solutions in the Temperature Interval (288.15 - 308.15) K	Thermochimica Acta	590	127-137	2014	Amalendu Pal, <u>Harsh Kumar</u> , Ritu Maan, Harish Kumar Sharma
6.	Protein mixtures of environmentally friendly zein to understand protein-protein interactions through biomaterials synthesis, hemolysis, and their antimicrobial activities	Physical Chemistry Chemical Physics	16	14257-14270	2014	Aabroo Mahal, Manoj Kumar Goshisht, Poonam Khullar, <u>Harsh Kumar</u> , Narinder Singh, Gurinder Kaur and Mandeep Singh Bakshi
7.	Solvation behaviour of some biologically active compounds in aqueous solutions of trilithium citrate at different temperatures	Journal of Molecular Liquids	197	301-314	2014	<u>Harsh Kumar</u> , Meenu Singla, and Rajeev Jindal

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
workshop on Green Chemistry	Dr Harsh Kumar Manchanda (As expert) At BBK DAV COLLEGE, Amritsar	March 14, 2015	DBT
Frontiers in Chemical Sciences and Technology	Dr Harsh Kumar Manchanda (Coordinator)	December 08-14, 2014	Self Financed

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk	Event/STC/Seminar/Workshop
Quantum Chemistry	Dr Harsh Kumar Manchanda	Frontiers in Chemical Sciences and Technology	14/12/2014	Frontiers in Chemical Sciences and Technology
Solution Thermodynamics and Ideal Mixing Laws	Dr Harsh Kumar Manchanda	Frontiers in Chemical Sciences and Technology	14/12/2014	Frontiers in Chemical Sciences and Technology
Solution Thermodynamics of binary liquid mixtures and and Ideal Mixing Laws	Dr Harsh Kumar Manchanda	7th National Conference on Recent Advances in Chemical, Biological and Environmental Science	31/01/2015	7th National Conference on Recent Advances in Chemical, Biological and Environmental Science

Any other significant achievement: Awarded the INSA Visiting Scientist Fellowship 2014 by Indian National Science Academy, New Delhi to work at CSMCRI-CSIR, Bhavnagar, Gujarat

Faculty: Dr Uma Shanker

PhD guidance: 01

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/Completed
13520001	Vidisha Jassal	Synthesis and applications of some nanosized metal hexacyanometallates (tentative).	ongoing	sole	nil	July, 2013

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/Completed
--	Swati Singh	Synthesis and applications of some nanosized MHCF's.	Awarded	Sole	NIL	
--	Pardeep Sharma	Synthetic and applications of some nanosizedmagnese oxides.	Awarded	Sole	NIL	
13320010	Mannu Kaur	Synthesis and Characterization of some metal oxides .nanoparticles and their applications.	On going	Sole	NIL	
13320024	Mehak Gupta	Synthesis and Characterization of some metal octacyanoferrates nanoparticles and their applications.	On going	Sole	NIL	
13320002	Sweta Gahlot	Synthesis and Characterization of Iron oxides and Manganse oxides nanoparticles and their applications.	On going	Sole	NIL	

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	"Arsenic contamination of ground water: a review of sources, prevalence, health risks and strategies for mitigation"	The Scientific word of Journal	2014	http://dx.doi.org/10.1155/2014/304524	2014	Uma Shanker, Shiv Shankar and Shikha
2	"Green synthesis of potassium zinc hexacyanoferratenanocubes and its potential application in photocatalytic degradation of organic dyes	R Sc Advances	5	26141-26149	2015	VidhishaJassal, <u>Uma Shanker</u> , B S Kaith and Shiv Shanker
3	"Synthesis, Characterization and applications of nano-structured Metal hexacyanoferrates - a review	Journal of Environment al Analytical Chemistry	2	128	2015	VidhishaJassal, <u>Uma Shanker</u> and Shiv Shankar

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
Frontiers in Chemical Science and Technology	Dr Uma Shanker	December 08-14, 2014	Self-Sponsored

Projects Completed/On Going/sponsored projects

S.No	Title	Year	Agency	Coordinator /Dept.	Project cost
1	BTR-3 Project on "γ-radiation induced synthesis of super-absorbents and impact of swift heavy ions bombardment on the physico-chemical properties.	2014.	IUAC-New Delhi,	Chemistry	~15 Lakh

Faculty (Contractual): Dr. Anand Kumar**Research Publications (International journals)**

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Formamide-Based Synthesis of Nucleobases by Metal(II) Octacyanomolybdate(I V):Implication in Prebiotic Chemistry.	Astrobiology	14(9)	769-779.	2014	A. Kumar , R. Sharma and Kamaluddin

Faculty (Contractual) : Dr. Shikha Narang
Research Publications (International journals)

S. No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	A supramolecular approach towards the construction of molecular salts using phosphonic acid and pyrazole. Fabrication of novel coated pyrolytic graphite electrodes for the selective nano-level monitoring of Cd ²⁺ ions in biological and environmental samples using polymeric membrane of newly synthesized macrocycle.	CrystEngComm	33(16)	7777-7789	2014	Udai Singh and Shikha Narang P.
2.		<i>Analytica Chimica Acta</i>	860	51-60	2015	Manoj K. Sahani, A.K. Singh, A.K. Jain, Anjali Upadhyay, Amit Kumar, Udai P. Singh, Shikha Narang

Faculty (Contractual): Dr. Jaspreet Bhatia
Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	RSM optimized soy protein fibre as a sorbent material for treatment of water contaminated with petroleum products.	Desalination and Water Treatment	online	1-10	2014	Jaspreet K. Bhatia , Balbir S. Kaith, Rubina Singla, Preeti Mehta, Vinay Yadav, Jitender Dhiman, Manpreet S. Bhatti,
2	Induction of Morphological Changes in Soy Protein Concentrate through Pressure Induced Graft copolymerization and Evaluation of Chemical and Thermal Properties.	Iranian Journal of Science and Technology (Sciences),	In press		2015	Jaspreet Kaur Bhatia , Balbir Singh Kaith, Rajeev Jindal
3	Preparation and Application of Grafted Holarrhena Antidycentrica Fiber as Cation Exchanger for Adsorption of Dye from Aqueous Solution.	Journal of Environmental Chemical Engineering	(on line)		2015	Balbir S. Kaith, Jitender Dhiman, Jaspreet K. Bhatia

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Frontiers in Chemical Science and Technology	National Institute of Technology, Jalandhar	December, 08-14, 2014	--

Faculty (Contractual): Dr. Vikash Kumar Saw
Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	Influence of Electrolytes on Methane Hydrate Formation and	Energy Sources, Part A: Recovery, Utilization and Environmental	36(15)	1659-1669	2014	V. K. Saw, B. B. Das, I Ahmad, A Mandal and S Laik

	Dissociation	Effects				
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Faculty: Dr. Mithu Maiti

Research Publications (National journals) : Nil

DEPARTMENT OF BIOTECHNOLOGY (BT)
DEPARTMENTAL SUMMARY

No. of Journal publications(International)	01	No. of PhD completed	02
No of expert talks delivered by faculty	02	No. off faculty members Upgraded qualifications	01
No. of expert talks organized	01		

1. Infrastructural Facilities Added:

Major equipments in the laboratories added during the time under consideration:?

2. Research and Development Activities

A. Research Area of the Faculty:

Microbial Bio Technology, Enzyme Technology, Bioprocess Engineering, Green Biofuel production, Environmental Biotechnology, Nanobiotechnology and Biological Waste Treatment etc.

3. Research Publication

a) Research Publication in International Journals (during last 01 year):

Nitai Basak, Asim Kumar Jana, Debabrata Das. Optimization of molecular hydrogen production by *Rhodobacter sphaeroides* O.U.001 in the annular photobioreactor using response surface methodology. *International Journal of Hydrogen Energy*, 5 year Impact Factor 3.4 (ISSN: 0360-3199), Elsevier, Vol 39, Issue August 04, 2014, pp.11889-11901.

3e) Faculty presented expert/invited lecture:

- Dr Nitai Basak had delivered "Invited Talk" entitled "Photofermentative biohydrogen production: as effective technology for renewable Bioenergy" in 1st International Conference on Recent Advances in Bio-Energy Research ICRABR 2015", held at SSS-NIRE, Kapurthala, March 14-17, 2015.
- Dr A K Jana had delivered "Invited Talk" entitled "Cellulosic ethanol: Alternative energy source" in Short term training program in 'Recent advances in energy technology' organized by Department of Chemical Eng, NIT Jalandhar, sponsored by TEQIP – II, June 02-06, 2014 .

3f) Completion of Ph.D by 2 students:

- Mr. Sandeep Kumar, Ph.D students under Prof. A.K.Jana had defended Ph.D thesis successfully in open house viva-voce examination on April 10, 2015. The title of the thesis is "Immobilization of Enzyme Serratiopeptidase on Magnetic Nanoparticles (MNPs) and characterization of resulting Nanoparticles".
- Mr. Nitai Basak, Research Scholar under joint supervision of Prof. A.K.Jana, Department of Biotechnology of the Institute and Prof. Debabrata Das, Department of Biotechnology, IIT Kharagpur had defended Ph.D thesis successfully in open house viva-voce examination on May 25, 2015. The title of the thesis is "Studies on Photofermentative Biohydrogen Production by Purple-Non-Sulfur Bacteria"

4. Faculty as Reviewer of International Reviewed Journal and Membership of Professional bodies:

Sr. No.	Name of the Faculty	Reviewer of the Journal	Membership of Professional Bodies
1.	Dr. A.K.Jana	1) Biochemical Engineering Journal (ELSEVIER)	LM: Indian Institute of Chemical Engineer, Kolkata
2.	Er. Nitai Basak	1) Bioresource Technology (ELSEVIER) 2) International Journal of H ₂ Energy (ELSEVIER) 3) Biomass and Bioenergy (ELSEVIER) 4) International Journal of Environment and Waste Management (Wiley Interscience) 5) Journal of Taiwan Institute of Chemical Engineer, Elsevier 6) Elsevier Energy conversion and Management 7) Energy Fuel, American Chemical Society	M: International Association of H ₂ Energy, USA M: American Chemical Society, USA M: Asian Federation of Biotechnology, Korea LM: International Association of Engineers, Hong Kong LM: Indian Institute of Chemical Engineer, Kolkata LM: Indian Association of Cultivation of Science, Kolkata LM: Indian Society of Technical Education, New Delhi

5. Special Achievement of Students

- Mr. Sujit Patil, All India Rank: 2 in GATE 2015
- Ms Kashish Goel, All India Rank: 351; Ms Ishu Saini, All India Rank: 452 in GATE 2015
- Ms Ankita Final year student, passing out in 2014, got All India Rank: 12 in GATE 2014
- Mr. Lakhan Kumar, All India Rank: 238 in GATE 2014
- GATE -2013: Arun Thapa, M.Tech student at IIT Kharagpur
- GATE-2012: Kapish Gupta, All India Rank 2, completed M.Tech 2014 from IIT Bombay
- Kapish Gupta, B.Tech passed out 2012, became overall topper among all branches from the Institute and has won Institute Gold Medal

6. Student Activity:

(i) **TECHNITI 2015, February 27- March 01, 2015:** SOBER (Society of Biotech Engineers and Researchers), the student society of the Department organized following events during:

- Poster- Punch, programme for Biotechnological thoughts
- Biotechnology Model making Competition, Mega event
- Bio Science Quiz
- Devil's Advocate, related to Biotechnology

(ii) Organization of expert lecture:

- SOBER (Society of Biotech Engineers and Researchers), the student society of the Department In collaboration with Institute organized expert lecture by Dr. U. C. Banerjee, Prof. and Head, Department of Pharmaceutical Technology, National Institute of Pharmaceutical Education and Research on January 09, 2015, Friday. The title of the topic is "Application of enzymes and whole cells for the enantiomeric synthesis of chiral drugs and drug intermediates".

(iii) **Fresher Welcome:** SOBER (Society of Biotech Engineers and Researchers), the student society of the Department organized "Fresher Welcome" to the new 1st year students in the Central Seminar Hall of the Institute on October 17, 2014.

(vi) **Farewell:** SOBER (Society of Biotech Engineers and Researchers), the student society of the Department organized "Farewell Ceremony" to the 5th outgoing batch (2011-2015) in the Central Seminar Hall of the Institute on April 22, 2015.

DEPARTMENT OF CHEMICAL ENGINEERING (CH) DEPARTMENTAL SUMMARY (1st April 2014- 31st March 2015)

No. of Journal publications(International)	16	No. of PhD completed	03
No. of Journal publications(National)	03	No. of new PhD students enrolled	03
No. of International Conferences attended	07	No. of New PG students completed	27
No. of National Conferences attended	01	No. of New PG students enrolled	20
No. of STC/ Workshops conducted	04	No. off faculty members Upgraded qualifications	02
No of conferences conducted	01	Any other important information	
No of expert talks delivered by faculty	04	No. of expert talks organized	04

FACULTY

Name	Position	Qualifications
Dr. S. Bajpai	Associate Professor & Head	PhD
Dr. M K Jha	Professor	PhD
Dr. Ajay Bansal	Associate Professor	PhD
Dr. Renu Gupta	Associate Professor	PhD
Dr. Sangita Garg	Associate Professor	PhD
Dr. Poonam Gera	Associate Professor	PhD
Mr. N K Srivasatava	Associate Professor	M Tech
Ms. Rubal Preet	Assistant Professor	M Tech
Dr. Jatinder Kumar	Assistant Professor	PhD
Dr. Neetu Divya	Assistant Professor	PhD

ACADEMIC PROGRAMMES

Undergraduate Programmes

- B. Tech. in Chemical Engineering

Postgraduate Programmes

- M. Tech. in Chemical Engineering

LIST OF LABORATORIES

- Computational and Simulation Lab
- Mass Transfer Lab
- Heat Transfer Lab
- Mechanical Operation Lab
- Pollution Abatement Lab
- Fluid Mechanics Lab
- Chemical Technology Lab
- Rubber Technology Lab
- Pollution Abatement Lab
- Post Graduate Research Lab
- Instrumentation Analysis Lab

Laboratory development

Sr no	Item purchased	Laboratory	Price (Lacs)	Laboratory in charge
1.	ANSYS Academic Teaching Software 14.0	Computational and Simulation Lab	6.5	Dr Jatinder Kumar
2.	Aqueflox Water Purifier By Millipore from Biotech system	Pollution Abatement lab		Dr S Bajpai

RESEARCH AND DEVELOPMENT ACTIVITIES (Faculty wise)**Faculty 1: Dr. M. K. Jha****PhD guidance:**

Roll No	Name of Candidate	Title	Status	Name of joint supervisor	Date of Enrolment/Completed
08401131	Shailender Bajpai	Chromium (VI) removal from Aqueous streams using low cost adsorbent, weakly anionic resins and Nano filtration process-A comparative study	Completed	Dr. S K Gupta IIT Delhi Dr. A Dey NIT Durgapur	August, 2014
	Shailendra Jagdish Naik	Study on application of steam and horizontal well technology to improve heavy oil recovery	Completed	Dr. Pushpa Jha SLIET Longowal	September, 2014
09401132	N K Srivastava	Studies on Removal of Chromium(VI) from Wastewater	In progress	Dr. T R Sreekrishnan IIT Delhi	
09401131	Manoj Kumar Jindal	Low temperature catalytic hydrothermal conversion of wood biomass to biocrude	In progress	-	
	Barjinder Bhalla	Study of Industrial By Products as Permeable Reactive Barriers for Landfill leachate Management	In progress	Dr. M S Saini GNDEC Ludhiana	
09401133	Shishir Kumar Mishra	Chromium recovery from tannery solid wastes and utilisation of residues	In progress	-	
11401102	Prashant Kumar	Process optimization of biodiesel production using hybrid heterogeneous catalyst	In progress	Dr. Ajay Bansal NIT Jalandhar Dr. A K Sharma Scientist 'D' SSS-NIRE Kapurthala	
12401102	Neetu Singh	Biodiesel Production by Enzymatic Transesterification and its application in CI Engines	In Progress	Dr. A K Sharma Scientist D SSS-NIRE Kapurthala	

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/Completed
12201103	Hemant	Study on Biosorption of Auramine-O Using Renewable and Biodegradable	Completed	Joint		June, 2014

	Kumar	Low Cost Biosorbent Spirogyra Species				
12201119	RavneetKaur	Study on Pyrolysis Kinetics of Waste Wood Biomass, Coal and Their Blend Using Thermogravimetric Analysis TGA)	Completed	Joint		June, 2014
10201137	Rinku Sharma	Preparation & Characterization of Propylene/ Natural Fibre Based Nanocomposite	Completed			June, 2014

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Efficiency Assessment and Mathematical Correlations Development between Bod and Other Parameters in Jalandhar Sewage Treatment	International Journal of Innovative Research in Science, Engineering and Technology	3 Issue 6		June 2014	E. Johal, B.S Walia, M.S. Saini and M.K.Jha
2.	Assessment of Soil Contamination near Unlined Municipal Solid waste Landfill	International Journal of Current Engineering and Technology	4	2678-2683	August, 2014	BarjinderBhalla, M.S.Saini, M.K.Jha
3.	Silver Nanoparticles Composite Nylon Nanofibers For Hybrid Water Filtration	Artificial Cells, Blood Substitutes, and Biotechnology: An International Journal			2014	E Johal, M. S. Saini, M.K.Jha and B. S Walia
4.	Removal of Cr(VI) from wastewater using NiO nanoparticles	International Journal of Science, Environment and Technology,	3 No. 2	395-402	2014	N. K. Srivastava, M. K. Jha, T. R. Sreekrishnan
5.	Optimization of effect of pretreatment on Chromium removal by algal biomass using response surface methodology	International Journal of Engineering Research	3 Issue 3	167-171	2014	N. K. Srivastava, S. S. Parhi, M. K. Jha, T. R. Sreekrishnan
6.	Recombinant Microbial Bioremediation for the treatment of Heavy Metals	Journal of Chemical Engineering and Innovation.	Vol 1, Issue 1	1-26	2015	N K Srivastava, M K Jha, T R Sreekrishnan and S Bajpai

Research Publications (National journals) :

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Effect of Particle Size and Concentration of Fly Ash on the Properties of Polypropylene Based Composite Materials	Journal of Engineering Applied Sciences	7320		2014	K. K. Singh and M.K.Jha
2.	Catalytic Hydrothermal Liquefaction of Waste Furniture Sawdust to Bio-oil	Indian Chemical Engineer			2015	Manoj Jindal and M K Jha
3.	Recombinant Bioremediation for the treatment of Heavy Metals	Journal of Chemical Engineering and Innovation.				N K Srivastava, M K Jha, T R Sreekrishnan and S Bajpai

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Indian Chemical Engineering Congress (CHEMCON 2014), the 67th Annual Session of the	Chandigarh Regional Centre Indian Institute of Chemical Engineers in Collaboration with Dr. SSB University Institute of Chemical Engineering &	December 27-30, 2014	IICChE

Indian Institute of Chemical Engineers and International Conference on "Chemical Engineering - Emerging Dimensions and Challenges Ahead" & Indo Japanese Symposium on "Separation Technology For Green Environment"	Technology, Punjab University, Chandigarh		
44 th Annual National Convention of the ISTE on the theme "Shaping Technical Education to meet the Challenges beyond 2020"	College of Engineering, Trivandrum	November 27-29, 2014	ISTE
Inter NIT Interaction Workshop	Visvesvaraya National Institute of Technology, Nagpur	October 13-14, 2014	

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
ISTE Engineering Education Congress and National Seminar on "Sustainability of Engineering Education"	Dr. M K Jha Dr. A K Chaudhary Mr. N K Srivastava	March 26-27, 2015	TEQIP and ISTE
Emerging Trends in Mining Industry	Dr. M K Jha Dr. A K Chaudhary Dr. S Bajpai	September 12-13, 2014	TEQIP
Short Term Training Programme on "Recent Advances in Hydrocarbon Engineering"	Dr. M K Jha Dr. Bidhan C Ruidas	September 11-15, 2014	ISTE – SRM
Recent Advances in Energy Technology	Dr. M K Jha Dr. Poonam Gera Dr. Sangeeta Garg	June 02-06, 2014	TEQIP

Expert talks delivered:

Title of talk	Name of expert	Event of delivered	Date of talk	Event/STC/Seminar/Workshop
Role of Indian Institute of Chemical Engineers towards growth of Chemical Engineering Students	Dr. M K Jha	Expert Lecture	August 30, 2014	Department of Chemical Engineering Saheed Bhagat Singh Technical Campus at, Firozepur
Exploration and Production of Hydrocarbon Industry		Expert Lecture	August 09, 2014	Department of Petroleum Engineering University College of Engineering, Rajasthan Technical University, Kota

Faculty 2: Dr Ajay Bansal**PhD guidance:**

Roll No	Name of Candidate	Title/ Area	Status	Name of joint supervisor	Date of Enrolment/ Completed
10401131	Jatinder Kumar	Modelling and simulation of immobilized-titanium dioxide based annular photo-catalytic reactor using CFD	Completed	-	Oct 2014
08402032	M K Kaushik	Effectiveness of gravel and scrap tyre chips mixes as drainage medium under different overburden stress conditions.	In Progress	Dr. A Agnihotri NIT Jalandhar	July 2008

11401102	Prashant Kumar	Process optimization of biodiesel production using hybrid heterogeneous catalyst	In progress	Dr. M k Jha NIT Jalandhar Dr. A K Sharma Scientist 'D' SSS-NIRE Kapurthala	July 2011
12401131	Rubal Preet	Studies on photodegradation of organic pollutants in water	In Progress	Dr Renu Gupta	July 2012
13512002	Vijay Sodhi	Investigations on an innovative up gradation of conventional treatment of industrial effluent	In Progress	Dr. M k Jha	Jan 2014
14512001	Nikesh	Hydrodynamic studies on multiphase reactor	In progress	Dr Renu Gupta	July 2014

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
10201134	Monika Sharma	Photo catalytic degradation of Rhodamine B dye using Photo Fenton Process	Completed	Joint	Dr J Kumar	March 2014
12201121	Saurabh Srivastava	Domestic Waste water treatment by electro coagulation using aluminium electrodes	Completed	Joint	Dr R Gupta	Aug 2014
12201106	Kashish Mehta	Synthesis and utilization of fly ash based zeolites for the treatment of coloured wastewater	Completed	Sole		Aug 2014
13212021	Simranjit Kaur	Assisted synthesis of ZnO-graphene composites with enhanced photo catalytic activity in reduction of rhodamine B	In progress	Sole		Jul 2013
13212009	Vikash Kumar	Synthesis of graphene oxide and its application in dye removal	In progress	Sole		Jul 2013

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
7.	Characterization, activity and process optimization with a biomass-based thermal power plant's fly ash as a potential catalyst for biodiesel production	Royal Society of Chemistry Advances,	2015(5)	9946-9954	2015	Prashant Kumar, Mohammad Aslam, Neetu Singh, Sunil Mittal, Ajay Bansal, Mithilesh Kumar Jha and Anil Kumar Sarma
8.	Performance Assessment of Tire Chips –Gravel Mixes as leachate drainage layer material	International Journal of Geotechnical Engineering	doi 10.1179/1939787914Y.0000000086		2014	M. K. Kaushik, Arvind Kumar, Ajay Bansal

9.	Performance Assessment of Gravel – Tire Chips mixes as Drainage layer Material using real active MSW landfill leachate	Journal of Geotechnical and Geological Engineering (Springer)	doi 10.1007/s10706-015-9889-1	2015	M. K. Kaushik, Arvind Kumar, Ajay Bansal
10.	Geo-Environmental Prospectives and Development Plans for a new MSW landfill site using Tire Chips as Leachate Drainage Materials	Electronic Journal of Geotechnical Engineering	19 (Z6): 17495-17513	2014	M. K. Kaushik, Arvind Kumar, Ajay Bansal

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Recent Trends in Civil engineering	Dept of Civil engineering NIT Jalandhar	26-30 May 2014	TEQIP-II
Data Analysis and Soft Computing	Dept of Computer Science and Engineering NIT Jalandhar	9-13 June , 2104	TEQIP-II
Filter media characterization and technology transfer event	Dept of Textile technology NIT Jalandhar	Dec 15, 2014	NIT Jalandhar
ISTE-SRM short term training programme on Recent advances in Hydrocarbon Engineering	Dept of Chemical Engineering NIT Jalandhar	Sept 11-15, 2014	ISTE – SRM
ISTE Engineering Education Congress and National Seminar on “Sustainability of Engineering Education”	NIT Jalandhar	March 26-27, 2015	TEQIP and ISTE

Short Term Courses/Workshops/Seminars organized:

Title of course	Association as	Dates	Funded by
Recent Advances in Energy Technology	Coordinator	June 02-06, 2014	TEQIP
Emerging Trends in Mining Industry	Member of Advisory Committee	September 12-13, 2014	TEQIP
Short Term Training Programme on “Recent Advances in Hydrocarbon Engineering”	Member of Advisory Committee	September 11-15, 2014	ISTE – SRM
ISTE Engineering Education Congress and National Seminar on “Sustainability of Engineering Education”		March 26-27, 2015	TEQIP and ISTE

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk	Event/STC/Seminar/Workshop
Fossil fuels viz a viz environmental issues	Dr Ajay Bansal	Recent Advances in Energy Technology at NIT Jalandhar	June 2-6, 2014	STC

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr Ajay Bansal	Life-Member	Indian Institute of Chemical Engineers, Kolkata	LM-11337
Dr Ajay Bansal	Life-Member	Indian society for Technical Education, New Delhi	LM – 17807

Projects Completed/On Going/sponsored projects

S.No	Title	Year	Agency	Coordinator /Dept.	Project cost
1.	Study on Treatment of Groundwater of A B Sugars	2014	AB Sugar Ltd.	Dr Jatinder Kumar and Dr Ajay Bansal	lac

	Ltd.			Dept of Chemical Engineering NIT Jalandhar	
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Any other significant achievement:

- Member of the Research Degree Committee of Energy Research Centre Panjab university Chandigarh
- Member Board of studies in the discipline of Chemical Engineering and Petrochemical Refining Engineering of Chandigarh University Gharuan
- Chaired the technical session at First International conference on Recent Advances in Bio Energy research organized by SSS-NIRE Kapurthala during March 14-17, 2015.

Faculty 3: DrRenu Gupta**PhD guidance:**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor
12401131	Ms.Rubal Preet	Degradation studies on organic pollutants	In Progress	Joint	Dr.Ajay Bansal
13512001	Ms.Sudha	Study on degradation of phenolic compounds using Fenton oxidation process	In Progress	Joint	Dr.Sangeeta Garg
14512001	Mr Nikesh Kumar	Multiphase flow	In Progress	Joint	Dr.Ajay Bansal

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
12201112	Nikesh Kumar	Removal of safaremine O dye using neem leaves as a low cost adsorbent	Completed	Sole	
12201122	Shailendra Kumar	Adsorption of orange G from a Aqueous solution onto a MgO Nanoparticles.	Completed	Sole	
13212016	Vishakha	Studies on Pressure drop in packed columns	Ongoing	Sole	

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by faculty :

Title of course	organizers	Dates	Funded by
Recent Trends in Instrumentation & Control Engineering	Dept of Instrumentation & Control Engineering, NIT Jalandhar	December 8 th -12 th , 2014	TEQIP
Recent Advances in Energy Technology	Department of Chemical Engineering, NIT Jalandhar	June, 2- 6, 2014	TEQIP
Filter media characterization & Technology transfer	Department of Textile Engineering, NIT Jalandhar	December 15 th , 2014	--

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr.Renu Gupta	Life Membership	IICChE, ISTE, JERAD	41305, 27061, L/871/11

Faculty 4: Dr. Sangeeta Garg**PhD guidance:**

Roll No	Name of Candidate	Title	Status	Name of joint supervisor	Date of Enrolment/ Completed
12401101	Deepak Kohli	Preparation and studies on the properties of poly vinyl alcohol/Barley husk/Kaolinite clay based hybrid composite films.	In Progress	Dr AK Jana, Professor, Department of Biotechnology, NIT Jalandhar	July, 2012
	Raj Kamal	Waste water treatment	In Progress	Dr S Bajpai	July, 2014
13512001	Ms.Sudha	Study on the degradation of Phenolic Compounds using Fenton Oxidation Process	In Progress	Dr Renu Gupta	July 2013

PG guidance:

Roll No	Name of	Title	Status	Sole	Name of	Date of
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	Candidate			or joint	joint supervisor	Enrolment/ Completed
12201117	Raj Kamal	Application of Artificial Neural Network for the prediction of sorption capacity of Nano-Fe ₃ O ₄ and Nano-Fe ₃ O ₄ -SiO ₂ for the removal of Lead and Cadmium ions from aqueous solution.	Completed			June, 2014
10201139	Tejinder Singh	Removal of Methylene Blue from waste water using unactivated and activated rice husk : Optimization of reaction parameters using Taguchi Analysis	Completed			June, 2014
12201110	Mukesh Agarwal	Studies on parameters affecting the adsorption of Congo Red from aqueous solution onto Grass waste	Completed			June, 2014
12201120	Ruby Yadav	Optimization of parameters that affects removal of Rhodamine B from waste water by using Fenton's Oxidation Process	Completed			June, 2014

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Sorption of Para Nitrophenol and Para Chlorophenol using Cross linked Starch based bio Adsorbent: Thermodynamics, Kinetics and Column Studies	Jr. of Industrial Pollution Control	30 (1),	129-138.	2014	Kohli, D., Garg, S., Jana, A.K., Bansal, A., and Chopra P.,
2.	Preparation of LDPE – acetylated / butyrylated starch blend blow films and characterization	Chinese Journal of Polymer Science	32,	268-279	2014	Garg, S., Jana A.K.,

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Emerging Trends in Traditional and Technical Textiles. Topic- (Preparation and studies on the mechanical properties of poly vinyl alcohol films reinforced with Barley husk)	International Conference, organized by Department of Textile Technology	11-12 th April, 2014	
IDCT-2014 Topic- Optimisation of parameters that affects the removal of Rhodamine B from Waste Water using Fenton's Oxidation Process	International Conference, organized by University School of Chemical Technology Guru Gobind Singh Indraprastha University New Delhi, India	Feb 28- March 1 st , 2014	
IDCT-2014 Topic- Removal of methylene blue from waste water using unactivated rice husk and activated rice husk: optimization of reaction parameters using conventional analysis	International Conference, organized by University School of Chemical Technology Guru Gobind Singh Indraprastha University New Delhi, India	Feb 28- March 1 st , 2014	
National seminar on Sustainable Renewable Energy Generation-Current scenario Topic- Chromium Removal from synthetic water by electrocoagulation using aluminium electrodes	National seminar, Energy Research Centre, Panjab University, Chandigarh	March 21, 2015	
National seminar on Sustainable Renewable Energy Generation-Current scenario	National seminar, Energy Research Centre, Panjab University,	March 21, 2015	

Topic- Studies on Properties of PVA/Starch Green Composite Films	Chandigarh		
National Seminar on Sustainability of Engineering Education Topic- Application of E-governance and E-learning Practices	National Seminar, organized by Dr. B.R. Ambedkar National Institute of Technology, Jalandhar	March 26-27, 2015	TEQIP-II

Expert talks delivered:

S.No.	Title of Lecture/ Lecture Series	Date, Place and Programme where lectures delivered	Other relevant information
1	Studies on the Properties of Partially Biodegradable Polymers	4 th June, 2014 at Department of Chemical Engineering, NIT Jalandhar, from June 02-06, 2014.	

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
Recent Advances in Energy Technology	Dr. Sangeeta Garg, Dr. Poonam Gera Dr. M.K. Jha	June 2-6, 2014	TEQIP-II

Faculty5: Poonam Gera**PhD guidance: 02**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
13812001	Mr. Kunwarpal	Thermochemical in conversion of biomass	In progress	joint	Dr. M.K. Jha and Dr. S.K. Tyagi	In progress
14512004	Ms. Ravneet Kaur	Conversion of Biomass to Bio oil	In progress	joint	Dr. M.K. Jha	In progress

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12201101	Aseem Kulshreshta	Immobilization of lipases on egg shell membrane and its application for biodiesel synthesis	Completed	Sole		June, 2014
12201116	Rahul Kumar	Removal of malachite by pistachio waste batch	Completed	Sole		June, 2014
13212005	Nisha Singh	Utilization of column studies leather solid waste for encapsulation of essential oil	In progress	Sole		July, 2013
13212018	Rajesh Kumar Gupta	Upgradation of vacuum Residue which is obtained from fraction of distillation of biocrude and kinetic study of residue	In progress	joint	Dr. A.K. Sarma	July, 2013
	Rajanjit Kaur	Photocatalytic degradation of yellow 12 dye by undoped and doped silver nanoparticle	Completed	joint	Ms. Rubal Preet Kaur	March, 2015

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	Process for the upgradation of petroleum residue: A review and science	International Journal of Advanced Technology	03	643-656	2015	Rajesh Gupta, Poonam Gera

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Recent Advances in Hydrocarbon Engineering	Deptt. of Chemical Engineering, NIT, Jalandhar	11-15 September, 2014	ISTE New Delhi
Recent Trends in Instrumentation and Control Engineering	Deptt. of Instrumentation and Control Engineering	8-12 Dec. 2014	SRM University Chennai
Sustainability of Engineering Education	NIT Jalandhar	26-27 2015	TEQIP, ISTE
Filter Media Characterization and Technology Transfer Event	Deptt of Textile Technology	Dec. 15. 2014	

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
Recent Advances in Energy Technology	Dr. Poonam Gera, Dr. Sangeeta Garg, Dr. M.K. Jha	June 2-6, 2014	TEQIP-II

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Biofuels	Life membership	IChE, JERAD	

Faculty 6: N K Srivastava**PG guidance:**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12201124	Ms. Tryphosa Daniel Gera	Removal of procian brilliant red HE-7B dye using nickel oxide nanoparticles enhanced with cetyl methyl ammonium bromide	Completed	Sole		30/07/2014
10201136	Ms. Ranju Ohri	Electrochemical treatment of distillery, sugar and dairy industry wastewater using iron and aluminium electrodes	Completed	Sole		11/03/2014

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	Removal of Cr(VI) from wastewater using NiO nanoparticles	International Journal of Science, Environment and Technology,	Vol 3 No. 2	395-402	2014	N. K. Srivastava, M. K. Jha, T. R. Sreekrishnan
2	Optimization of effect of pretreatment on Chromium removal by algal biomass using response surface methodology	International Journal of Engineering Research	Vol 3 Issue 3	167-171	2014	N. K. Srivastava, S. S. Parhi, M. K. Jha, T. R. Sreekrishnan
3	Recombinant Microbial Bioremediation for the treatment of Heavy Metals	Journal of Chemical Engineering and Innovation.	Vol 1, Issue 1	1-26	2015	N K Srivastava, M K Jha, T R Sreekrishnan and S Bajpai

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Recent Advances in Energy Technology	Department of Chemical Engineering, NIT Jalandhar	June 02-06, 2014	TEQIP
Recent Advances in Hydrocarbon Engineering	Department of Chemical Engineering, NIT Jalandhar	September 11-15, 2014	ISTE New Delhi
Filter Media Characterization and Technology Transfer Event	Department of Textile Technology, NIT Jalandhar	December 15, 2014	TEQIP
Sustainability Engineering and education	Dr. B. R. Ambedkar NIT Jalandhar	March 26-27, 2015	TEQIP, ISTE

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
ISTE Engineering Education Congress and National Seminar on "Sustainability of Engineering Education"	Dr. M K Jha Dr. A K Chaudhary Mr. N K Srivastava	March 26-27, 2015	TEQIP and ISTE

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
N K Srivastava	Life Member	Indian Institute of Chemical Engineers, Kolkata	LM47598
N K Srivastava	Life Member	Journal of Environmental Research and Development	L/88/11

Any other significant achievement:

Book Chapter Published-

Parmvir Singh, Rishab Jain, Nirmal Kumar Srivastava, Kaushik Shandilya and Jayendra Solanki, Chapter ID: 29661, Chapter Title: Synthesis of Manganese Oxide Nanoparticles using Similar Process and Different Precursors - A Comparative Study, Book ID: 6217, Book Title: Advances in Nanotechnology. Volume 13, ISBN: 978-1-63482-367-8, Nova Science Publishers, Inc., New York, USA, 2015.

Faculty7: Dr. S. Bajpai

PhD guidance: NONE

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of Joint supervisor	Date of Enrolment/ Completed
14512002	Rajkamal	Not decided so far	In Progress	Joint	Dr Sangita Garg	July, 2014

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12201107	Kona Prasad	Synthesis and characterization of magnetic nanocomposit for removal of Cr(VI) from aqueous solution	Completed	Sole		June, 2014
12201103	Guru Kripa	Optimization of nanofiltration process using face centred CCD approach	Completed	sole		June, 2014

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
National seminar on Sustainability of Engineering Education &ISTE Engineering Education congress	NIT Jalandhar	March 26-27, 2015	NIT Jalandhar
Symposia on Emerging Trends in Mining Industry	NIT Jalandhar	September 12-15, 2014	TEQIP-II

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
ISTE Engineering Education congress & National seminar on Sustainability of Engineering Education	NIT Jalandhar	March 26-27, 2015	NIT Jalandhar

1. Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr S Bajpai	Life Member	Indian Institute of Chemical Engineering	

Upgraded qualifications

Name of faculty	date of joining	Highest qualification of the faculty	year of attaining the qualification	Present Designation.
Dr S Bajpai		PhD	2014	Associate Professor

Any other significant achievement:

Book Published

1. Petroleum Engineering Vols. I & II, Vol. 2: Petrochemical, Edition: Petroleum Engg./Chemical Technology, Publisher: Studium Press LLC USA, Editors: Dr. K.K. Pant, Dr. ShishirSinha S. Bajpai, Dr. J.N. Govil.

Faculty 9: Ms Rubal Preet

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12201118	Rani Arunabha Biswas	Batch and Column Studies for removal of Safranin O using hen feathers as potential adsorbent	Completed	Sole		June, 2014
12201114	Payal Hota	Utilisation of Tea waste based adsorbent for the removal of	Completed	Sole		June, 2014

		Bismark brown Y dye				
11201109	Mohammad Zeeshan Alam	Photocatalytic degradation of fast green dye by undoped and doped ZnO nano particles	Completed	Sole		June, 2014
10201140	Upinder Kaur	Photocatalytic degradation of Rhodamine B dye by undoped and doped ZnO nanoparticles	Completed	Sole		February, 2015
10201135	Rajanjit Kaur	Photocatalytic degradation of Yellow 12 dye by undoped and doped silver nano particles	Completed	Joint	Dr Poonam Gera	February, 2015
13212003	Navneet Kumar	Synthesis, characterisation and assessment of photocatalytic property and antimicrobial activity of uncapped and capped ZnS nanoparticles	In progress	Sole		
13212011	Parneet Kaur	Enzyme production from fungus using Mendelweb media	In progress	Sole		

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Recent Advances in Energy Technology	Department of Chemical Engineering, NIT, Jalandhar	June 2-6, 2014	TEQip-II
Recent Advances in Hydrocarbon Engineering	Department of Chemical Engineering, NIT, Jalandhar	September 11-15, 2014	ISTE New Delhi
Emerging Trends in Mining Industry	NIT Jalandhar	September 12-13, 2014	
Frontiers in Chemical Sciences and Technology	Department of Chemical Engineering, NIT, Jalandhar	December 08-14, 2014	

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Rubal Preet	Life membership	IChE	
Rubal Preet	Life membership	JERAD	

Faculty 9: Dr. Jatinder Kumar**PG guidance:**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12201115	Priyanshu Verma	Photocatalytic Degradation of Meropenem Antibiotic in Aqueous Solution and Urine Sample using UV/TiO ₂ and UV/TiO ₂ /H ₂ O ₂ Processes	Completed	Sole		June, 2014
12201111	Naveen Mittal	Synthesis, Characterization and Photocatalytic Activity of Bismuth Doped-Titanium Dioxide under Different Light Sources	Completed	Sole		June, 2014
10201134	Monika Sharma	Photocatalytic Decolourization of Rhodamine B using Photo-Fenton Process	Completed	Joint	Dr Ajay Bansal	June, 2014

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Synthesis, characterization and photocatalytic activity of Bismuth doped titanium dioxide under different	Journal of NanoScience, NanoEngineering & Applications,	4(3)	23-31	2014	Naveen Mittal, Priyanshu Verma, Jatinder Kumar

	light sources.					
2.	Photocatalytic disinfection using titanium dioxide: Use of CFL as environmental disinfectant	Nano Trends	16 (2)	39-42	2014	Priyanshu Verma, Anurag Srivastava, Naveen Mittal, Jatinder Kumar
3.	Degradation and microbiological validation of meropenem antibiotic in aqueous solution using UV, UV/H ₂ O ₂ , UV/TiO ₂ and UV/TiO ₂ /H ₂ O ₂ processes	International Journal of Engineering Research and Applications	7 (6)	58-65	2014	Priyanshu Verma, Jatinder Kumar

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Recent Advances in Energy Technology	NIT Jalandhar	June 02-06, 2014	TEQIP-II
Sustainability of Engineering Education	NIT Jalandhar	March 26-27, 2015	NIT Jalandhar

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr Jatinder Kumar	Life-Member	Indian Society for Technical Education	LM-34562
Dr Jatinder Kumar	Associate Member	Indian Institute of Chemical Engineering	

Projects Completed/On Going/sponsored projects

S.No	Title	Year	Agency	Coordinator /Dept.	Project cost
1.	Study on Treatment of Groundwater of A B Sugars Ltd.	2014	AB Sugar Ltd.	Dr Jatinder Kumar	1.0 lac

Upgraded qualifications

Name of faculty	date of joining	Highest qualification of the faculty	year of attaining the qualification	Present Designation.
Dr Jatinder Kumar	Oct, 2001	PhD	2014	Assistant Professor

Faculty 9: Dr. Neetu Divya**PhD guidance: 01**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
	Kashish Mehta	Not decided so far	In progress	Joint	Dr.M.K.Jha	July 2014

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12201113	Mr Pankaj Kumar	Synthesis of Chemically Derived Graphene Oxide from Graphite	Completed	Sole	Dr. Murari Prasad Principal Scientist CSIR Bhopal	Completed 4/08/2014
12201105	Mr. Kamble Pranil	Studies for the removal of aqueous phenol by adsorption & Photocatalysis	Completed	Sole	NA	Completed 25/07/2014
13212020	Mr. Amit Kumar Chaurasia	Laccase immobilization on nano particles : Photo degradation of Alizarin Red S	On going	Sole	NA	30/07/2013 On going

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
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1.	Biosorption studies for Chromium (VI) removal using Sweetlime fruit skin & Bagasse"	International Journal of Research in Advent Technology(IJRAT),	2(4),	pp. 413-418 E-ISSN: 2321-9637. (Impact Factor: 0.765),.	April 2014	Neetu Divya, Bidyut Mazumdar
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Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
Recent Advances in Energy Technology	NIT Jalandhar	June 02-06, 2014	TEQIP-II
Sustainability of Engineering Education	NIT Jalandhar	March 26-27, 2015	NIT Jalandhar
Chemical Process Modeling & Simulation (CPMS-14)	Department of Chemical Engineering, National Institute of Technology, Raipur	June, 23 rd - 27 th , 2014	NIT Raipur Self Sponsored
Renewable Energy & Environment (REE-14)	Department of Chemical Engineering, National Institute of Technology, Raipur	June, 12- 13, 2014	TEQIP-II

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr Neetu Divya	IICChE-Life Membership	Indian Institute of Chemical Engineering-.	LM-46910
Dr. Neetu Divya	Life Membership	International Association of Computer Sciences and Information Technology (IACSIT)-2009	
Dr. Neetu Divya	Associate Membership	Institute of Engineers (India)-IEI-	AM 100467-3.

**DEPARTMENT OF CIVIL ENGINEERING
DEPARTMENTAL SUMMARY (1st April 2014- 31st March 2015)**

No. of Journal publications(International)	5	No. of PhD completed	03
No. of Journal publications(National)	1	No. of new PhD students enrolled	05
No. of STC/ Workshops conducted	01	No. of New PG students completed	27
No of expert talks delivered by faculty	03	No. of New PG students enrolled	27
		No. of faculty members enrolled for higher qualifications	02

FACULTY

Name	Position	Qualifications
Dr. A. K. Agnihotri	Professor	PhD, University of Roorkee
Dr. A. P. Singh,	Professor	PhD, P.T.U Jalandhar
Dr. Partap Singh,	Professor	PhD, P.U. Chandigarh
Dr. S.P. Singh,	Professor	PhD, University of Roorkee
Mr. Davinder Singh,	Assistant Professor	ME, P.U. Chandigarh
Dr. Rizwan Ahmad Khan	Assistant Professor	PhD, IIT Delhi
Ms. Shailja Bawa	Assistant Professor	ME, P.U. Chandigarh

ACADEMIC PROGRAMMES
Undergraduate Programmes

Bachelor of Technology in Civil Engineering

Postgraduate Programmes

- Master of Technology in Structural and Construction Engineering (Full Time and Part Time)
- PhD (Full Time and Part Time)

LIST OF LABORATORIES

Concrete Technology
CAD Laboratory
Environmental Laboratory
Hydraulics laboratory
Geotechnical Laboratory

Materials Testing Laboratory
Structural Analysis Laboratory
Surveying Laboratory

RESEARCH AND DEVELOPMENT ACTIVITIES(Faculty wise)**Faculty 1: Dr A P Singh****PhD guidance:**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of enrolment/ Completed
	Mr.Maninder Pal Singh	Water permeability and strength characteristics of hybrid steel fibre reinforced concrete	Awarded	Joint	Professor S P Singh	

Faculty 2: Dr S P Singh**PhD guidance:**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of enrolment/ Completed
	Mr.Maninder Pal Singh	Water permeability and strength characteristics of hybrid steel fibre reinforced concrete	Awarded	Joint	Professor A P Singh	
	Mr. Raman Bedi	Flexural fatigue studies on fibre reinforced polymer concrete composites	Awarded	Joint	Professor Rakesh Chandra, Department of Mechanical Engineering	
	Ms. Harpreet Gaba GNDEC Ludhiana	Structural health monitoring and retrofitting of RCC rectangular slabs	Awarded	Joint	Professor H S Rai, GNDEC Ludhiana	

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of enrolment/ Completed
	Mr.Anil Kumar	Carbonation resistance of concrete containing recycled concrete aggregates	Completed	Sole	---	----
	Mr.Bhanu Prakash	Carbonation resistance of self compacting concrete	Completed	Sole	---	----
	Mr.Lalit Kumar	Strength and durability properties of concrete containing recycled concrete aggregate	Completed	Sole	---	----
	Mr.Shishir Upadhyay	Strength development and flexural toughness of steel fibre reinforced concrete made with recycled concrete aggregate	Completed	Sole	---	----
	Mr.Vamshi Sanga	An investigation on the mechanical properties of polymer concrete	Completed	Joint	Mr Raman Bedi, Associate Professor of Mechanical Engineering	
	Mr.Prakash Khude	Studies on coir reinforced composites in civil engineering applications	Completed	Joint	Professor S Ghosh, Department of Textile Technology	
	Mr.Amit Kumar	Strength development and water absorption of concrete containing metakaolin, silica fume and rice husk ash	Completed	Joint	Dr Rizwan A Khan	

Research Publications (International journals)

S.No	Title of paper	Journal Name	Volume Number	Page No	Publication year	Authors as on the article
1	Mean and Design Fatigue Lives of Steel Fibre Reinforced Concrete Containing Cement Based Materials	Magazine of Concrete Research, Thomas Telford	Accepted			Gurbir Kaur, S P Singh, S K Kaushik
2	Fatigue Performance of Plain and Steel Fibre Reinforced Self Compacting Concrete Beams using S-N Relationships	Engineering Structures, Elsevier Science	Accepted			S Goel, S P Singh
	Experimental Study on the Strength Characteristics and Water Permeability of Hybrid Steel Fibre Reinforced Concrete	International Scholarly Research Notices (ISRN)	Accepted			M P Singh, S P Singh, A P Singh
	Effect of Fibre Hybridization on Compressive Strength, Split Tensile Strength and Water Permeability of SFRC	Journal of Materials and Engineering Structures	Accepted			M P Singh, S P Singh, A P Singh
	Flexural Fatigue Life Assessment and Strength Prediction of Glass Fibre Reinforced Polymer Concrete Composites	ISRN Material Science	Accepted			Raman Bedi, S P Singh, Rakesh Chandra
	Reviewing Some Properties of Polymer Concrete	Indian Concrete Journal				Raman Bedi, Rakesh Chandra, S P Singh

Continuing Education / QIP Short Term Lectures / Special Lectures Delivered:

S.No.	Title of Lecture/ Lecture Series	Date, Place and Programme where lectures delivered	Other relevant information
1.	Performance of Steel Fibre Reinforced Concrete made with Cement Additions	National Seminar at Amritsar College Engineering and Technology, 18 July 2014	-
2.	Performance of Steel Fibre Reinforced Concrete made with Cement Additions	Short Term Course at NIT Jalandhar, 28 May 2014	-

Faculty 3: Dr Rizwan A Khan**PG guidance:**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of enrolment/ Completed
12202101	Mr. A Satya narayna	A Study on development of high performance concrete using Silica Fume, Fly Ash and Copper Slag	Completed	Sole	---	----
12202105	Mr.Dandamudi Puranchandra Rao	A Study on Development of Concrete Using Glass Fibre	Completed	Sole	---	----
12202108	Mr Jaisal Muneer K	Development of Concrete Using Municipal Solid Waste Incineration Ash	Completed	Sole	---	----
12202110	Mr Karri Srinivas Reddy	Strength And Durability Study of Recycled Aggregate Concrete Containing Silica Fume As Partial Replacement for Cement	Completed	Sole	---	----
12202115	Mr. Patamata Sasidhar	Use of Copper Slag in Concrete And Cement Mortar As Replacement of Sand	Completed	Sole	---	----

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
Recent Trends in Civil Engineering	Dr A Agnihotri and Dr Rizwan A Khan	26-30 May 2014	TEQIP-II

Expert talks delivered:

Title of talk	Name of expert	Event of talk	Date of talk	Event/STC/Seminar/Workshop
Reinforced Soil foundations	Dr Arvind K Agnihotri	STC	May 28, 2013	STC
Geotechnical Considerations in Earthquake resistant design of structures	Dr Arvind K Agnihotri	STC	May 30, 2014	STC
Performance Evaluation of Bamboo Reinforced Concrete	Rizwan A Khan	Short Term Course	29 May 2014	STC

Consultancy services completed/ongoing:

S.No	Title	Year	Agency	Coordinator /Dept.	Consultancy cost
Liaison is maintained with the civil engineering construction industry by way of rendering consultancy services related to structural design of RCC commercial and industrial structures and material testing etc.					

DEPARTMENT OF ELECTRONICS AND COMMUNICATION ENGINEERING (ECE)
DEPARTMENTAL SUMMARY

No. of Journal publications(Inter.)	36	No. of expert talks organized	08
No. of STC conducted	04	No of PhD students completed	05
No. of Mtech students completed	26	No of new PhD students enrolled	14
No of New MTech students enrolled	32	No of conferences/STC attended	15

1 Faculty

Sr. No.	Name	Position	Qualifications
1.	Dr R K Sarin	Professor	PhD
2.	Dr Arun K Khosla	Associate Professor	PhD
3.	Dr Mamta Khosla	Associate Professor	PhD
4.	Dr B S Saini	Associate Professor	PhD
5.	Dr Ramesh K Sunkaria	Assistant Professor	PhD
6.	Dr Indu Saini	Assistant Professor	PhD
7.	Dr Neetu Sood	Assistant Professor	PhD
8.	Er Ashish Raman	Assistant Professor	PhD (Pursuing)
9.	Er Deepti Kakkar	Assistant Professor	PhD (Pursuing)
10.	Dr Balwinder Raj	Assistant Professor	PhD

2 Academic Programmes**Undergraduate Programmes**

- B. Tech. in **Electronics and Communication Engineering**

Postgraduate Programmes

- M. Tech. in **Electronics and Communication Engineering**
- M. Tech. in VLSI Design

3 Development of Laboratories

- VLSI Design Lab
- Microwave Engineering Lab
- Digital Signal Processing Lab
- Emerging Technologies Lab
- Biomedical Signal Processing & Telemedicine Lab
- Medical Imaging and Computational Modeling of Physiological Systems- Research Laboratory
- Nan electronics Research Laboratory
- Basic Electronics Lab
- Communication System Lab
- Digital Electronics Lab
- Embedded System Lab
- Devices & circuit Lab

4 Research and Development activities**Faculty wise****Faculty Ashish Raman****Mtech guidance**

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Siva Sankar Prasad D	Designing of Phase and Frequency Detector for Video Applications	Completed	Joint	Dr R K Sarin
Inderdeep Singh	Design of Temperature Nano-Sensor by Using the Electronic Transport Properties of Graphene Nanoribbon	Completed	Sole	-
Lesh Kumar Patel	Design and Implementation of High Performance CMOS Current Comparator for ADC Applications	Completed	Sole	-

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	Phase And Frequency Detector For Low Jitter And High Speed Applications-Review	International Journal of Engineering Research & Technology	2 Issue 6	3133-3136	2013	D. Siva Sankar Prasad, Dr R. K. Sarin
2.	Design and Investigative Aspects of RF-Low Power 0.18 μ m based CMOS Differential Ring Oscillator	International Journal of Advanced Science and Technology	58	87-102	2013	Dr R. K. Sarin
3	The design of a novel delay cell based 8.3 GHz, low phase noise ring oscillator in C-MOS 180 nm technology for biomedical ultra-wide-band integrated applications	Int. J. Biomedical Engineering and Technology	13, No. 1	1-16	2013	Dr R. K. Sarin
4	The Shift from Microelectronics to Nanoelectronics – A Review	IJARCCCE	2, Issue 11	4464-4468	2013	Inderdeep singh

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
Recent Trends in VLSI and Communication Systems	Dr. R K Sarin Dr. Arun Khosla Dr. Mamta Khosla Deepti Kakkar Ashish Raman	June 17-21, 2013	TEQIP-II

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk
Recent Trends in VLSI	Ashish Raman	Recent Trends in VLSI and Communication Systems	19/06/2013

Faculty: Dr. R K Sarin**PhD guidance**

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Ashish Raman		In progress	Sole	
Sunny Anand		In progress	sole	
Ms Sheekha Sukhija		In progress	joint	Dr S Singh
Ms Harmander Kaur		In progress	joint	Dr M Khosla
Ankush Chunn		In progress	sole	
Intikhab Ameen		In progress	sole	
Kanwaldeep Singh				

Mtech guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Bhuvan Joshi	VLSI	In progress	Sole	
Abhay Goel	RF	In progress	Joint	Dr S Singh

Research Publications (International journals)

S. No	Title of paper	Journal Name	Volume Number	Page No	Publication year	Authors as on the article
1	Three papers published					Co-author

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Organizers	Dates	Funded by
NBA – Washington Accord	NBA	Sept 2013	NBA
NBA Washington Accord	NBA	Aug 2013	NBA

Short Term Courses/Workshops/Seminars organized: Nil**At ECE Department and through IETE many events were organized****Expert talks delivered:**

Title of talk	Name of expert	Event of talk delivered	Date of talk
VLSI Fabrication Aspects	Dr. R K Sarin	Short Term Course on "VLSI Design through ICT, 10-14 Mar 2014 at NITTTR Chandigarh	14 Mar, 2014

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr R K Sarin	Annual Member	IEEE , USA	90296653
Dr R K Sarin	Fellow & Life Member	Institution of Electronics and Telecommunication Engineers (IETE), New Delhi, India	F109119

Projects Completed/On Going/sponsored projects: SMDP II (VLSI) DIT Ministry of Communication, N Delhi**Any other significant achievement****Chairman IETE Jalandhar Centre****Member BOS of many Universities/Technical Institutes****Member of various committees at national level****Faculty: Dr. Balwinder Raj****PhD guidance**

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Amandeep Singh	CNT Based Memory Design	In progress	Joint	Dr. Mamta Khosla
Sanjeev Kumar Sharma	Modeling of Nanowire and Circuit Dedsign	In progress	Joint	Dr. Mamta Khosla

Mtech guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Md Imran Ansari	Radiation Hardened FinFET Based SRAM Design	In progress	Sole	
Priya Bansal	Memristor And Its Applications for Low Power VLSI Circuits Design	In progress	Sole	
Vikas Aazad	High Frequency SRAM design using High Electron Mobility Transistor (HEMT)	In progress	Sole	

Research Publications (International journals)

S. No	Title of paper	Journal Name	Volume Number	Page No	Publication year	Authors as on the article
1	INDEP approach for leakage reduction in nanoscale CMOS circuits	International Journal of Electronics, Taylor & Francis,	101	1-13	2014	V.K. Sharma, M. Pattanaik & Balwinder Raj
2	PVT variations aware low leakage INDEP approach for nanoscale CMOS Circuits	Microelectronics Reliability, Elsevier	54	90-99	2014	V.K. Sharma, M. Pattanaik & Balwinder Raj
3	"ONOFIC Approach: Low Power High Speed Nanoscale VLSI Circuits Design	International Journal of Electronics, Taylor & Francis,	101	61-73	2014	V.K. Sharma, M. Pattanaik & Balwinder Raj

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Organizers	Dates	Funded by
hands on training workshop on "Nanofabrication Technologies	Indian Institute of Technology, Bombay	24 to 28 June 2013	INUP (Indian Nanoelectronics User Program)
8 th International Conference on Intelligent Systems and Control	KC Engineering College, Coimbatore, Tamil Nadu	10 th and 11 th January 2014	NIT Jalandhar (PDA Grant)
17 th Punjab Science Congress (PSC-	Punjab Technical	Feb 14-16	NIT Jalandhar (PDA

2014) "Science and Technology for Sustainable Growth"	University, Kapurthala, Punjab	2014	Grant)
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Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk
VHDL and Its Implementation	Dr. Balwinder Raj	Short Term Course on "VLSI Design through ICT	11 Mar, 2014
Nano-Scale Semiconductor Devices: Problems and Possible Solutions	Dr. Balwinder Raj	AICTE Sponsored Two week Faculty Development Program on "ADVANCED VLSI DESIGN TECHNIQUES"	28 Jan 2014

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr. Balwinder Raj	Annual Member	IEEE& Electron Devices Society (EDS), USA	90274244
Dr. Balwinder Raj	Life Member	Indian Society for Technical Education (ISTE), IIT(Delhi)	LM-93041
Dr. Balwinder Raj	Life member	Institution of Electronics and Telecommunication Engineers (IETE), New Delhi, India	M-231963

Projects Completed/On Going/sponsored projects

1. "Compact Quantum Mechanical Mobility Model for Surrounding Gate Transistor: Modeling and TCAD Simulation Approach, Ministry of Communication and Information Technology (MCIT), Government of India, 2012-2014 (Completed)
2. DST FIST project to establish Semiconductor Devices Characterization facilities, VLSI Lab in Department of ECE, at NIT Jalandhar, 2013-2017 (Rs. 1.55 Crores) (other investigator Dr. Arun Khosla) Ongoing.

Faculty Mamta Khosla

PhD guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Harmandar Kaur	Not finalized	ongoing	joint	Dr R K Sarin
Amandeep Singh	CNT based memory design	ongoing	joint	Dr Balwinder Raj
Sanjeev Kumar	Modeling of nanowire and ckt design	ongoing	joint	Dr Balwinder Raj

Mtech guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Tarun Bali	Placement in FPGA Using Hybrid PSO-SA Technique	completed	Sole	-
Rahul Vats	Design And Analysis of PAI-Sigma Matchline For Binary Content Addressable Memory	completed	joint	Dr R K Sarin
Sunil Kumar	Robust Hand Gesture Recognition System For HMI Applications	Completed	sole	-
Pushpendra	PAPR Reduction In WP-OFDM Using PSO Based Pts Technique	completed	joint	Dr Neetu Kath
Varun Jandial	A Modified Approach for Adiabatic Logic	ongoing	Sole	
Guguloth Vijaya	Design of Phase Frequency Detector and Charge Pump for PLL Applications	Ongoing	sole	
Eeshant Aggarwal	Testing of DDR-III SDRAM Memory Interface	Ongoing	sole	

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	Evolutionary Design of Efficient Type-2 Fuzzy Models from Noisy Data using Hybrid PSO Model	International Journal of Bio-Inspired Computation-Inderscience	1 (2)	156-178	2014	Mamta Khosla, R K Sarin and Moin Uddin
2	Placement in FPGA using Hybrid PSO-SA Technique	International Journal of Engineering Research and Technology(IJERT)	2 (9)	350-355	2013	Tarun Bali, Dr. Mamta Khosla, Naveed Anjum

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
Recent Trends in VLSI & Communication Systems	R K Sarin, Arun Khosla, Mamta Khosla, Ashish Raman and Deepti Kakkar	June 17-21, 2013	TEQIP-II

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk
Type-2 Fuzzy Logic – Research Challenges	Mamta Khosla	STC on Recent Trends in VLSI & Communication Systems	19.6.13

Projects Completed/On Going/sponsored projects: SMDP-II Completed**Faculty: Dr. BARJINDER SINGH SAINI****PhD guidance**

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Taranjit Kaur	Medical Image Processing	In progress	Joint	Dr. Savita Gupta
Anukul Pandey	Biomedical signal/Image processing along with communication system	In progress	Joint	Dr Neetu Sood, Dr Butta Singh

Mtech guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Anukul Pandey	Effect of Base Transceiver Station and Mobile Phone's radiation on Heart Rate Variability	Completed	Sole	
Shaweta Luthra	Linear and Non-linear analysis of heart rate variability during menstrual cycle in young women	Completed	Sole	
Saloni Pal	An improved level set method for image segmentation	Completed	Sole	
Puneet Sharma	ECG analysis using designed wavelet	In progress	Sole	
Vivek venugopal	Image fusion using weighted least square filter	In progress	Sole	
Prashali Chaudhary	Degraded document image binarization	In progress	Sole	

Research Publications (International journals)

S.No	Title of paper	Journal Name	Volume Number	Page No	Publication year	Authors as on the article
1.	Locally Adaptive Bilateral Clustering for Image Denoising and Sharpness Enhancement	International Journal of Applied Physics & Mathematics	3, No.1	23-27	2013	B. S. Saini, Ravi Raj, and Indu Saini
2.	Cloud Classification for Weather Information by Artificial Neural Network	International Journal of Applied Physics & Mathematics	3, No. 1	28-30	2013	Sanju Kuril, Indu Saini, and B. S. Saini
3.	Comparison of re-sampling methods in the spectral analysis of RR-interval series data	Signal Processing – An International Journal	7, No.1	16-31	2013	B S Saini, Dilbag Singh, and Vinod Kumar
4.	Comparative Analysis of Edge Based and Region Based Active Contour using Level Sets and its Application on CT images	International Journal of Research in Engineering & Technology	2, No.4	566-573	2013	B. S. Saini, G. Sethi
5.	Transfer Entropy Estimation Supplements Time-Domain Beat-To-Beat Baroreflex Sensitivity Index under Postural Stress	International Journal of Research in Engineering & Technology	2, No.4	574-578	2013	B. S. Saini, A. Singh, Dilbag Singh
6.	Effect of Mobile Phone and BTS Radiation on Heart Rate Variability	International Journal of Research in Engineering & Technology	2, No.4	662-666	2013	B S Saini, A Pandey
7.	Comparison of Heart Rate Variability Analysis	International. Journal of Electrical & Electronics	2, No.2	73-80	2013	B S Saini, Shaweta

	Methods in Young Women during Menstrual Cycle	Engineering & Telecommunication				Luthra and Kirti Rawal
8.	Local Intensity based Improved Level Set Method for Image Segmentation	International. Journal of Electrical & Electronics Engineering & Telecommunication	2, No.2	59-67	2013	B S Saini, Saloni Pal,
9.	Effect of Wireless Network Radiation on Heart Rate Variability	International Journal of Information and Electronics Engineering	4, No.1	70-73	2014	B S Saini, A Pandey

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Organizers	Dates	Funded by
2 nd International Conference on Communication and Electronics Information, Melbourne, Australia	IACSIT	Jan 2-3, 2014	TEQIP-II

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
C++ Programming Language	Dr. B S Saini	April 29 - May 10, 2013	TEQIP-II sponsored
ICT for Computing & Signal Processing	Dr. B S Saini	June 03-14, 2013	TEQIP-II sponsored

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk
Linear Analysis Techniques for HRV	Dr B S Saini	Faculty Development Program/STTP on "ICT for Computing & Signal Processing"	June 03-14, 2013
Wavelet	Dr B S Saini	Faculty Development Program/STTP on "ICT for Computing & Signal Processing"	June 03-14, 2013
Heart Rate Variability	Dr B S Saini	Faculty Development Program/STTP on "ICT for Computing & Signal Processing"	June 03-14, 2013
Biomedical Signal Processing	Dr B S Saini	Faculty Development Program/STTP on "ICT for Computing & Signal Processing"	June 03-14, 2013
Assembly Language	Dr B S Saini	Short term course on "C++ Programming Language"	April 29 - May 10, 2013

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr B S Saini	Life Member	IETE	M230080
Dr B S Saini	Member	IEEE-EMBS	92675959

Faculty: Dr Ramesh Kumar Sunkaria**PhD guidance**

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor	Registration
Aman Kumar	Biomedical Signal/Image Processing	In Progress	Sole	-	July, 2013 NIT Jalandhar
Puneeta	Non-linear methods of cardiac variability	Comprehensiv e held	Sole	-	July, 2012/ NIT Jalandhar
Ram Sewak Singh	Biomedical signal processing	In Progress	Joint	Dr. B. S. Saini Deptt. of ECE NIT Jalandhar	July, 2012/ NIT Jalandhar
Kamaljeet Kaur	ECG signal processing	In Progress	Joint	Dr. Charandeep Singh RBIET, Hoshiarpur (PTU, Jalandhar)	July, 2012/ PTU Jalandhar
Kawaldeep Singh	Heart rate variability Analysis	In Progress	Joint	Dr. R. K. Sarin Professor, Deptt. of ECE NIT Jalandhar	July, 2011/ NIT Jalandhar
Omkar Singh	Medical Signal Analysis	In Progress	Sole	-	January, 2014 NIT Jalandhar
Jasleen Kaur	Medical Imaging	In Progress	Sole	-	January, 2014 NIT Jalandhar

M. Tech guidance: Total completed till date: 14+4 in progress

Name of Candidate	Title	Status (2013-14)	Sole or joint candidate	Name of joint supervisor
Aman Kumar	Design of Prototype Filter Using Windowing and Linear Optimization Technique for the Non-Uniform Filter Banks	Completed	Sole	NA

Nisha Kumari	Haze Removal and Color Compensation of Under Water Images	Completed	Sole	NA
Saurabh Singhal	Design of Prototype Filter Using Windowing and Linear Optimization Technique for the Non-Uniform Filter Banks	Completed	Sole	NA
Akhanda Nand Pathak	Image processing	Completed	Sole	NA
Ravi Bhushan	Image processing	Completed	Sole	NA
Varun Singh	Signal Processing	Completed	Sole	NA
Prateek Bansal	Image processing	In Progress	Sole	NA
Shafi M N	Signal Processing	In Progress	Sole	NA
Himanshu Yadav	Signal Processing	In Progress	Sole	NA
Udaya Pratap	Image processing	In Progress	Sole	NA

Research Publications (International journals)

S. No	Title of paper	Journal Name	Volume Number	Page No	Publication year	Authors as on the article
1	Effect of ekagrata meditation on sympatho-vagal balance-An autoregressive model approach	Journal of Industrial and Intelligent Information,	Vol. 1,	pp. 102-106	2013	Ramesh Kumar Sunkaria,
2	Gender based variability time-series complexity analysis	International Journal of Medical, Pharmaceutical Science and Engineering,	Vol. 8, No.3	pp. 1-5	2014	Ramesh Kumar Sunkaria and Puneeta Marwaha
3	Haze Removal and Color Compensation of Underwater Image	International Journal of Computer Applications,	Vol. 68, No. 6	pp. 15-20	2013	Nisha and Ramesh Kumar Sunkaria
4	Modified approach for ECG signal denoising based on empirical mode decomposition and moving Average Filter	international Journal of Medical Engineering and Informatics	Vol. 6, No.2,	pp. 165-188,	2014.	Sonali, Omark Singh, Ramesh Kumar Sunkaria
5	An artificial neural network based heart rate variability classifier for cardiac health prognosis	International Journal of Electronic Healthcare	[Accepted]	[Accepted]	[Accepted 2013- Article in press]	Ramesh Kumar Sunkaria, Vinod Kumar and Suresh Chandra Saxena
6	Cardiac variability time-series analysis by sample entropy and multiscale entropy	International Journal of Medical Engineering and Informatics	[Accepted]	[Accepted]	[Accepted 2013- Article in press]	Puneeta and Ramesh Kumar Sunkaria
7	Beat detection algorithm for ECG and arterial blood pressure waveforms using empirical mode decomposition – A Unified Approach	International Journal of Signal and Imaging Systems Engineering	[Accepted]	[Accepted]	Accepted 2014- Article in press].	Suraj Kumar Bhati, Omark Singh, Ramesh Kumar Sunkaria
8.	Multiclass Brain Tumor classification using SVM	International Journal of computer Application,	Vol. 97, No. 23.	pp. 34-38,	July 2014.	Akhanda Nand Pathak and Ramesh Kumar Sunkaria,
9.	A Novel Technique of Image Mosaicing Based on Discrete Wavelet Transform and its performance evaluation	International Journal of computer Application,	Vol. 98, No. 15.	pp.1-8,	2014.	Ravi Kumar and Ramesh Kumar Sunkaria,
10.	Powerline Interference Reduction in ECG Signals using Empirical Wavelet Transform and Adaptive Filtering	Journal of Medical Engineering and Technology.	[Accepted]	[Accepted]	[Accepted-2014]	Omark Singh and Ramesh Kumar Sunkaria,

11.	Aging effect on HRV dynamics: A comparative study with FFT and AR model	International Journal of Signal and Imaging Systems Engineering	Vol. 6, No. 4.	pp. 240-249	2013.	Ramesh Kumar Sunkaria, Vinod Kumar and Suresh Chandra Saxena
12.	Optimization of wavelet based image fusion for multi-focused images.	International Journal of Signal and Imaging Systems Engineering	Vol. 6, No. 4.	pp. 203-210,	2013.	Hemant Singh Ajal and Ramesh Kumar Sunkaria,
13.	Wavelet based optimum ECG-data compression using thresholding technique	International Journal of Signal Processing, Image Processing and Pattern Recognition	[Accepted]	[Accepted]	[Accepted-2014]	Ramesh Kumar Sunkaria
14.	Boundary Detection in Ultrasound Images for Diagnosis of Liver Diseases	International Journal of Computer Applications,	[Accepted]	[Accepted]	[Accepted-2014]	Rameh Kumar Sunkaria

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	organizers	Dates	Funded by
Medical Signal Processing and Its Interpretation	NIT Jalandhar	December 23-27, 2013	TEQIP-II, NIT Jalandhar
Human Factor Engineering	NIT Jalandhar	July 1-5, 2013	TEQIP-II, NIT Jalandhar
Recent Advances in Industrial Engineering	NIT Jalandhar	July 4-12, 2013	TEQIP-II, NIT Jalandhar
Energy and Environment Management	NIT Jalandhar	October 19-23, 2013	TEQIP-II, NIT Jalandhar
Short Term Course on "Emerging Trends in Mining Industry"	NIT Jalandhar	September 12-13, 2014	TEQIP-II, NIT Jalandhar

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
Medical Signal Processing and Its Interpretation	Dr Ramesh K Sunkaria	December 23-27, 2013	TEQIP-II, NIT Jalandhar
Biomedical Instrumentation Systems	Dr Ramesh K Sunkaria	December 25-26, 2013	-----
Application of Six Sigma in Indian Industry	Dr Ramesh K Sunkaria	June 9-13, 2014	TEQIP-II, NIT Jalandhar

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk
"Cardiac Variability Analysis: Can Be a Potent Tool for Diagnosing Heart Abnormalities"	Dr. Ramesh K Sunkaria	In STC organized by Department of Electronics and Communication Engineering, Dr. B.R. Ambedkar National Institute of Technology, Jalandhar.	December 23-27, 2013.
"Bioelectric Signals- Characteristics and Acquisition"	Dr. Ramesh K Sunkaria	In STC organized by Department of Electronics and Communication Engineering, Dr. B.R. Ambedkar National Institute of Technology, Jalandhar.	December 23-27, 2013.
"Cardiovascular Health Degradation: A Major Fallout of Work Place Stress"	Dr. Ramesh K Sunkaria	In STC organized by Department of Industrial and Production Engineering, Dr. B.R. Ambedkar National Institute of Technology, Jalandhar	July 1-7, 2013.
"ECG Signal- A Marker of Cardiovascular Health"	Dr. Ramesh K Sunkaria	In STC organized by Department of Information Technology, Dr. B.R. Ambedkar National Institute of Technology, Jalandhar and C T institutes of Engineering and Technology, Jalandhar	July 2-15, 2013.
"Heart Rate Variability-A Potential Tool for Cardiac Disease Diagnosis"	Dr. Ramesh K Sunkaria	In STC organized by Department of Electronics and Communication Engineering, Dr. B.R. Ambedkar National Institute of Technology, Jalandhar	July 7-11, 2013.

"Biomedical Signal Processing-I and II"	Dr. Ramesh K Sunkaria	In STC organized by Department of Electronics and Communication Engineering, RIMT, Mandi Gobind Garh, Ludhiana	July 18-23, 2013.
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Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr. Ramesh K Sunkaria	Life Member	ISTE	-
Dr. Ramesh K Sunkaria	Member	IEEE	Membership No.-91215738
Dr. Ramesh K Sunkaria	Member	IEEE Engineering in Medicine and Biology Society	Membership Order Number: 1-1728678160
Dr. Ramesh K Sunkaria	Member	IEEE Signal Processing Society Membership	Membership Order Number: 1-1728678160
Dr. Ramesh K Sunkaria	Member	IEEE Computer Society Membership	Membership Order Number: 1-1728678160
Dr. Ramesh K Sunkaria	Member	IEEE Information Theory Society Membership	Membership Order Number: 1-1728678160

Projects Completed/On Going/sponsored projects: Proposal submitted**Details of faculty, who have Upgraded qualifications:Ph.D. (June, 2010)****1. Any other significant achievement**

- Guest Editor, Special issue on 'Medical Image and Signal Processing', International Journal of Biomedical Engineering and Technology
- Guest Editor, Special issue on 'Bio-Medical Signal and Image Processing', International Journal of Signal and Imaging System Engineering.
- Member of Students Advisory Committee 2007-09, Electrical Engineering Department, IIT Roorkee.
- Reviewer, Journal of Computer and Electrical Engineering, Elsevier.
- Reviewer, IEEE Transactions on Engineering in Medicine and Biology.
- Reviewer, IEEE Conferences.
- Reviewer, IETE Journal of Research, INDIA.
- Reviewer, Journal of Optics.
- Reviewer, International Conference on Biomedical Engineering and Assistive Technologies (BEATs)-17-19 Dec, 2011.
- Reviewer, Journal of Signal and Information Processing.
- Session Chair for Technical sessions in International Conference on Biomedical Engineering and Assistive Technologies (BEATs)-17-19 Dec, 2011.
- Session Chair, International Conference on "Electrical, Computer, Electronics and Communication Engineering (ICEECE-2011)" organized by World Academy of Science, Engineering and Technology, Bangkok, Thailand, March 29-31, 2011.
- Member, selection committee for faculty recruitment in Baba Bhag Singh Institute of Engineering and Technology, Padiana, Jalandhar.
- Member, selection committee for faculty recruitment in Global Institute of Engineering and Technology, Amritsar.

Faculty : Dr Indu Saini**Mtech guidance**

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Rakesh Kumar	Empirical Wavelet Transform Based ECG Signal Compression	Ongoing	Sole	-
Gurlovleen Singh	Effects of mobile radiations on EEG waves	Ongoing	Sole	-

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	QRS Detection using K-Nearest neighbor algorithm (KNN) and evaluation on standard ECG databases	Journal of Advanced Research, (Elsevier)	Vol. 4, no. 4	331-344	2013	Indu Saini, Dilbag Singh, Arun Khosla
2.	Detection of QRS-complex using K-Nearest Neighbor algorithm	International Journal of Medical Engineering and Informatics, (Inderscience)	Vol. 5, no. 1	85-101	2013	Indu Saini, Dilbag Singh, Arun Khosla

3	P- and T-wave Delineation of ECG signal using Support Vector Machine	IETE Journal of Research	Vol. 59, no. 5	615-623	2013	Indu Saini, Dilbag Singh, Arun Khosla
4	K-Nearest Neighbor-based algorithm for P and T-waves detection and delineation	Journal of Medical Engineering and Technology	Vol. 38, no. 3	115-124	2014	Indu Saini, Dilbag Singh, Arun Khosla

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	organizers	Dates	Funded by
2 nd International Conference on Communication and Electronics Information, Melbourne, Australia	IACSIT	Jan 2-3, 2014	TEQIP-II
ICT for Computing & Signal Processing	NIT Jalandhar & CT Institute of Engg. Mgt. & Technology, Jalandhar	03-14 June, 2013	TEQIP-II
Advances in Software Engineering & Knowledge Based Systems	NIT Jalandhar	16-20 December, 2013	TEQIP-II

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
ICT for Computing & Signal Processing	NIT Jalandhar & CT Institute of Engg. Mgt. & Technology, Jalandhar	03-14 June, 2013	TEQIP-II

Details of faculty, who have Upgraded qualifications Completed PhD**Faculty: Dr. NEETU SOOD****PhD guidance**

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Sandeep Verma	Wireless Sensor Network	In progress	Joint	Dr Ajay Sharma
Amandeep Kaur Johal	Designing of algorithm for WSN	In progress	Joint	Dr Ajay Sharma
Anukul Pandey	Biomedical signal/Image processing along with communication system	In progress	Joint	Dr Neetu Sood, Dr Butta Singh

Mtech guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Pushpinder Singh	PSO Reduction in WP- OFDM using PSO Based PTS Technique	completed	Joint	Dr Mamta Khosla
Prashant Sharma	Performance Analysis of Wavelet based OFDM under Rayleigh and nakagami-m fading channel	completed	Sole	
Abhijit Bhattacharya	BER Performance of SC-QPSK system under Nakagami-m fading channel with Diversity reception	completed	Sole	
Shree Ram	WSN	In-Progress	Sole	
Vikas Kumar	PAPR Problem in OFDM	In-Progress	Sole	
Kamal	PAPR Problem in OFDM	In-Progress	Sole	
Mahendra pandel	Single Carrier Modulation	In-Progress	Joint	Ms Deepti Kakkar
Raza Ahmed Ansari	WSN	In-Progress	Joint	Ms Deepti Kakkar

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Semianalytic BER Estimation of SC-QPSK under Nakagami-m Frequency Selective Fading Channel with Diversity Reception	International Journal of Information and Electronics Engineering	4, No. 1	67-69	2014	Abhijit Bhattacharya, Neetu Sood
2.	Analysis of Link Adaptation Algorithms Using Coding Scheme for OFDM Systems Under Frequency Selective Fading Environment	International Journal of Computer and Electrical Engineering	5, No.2	160-163	2013	Sandeep Singh and Neetu Sood
3.	Diversity Performance Analysis of OFDM-BPSK and -QPSK over Nakagami-m Flat Fading Channels	International Journal of Communication Networks and Distributed Systems (IJCNDs),	10, No. 1	52-65	2013	Neetu Sood, Ajay K Sharma and Moin Uddin

		Inderscience				
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Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Organizers	Dates	Funded by
2 nd International Conference on Communication and Electronics Information, Melbourne, Australia	IACSIT	Jan 2-3, 2014	TEQIP-II sponsored
ICT for Computing & Signal Processing	NIT Jalandhar and CTIEMT, Jalandhar	June 03-14, 2013	TEQIP-II sponsored
Advances in Software Engineering and knowledge Based Systems	NIT Jalandhar	16th-20th December, 2013	TEQIP-II sponsored

Details of faculty, who have Upgraded qualifications Completed PhD
Any other significant achievement

Reviewer - International Journal of Communication System by Wiley
 Reviewer - International Journal of Wireless Communications and Mobile Computing by Wiley
 Reviewer - IEEE Communications letters
 Reviewer – Wireless Personal Communications by Springer

INSTRUMENTATION AND CONTROL ENGINEERING
DEPARTMENTAL SUMMARY (1st April 2014- 31st March 2015)

No. of Journal publications (International)	14	No. of PhD completed	02
No. of Journal publications (National)	05	No. of new PhD students enrolled	05
No. of International Conferences attended	08	No. of New PG students completed	22
No. of National Conferences attended		No. of New PG students enrolled	25
No. of STC/ Workshops conducted	02	No. off faculty members Upgraded qualifications	02
No of expert talks delivered by faculty	06	No. of expert talks organized	03

FACULTY

Sr. No.	Name	Position	Qualifications
1	Dr A K Jain	Professor	PhD
2	Mr Narinder Singh	Associate Professor	MTech
3	Dr Dilbag Singh	Associate Professor	PhD
4	Dr S K Pahuja	Associate Professor	PhD
5	Mrs Roop Pahuja	Associate Professor	MTech (PhD thesis submitted)
6	Dr Sheela Tiwari	Associate Professor	PhD
7	Mr Rajesh Kumar Singla	Associate Professor	MTech (PhD thesis submitted)
8	Dr Kuldeep Singh Nagla	Associate Professor	PhD

ACADEMIC PROGRAMMES
Undergraduate Programmes

- BTech in Instrumentation and Control Engineering

Postgraduate Programmes

- M. Tech. in Control and Instrumentation Engineering
- M. Tech. Part Time in Control and Instrumentation Engineering
- Full and part Time Ph D Programme in Instrumentation and Control Engineering

Development of Laboratories

- Analytical Instrumentation Laboratory
- Biomedical Instrumentation Laboratory
- Control Engineering Laboratory
- Electrical Machines Laboratory
- Fabrication Unit and Transducers Laboratory
- Measurement and Circuit Laboratory
- Microprocessor based Instrumentation Laboratory
- Computing Laboratory
- Process Control Instrumentation Laboratory
- Robotics Laboratory
- Signal Processing Laboratory
- Virtual Instrumentation Laboratory
- Human Machine Interface Laboratory

• Wireless Networks Laboratory
RESEARCH AND DEVELOPMENT ACTIVITIES (Faculty wise)

Dr A K Jain

PhD guidance

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment / Completed
09406001	Mahendra Kumar	Performance Tradeoff in Quality of Service for IEEE802.11 Wireless LANs	Pre submission held	Sole	--	
11406001	Ajay Roy	QoS Enhancement in Wimax Networks	Comprehensive held	Sole	--	
12406001	Shashank Tripathi	Investigation into QoS for Integrated UMTS and WLAN Networks	Comprehensive held	Sole	--	
14506002	Amanjot Singh Toor	Wireless Networking	In Progress	Sole	--	

M Tech guidance

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12206103	Ajay Kumar	Investigation of Security Behaviour of IEEE 802.11 Wireless Networks	Completed	Sole	-	June, 2014
12206104	Anuj Kumar	Investigation into Quality of Service of Mobile Ad-hoc Networks (MANETs) based on IEEE 802.11 Wireless Networks	Completed	Sole	-	June, 2014
12206111	Himanshu Mahajan	Investigation into Quality of Service in Zigbee based Wireless Sensor Networks	Completed	Sole	-	June, 2014

Research Publications (International journals)

S. No.	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Comparative Performance Analysis of WiMAX Networks with CBR traffic on various Routing Protocols	International Journal of Information Technology and Computer Science (IJITCS), ISSN: 2074-9007			2014	Ajay Roy, A.K. Jain
2.	A Survey on IEEE 802.11 WLANs	International Journal of Advanced Research in Computer Science and Software Engineering (IJARCSSE)	Vol-4, Issue-10	28-34	October-2014	Amanjot Singh Toor, A.K.Jain

Research Publications (National journals)

S. No.	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Survey on Short-range Wireless Networking Technologies	Journal of Mobile Computing, Communications & Mobile Networks	Vol. 1 Issue 3	1-12	December-2014	Shashank Tripathi, A.K. Jain
2.	Research Issues in UMTS-WLAN Interworking: A Survey	Journal of Mobile Computing, Communications & Mobile Networks	Vol. 1 Issue 3	34-41	December-2014	Shashank Tripathi, A.K. Jain
3.	High-range Wireless Networking Technologies: A Survey	Journal of Telecommunication, Switching Systems and Networks	Vol. 1 Issue 2	9-17	December-2014	Shashank Tripathi, A.K. Jain
4.	WLAN and UMTS QoS: A Survey	Journal of Telecommunication, Switching Systems and Networks	Vol. 1 Issue 3	12-22	December-2014	Shashank Tripathi, A.K. Jain

5.	Performance Analysis of Mobile WiMAX Networks on Various Routing Protocols Using Strict Priority and Weighted Round Robin Scheduling Algorithm on CBR Traffic	Journal of Mobile Computing, Communication and Mobile Networks	Vol. 1 Issue 3	13-36	December-2014	Ajay Roy, A.K. Jain
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Mr Narinder Singh
M Tech guidance

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date Enrolment/ Completed
12206110	Mr Himanshu Chhabra	Robust Control of Quarter Vehicle Active Suspension System	Completed	Sole	--	June, 2014
12206112	Mr Imran Husain	ANFIS Control of Two Link Rigid Manipulator	Completed	Sole	--	June, 2014
12206115	Moinuddin Ansari	Robust Control of Double Inverted Pendulum System	Completed	Sole	--	June, 2014
12206117	Mr Pawan Singh Yadav	Robust Control of Two Link Rigid Manipulator	Completed	Sole	--	June, 2014

Research Publications (International journals)

S. No.	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Robust Control of Two Link Rigid Manipulator	International Journal of Information and Electronics Engineering, Vol. 5, No. 3, May 2015	5(3)		May, 2015	Pawan Singh Yadav and Narinder Singh
2.	Comparison of Neural Network and Fuzzy Logic Control for Nonlinear Model of Two Link Rigid Manipulator	International Journal of Control and Automation	Vol.7 (4)	417-428	2014	Narinder Singh and Bharti Panjwani

Dr Dilbag Singh
PhD guidance

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date Enrolment/ Completed
	Indu Saini	Machine learning algorithms for enhanced ECG analysis	Completed	Sole	Dr Arun Khosla	Completed
08406031	Kuldeep Singh Nagla	Analysis and Development of Sensor Fusion Framework for Mobile Robots	Completed	Joint	Dr Moin Uddin	Completed, 2014
11406002	Rajinder Kaur	Non-invasive investigations of Cardiovascular Control Mechanisms	In progress	Sole	--	
14506004	Helen Mary M C	Biomedical Signal Processing	In progress	Sole	--	
14506001	Abdullah Bin Queyam	Feto-Maternal Monitoring	In progress	Joint	Dr S K Pahuja	

M Tech guidance

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date Enrolment/ Completed
12206114	Koncha Tarakeswara Rao	Kalman Filter Based QRS Detection for ECG	Completed	Sole	-	
12206101	Aakash	Heart Rate Variability	Completed	Sole	-	

	Mahawar	Power and Respiratory Frequency Correlation under Respiratory Sinus Arrhythmia				
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Research Publications (International journals)

S. No.	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Electrocardiogram beat classification using empirical mode decomposition and multiclass directed acyclic graph support vector machine	Computers & Electrical Engineering	40(5)	1774–1787,	July 2014	I. Saini, Dilbag Singh and A. Khosla
2.	K-nearest neighbour-based algorithm for P- and T-waves detection and delineation	Journal of Medical Engineering & Technology	38(3)	115-124	April 2014	I. Saini, Dilbag Singh and A. Khosla
3.	Multisensor data fusion and integration for mobile robots: A review	International Journal of Robotics and Automation	3(2)	131-138	June 2014.	K.S. Nagla, Moin Uddin and Dilbag Singh
4.	Racial differences in the ECG — selected aspects, P.W. Macfarlane	Journal of Electrocardiology (Elsevier),	Vol. 47	809-814	2014	I.A. Katibi, S.T. Hamde, D. Singh, E. Clark, B. Devine, B.G. Francq, S. Lloyd, V Kumar,

**Dr S K Pahuja
PhD guidance**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
14506001	Abdullah Bin Queyam	Feto-Maternal Monitoring	In progress	Joint	Dr Dilbag Singh	
14506003	Ramesh Kumar Meena	Medical Imaging using Electrical Impedance Tomography	In progress	Sole	--	

M Tech guidance

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12206108	Mr Harminder Singh Bhamra	Study and Simulation of Solar Radiation Effects on Human Skin	Completed	Sole	--	June, 2014

**Dr Roop Pahuja
M Tech guidance**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12206120	Mr Ram Swaroop Yadav	VI System for better Tilt Estimation of 3D Moving Object using MEMS Multi-Sensor Fusion	Completed	Sole	--	June, 2014
12206123	Mr Vaibhav Gautam	Design and Development of Remotely Accessible Multi-Mode Virtual Laboratory of Transducers	Completed	Sole	--	June, 2014

**Dr Sheela Tiwari
PhD guidance**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
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14806001	Ashutosh Bahadoria	Power System Operation and Control	In progress	Sole	--	
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M Tech guidance

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12206116	Mudita Juneja	Reduced Order Modelling Of Tripple Link Inverted Pendulum Using Particle Swarm Optimization	Completed	Sole	--	June, 2014
12206119	Rajiv Kumar	Investigation into the performance of Fuzzy Logic based Controllers for Temperature Control of a Two Tank System	Completed	Sole	--	June, 2014
12206124	Vaghela Chintan	Performance Comparison of Model Predictive Controller and Hybrid Fuzzy Controller for Temperature Control of a Two Tanks System	Completed	Sole	--	June, 2014

Research Publications (International journals)

S. No.	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Performance Comparison of Variants of ant Colony Optimization Technique for online Tuning of a PI Controller for a Three Phase Induction Motor Drive	International Journal of Computer Science and Information Technology	5(4)	5814-5820	2014	Jasdeep Kour and Sheela Tiwari
2.	Reduced Order Modeling Of Triple Link Inverted Pendulum Using Particle Swarm Optimization Algorithm	International Journal of Advancements in Electronics and Electrical Engineering (IJAEEE)	Vol. 3 (3)	113-117	2014	Mudita Juneja, Sheela Tiwari

Dr Rajesh Kumar Singla**M Tech guidance**

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
12206122	Mr Sushil Keshari	Temperature Control of CSTR using PID, Cascade, FLC & ANFIS Controller	Completed	Sole	-	June, 2014
12206107	Mr Harish Kumar Dalal	Classification of EEG Signals for Brain Computer Interface (BCI) Application	Completed	Sole	-	June, 2014
12206105	Mr Bharat Sachdeva	Brain Computer Interface based Application using P300 Rhythm	Completed	Sole	-	June, 2014
12206102	Mr Abhash	Ground Vehicle Classification using Acoustic Signature and Classifiers	Completed	Sole	-	June, 2014

Research Publications (International journals)

S. No.	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1.	Influence of stimuli colour in SSVEP-based BCI wheelchair control using support Vector Machines	Journal of Medical Engineering and Technology, (Informa Healthcare)	Vol. 38, No. 3	125-134	2014	Rajesh Singla, Arun Khosla, R Jha

2.	Influence of stimuli colour on feature classification for BCI applications	International Journal of Biomedical Engineering and Technology (Inderscience)	Vol. 15, No. 1,	82-93	2014	Rajesh Singla, Arun Khosla, R Jha
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Dr Kuldeep Singh Nagla
M Tech guidance

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/Completed
12206125	Vikas Kumar	Error Analysis of 3-DOF Manipulator	Completed	Sole	--	June 2014
12206113	Jai Prakash Jingar	Improved Computation Time for Occupancy Grid Mapping	Completed	Sole	--	June 2014

Research Publications (International journals)

S. No.	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	Multisensor Data Fusion and Integration for Mobile Robots: A Review	International Journal of Robotics and Automation	3	131-138	2014	KS Nagla, Moin Uddin, Dilbag Singh
2	Intelligent Induction Hardening Device And Method Thereof	Official journal of patent office govt of India	6	152	2014	Amit Kohli, Hari Singh, KS Nagla

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Name of Faculty	Title of course	Name of organizer	Dates	Funded by
Dr Dilbag Singh	41 st International Congress on Electrocardiology	Bratislava, Slovakia	04/06/2014 to 07/06/2014	TEQIP-II
Dr Dilbag Singh	Attended Indo-French workshop on "Developments in Academics and Research in Engineering Systems"	Ecole Centrale de Lillie, France	23/06/2014 to 25/06/2014	NITJ
Dr S K Pahuja	41 st International Congress on Electrocardiology	Bratislava, Slovakia	04/06/2014 to 07/06/2014	TEQIP-II
Dr S K Pahuja	Two Days Tutorial on "Advanced Distribution Automation System and Common Information Model (CIM)"	Central Power Research Institute, Bengaluru	19/03/2015 to 20/03/2015	
Dr Sheela Tiwari	Workshop on Grid Integration of Renewable Energy Source	IIT Delhi	18/04/2015 to 19/04/2015	
Dr K S Nagla	Attended Indo-French workshop on "Developments in Academics and Research in Engineering Systems"	Ecole Centrale de Lillie, France	23/06/2014 to 25/06/2014	
Dr K S Nagla	Recent Trends in Energy Technology	Dr BR Ambedkar NITJ	02-06-2014 to 06-06-2014	TEQIP-II
Dr K S Nagla	Application of Six Sigma in Indian Industry	Dr BR Ambedkar NITJ	09-06-2014 to 13-06-2014	TEQIP- II

Short Term Courses/Workshops/Seminars organized:

TEQIP-II Sponsored Short Term Course on "Recent Trends in Instrumentation and Control Engineering (RTICE-2014)", held on December 08-12, 2014 organized by Department of Instrumentation and Control Engineering, Dr B R Ambedkar National Institute of Technology, Jalandhar. (Coordinators: Dr A K Jain and Dr Kuldeep Singh Nagla)

Department of Instrumentation and Control Engineering has arranged a students Workshop on Teaching Control Systems with Quanser QUBE-Servo on February 06, 2015 at 10:30 AM to 03:00 PM in NKN Cell, IT Park 2nd Floor for B Tech / M Tech students of NIT- Jalandhar.

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk	Event/ STC/ Seminar/ Workshop
Numerical techniques for engineers	Dr Dilbag Singh	Inaugural address for AICTE STC on at Amritsar College of Engineering and Technology, Amritsar	30/06/2014	STC
Challenges in Bio-medical Engineering	Dr Dilbag Singh	Dr BR Ambedkar NIT Jalandhar	10/12/2014	STC
Robotics: Focused on sensors Fusion	Dr KS Nagla	At LPU Jalandhar	18/01/2014	Seminar
Recent Trends on Robotics	Dr KS Nagla	DAV Institute of Engineering	17/10/2014	Workshop

an Overview		and Technology Jalandhar		
Recent Trends on Robotics	Dr KS Nagla	Dr BR Ambedkar NIT Jalandhar	09/12/2014	STC
Recent Trends on Robotics	Dr KS Nagla	NITTTR Chandigarh	20/02/2015	STC

Consultancy services completed/ongoing:

S.No	Title	Year	Agency	Coordinator /Dept.	Consultancy cost
1	Awaited	2014-15	To Steinbeis GmbH & Co. KG für Technologietransfer, Willi-Bleicher-Strasse 19, Germany	ICE	On process

Upgraded qualifications

Name of faculty	Date of joining	Highest qualification of the faculty	year of attaining the qualification	Present Designation
Dr Sheela Tiwari	2007	PhD	2015	Associate Professor
Dr KS Nagla	2008	PhD	2015	Associate Professor

Membership to professional bodies

Name of Faculty	Type of Membership	Organization	Membership Number
Dr A K Jain	Annual Life Member	IEEE ISTE	M92954278 LM 8852
Mr Narinder Singh	Life Member	IE, IETE	107815/6, 102863
Dr Dilbag Singh	Life Member Life Member Life Member Annual Life Member Life Member	ISTE Instrument Society of India (ISOI), IISc Bangalore Biomedical Engineering Society of India Member IEEE-EMBS Fellow IEI Fellow IETE	LM22453 LM833 L939 M90778042 F-1151440 F-230069
Dr S K Pahuja	Life Member	ISTE	LM 22452
Dr Sheela Tiwari	Life Member	ISTE	LM 26873
Dr K S Nagla	Annual Life Member Life Member	Student member of IEEE Member of RAS (Robotics & Automation Society) India Innovator Association	No. 80428592 - -

Expert Talks Organized

Sr. No.	Name	Address	Topic	Date
1	Dr. Vinod Kumar	Dean Faculty Affairs and Professor, Department of Electrical Engineering, IIT Roorkee	Virtual Labs	19/08/2014
2	Er. Dhurjati Sreeram Bhargav	M/s ALSTOM India Limited, Noida	Transition from campus life to industrial culture for an Instrumentation and Control Engineer	12/09/2014
3	Dr H K Verma	Director (Retd.) IIT - Roorkee	MEMS and Smart Sensors Sensor Networks	11.12.2014

Any other significant achievement:

Indian design patent titled "Door Handle", **Granted** on 20-02-2015 Design no 265973, date 24-09-2014.

Students Activities

- i) The students of IC Department conducted various technical games (Make your instruments/ Robotics) in the month of April, 2014 under SPICE Society of the Department.
- ii) Mr Umesh Kumar and Mr Kamal Kumar, M. Tech student participated in the Short Term Training programme on Performance Testing and Evaluation for SHP Stations during January 19-23, 2015 sponsored by Ministry of New and Renewable Energy, GOI, organized by Alternate Hydro Energy Centre, IIT- Roorkee.

Student Achievement

B Tech - Placement List

Sr. No.	Roll No.	Candidate Name	Branch	Batch	CGPA	Company Placed	Package
1.	11102014	ANKITA GARG	Instrumentation and Control	2011-15	8.97	TCS, Saint gobain	3.18,5.75LPA
2.	11106001	AAKANKSHA GUPTA	Instrumentation and Control	2011-15	8.03	Aricent, Bunge	3.25,4.5LPA
3.	11106003	AMIT GARG	Instrumentation and Control	2011-15	7.88	TCS, JSW	3.18,4.5LPA
4.	11106018	GAURAV CHAUDHARY	Instrumentation and Control	2011-15	6.8	TCS,virtusa	3.18,5LPA
5.	11106022	HEENA SETHI	Instrumentation and Control	2011-15	7.86	Aricent,virtusa	3.25,5LPA
6.	11106026	KANCHAN	Instrumentation and Control	2011-15	8.31	Aricent, JSW	3.25,4.5LPA
7.	11106029	KARAN SOOD	Instrumentation and Control	2011-15	7.29	Aricent, JSW	3.25,4.5LPA
8.	11106052	RAMANDEEP SINGH	Instrumentation and Control	2011-15	7.68	TCS, Saint gobain	3.18,5.75LPA
9.	11106053	RAMIT SALUJA	Instrumentation and Control	2011-15	8.9	infsys,L & T Constructions	3.25,5.3LPA
10.	11106071	SIDDHARTH MALIK	Instrumentation and Control	2011-15	8.66	TCS,Samsung Engineering	3.18,5LPA
11.	11106075	SUKHVIR SINGH SOHAL	Instrumentation and Control	2011-15	7.86	tcs,L & T Constructions	3.18,5.3LPA
12.	11106084	VAISHALI VERMA	Instrumentation and Control	2011-15	8.33	TCS,Technip	3.18,5LPA
13.	11112084	SURBHI JAMWAL	Instrumentation and Control	2011-15	8.77	TCS,Mu Sigma	3.18,4.5LPA
14.	11106030	KIRAN ARYA	Instrumentation and Control	2011-15	6.66	TCS,Mu Sigma	4.5LPA
15.	11106054	RASANDEEP SINGH VIRK	Instrumentation and Control	2011-15	6.49	TCS,Bhushan	3.18,4.5LPA
16.	11106013	BHARAT TUKADIYA	Instrumentation and Control	2011-15	7.9	JSW	4.5LPA
17.	11106072	SIDIKA ANAND	Instrumentation and Control	2011-15	8.47	Paytm	8LPA
18.	11106082	TARUN KUMAR GARG	Instrumentation and Control	2011-15	7.54	Samsung Engineering	5LPA
19.	11106086	VINEET SHARMA	Instrumentation and Control	2011-15	5.75	Gurdatta	4.5 LPA
20.	11106088	VIVEK MITTAL	Instrumentation and Control	2011-15	8	Alstom	5LPA
21.	11106089	YOGESH YADAV	Instrumentation and Control	2011-15	6.48	A k vidyamandir	5 LPA
22.	11111013	MITALI	Instrumentation and Control	2011-15	8.29	Alstom	5LPA
23.	11112037	KANIKA CHABRA	Instrumentation and Control	2011-15	8.5	EXL	5.5LPA
24.	11106004	ANJALI KUMARI	Instrumentation and Control	2011-15	7.06	DRDO	10 LPA
25.	11106016	DIWAKAR KUMAR	Instrumentation and Control	2011-15	7.32	Bhushan steel	4.5 LPA
26.	11106063	SAMVIRTIJI KANWAR	Instrumentation and Control	2011-15	7.85	DRDO	10 LPA

27.	11106010	AXAY KUMAR GUPTA	Instrumentation and Control	2011-15	6.97	Vidyamandir	5 LPA
28.	11106056	RAVIKANT	Instrumentation and Control	2011-15	6.21	Vidyamandir	5 LPA
29.	11106005	ANKUR GOUR	Instrumentation and Control	2011-15	7.47	TCS	3.18LPA
30.	11106009	ASHUDEEP	Instrumentation and Control	2011-15	6.08	Infosys	3.25LPA
31.	11106011	AYUSH JAIN	Instrumentation and Control	2011-15	6.87	IBM	3.25LPA
32.	11106012	BHALA RAM	Instrumentation and Control	2011-15	7.94	IBM	3.25LPA
33.	11106015	DEEPIKA VERMA	Instrumentation and Control	2011-15	6.77	TCS	3.18LPA
34.	11106017	GAGANDEEP SINGH	Instrumentation and Control	2011-15	7.19	TCS	3.18LPA
35.	11106019	HARDIT SINGH	Instrumentation and Control	2011-15	6.71	TCS	3.18LPA
36.	11106020	HARPREET AHIR	Instrumentation and Control	2011-15	6.99	TCS	3.18LPA
37.	11106027	KANIKA CHOUDHARY	Instrumentation and Control	2011-15	7.3	TCS	3.18LPA
38.	11106033	MADHAV RATNA	Instrumentation and Control	2011-15	6.6	IBM	3.25LPA
39.	11106034	MANAV KHANNA	Instrumentation and Control	2011-15	7.73	Tech Mahindra	3LPA
40.	11106036	MAYANK CHAUHAN	Instrumentation and Control	2011-15	6.63	IBM	3.25LPA
41.	11106037	MONIKA PAL	Instrumentation and Control	2011-15	7.4	TCS	3.18LPA
42.	11106038	NANCY BANSAL	Instrumentation and Control	2011-15	7.49	TCS	3.18LPA
43.	11106041	NAVDEEP KAMBOJ	Instrumentation and Control	2011-15	6.09	Infosys	3.25LPA
44.	11106045	PAWAN KUMAR	Instrumentation and Control	2011-15	7.61	TCS	3.18LPA
45.	11106046	POOJA GANGWAL	Instrumentation and Control	2011-15	7.12	TCS	3.18LPA
46.	11106047	PRERNA KUMARI	Instrumentation and Control	2011-15	6.92	TCS	3.18LPA
47.	11106048	PRINCI MALHAN	Instrumentation and Control	2011-15	6.52	Emerson	3.5LPA
48.	11106055	RATAN SINGH	Instrumentation and Control	2011-15	7.53	IBM	3.25LPA
49.	11106057	ROHIT SINGH	Instrumentation and Control	2011-15	7.52	Infosys	3.25LPA
50.	11106059	SAHIL GUPTA	Instrumentation and Control	2011-15	7.19	IBM	3.25LPA
51.	11106061	SAMARDEEP VERMA	Instrumentation and Control	2011-15	6.48	Tech Mahindra	3LPA
52.	11106062	SAMEER MASSEY	Instrumentation and Control	2011-15	6.88	IBM	3.25LPA
53.	11106065	SANYAM	Instrumentation and Control	2011-15	8.03	Infosys	3.25LPA
54.	11106069	SHIVANI	Instrumentation and Control	2011-15	8.06	Arcent	3.25LPA
55.	11106070	SHVETA KOUNDAL	Instrumentation and Control	2011-15	7.3	TCS	3.18LPA
56.	11106073	SITA RAM HUDDA	Instrumentation and Control	2011-15	7.86	Arcent	3.25LPA
57.	11106076	SUMIT NIBHWANI	Instrumentation and Control	2011-15	7.61	TCS	3.18LPA
58.	11106077	SURABHI GUPTA	Instrumentation and Control	2011-15	6.4	Emerson	3.5 LPA

59.	11106078	SURAJ SINGH	Instrumentation and Control	2011-15	6.12	Emerson	3.5 LPA
60.	11106081	TANIA JASAM	Instrumentation and Control	2011-15	7.6	Aricent	3.25LPA
61.	11106083	TATPAR MISHRA	Instrumentation and Control	2011-15	6.58	TCS	3.18LPA
62.	11110034	HARSHITA SINGHAL	Instrumentation and Control	2011-15	7.69	TCS	3.18LPA
63.	11111032	SURABHI GUPTA	Instrumentation and Control	2011-15	8.16	TCS	3.18LPA
64.	11113043	NAMARTA SAINI	Instrumentation and Control	2011-15	7.97	TCS	3.18LPA
65.	11113075	SHIFU JAIN	Instrumentation and Control	2011-15	8.55	TCS	3.18LPA

GATE-2015	
Name	Rank
RatanSingh Rathore	48
Suray Mittal	63
Vaishali Verma	130
Ayush Jain	221
Samvirtji Kanwar	360
Sumit Nibhwani	422
Ankur Gour	438
Pawan Kumar	453
Shivani Yadav	453
Bharat Tukadiya	458
Bhala Ram	526
Harshita Singhal	526

CAT-2014	
Name	CAT Percentile
Sidika Anand	97.97

DEPARTMENT OF MECHANICAL ENGINEERING (ME)
Annual Report for year (2014-2015)

Faculty Name: Dr. R.S. Bharj

PhD guidance:

Roll No	Name of Candidate	Title	Status	Name of joint supervisor	Date of Enrolment/Completed
09409031	Narinder singh	Exp. Investigation on NEF in small HP Gen. set.	Presubmission	no	July 2009
14509005	Surender kumar	Solar hybrid refrigeration system	1 year complete	no	14-8-2014
14509006	Vishal Mahajan	Synthesis of CNT	1 year complete	no	8-8-2014

PG guidance:

Roll No	Name of	Title	Status	Sole	Name of	Date of
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	Candidate			or joint	joint supervisor	Enrolment/ Completed
12209016	Sandeep kumar	The effect of size, thickness and type of the bonding interlayer on bullet Proof glass as per EN 1063	complete	Sole	no	July 2012
13209012	Rajender kumar	Thermal energy storage in phase change material	complete	Sole	no	July 2013
13209025	Parag mohan	On Board Engine Performance and Emission Measurements as per Indian	complete	Sole	no	July 2013
14209015	MD Muzeeb Khan	Modling and simulation of grain dryer	Resesrch start	Sole	no	July 2014
14209006	Virender singh	Polymer nano composite.	Resesrch start	Sole	no	July 2014
14209013	Rajesh kumar singh	Dynamic mechanical analyses of various polymer.	Resesrch start	Sole	no	July 2014

Research Publications (International journals)

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
1	Biogas: A Natural and renewable Source for Carbon Nanotubes	International Journal of Research in Advent Technology	Vol.2	pp 54-59.	March 2014	Jyoti Bharj, Sarabjit Singh, Subhash chander, Rabinder Singh
2	Study on Solar Hybrid System for Cold Storage	IJERT	Vol.3	No. 2	Feb. 2015	R. S. Bharj

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Name of organizer	Dates	Funded by
NCME-2014	Panjab University SSG Reginal Center, Hoshiarpur (PB)	7-8 Nov. 2014	TEOIP
ICNM-2014	IIUCNN Mahatma Gandhi University, Kerala	19-21 December, 2014.	self
Understanding IC Engine and Fuel using human Analogy	PUSGRC, Hoshiarpur (PB)	10-07-2015	self
Study on Solar Hybrid System for Cold Storage	ESTEEM-2015, PPIMT Campus, Hisar, Haryana.	26-27 March 2015.	self
Carbon: A journey from Soot to Nanotubes	ICNM-2014, Mahatma Ghandi University, Kottayam, Kerala	19-21 December, 2014.	self
The effect of size, thickness and type of the bonding interlayer on bullet Proof glass as per EN 1063	ICMSCMP 2014, Barcelona, Spain.	27-28 Feb 2014	self
Parametric Evaluation of spark ignition engine with ethanol blended gasoline fue	ICFTEM-2014), GITM Bilaspur, Haryana.	2014	self

Faculty Name: Dinesh Kumar Shukla**PhD guidance:**

Roll No	Name of Candidate	Title	Status	Name of joint supervisor	Date of Enrolment/ Completed
12409031	Gurveen Singh	Parametric study on using surface active elements In gtaw process	On going	-	July 2012
12409033	Piyush	Study of process parameters in FSW on	On going	-	July 2012

	Gulati	Magnesium alloy			
08409033	S K Tiwari	Some investigations on FSW of Al Alloy 5083	Completed	Dr Rakesh Chandra	July 2015

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
13209022	Surya Kr Pandey	Parametric study on mild steel using GMAW	On going	Sole	-	July 2013
13209017	Shailendra Pandey	Influence of process parameters on weld bead geometry and mechanical properties in GTAW	On going	Sole	-	July 2013
13216015	Vijander Kumar	Parametric study of GTAW on mech prop of low carbon steel	completed	Jointly	Dr Ajay Gupta	June 2015
13216016	Jeetendra Kumar	Application of flux powder in austenitic stainless steel welding using GTAW	completed	Jointly	Dr R K Garg	June 2015

Research Publications (International journals) NA

S.No	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Authors as on the article
	Effect of tool tilt on formation of tunnel in FSW 5083 joints	Journal of Materials & Metallurgical Engineering,	Vol 4 No 2		2014	Dr S K Tiwari De Rakesh Chandra

Faculty Name: Dr. Sarabjot Singh Sandhu**PhD guidance:**

Roll No	Name of Candidate	Title	Status	Name of joint supervisor	Date of Enrolment/ Completed
13509001	Mr. Akash deep	Production & comparative performance evaluation, emissions and combustion characteristics of a compression ignition direct injection engine using castor biodiesel	FT	Dr. Subhash Chander, Dept. of Mech. Engg	Date of Enrolment 06/08/2013
14809001	Mr. Virender Singh Gurao	Performance, Emission and Combustion Characteristics of single cylinder CI engine fuelled with Bitter Apricot.	PT	N.A.	Date of Enrolment 06/08/2014
14509003	Mr. Deepak Singh	Production and Utilization of Green Diesel in CI Engine.	FT	N.A.	Date of Enrolment 06/08/2014

PG guidance:

Roll No	Name of Candidate	Title	Status	Sole or joint	Name of joint supervisor	Date of Enrolment/ Completed
13209006	Rakesh Sindhu	A study on performance and emissions characteristics of CI engine using green diesel.	FT	Joint	Dr. A.K. Sarma (Scientist D, SSS NIRE, Kapurthala)	Final defense viva pending

13209003	Harinder Pal Singh	A study on performance and emissions characteristics of CI engine fuelled with blends of diesel and biodiesel/green diesel	FT	Joint	Dr. A.K. Sarma (Scientist D, SSS NIRE, Kapurthala)	In progress
11209034	Mandeep Singh	Performance and emission characteristics of multi-cylinder indirect injection (IDI) compression ignition (CI) engine fuelled with blends of Argemone Biodiesel and Diesel	PT	Sole	N.A.	Completed on 6 th July 2015

Expert talks delivered:

Title of talk	Name of expert	Event of talk delivered	Date of talk	Event/STC/Seminar /Workshop
Hydrogen-Energy	S.S. Sandhu	PTU-PITTTTR Sponsored FDP on, "Advances in Renewable Energy Technologies" (May 25-29, 2015) organized by AIET, Faridkot.	25 th May 2015	Workshop
Hydrogen Economy	S.S. Sandhu	PTU Sponsored FDP on, "Emerging Trends in Mechanical Engineering (ETME-15)" (June 8-12, 2015) organized by RIET, Ropar	12 th June 2015	Faculty Development Programme

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Sarbjot Singh Sandhu	Life member	ISTE	Membership No. 90274244

Projects Completed/On Going/sponsored projects

S.No.	Title	Year	Agency	Coordinator /Dept.	Project cost
1.	Production & comparative performance evaluation, emissions and combustion characteristics of a compression ignition direct injection engine using castor biodiesel	Sept. 2013 & 3 years	DST, New Delhi		14.48 lacs

Achievements of the Department of Mechanical

- Three of the BTech students of the department got admission in prestigious universities in US (Mr. Gurjap Singh - Iowa state University (with full scholarship), Ms. Rajni Chahal -University of Texas and Mr. Rishab Gaba (State University Buffalo).
- One student (Dr. Satpal Singh) got PhD degree and another student (Mr. SK Tiwari) has finally defended his Ph.D Research work on July 20, 2015
- Mr. Anuj Gupta (BTech 2015 Batch Student) got a cash award of Rs. 10,000.00 from TCS for acquiring highest CGPA in his batch 2015 from the entire Institute.
- Dr. SS Sandhu published one Journal paper and also attended one International Conference. Dr. JA Vaz published one Journal paper. Dr. Pramod Kumar attended one conference at Kolkata.
- Commendable contributions have been made by three faculty members of the Mechanical Department in expediting the TEQIP-II project.

- Dr. Dinesh Shukla and Dr. SS Sandhu have been requested to look after more actively towards the Building and Works section; as department is falling short of space for the development of many new labs and expansion

- of existing labs.
- It is also proposed that major section of *Old Sciences Block* (building adjacent to Department of ME) should be given to department of Mechanical Engineering as most of the sections of *Old Sciences Block* are going to be shifted to *New Sciences Block* building. This will ease out, to some extent, the acute shortage of the space in department of ME. It is further deliberated that the proposal should be sent to the director for approval and final decision.
 - All the members have unanimously proposed that the internal examiner should be paid equal amount of Remuneration for thesis supervision of PG students (both MTech and PhD) as that of external examiner. This practice has already been followed in many universities. It is further deliberated that this issue will be put forwarded to the Dean Academic to take up this in the upcoming institute senate meeting.
 - The members also deliberated on the issue of finalizing the external examiner for the evaluation of MTech theses. It is proposed that a list of three examiners will be provided by the concerned supervisors and out of that HOD should finalize one examiner. At present the name is finalized by the Dean Academics. This step can be eliminated and can be settled at department level only. As the matter is related to academics therefore the proposal for above said point may be put forwarded to the upcoming institute senate meeting.
 - Progress of NBA Accreditation was reviewed; Prof. Trehan (in abstentia) has been requested to expedite as per the requirement of the institute.

Computer Science and Engineering
(Annual Report April -2014 to March-2015)
DEPARTMENTAL SUMMARY

No. of Journal publications(Inter.)	15	No. of expert talks organized	-
No. of Journal publications(Nat.)	01	No of PhD students completed	02
No. of STC conducted	01	No of new PhD students enrolled	09
No of workshops/ conferences conducted	01	No of New M Tech students enrolled	30
No. of M Tech students completed	34	No of conferences attended	10

Faculty

Sr. No.	Name	Position	Qualifications
1	Prof. Ajay K. Sharma	Professor (On Lien)	Ph D
2	Prof. A. L. Sangal	Professor (On Lien)	Ph D
3	Dr Harsh K Verma	Associate Professor & Head (CC)	Ph D
4	Dr Renu Dhir	Associate Professor & Head (CS)	Ph D
5	D K Gupta	Associate Professor	M. Tech
6	Dr Geeta Sikka	Associate Professor	Ph D
7	Rahul Aggarwal	Lecturer (Selection Scale)	B.Tech.
8	Rajneesh Rani	Assistant Professor	M.Tech (Pursuing Ph D)
9	Dr. Paramvir Singh	Assistant Professor	Ph D

1. Academic Programmes

Undergraduate Programmes

- B. Tech. in Computer Science and Engineering

Postgraduate Programmes

- M. Tech. in Computer Science and Engineering
- M. Tech. in Information Security
- M. Tech. Part Time in Computer Science and Engineering

2. Development of Laboratories

- Information and Security Lab under ISEA by MCIT, New Delhi.
- Software Engineering & Operating Systems Laboratory
- RDBMS & Programming Language Laboratory
- Data Communication & Computer Networks Laboratory
- Microprocessor & Digital Circuit & Logic Design Laboratory
- Wireless Sensor Networks Laboratory
- Embedded System Laboratory
- Image Processing and Pattern Recognition Laboratory
- Computer Graphics Lab.
- Natural Language and Pattern Recognition Lab.
- Project Lab. For M Tech.
- Wireless and Optical Networks Lab.
- Microprocessor Lab.

3. Research and Development activities

Faculty wise Ph D guidance

Dr. Ajay K Sharma

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Ms. Deepti Gupta (09403004)	"Performance Investigations and Design of Energy Efficient Routing Protocols for Wireless Sensor Networks"	Completed	Sole	-

Dr. A L Sangal

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Mr. Harminder Singh Bindra (09403001)	"Design, Implementation, Performance Evaluation and Extension of Delay Tolerant Network's Routing Protocol in Adhoc Network Environment"	Completed	Sole	-

Dr Renu Dhir

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Mr Ishan Kumar	Natural language processing	On Going	Sole	
Ms Amandeep Kaur	Image Processing	On Going	Sole	

Dr Harsh K Verma

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Mr. Himanshu	Computer Network	On Going	joint	Dr. A L Sangal
Mr. Manoj Kumar		On Going	joint	Dr. Renu Dhir
Mr. Naveen Bilandi		On Going	joint	Dr. Geeta Sikka

Dr. Geeta Sikka

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Mr. Utsav Upadhyay	Big Data	On Going	Sole	

Dr. Paramvie Singh

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Ms. Satnam Kaur	Software Engineering	On Going	Sole	
Ms. Sandeep Kaur	Software Engineering	On Going	Sole	
Ms. Harleen Kaur	Software Engineering	On Going	Sole	

M Tech guidance**Dr. Renu Dhir**

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Ms.Amandeep Kaur 10203031	Sensor Integrated Radio Frequency Identification based Postal Letter Tracking System	Completed	Sole	-
Banoth Ramesh 12203101	Identification of Telugu Script in a Bilingual Document Image	Completed	Sole	-
Dilip Halder 12203104	Detection of Target and Image Shooting Through Invisible Unmanned Aerial Vehicle (IUAV)	Completed	Sole	-
Amlan Jyoti Basumatari 12203002	Character segmentation of Assamese printed and handwritten words using classifier-based sliding window technique	Completed	Joint	Ms. Rajneesh Rani
Arjun Singh 12203004	Handwritten DEVANAGRI Character Recognition Using SVM & ANN	Completed	Joint	Ms. Rajneesh Rani
Kansham Angphun Maring 12203015	Recognition of Cheising Iyek/Eeyek-Manipuri digits Using Support Vector Machines	Completed	Sole	-

Shubham Shukla 12203022	Digital Image Mosaicing using Optimized KD-Tree Search	Completed	Joint	Ms. Rajneesh Rani
Sonu Verma 12203023	Iris Recognition With Parallel Implementantion	Completed	Sole	
Sunny Dhawan 12203024	Handwritten Gurmukhi character segmentation using SVM and Neural Network	Completed	Sole	

Dr. Harsh K Verma

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Nitin Kumar 12203107	A New Technique in Arithmetic Coding using Infinite Precision System	Completed	Sole	-
Tajinder Singh 12203108	A Novel Approach to enhance security of image data using Altered Advance Encryption Standard	Completed	Sole	-
Apeksha Aggarwal 12203003	An Approach for Augmenting Selection Operators of SQL queries Using Fuzzy-Logic	Completed	Sole	-
Mohd. Ahsan 12203016	An Improved Approach for Collaborative Recommendation System	Completed	Sole	-
Kanwar Preet Singh (11203041)	An Improved Restoration Tool Using Curvelet Transformation	Completed	Sole	
Manali 12203106	Modified Pegasis Protocol To Reduce Time Delay In Transmission With Improved Nework Lifetime In WSN	Completed	Joint	Dr. Ajay K Sharma

Sh. D.K.Gupta

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Vinay Dwivedi 12203110	Comparison of Energy Efficient Algorithm for Optical Network based on different clustering techniques	Completed	Sole	-
Brijesh Kr. Vishwakarma 12203102	Comparative Analysis of Putnam's SLIM using various Fuzzy Membership Functions	Completed	Sole	-
Hartej Singh 12203105	A Modified Pixel Value Differencing method for Information Hiding.	Completed	Sole	-
Bhupesh 12203006	Hierarchical Agglomerative clustering using K-Nearest Neighbor & Digraph	Completed	Sole	-
Ramesh Kumar 12203020	CPU Scheduling using Genetic Algorithm	Completed	Sole	-
Aman Kamboj (11203031)	An Improved Halftone Visual Secret Sharing Scheme for Gray-Level Images Based on Error Diffusion in Forward and Backward Direction			

Dr. Geeta Sikka

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Utsav Upadhyay 12203109	A Highly Enhanced Self-Adaptive MapReduce Scheduling algorithm based on instantaneous performance of a node	Completed	Sole	-
Chitraksh Vyas 12203103	A Randomized MapReduce Scheduling Algorithm	Completed	Sole	-
Ashutosh Jha 12203005	A new approach for finding maximally frequent item sets	Completed	Sole	-
Thammu Bharadwaj 12203026	A Non-restrictive Algorithm for Single Source Shortest Path Problem with Linear Time Complexity for Sparse Graphs	Completed	Sole	-
Surabhi Midha 12203025	Optimizing Energy Efficiency and Combating DoS Attack via Game Theoretic and Delaunay Triangulation Approach in Wireless Sensor Networks	Completed	Joint	Dr. Ajay k Sharma

Ms. Rajneesh Rani

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Jashandeep Kaur (10203036)	An Efficient Skew Detection Technique For Scanned Documents Using Fast Fourier Transform	Completed	Sole	-

Dr. Paramvir Singh

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Ms. Shelza Kapur 09203038	Performance Analysis of DCT Based Digital Image Watermarking Using Color Spaces	Completed	Sole	-
Ajad 12203001	ω - Automaton Driven Specification and Verification of UML 2.0 Sequence Diagram	Completed	Sole	-
Prerna Pandey 12203018	Design and Validation of Aspect Oriented Coupling Metrics	Completed	Sole	-
Prita 2203019	Comparative Performance Analysis of Calling Context Profiling Data Structures	Completed	Sole	-
Rohit Anand 12203021	Performance Analysis of Java Bytecode Instrumentation Libraries	Completed	Sole	-
Anupriya (10203032)	Metic Based Empirical Study Into The Impact of Software Category on Various Design Attributes	Completed	Sole	
Gurpreet Kaur (11203037)	Validating Software Evolution of Agile Projects Using Lehman Laws	Completed	Sole	

Research Publications (International journals)

S.No	Title of paper	Journal Name	Volume Number	Page No	Publication year	Authors as on the article
1.	"Performance Evaluation of MANET Routing Protocols with Scalability, Real Time Data and its effects on Qos",	Journal of Computing Technologies	vol.1	p-44-55	2014	Bhavneet Singh and Renu Dhir
2.	Performance Analysis of MANET Routing Protocols AODV, OLSR and TORA under the different Traffics (CBR and VBR)	Journal of Advance and Innovative Research	vol-2	pp-479-484	2014	Bhavneet Singh and Renu Dhir
3.	Hybrid multimodal registration of carotid magnetic resonance and ultrasound images using free form deformation	Journal of multimedia theory and applications	vol-2(1)	pp-20-28	(2014)	Anupama Gupta, Harsh K Verma
4.	QoS Provisioning in channel Allocation Strategy in Cognitive Radio Using Fuzzy Logic	International Journal of Information and Communication Technology Research		in press	(2014)	ManinderKaur, Harsh K Verma and Moin Uddin
5.	Efficient Security Mechanism to counter measure the malicious attack in wireless sensor network	International Journal of Information Privacy, Security and Integrity		in press	(2014).	Sunil Gupta, Harsh K Verma and A I Sangal,
6.	Grey relational effort analysis technique using robust regression methods for individual projects	International journal of computational intelligence studies, Inderscience	2014 Vol.3 No.1	pp. 40 - 73	(2014)	Geeta Nagpal, Moin Uddin, Arvinder Kaur
7.	Feature weighted unsupervised classification algorithm and adaptation for software cost estimation	International journal of computational intelligence studies, Inderscience	2014 Vol.3, No.1	pp. 74 - 93	(2014)	Pushpendra Kumar Rajput, Geeta Nagpal, Aarti
8.	An Optimized Approach for Density Based Spatial Clustering Application with Noise	ICT and Critical Infrastructure: Proceedings of the 48th Annual Convention of Computer Society of India	Vol I	pp. 695-702	2014.	Rakshit Arya, Geeta Sikka
9.	"A Study on Vectorization	ICT and Critical	Vol I	pp.	2014	Devendra

	Methods for Multicore SIMD Architecture Provided by Compilers"	Infrastructure: Proceedings of the 48th Annual Convention of Computer Society of India		723-728		Ojha, Geeta Sikka
10.	" Empirical investigation into static and dynamic coupling metrics	", ACM Sigsoft SEN	39(1)	pp. 1-8	2014.	Rani Geetika, Paramvir Singh
11.	" Dynamic coupling metrics for object oriented software systems: A Survey	ACM Sigsoft SEN	39(2)	pp. 1-8	2014.	Rani Geetika, Paramvir Singh
12.	" Gabor Features based script identification of lines within a Bilingual/Trilingual	International Journal of Advanced Science and Technology, Document accepted to be published in SERSC Publications.				Rajneesh Rani, Dr. Renu Dhir and Gurpreet Singh Lehal
13.	" Structural and Gabor Features for Script Identification of Gurumukhi and English words	International Journal of signal and image processing	4.1	pp. 79-84	2014	Rajneesh Rani, Dr. Renu Dhir and Gurpreet Singh Lehal
14.	A Study of Cognitive Radio based on WARP Platform	International Journal of Computer Science and Engineering Technology	Vol 5	243-247	March 2014	Navreet Kaur
15.	"RSSI based Optimum Transmission Power Ad-Hoc on-Demand Distance Vector (rOTP-AODV) Routing Protocol.	International Journal of Computer Applications	93.5		(2014).	Amit Kumar Dogra, and Ajay Kaul
16.	Performance analysis of DCT based digital image watermarking using color spaces effects,	International Journal of Computer Science and Engineering Technology	vol. 05	no. 06	(2014)	Shelza Kapur and Paramvir Singh

Research Publications (National journals)

S.No	Title of paper	Journal Name	Volume Number	Page No	Publication year	Authors as on the article
1.	Performance Evaluation of AQM Algorithms for PGM based group communication in Centralized Multicasting Network	<i>International Journal of Modern Trends in Engineering and Research</i>	Volume 02	508	2015	Shaveta, Ashish Kumar

Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Organizers	Dates	Funded by	Name of the Faculty
International Conference on Cross Cultural Nuances		October 30-31 2014		Dr. H.K. Verma
Recent Trends in Instrumentation and Control Engineering	NIT Jalandhar	Dec 8-12, 2014	TEQIP-II	Dr. Parmvir Singh
Data Analysis and Software Computing (DASC-2014)	NIT Jalandhar	09-13 June, 2014	TEQIP-II	Mr. D. K. Gupta
Data Analysis and Software Computing (DASC-2014)	NIT Jalandhar	09-13 June, 2014	TEQIP-II	Mr. Rahul Aggarwal
Data Analysis and Software Computing (DASC-2014)	NIT Jalandhar	09-13 June, 2014	TEQIP-II	Mr. Ashish Kumar Ms Navreet Kaur Ms. Kamalpreet Kaur, Ms. Kirti Ms. Deepika Ms. Jobanpreet Kaur

Short Term Courses/Workshops/Seminars organized:

Title of course	Name of organizer	Dates	Funded by
Data Analysis and Software Computing (DASC-2014)	Dr. Renu Dhir Dr. H.K. Verma Dr. Geeta Sikka Dr. Parmvir Singh	09-13 June, 2014	TEQIP-II

Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr. A L Sangal	Life Membership	ISTE, New Delhi	
Dr. A L Sangal	Life Membership	CSI	
Dr Harsh K Verma	Annual	IEEE@Computer Society	92158765
Dr Paramvir Singh	Professional Membership	IEEE Computer Society, USA IEEE Communications Society, USA	92939007
Dr Paramvir Singh	Life Membership	ISTE, New Delhi	LM-93050

Projects Completed/On Going/sponsored projects:

Participating Institute of Information Security Education and Awareness (ISEA) Project
Phase-II initiated by the Ministry of Communications and IT, New Delhi.

Principal Investigator: Dr Harsh K. Verma

Co-Investigator: Dr Renu Dhir

DEPARTMENT OF TEXTILE TECHNOLOGY (TT)**DEPARTMENTAL SUMMARY**

No. of Journal publications(Inter.)	27	No. of expert talks organized	05
No. of Journal publications(Nat.)	12	No of PhD students completed	02
No. of STC conducted	03	No of new PhD students enrolled	09
No of workshops/ conferences conducted	02	No of New M. Tech students enrolled	18
No. of M. Tech students completed	18	No of conferences attended	09

1. Faculty

Sr. No.	Name	Position	Qualifications
1	Dr. S K Sinha	Professor and Head	PhD
2	Dr. S Ghosh	Professor	PhD
3	Dr. J N Chakraborty	Professor	PhD
4	Dr. A. Mukhopadhyay	Professor	PhD
5	Dr. A Chatterjee	Associate Professor	PhD
6	Dr. N Bhowmick	Associate Professor	PhD
7	Mr. M D Roy	Associate Professor	Pursuing PhD
8	Dr. A K Choudhary	Associate Professor	PhD
9	Dr. Vinay Midha	Associate Professor	PhD
10	Dr. Monica Sikka	Associate Professor	PhD
11	Dr. K V P Singh	Assistant Professor	PhD

4. Academic Programmes**Undergraduate Programs**

- B. Tech. in Textile Technology (Intake 90)

Postgraduate Programmes

- M. Tech. in Textile Engineering & Management (28)
- M. Tech. Part Time in Textile Engineering & Management (Minimum 5)
- Full and part Time Ph D Programme in Textile Engineering

5. Development of Laboratories

Textile testing lab- New general testing instruments used for regular UG testing such as Projection microscope, twist tester, pilling tester, abrasion tester have been procured. Renovation of lab has also been made.

Advanced Fabric Research Lab- Industrial filtration test rig, Pulse jet filtration Instrument, Moisture Measurement Tester, Fabric feel tester and Dry rate tester have been purchased.

Textile Chemical Processing Lab- UV visible double beam Spectrophotometer has been purchased. Renovation of lab is done.

Computer Lab- New computers have been installed, e-Library has been established, Audio-visual aid is under process.

Garment Manufacturing Lab & Fashion Studio- Tukatech software for advanced fabric and garment designing.

6. Research and Development activities (Faculty wise)

Dr. S. Ghosh

PhD guidance

Name of Candidates	Title	Status	Sole or joint candidate	Name of joint supervisor
Sukumar Roy	Design of Water Filter	In Progress	Joint	P. K. Roychoudhury N. Bhowmick
Pawan Kumar	Comfort property of yarn for application in sports	In Progress	Joint	S. K. Sinha
Alok Kumar	Fibre shedding	In Progress	Joint	N. Bhowmick
Pratibha	Wicking behavior of towel	In Progress	Joint	A. Chatterjee

II M.Tech guidance

Name of Candidates	Title	Status	Sole or joint candidate	Name of joint supervisor
Ripan Das	Thermal behavior of fabric	On going	Sole	S. Ghosh
Saravana Kumar	Tearing behavior of woven fabric	On going	Joint	M. D. Roy
Gaurav Singal	Wicking behavior of woven fabric	On going	Joint	M. D. Roy

Dr. J.N. Chakraborty

I PhD guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Priyadarshi Jaruhar	Reduction and application of sulphur dyes on cotton using enzymes	Thesis submitted	Sole	---

Guneet Dhiman	Compatibility of Anti-crease, anti-microbial and soil release finishes for simultaneous application on cotton	Continued	Sole	---
Amandeep Kaur	Bio-finishing of wool with immobilized protease	Continued	Sole	---
Shelly Khanna	Fragrance and mosquito repellent finishing of cotton, polyester and their blends with natural essential oils	Continued	Sole	---
Amit Madhu	Pretreatment of cotton using immobilized enzymes	Continued	Sole	---
Dibyendu Pal	Yet To be decided	Continued	Sole	---

II M Tech guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Madan Mohan Das	Enzymatic Scouring of Cotton	Completed	Sole	

III Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Organizers	Dates	Funded by
International Conference on Emerging Trends in Traditional and Technical Textiles	NIT Jalandhar	April' 11 th -12 th 2014	TEQIP-II

IV Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr J N Chakraborty	Three Years	Society of Dyers & Colourists, UK	-----

Dr. S. K. Sinha**I PhD guidance**

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Pawan Kumar	Comfort properties of yarn for application in sportswear	Final stage for submission.	Joint	Dr S. Ghosh
M D Roy	Characteristics of yarn & Fabric made from different fibers	Pre-submission awaited	Joint	Prof R Chattopadhyay IIT Delhi
Ravi Kumar Jain	Apparel application of nonwovens	Ongoing. Comprehensive passed	Joint	Prof A Das, IIT Delhi
Dinesh Bhatia	Thermal Characteristics of Polyester/Wool Yarn	Ongoing	Sole	-----
Madan Regar	Structural Investigation of Eli-Twist Yarn	Ongoing	Joint	Prof R Chattopadhyay, IIT, Delhi
Bhavna Choubisa	Yest to decide	Ongoing	Sole	-----

II M Tech guidance

Name of	Title	Status	Sole or joint	Name of joint
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Candidate			candidate	supervisor
Arpita Kothari	Effect of Structural Modification of Spun Yarn on Inverse Relaxation Behaviour	Completed	Joint	Dr A Chatterjee
Kasimi Nurusaba	Optimization of Process and Testing Parameters for Strength and Elastic Recovery of Lycra Core Spun Yarn	Completed	Joint	Dr A Sachdeva
Payal	Elastic Performance Coefficient and Recovery of Cotton/Lycra Core Spun Denim Yarn and Fabric	Completed	Sole	-----

Reviewer: Textile Research Journal, UK; Indian Journal of Fibre and Textile Research, India; Springer Publication (India). Fibres and Polymers, Journal of the Institute of Engineers: Series E

III Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

S.K. Sinha	Method of analysis & comparative assessment of yarn packing density	International Conference on Emerging Trends in Traditional & Technical Textiles			2014	Pawan Kumar Ravi K.Jain
S.K. Sinha	Modification of wool blended yarn for improved comfort	International Conference on Emerging Trends in Traditional & Technical Textiles			2014	S. Ghosh Pawan Kumar

Dr A. Mukhopadhyay**Ph D Research Supervision**

Sr.	Name of Student	University and	Thesis Title	Co-supervisor	Status
1.	N C Ray	NIT Jalandhar, 2011	Surface Degradation Behavior of Fancy Yarn Fabric	Dr. Vinay Midha	In progress
2.	Kamal Dhawan	NIT Jalandhar, 2012	Industrial Aerosol Filtration	-----	In progress
3.	Harabansh Singh	NIT Jalandhar, 2012	Battery Separator	Dr. A. Chatterjee	In progress
4.	Vaibhav Gupta	NIT Jalandhar, 2012	Sewing Dynamics	Dr. Vinay Midha	In progress

Refereed Journal Papers**International Journals**

1. Response of Slub Characteristics on Tensile Properties of Injected Slub Yarn, N. C. Ray, A. Mukhopadhyay, V. K. Midha, Journal of The Institution of Engineers (India): Series E, 2015, DOI 10.1007/s40034-015-0065-1.
2. Effect of Silicon Finish on the behaviour of Regenerated Surface Filters at Different Dust Concentration, A Mukhopadhyay and S R Swain, Filtration Journal, American filtration society, 15 (1), 2015, pp. 40-47.
3. Effect of high temperature on the performance of filter fabric, A Mukhopadhyay, and V Pandit and K Dhawan, Journal of Industrial Textiles, Published online (January 14, 2015, doi: 10.1177/1528083714567240)

4. Control of industrial air pollution through sustainable development, Pandit, Environ Development Sustainability, 16, 2014, pp. 35-48.

A Mukhopadhyay, and V

Refereed Conference Research Papers (Published ones during the report period) Information to be given in the order as below:

- (a) Effect of Fabric Type and Dust Concentration on Filtration Performance, Arunangshu Mukhopadhyay and Soumya Ranjan Swain, February 24-26, 2015, Filtech -2015, Cologne, Germany.
- (b) Study and characterization of the emitted particles in pulse jet filtration, A K Choudhary and A Mukhopadhyay, February 24-26, Filtech -2015, Cologne, Germany.
- (c) New test rigs for characterizing filter media, A Mukhopadhyay and A K Choudhary, February 24-26, Filtech -2015, Cologne, Germany.
- (d) International Conference on Technical Textiles and Nonwovens 2014, The Structural Configuration and Stretch Property of High Stretch Bandages, M P Sikka, S. Ghosh, A. Mukhopadhyay, Indian Institute of Technology Delhi, India, 6-8th November, 2014.
- (e) Industrial Gas Filtration: Issues and Challenges, A Mukhopadhyay and A K Choudhary, in One Day Workshop on Filter Media Characterization, National Institute of Technology, Jalandhar, December 15, 2014.

Books/ Monographs publication

A book chapter on **Composite nonwovens in filters: Part I Filtration Mechanism and Characteristics requirements of Nonwovens as Filter** in Composite nonwoven materials: Design, development and applications, Woodhead Publishing Limited, Elsevier, Cambridge, ISBN 9780857097705, 2014.

A book chapter on **Composite nonwovens in filters: Part II Composite Nonwovens in Filters** in Composite nonwoven materials: Design, development and applications, Woodhead Publishing Limited, Elsevier, Cambridge, ISBN 9780857097705, 2014.

Sponsored Projects

S. No.	Title of Project & type	Funding Agency	Financial Outlay	Year of start & total period	Name of P.I and other Investigators	Status: started or completed or in progress
1	Infrastructure Development (under FIST)	DST, Govt. of India	59 Lakhs	From November 2009 (duration 5	P.I.: S Ghosh	Completed

2	Design of Pulse Jet Filtration Apparatus	DST, Govt. of India	52.28 Lakhs	IDP/IND/2010/21 dated 13.09.2011	P.I.: A Mukhopadhyay	Completed
3	Development of Positive thread feeding device for Sewing Machine	DST, Govt. of India	25.00 Lacs	From February 2015	P.I.: Dr V Midha	Ongoing

Products/ Processes/ Development and Technology Transfer/ Patents:

Title: AN APPARATUS FOR TESTING CLEANABLE FILTER MEDIA IN TUBULAR FORM

- **Application No. : 511/DEL/2015**
- **Date of CS Filing: 23.02.2015**

Title: AN APPARATUS FOR TESTING CLEANABLE FILTER MEDIA IN FLAT FORM

- **Application No. 512/DEL/2015**
- **Date of CS Filing: 23.02.2015**

Applicants – Dr . A . Mukhopadhyay et al.

Evaluated research project from Department of Science and Technology, Govt. of India.

Expert for Academic Audit at Department of Textile Technology, VJTI, Mumbai on 23.09.2014.

Invited Speaker

Presented invited lecture, “Industrial Gas Filtration for Pollution Control: Issues and Challenges”, in Gujarat Technological University during Research Week, April 17-18, 2015.

Understanding of Basic Parameters used in Characterizing Textile Materials, PTU GJS Campus, Bathinda, Punjab, Under TEQUIP, October 16, 2014.

Plenary Speaker, Industrial Gas Filtration: Issues and Challenges, International Conference on Technical Textiles and Nonwovens 2014, Indian Institute of Technology Delhi, India, 6-8th November, 2014.

Lecture on Functions and Properties of Geo-textiles at Short Term Course on Recent Trends in Civil Engineering during 26 - 30 May 2014 under TEQIP-II at Department of Civil Engineering, Dr B R Ambedkar, National Institute of Technology Jalandhar, Punjab.

Reviewer: Textile Research Journal, UK; Journal of Textile Institute, UK; Journal of Industrial Textiles, UK, Powder Technology (Elsevier Publication), Journal of Air and Waste Management Association, Boston; Journal of Engineered Fibers and Fabrics, USA; International Journal of Fibres and Polymers, South Korea, Research Journal of Textile and Apparel, Hong Kong, Journal of Textiles, Hindawi Publishing Corporation; International Journal of Educational Research and Reviews, Nigeria; Journal of Petroleum and Gas Engineering, Nigeria, Journal of Engineering and Technology Research, Nigeria; Indian Journal of Fibre and Textile Research, India; Institute of Engineers, Springer

Publication (India). Journal of Textiles and Light Industrial Science and Technology (TLIST), QScience Connect, Qatar, Journal of the Institution of Engineers; Aerosol Science and Technology (Taylor and Francis), Journal of the Institute of Engineers: Series E, Journal of Textile Association (India)

Editorial Board Member - International Journal of Textile and Fashion Technology (IJTFT), International Journal of Textiles and Light Industrial Science and Technology (TLIST), International Journal of Textiles, Hindawi Publishing Corporation (USA).

External examiner and evaluator of M Tech and Ph D theses from IIT Delhi, Ph D thesis from PSG College of Technology, Coimbatore and Technological Institute of Textiles and Sciences, Bhiwani (Haryana).

Chairman of three sessions at Filtech Conference, **Filtech -2015, Cologne, Germany**. held on **February 24-26, 2015**.).

Chairman of session in International Conference on Technical Textiles and Nonwovens 2014, Indian Institute of Technology Delhi, India, 6-8th November, 2014. I was also scientific committee member.

Advisory committee for International Conference on Technical Textiles & Nonwovens (ICTN 2014), 6th-8th November, 2014. Department of Textile Technology, Indian Institute of Technology Delhi, New Delhi.

Advisory committee for National Conference on Advances in Textile Manufacturing, October 11, 2014, Jaya Engineering College Chennai.

Organisation of Courses/ Conferences

Industrial Gas Filtration: Issues and Challenges, A Mukhopadhyay and A K Choudhary, in One Day Workshop on Filter Media Characterization, National Institute of Technology, Jalandhar, December 15, 2014.

Participation in Seminar/ Symposium/ Workshop etc.

Filtech Conference and Exhibition -2015, Cologne, Germany, February 24-26, 2015.

OTHER WORK (not included in the form above)

Coordinator of one day **National Seminar on Advances in Textile Materials and Processes on October 29, 2014.**

Co-ordinator and Organizer of Technology Transfer Event & One Day Workshop on Filter Media Characterization, National Institute of Technology, Jalandhar, December 15, 2014.

Technology transfer event: NIT Jalandhar has transferred the right of manufacturing of test rigs (for characterizing filter media used for pollution control in industries) to Kanwal Enterprises, Gurgaon, Hr.). These test rigs, viz. a viz. pulse-jet filtration test rig and industrial filtration rig have been developed through a project supported by Instrumentation Development Programme (IDP) under Department of Science & Technology (DST), Government of India. The cost involved of this research project was Rs 52.28 lacs. **Technology transfer** event was organized at NIT Jalandhar on December 15, 2014. Highlights of New Test Rig for Characterizing Industrial Gas Filter Media, has been discussed by Dr A Mukhopadhyay, Principal Investigator, DST Project

Participated in festival of innovation at President House for showcasing innovations on March 10, 2015.

Dr. A. Chatterjee

I PhD guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
H S Mohapatra	Citric Based Fibers	About to submit	Joint	Pramod Kumar
S Maity	Conductive Textiles	About to submit	Sole	-----
Pratibha	Moisture Management of Dref-3	Comprehensive	Joint	S Ghosh

	friction spun yarn	Completed		
Harabansh Singh	Bettry Separator	Comprehensive Completed	Joint	A Mukhopadhyay

II M Tech guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
M. Nivas Kumar	Preparation and Characterisation of Graphene Coated Cotton Textile	Completed	Sole	
Bhupinder	Thermoelectric behavior of conductive polymer based textiles	Completed	Sole	
Arpita Kothari	Effect of structural modification of spun yarn on inverse relaxation behaviour	completed	joint	Dr. S K Sinha

III Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Organizers	Dates	Funded by
International Conference on Emerging Trends in Traditional and Technical Textiles	NIT Jalandhar	April' 11 th -12 th 2014	TEQIP-II

Dr. N. Bhowmick**I PhD guidance**

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Alok Kumar	Role of yarn structure in fiber shedding behaviour during knitting process	ongoing	Joint	Dr S Ghosh
Sukumar Roy	Design of Portable Water Filter to improve Water quality for rural people	ongoing	Joint	Dr S Ghosh ,Dr P K Roychoudhury (I.I.T. Delhi)
Sukhvair Singh	Influence of can spring parameters on spun yarn characteristics	ongoing	Joint	Dr Joseph AnandVaz

II MTech Guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Sukhvair Singh	Role of the sliver can parameters and storage time on combed yarn quality	Completed	Sole	-
Revappa J. Yedde	Water Management in Horticulture by Hydrogel-fibre Composite in Arid and Semi-arid Area	Completed	Sole	-
Akhtarul Islam Amjad	Assessment of Water Filtrability of Needle Punched Nonwoven Fabrics	Completed	Sole	-

II Short Term Courses/Workshops/Seminars organized

Title of course	Name of organizer	Dates	Funded by
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Mr. M.D. Roy**I M Tech guidance**

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Suresh Gandhi	Performance assessment of air-jet yarn and subsequent fabrics made out of these two as filler yarns	Completed	Sole	Nil
Harwinder Singh	Evaluation of mechanical properties of peanut shell flour-polypropylene composite	Completed	Sole	Nil
Kalamraju Sai Sitaram	Supply chain revampment by coupling demand with sales using quantitative techniques	completed	Sole	Nil

II Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Organizers	Dates	Funded by
International Conference on Emerging Trends in Traditional and Technical Textiles,	NIT Jalandhar	April' 11 th -12 th 2014	TEQIP-II
Autex World Textile Conference	Autex, Dresden , Germany	May 22-24, 2013	Autex
Workshop Cum Training Programme	School of Engineering, University of Minho, Portugal	16-20 Dec 2013	-----

III Short Term Courses/Workshops/Seminars organized: None**IV Expert talks delivered**

Title of talk	Name of expert	Event of talk delivered	Date of talk
Studies of effects of mechanical conditioning on abrasive behaviour of yarn	M D Roy	13 th AUTEX Word Textile Conference, Germany	May-24, 2013
Study on ring & Air Jet yarns & its mechanical performances in fabrics	M D Roy	International Conference on Emerging Trends in Traditional and Technical Textiles	April 11-12, 2014

Dr A.K Choudhary**I PhD guidance**

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Angat kumar	Characterization of Denim fabrics	continued	Joint	Dr A Mukhopadhyay
Ramratan Guru	Studies on the thermo-physiological behavior of knitted active sportswear.	Continued	Sole	Nil

II M Tech guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
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Ramratan	Effect of various finishing & its Hygral comfort properties	Completed	Sole	Nil
Suyash Manmohan	Study of Activated carbon indoor air filter media	Continued	sole	Nil
Sudev Dutta	Response of filter media type on flat and tubular based pulse jet filtration test rigs	Continued	sole	Nil

III Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Organizers	Dates	Funded by
Some characterization of seam qualities with varying stitching parameters and functional finishes of suiting fabrics.	NIT Jalandhar	April' 11 th -12 th 2014	TEQIP-II
Study and characterization of emitted particles in pulse-jet filtration.	International conference filtech-2015, Germany,	24-26 February 2015	NIT Jalandhar
Poster Presentation on development of new test rig.	International conference filtech-2015, Germany,	24-26 February 2015.	TEQIP-II
Presented paper on "Modern development in artificial skin", ISTE Engineering Education congress and National Seminar on sustainability of engineering education	NIT Jalandhar	26-27 March, 2015	ISTE, NITJ
Presented paper on "Recent research and development in soft tissue implant", ISTE Engineering Education congress and National Seminar on sustainability of engineering education	NIT Jalandhar	26-27 March, 2015	ISTE, NITJ
Presented paper on "Technological advances in bedding material", ISTE Engineering Education congress and National Seminar on sustainability of engineering education	NIT Jalandhar	26-27 March, 2015	ISTE, NITJ
Presented paper on "Innovation in bandages", ISTE Engineering Education congress and National Seminar on sustainability of engineering education	NIT Jalandhar	26-27 March, 2015	ISTE, NITJ
Presented paper on "Latest development in filtration and it's control units", ISTE Engineering Education congress and National Seminar on sustainability of engineering education	NIT Jalandhar	26-27 March, 2015	ISTE, NITJ
Presented paper on "Advancement in surgical clothing", ISTE Engineering Education congress and National Seminar on sustainability of engineering education	NIT Jalandhar	26-27 March, 2015	ISTE, NITJ
Presented paper on "Innovation in comport of sports textile", ISTE Engineering Education congress and National Seminar on sustainability of engineering education	NIT Jalandhar	26-27 March, 2015	ISTE, NITJ
Participated in two day all India Rajbhasha Conference at Vishakhapatnam	MHRD	22-23 May, 2014	NITJ
Application of six sigma in Indian industry	NIT Jalandhar	09-13 June	NIT

Chaired the one session in International Conference Emerging Trends in Traditional and Technical Textiles (ICETT-2014),	NIT Jalandhar	2014 April 11-12, 2014.	Jalandhar NIT Jalandhar
Chaired the one session in International conference filtech-2015.	Filtech, Germany,	24-26 February 2015.	NIT Jalandhar

IV Short Term Courses/Workshops/Seminars organized

Title of course	Name of organizer	Dates	Funded by
International Conference on Emerging Trends in Traditional and Technical Textiles	NIT Jalandhar	April 11 th -12 th 2014	TEQIP-II, Ministry of Textiles and private sponsorship
ISTE Engineering Education congress and National Seminar on sustainability of engineering education	Joint Organizer secretary, NIT Jalandhar	26-27 March, 2015	ISTE, NITJ
Seminar on mining engineering	NIT Jalandharj	12-13 Dec 2014	TEQIP-II
Workshop on filter media characterization	NIT Jalandhar	15 Dec 2014	DST new DELHI

Dr. Vinay Midha

I PhD guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Suresh	To control run off erosion of soil by using geotextiles	ongoing	Sole	Nil
Vaibhav Gupta	Modelling of sewing machine	ongoing	Joint	A Mukhopadhyay
Ashish Gupta	Seam strength Prediction	ongoing	Sole	Nil
Agya Preet	Multy Layering Clothing	ongoing	Joint	A Mukhopadhyay
Ankush Sharma	Studies on Needle heating during high speed industrial sewing	ongoing	Sole	Nil
Shubham Joshi	Investigation of durable antimicrobial finishes to chemically modified textile substrates using Trichloroacetic acid-Methylene Chloride solvent system for healthcare and hygiene applications	ongoing	Joint	Prof S Rajendran, University of Bolton, UK
N C Ray	Fibre attrition behavior of injected slub yarns and surface degradation behavior of the fabrics produced	ongoing	Joint	A Mukhopadhyay

II M Tech guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Shiv Kumar Hiremath	Optimization of splicing parameters using Taguchi	completed	Sole	Nil
Neeraj Sharma	Serviceability of jute geotextiles in unpaved roads	completed	Sole	Nil
Shailja Sharma	Modelling Sewing Thread Consumption for Lockstitch and 401 Chainstitch	ongoing	Sole	Nil
Shubham Joshi	Influence of In situ parameters on serviceability of chemically treated jute geotextiles in unpaved roads	ongoing	Sole	Nil
Neeraj Gupta	Optimisation of parameters for sewing threads in technical application	Ongoing	Sole	Nil

III Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Organizers	Dates	Funded by
International Conference on Technical Textiles and Nonwovens	IIT Delhi	Nov. 6 th – 8 th 2014	TEQIP-II
International Conference on Emerging Trends in Traditional and Technical Textiles,	NIT Jalandhar	April' 11 th -12 th 2014	TEQIP-II

IV Short Term Courses/Workshops/Seminars organized

Title of course	Name of organizer	Dates	Funded by
International Conference on Emerging Trends in Traditional and Technical Textiles	NIT Jalandhar	April 11 th -12 th 2014	TEQIP-II, Ministry of Textiles and private sponsorship

V Expert talks delivered

Title of talk	Name of expert	Event of talk delivered	Date of talk
Surface ornamentation of Garments by Fancy Yarns	Dr Vinay Midha	National Workshop on Surface Ornamentation of Garments, sponsored by UGC	27 th – 28 th Feb. 2015

V Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
Dr Vinay Midha	Life Membership	ISTE	LM-86061

5. Projects Ongoing

- Project on 'Design of instrument for positive thread feeding in sewing machine' sanctioned by Department of Science and Technology, GOI for 22.11 lacs, PI- Dr Vinay Midha

6. International Publications

Faculty	Title of paper	Journal Name	Vol. No.	Page No	Publication year	Co-authors as on the article
Vinay Midha	Effect of seam angle on seam puckering in lightweight woven fabrics	The Journal of the Textile Institute	online		10-08-2014	Suresh K. S.
Vinay Midha	Performance of transesterified jute rolled erosion control products",	<i>Geosynthetics International,</i>	21(5)	301-309	May 2014	Suresh K. S & A. Sharma
Vinay Midha	Optimizing aqua splicer process parameters for Lycra-cotton core spun yarn using Taguchi method", ,	<i>Journal of the Institution of Engineers (India): Series E</i>	96(2)	131-138	Nov 2014	Hiremath, S & Gupta V
Vinay Midha	Response of Slub Characteristics on Tensile Properties of Injected Slub Yarn",	<i>Journal of the Institution of Engineers (India)</i>	Online		March 2015	Ray, N C & Mukhopadhyay, A.

Dr. Monica Sikka**I M Tech guidance**

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Khin Su Lwin	Pressure behavior of crepe bandage fabric on repeated usage and repeated washing operations	Completed	Sole	NA

II Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty

Title of course	Organizers	Dates	Funded by
International Conference on Emerging Trends in Traditional and Technical Textiles	NIT Jalandhar	April' 11 th -12 th 2014	TEQIP-II Ministry of Textiles and private sponsorship
Recent advances in energy technology	NIT Jalandhar	June 2-6, 2014	TEQIP-II
Data analysis and soft computing	NIT Jalandhar	June 9-13, 2014	TEQIP-II
Filter media characterization & technology transfer	NIT Jalandhar	December 15, 2014	

III Short Term Courses/Workshops/Seminars organized

Title of course	Name of organizer	Dates	Funded by
International Conference on Emerging Trends in Traditional and Technical Textiles	NIT Jalandhar	April 11 th -12 th 2014	TEQIP-II, Ministry of Textiles and private sponsorship
Garment Technology	NIT Jalandhar	June 10-14, 2013.	TEQIP

IV Expert talks delivered

Title of talk	Name of expert	Event of talk delivered	Date of talk
Modelling of the bandaging procedure and its application while wrapping the high stretch bandage	Dr Monica Sikka	International conference on technical textiles and nonwoven, IIT DELHI	November 6-8, 2014
The structural and stretch property of high stretch bandages	Dr Monica Sikka	International Conference on Emerging Trends in Traditional and Technical Textiles	April' 11-12, 2014
Surface ornamentation of fabrics using different weaves	Dr Monica Sikka	Two day national workshop at S.D. College for women, Jalandhar	February 27-28, 2015

Dr. K.V.P. Singh
PhD guidance

Name of Candidate	Title	Status	Sole or joint candidate	Name of joint supervisor
Pankaj Rao	Upgradation of the Fabric Feel Tester	Ongoing	Joint	Dr. Apurba Das(IIT Delhi)
Emily Dey	Natural, Anti-bacterial finish on surgical gowns.	Ongoing	Sole	Nil
Behera	Flexible Reed	Ongoing	Sole	Nil

M Tech guidance**II Short Term Courses/Training Programs/Seminars/Conferences/Workshops/Symposia attended by the faculty**

Title of course	Organizers	Dates	Funded by
International Conference on Emerging Trends in Traditional and Technical Textiles,	NIT Jalandhar	April' 11 th -12 th 2014	TEQIP-II
FDP, 'Apparel Product Design and Development"	NIT, Jalandhar	Feb 11,12,13 ,2016	TEQIP-II

III Expert talks delivered : **Performance Lab:** FDP, 'Apparel Product Design and Development"

IV Membership to professional bodies

Name of faculty	Type of membership	Organization	Membership number
KVP Singh	Textile Association (Punjab)	NIT, Jalandhar	Jal/LM/20415 2004

11.12 Finance & Accounts Detail



भारतीय लेखा तथा लेखा परीक्षा विभाग
कार्यालय प्रधान निदेशक - लेखा परीक्षा (केन्द्रीय), चण्डीगढ़
INDIAN AUDIT AND ACCOUNTS DEPARTMENT
OFFICE OF THE PRINCIPAL DIRECTOR OF AUDIT (CENTRAL),
CHANDIGARH - 160017

क्रमांक/No.: PDA(C)/CB/SARs/2015-16/226
दिनांक/Dated: 19/2/2016

To

The Secretary,
Department of Education,
Ministry of Human Resource Development,
Government of India,
New Delhi.

Subject: Separate Audit Report on the annual accounts of Dr. B. R. Ambedkar National Institute of Technology, Jalandhar for the year ended 31 March 2015.

Sir,

I enclose a copy of the Separate Audit Report on the annual accounts of Dr. B. R. Ambedkar National Institute of Technology, Jalandhar for the year ended 31 March 2015 to be placed before both the Houses of Parliament. The report may be kept confidential till its presentation in the Parliament.

Kindly send us five copies of the above report after its presentation.

Please acknowledge receipt of this letter.

Yours faithfully,

Encls: as above

Principal Director

लेखा परीक्षा भवन, सेक्टर 17-ई, चण्डीगढ़
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Separate Audit Report of the Comptroller & Auditor General of India on the Accounts of Dr. B. R. Ambedkar National Institute of Technology, Jalandhar for the year ended 31 March 2015

We have audited the Balance Sheet of Dr. B. R. Ambedkar National Institute of Technology, Jalandhar as at 31 March 2015, Income & Expenditure Account and Receipts & Payments Account for the year ended on that date under Section 19(2) of the Comptroller & Auditor General's (Duties, Powers & Conditions of Service) Act, 1971 read with Section 22(2) of the National Institute of Technology Act, 2007. These financial statements are the responsibility of the Institute's management. Our responsibility is to express an opinion on these financial statements based on our audit.

2. This Separate Audit Report contains the comments of the Comptroller & Auditor General of India (CAG) on the accounting treatment only with regard to classification, conformity with the best accounting practices, accounting standards and disclosure norms, etc. Audit observations on financial transactions with regard to compliance with the Law, Rules & Regulations (Propriety and Regularity) and efficiency-cum-performance aspects, etc., if any, are reported through Inspection Reports/ CAG's Audit Reports separately.

3. We have conducted our audit in accordance with auditing standards generally accepted in India. These standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free from material misstatements. An audit includes examining, on a test basis, evidences supporting the amounts and disclosure in the financial statements. An audit also includes assessing the accounting principles used and significant estimates made by management, as well as evaluating the overall presentation of financial statements. We believe that our audit provides a reasonable basis for our opinion.

4. Based on our audit, we report that:

- i) We have obtained all the information and explanations, which to the best of our knowledge and belief were necessary for the purpose of our audit.

- ii) The Balance Sheet and Income and Expenditure Account dealt with by this Report have been drawn up in the format prescribed by the Ministry of Human Resources Development, Government of India vide order No. 29-4/2012-FD dated 17 April 2015.
- iii) In our opinion, proper books of accounts and other relevant records have been maintained by Dr. B. R. Ambedkar National Institute of Technology, Jalandhar in so far as it appears from our examination of such books.

iv) We further report that:

A. Balance Sheet

A.1 Current liabilities and Provisions (Schedule-3): Rs.87.28 crore
Cheques issued but not presented Rs.Nil

Above does not include an amount of Rs.11.79 crore on account of "Cheques issued but not presented", which should be included in the Current Liabilities and Provisions under head "Cheques issued but not presented". This has resulted in understatement of Current Liabilities and Provisions as well as Current Assets by Rs.11.79 crore

A.2 Fixed Assets (Schedule 4): Rs.324.56 crore

(a) Above includes works amounting to Rs.11.59 crore which were under progress as on 31.03.2015 and the same were wrongly included under the head Fixed Assets. This has resulted in understatement of Capital Work-in-Progress and overstatement of Fixed Assets by Rs.11.59 crore.

(b) Fixed Assets include an advance of Rs.6.25 crore given to CPWD in the previous year for construction work of Sports Complex which was included under the head Fixed Assets. No expenditure has been incurred from this advance as work has not been started till date. The advance amounting to Rs.6.25 crore given to CPWD should have been shown as advance in Loans, Advances and Deposits (Schedule-8). This has resulted in understatement of Loans, Advances and Deposits and over statement of Fixed Assets by Rs.6.25 crore.

A.3 Current Assets (Schedule-7): Rs.138.18 crore
Term Deposits – Rs.71.19 crore

Above includes investments made in term deposits out of Earmarked/ Endowment funds amounting to Rs.56.81 crore, which should be shown under separate schedule "Investment from Earmarked/Endowment funds" (Schedule 5) as per revised format of accounts for Central Educational Institutes. This resulted in overstatement of Current Assets and understatement of Investment from Earmarked/Endowment funds by Rs.56.81 crore.

A.4 Loans, Advances and Deposits (Schedule-8): Rs.18.83 crore

Above does not include an amount of advance for Miscellaneous works in Labs amounting to Rs.0.07 crore given to CPWD in the previous year and booked to the Income and Expenditure Account of the previous year. Till date, no expenditure has been incurred out of this advance and no work has been started. This has resulted in understatement of Loans, Advances and Deposits as well as Corpus/ Capital Fund by Rs.0.07 crore.

B. Income & Expenditure Account
Income from Investment (Schedule-11) Rs.2.99 crore

As per the provisions of revised format of accounts for Central Educational Institutes income from investments made out of Earmarked funds has to be credited to the respective funds. However, the Institute has not transferred the interest earned of Rs.2.11 crore on the investment made out of Earmarked/Endowment Funds (in term deposits/ saving bank accounts) and treated it as the income of the Institute. This has resulted in understatement of Earmarked/ Endowment Funds as well as overstatement of Surplus and Corpus/ Capital Fund by Rs.2.11 crore.

C. Significant Accounting Policies (Schedule-23)

Significant Accounting Policy at Sl. No. 4 states that depreciation on fixed assets is provided on straight line method at the applicable rates as per MHRD guidelines which is contradictory to Note at Sl. No. 10 of Notes to Accounts (Schedule 24) which states that no depreciation has been charged on the Fixed Assets during the current year due to shortage of time after receipt of guidelines from MHRD.

D. Notes on Accounts (Schedule-24)

D.1 It is noticed that the Institute has not disclosed its accounting policy in regard to retirement benefits (i.e. Pension, accumulated leave encashment and gratuity). However, Sl No. 16 of the Notes on Accounts states that the provisions for the gratuity and leave encashment has been charged as informed and provided by the management. This is contrary to the revised format of accounts for Central Educational Institutes and AS-15 of ICAI which requires provision to be made on actuarial basis. No such provision, however, was made in the accounts in respect of pension.

D.2 Sl. No. 1 of Notes on Accounts states that Physical Verification of Inventory for the year 2014-15 has been done. But in actual no Physical Verification has been done. Thus, the note at Sl. No. 1 is incorrect.

E. General**Net impact of Audit comments on the Annual Accounts**

Net impact of Audit comments on the Annual Accounts of Dr. B. R. Ambedkar National Institute of Technology, Jalandhar for the year ending 31 March 2015 is as under:

- i Asset understated by Rs.11.86 crore.
- ii Liabilities understated by Rs.13.90 crore.
- iii Surplus for the year overstated by Rs.2.11 crore.
- iv Corpus/Capital Fund overstated by Rs.2.04 crore.

F. Grant-in-Aid

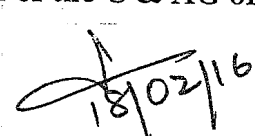
Out of the available funds of Rs.112.65 crore (Plan: Rs.40.58 crore and Non-Plan: Rs.72.07 crore), including Grant in Aid received during the year Rs.42.00 crore (Plan: Rs.15.00 crore and Non: Rs.27.00 crore), previous year balance of Rs.51.63 crore, (Plan: Rs.25.58 crore and Non Plan: Rs.26.05 crore), and internal income of Rs.19.02 crore. The Institute could utilize the sum of Rs.56.72 crore (Plan: Rs.13.29 crore and Non Plan: Rs.43.43 crore), leaving unspent balance of Rs.55.93 crore (Plan: Rs.27.29 crore and Non Plan: Rs.28.64 crore).

G. Management letter

Deficiencies which have not been included in the Separate Audit report have been brought to the notice of the Institute's management through a management letter issued separately for remedial / corrective action.

- v) Subject to our observations in the preceding paragraphs, we report that the Balance Sheet, Income and Expenditure Account and Receipts & Payments Account dealt with by this report are in agreement with the books of accounts.
- vi) In our opinion and to the best of our information and according to the explanations given to us, the said financial statements read together with the Accounting Policies and Notes on Accounts, and subject to the significant matters stated above and other matters mentioned in Annexure to this Audit Report give a true and fair view in conformity with accounting principles generally accepted in India:
 - a. In so far as it relates to the Balance Sheet, of the state of affairs of Dr. B. R. Ambedkar National Institute of Technology, Jalandhar as at 31 March 2015; and
 - b. In so far as it relates to Income & Expenditure Account, of the surplus for the year ended on that date.

For and on behalf of the C & AG of India


Principal Director of Audit
(Central), Chandigarh

Place: Chandigarh
Date:

Annexure

1. Adequacy of Internal Audit System

The Internal Audit System was deficient to the extent that no Internal Audit Report had been prepared and the post of Audit Officer is still lying vacant.

2. Adequacy of Internal Control System

Internal control system is inadequate as the Institute requires posting of proper staff in Accounts Section, etc., initiation of Management Information System (MIS), non physical verification of assets/inventories in time and payment of statutory dues.

3. Physical verification of Fixed Assets

Physical verification of Fixed Assets was under process.

4. Physical verification of Inventories

Physical verification of Inventories was under process.

5. Regularity in payments of statutory dues

~~The statutory dues of Rs.16.15 lakh payable to Employees State Insurance Corporation by the Institute were not paid by the Institute.~~



Deputy Director

Dr B R AMBEDKAR NATIONAL INSTITUTE OF TECHNOLOGY JALANDHAR**FINANCIAL POSITION AS ON 31.3.2015****Plan (Non Recurring)****Rs.in lacs**

Name of Head	Opening balance as on 1.4.2014	Grant in aid released during 2014-2015	Total amount available	Expenditure from 1.4.2014 to 31.3.2015	Unspent balance as on 31.3.2015
Buildings	2491.71	1339.11	3830.82	1170.71	2660.11
Other Facilities	17.63	115.43	133.06	116.80	16.26
Equipment	-	45.46	45.46	41.50	3.96
Total	2509.34	1500.00	4009.34	1329.01	2680.33
	48.75*	-	48.75	-	48.75*
Grand Total	2558.09	1500.00	4058.09	1329.01	2729.08

*Unspent balance under OSC of Rs.48.75 lacs has been merged in with main account

Non Plan (Recurring)

Opening balance as on 1.4.2014	Grant in aid released during 2014-2015	Income during 2014-2015	Total amount available	Expenditure from 1.4.2014 to 31.3.2015	Unspent balance as on 31.3.2015
2598.66	2700.00	1902.26	7200.92	4342.78	2858.14
5.99*	-	-	5.99	-	5.99*
2604.65	2700.00	1902.26	7206.91	4342.78	2864.13

*Unspent balance under OSC of Rs.5.99 lacs has been merged in with main account

Projects

Opening balance as on 1.4.2014	Grant in aid released during 2014-2015	Income during 2014-2015	Total amount available	Expenditure from 1.4.2014 to 31.3.2015	Unspent balance as on 31.3.2015
182.67	27.64	42.93	253.24	119.78	133.46