NATIONAL EDUCATION SOCIETY (R)



# JAWAHARLAL NEHRU NEW COLLEGE OF ENGINEERING



Shivamogga, Karnataka (Approved by AICTE, New Delhi, Affiliated to VTU, Belagavi)



ANNUAL REPORT 2021-22

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#### **NATIONAL EDUCATION SOCIETY (R)**

# JAWAHARLAL NEHRU NEW COLLEGE OF ENGINEERING



Shivamogga, Karnataka



To be a pace setting institute in technical & management education and research in producing highly competent engineers, managers & entrepreneurs to meet the needs of industry and society.



# **Our Mission**

- \* Impart quality education through flexible and innovative learning process.
- Enable and ignite young minds to excel in their career and life with entrepreneurial spirit, professional ethics and human values.
- \* Facilitate invention based research and collaborate with industries to address societal needs.

# **QUALITY POLICY**

- \* Providing state-of-the-art technology support and best possible educational infrastructure.
- \* Development of faculty through supporting policies and procedures towards achieving higher qualifications, short-term courses, participation / presentations in seminars and conferences.
- Encouragement to undertake research and consultancy, improving teaching learning process by introducing innovative pedagogical and student interaction mechanism.

# **ANNUAL REPORT 2021-22**

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#### 1. ABOUT NES

During the Freedom struggle, Mahatma Gandhi, the Father of our Nation stressed the need for quality rural education and development of women education and urged the leaders and youth to help in promoting it. Senior Freedom fighters and public of Shimoga were first to respond to the call of Mahatma. In 1946 they set up the National education society at Shimoga which is the important place of Malnad Area of Western Ghat Region in the Country which is endowed with rich and enchanting grace of Nature.

The Society, with the zeal dedication of senior leaders of the district like Mr. S.V.Krishna Murthy Rao, former deputy speaker of Loksabha, Mr.H.S.Rudrappa, Former Minister of Karnataka. Mr. P. Murudappa, Mr. R. K. Jayatheerthachar and Mr. S. Narasimha Murthy senior Advocates, Mr. S. R.Nagappa Shrestty, Ex-MLA and a great social worker and others strived hard to build the institution as founders to achieve the aspirations of Mahatma. The society started independently Managed High School in the district during 1946 and constructed its own building with public assistance. With a view to give thrust towards girl's education NES opened the first Girl's High School in the district in 1954 and gradually opened educational institutions in rural areas of the district to cater the needs of rural people.

Many illustrious leaders, statesman, personalities have visited the National education Society and have blessed by appreciating the dedicated service of the society. Among them are Honorable Dr. Rajendra Prasad, former President of India, Philosopher educationist Dr. S. Radha Krishnan, former president of India, Shri Lal Bahadhur Shastry, Former Prime Minister of India, Sri Jayachamaraj wodeyar, former Maharaja of Mysore, Sri Vinoba Bhave a great leader of Sarvodaya movement, Acharya Tulsi, the leader of Anavarath Movement are few among them.

Despite number of problems during and after freedom struggle the enthusiasm and commitment of National Education Society never detered towards working for the cause of education. The society started number of professional Colleges in the district. Now it is running 40 educational institutions providing education to more than 15,000 students with 1000 staff force. Starting from giving importance to Primary, Secondary and Pre-University education by opening number of Schools and Junior Colleges, the National Education Society is offering courses with high quality education in Engineering, Law, Commerce, Pharmacy, Applied Science and Home Science through its well established colleges.

Thousands of Alumni of these institutions have made their name and fame earned by obtaining national and international recognitions in their respective fields. It is a matter of great satisfaction to the society in its efforts to do best for imparting good education to students. Good number of students is coming out from its institutions with flying colours obtaining distinction every year.

The Society is managed by an Executive Committee. The directors have taken the development of

the Society as a life mission and are continuing the efforts to fulfil the aspirations of its founders. It has provided all the necessary facilities with adequate infrastructure to students and staff to promote both curricular and co-curricular activities.

The National Education Society observed its Golden Jubilee during 1998, and dedicated a statue to Mr.S.R.Nagappa Shrestty, a man who devoted his life to the development of the society. Further, NES celebrates Diamond Jubilee year during 2022.

For more details, please visit: <a href="http://nes-shimoga.org/about.html">http://nes-shimoga.org/about.html</a>

# EXECUTIVE COMMITTEE OF NATIONAL EDUCATION SOCIETY (R)



Sri. A. S. Vishwanatha President



Sri. T. R. Ashwathanarayana Setty
Vice President



Sri. S. N. Nagaraja Secretary



Sri. D.R. Amarendra Kireeti
Joint-Secretary



Sri. C. R. Nagaraj Treasurer



Sri. D. H. Srinivasa Murthy Director



Sri. N. T. Narayana Rao Director



Sri. G. S. Narayana Rao Director



Smt. S. R. Susheelamma Director



Sri. P. Mylarappa Director



Dr. P. Narayan Director



Sri. M. Shankara Rao Director



Dr. H. V. Subramanya Director



Smt. Rukmini Vedavyas Director



Sri. H. C. Shivakumar Director

# **ANNUAL REPORT 2021-22**

#### 3. ABOUT JNNCE

Jawaharlal Nehru New College of Engineering (JNNCE)[formerly Jawaharlal Nehru National College of Engineering], is one of the technical institutions of Karnataka, providing excellent technical education and training to students from all parts of India. Established by NES in 1980, JNNCE is approved by Government of Karnataka and AICTE; affiliated to Visvesvaraya Technological University, Belgaum and accredited by NAAC.

A preferred destination of students seeking technical education, the institution offers BE degree in 8 branches, 3 PG Courses, namely, M. Tech., MCA and MBA, besides M.Sc. (Engg.) and Ph.D. in nine disciplines. Spread over a sprawling campus of 39.4 acres, the institution is reputed for its high-caliber faculty, excellent infrastructure, academic environment and placement. Around 17000 graduates and post-graduates have so far passed out from this College and have been making significant contributions in academic institutions, industry R & D organisations and Government Departments in India and abroad.

JNNCE is also a University recognized research centre in Civil Engineering, Mechanical Engineering, Computer Science and Engineering, Electrical and Electronics Engineering, Electronics and Communication Engineering, MBA, Physics, Chemistry and Mathematics leading to the award of M.Sc. (Engg.) and Ph.D. So, for 54 candidates have been awarded Ph.D. from our research centres.

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# 4. GOVERNING COUNCIL OF JNNCE

1.	Sri. A S Vishwanatha President, NES, Shivamogga	CHAIRMAN	
2.	Sri. T R Ashwathanarayana Setty Vice President, NES, Shivamogga	MEMBER	
3.	Sri. S N Nagaraja Secretary, NES, Shivamogga	MEMBER	
4.	Sri. D R Amarendra Kireeti Joint Secretary, NES, Shivamogga	MEMBER	
5.	Sri. C R Nagaraj Treasurer, NES, Shivamogga	MEMBER	
6.	Sri. M Shankar Rao Director, NES, Shivamogga	MEMBER	
7.	Dr. H V Subramanya Director, NES, Shivamogga	MEMBER	Industrialist
8.	Smt. Rukmini Vedavyasa Director, NES, Shivamogga	MEMBER	
9.	Sri. Girimaji R Ravindra Life Member, NES	MEMBER	
10.	Prof. T S Hoovaiah Gowda Registrar, NES, Shivamogga	Ex-Officio Member	
11.	Dr. R V Praveen Gowda PRINCIPAL, Oxford College of Engg, Blore	MEMBER	UNIVERSITY NOMINEE
12.	Regional Director, South-Western Regional AICTE Office	MEMBER	AICTE NOMINEE
13.	Directorate of Technical Education, Bangalore	MEMBER	GOVT NOMINEE
14.	Dr. Manjunatha P Prof, ECE. Dept, & Dean Academics J.N.N.C.E, Shivamogga	MEMBER	STAFF NOMINEE
15.	Smt. Anuradha C K Asst. Prof. MBA Dept.,. J.N.N.C.E, Smg	MEMBER	
16.	Dr. K. Nagendra Prasad, Principal, J.N.N.C.E, Shivamogga	MEMBER SECRETARY	

#### 5. INSTITUTE PROFILE

JNNCE is a flagship Institute of the National Education Society (NES), established by freedom fighters and philanthropists like Sri. H. S. Rudrappa, Sri. S. V. Krishna Murthy Rao, Sri.S. R. Nagappa Setty and Sri. D. S. Dinakar and groomed by Sri Girimaji N Rajagopal, Sri D.R.Ratnakar among others.

All the founders of NES by their vision, hard work and contribution have brought JNNCE to the level it is today, which is being acknowledged and applauded by all. With the blessings of all, JNNCE is marching towards becoming one of the best institutions imparting education in engineering, management and computer application to needy students and creating citizens of tomorrow.

In this direction, over the last couple of years, many such developments and improvements have been achieved, with successful milestones. During July 2016, an initiative "Transformation for Excellence 2.0" for making JNNCE one of the top engineering, research, innovation and enterprising institutes was started. During this journey, the focus was on improving the quality of education, research & innovation, infrastructure development, employability of students & few more.

Jawaharlal Nehru New College of Engineering (JNNCE)[Formerly, Jawaharlal Nehru National College of Engineering (JNNCE)] was established in the year 1980 by National Education Society (NES). JNNCE is imparting education in Technology and Management since 41 years. JNNCE is running B.E (Civil, Mechanical, EEE, ECE, CSE, ISE, ETE & AI & ML), M.Tech (Transportation Engineering and Management, Computer Science), MCA and MBA programmes. JNNCE has been recognized by All India Council for Technical Education (AICTE) New Delhi, and Government of Karnataka, and is affiliated to Visveswaraya Technological University, Belgaum and accredited by NBA-New Delhi and NAAC. For more details about our college, please log on to our website: www.jnnce.ac.in

The lush green sprawling campus of about 39.4 acres caters to the needs of nearly 3750 students and 450 staff, with state-of-the-art technology back-up, well-equipped laboratories and workshops, library, hostels, playgrounds and other amenities. The dedicated faculty of the institute comprises of nearly 54 Ph.Ds as well as 123 with PG qualifications, amongst whom 52 are pursuing Ph.D.

JNNCE, firmly set on realizing its vision of becoming a pace-setting institute in technical and management education and research, has been successfully producing highly competent engineers, managers and entrepreneurs to meet the needs of industry, business and the society. In this direction, the just-now concluded 2021-22 academic year has been yet another fruitful year for the

institute, as manifested in the above accomplishments and new developments on all fronts, providing further impetus to its urge for excellence in the ensuing academic year 2022-23. NES Management, JNNCE Staff, Students, Alumni are constantly working towards achieving this goal.

#### Glimpses of Major Achievements of the Year 2021-22

#### **❖** Ranking/Rating:

There is remarkable improvement in overall ranking in survey done leading magazines in 2021, as mentioned below:

- 1. Ranked 52<sup>nd</sup> in "India Today" survey, 12th Rank in Karnataka
- 2. Ranked 52<sup>nd</sup> among Top-100 Engineering Colleges of South India in Survey by "The Week" magazine
- 3. Ranked 80<sup>th</sup> in India among Top-100 Engineering Colleges of India in 2021 as per "The Outlook" & 17<sup>th</sup> position in Karnataka

#### ❖ Academics:

Institution has so far secured over 100 ranks in university exams and during 2020-21 we bagged 3 ranks in VTU exam. We have introduced a mentoring process for potential rank holders as well other students to help them perform better in their examinations. We have started rewarding students who excel in their studies, cultural, sports and research & innovation, by awarding cash prizes, partial waiver of tuition fees and merit certificates. We organize Graduation Day which is unique where in all students become eligible for Graduation (Graduands).

#### Research and Innovation:

The Objective is set to focus on research and innovation so that education quality will improve.

Our Faculty and students are pursuing research in emerging areas to solve the societal problems.

The faculty have presented and published more than 300 papers in national and international seminars, conferences and journals in the last five years. Funded Research projects worth more than Rs. 39 Lakhs have been carried out in the institute in this year. The institution has organized one International Conference and four National Conferences /Seminars on different academic and intellectual themes successfully, attracting resource persons, speakers and delegates from academics and industry from all over India; also brought out Conference Proceedings containing valuable information and insights. To motivate innovation-based research among faculty and

students, JNNCE Research and Innovation Centre in JNNCE (JNNRIC) started in 2017-18 has been functioning. So for, 54 candidates obtained Ph.D. degrees from JNNCE under Research Centre of VTU.

To encourage research and publication, the institute had launched its own online bi-annual research journal, titled "JNNCE Journal of Engineering & Management" (JJEM) in October 2017; four issues, containing research papers from scholars, both from India and abroad, have been already released and the 12<sup>th</sup> issue is now under process.

The College has also continued to publish its bi-annual, in-house newsletter titled "JNNCE Beacon" to showcase the events and developments on the campus.

Many projects catering to the need of the society are being developed; few of them are:

- IoT based smart ventilator
- Generation of motive power in electric vehicle
- Two way charge-discharge cycling based dual-motor electric vehicle
- Generation of motive power in electric vehicle
- Automation of areca nut boiling and drying processes using embedded system
- Thermal Analysis of Waste Cooking Oil Extracted From Different Edible Oil Seeds
- To study and characterization and performance analysis of different UCO with solvent blends as fuel source in IC Engines
- A web based information system for the management of ICU beds during the COVID- 19 outbreak
- Integrated smart pole
- Field investigation of cold mix technologies
- Stabilisation of clayey sand by Terrazyme
- Laboratory Investigation on Composite Pavements using cutback and Emulsion

JNNCE has received funding from NewGen Innovation and Entrepreneurship **D**evelopment Center (NewGen IEDC) under the aegis of NSTEDB, DST, Govt. of India at JNNCE with **grant of Rs. 2.87 Crore** over a period of 5 years. JNNCE is one of the Institutions obtained this grant among 250+ institutions that had submitted applications and only college in Karnataka, who got this grant. Objective of this grant is to create the platform for Innovation & Entrepreneurship and create

companies with objective of generating revenue, creating jobs and wealth. During 2021-22, fourteen projects have been funded with 2.5 lakhs each.

JNNCE has received more than 41 Lakhs funding from funding agencies like Department of Science & Technology, Govt. of India, AICTE, Govt. of Karnataka.

We are also aggressively moving in establishing Industry-Institute collaboration to foster the practical knowledge among Faculty and students. In this direction, we have signed MOUs with many companies such as:

- Ekathva Innovations, Shivamogga
- Tequed Labs, Bangalore.
- National Highways Authority of India (NHAI)
- Technology Informatics Design Endeavour(TIDE), Bangalore

#### Placement:

In addition to education and research, we are focusing to provide skill-based training to increase their employability. To prepare students, we are providing soft skill training, exposed to emerging technologies by way of technical talks by Industry experts, hands-on workshops in emerging and niche technology areas like Artificial Intelligence, Machine Learning, IoT, Data Science, Satellite Communication etc. Also we have created the platform to pursue their projects in emerging technology fields and involve in research projects focusing social issues, agriculture, manufacturing, low-cost construction of building, healthcare, finance, etc.

More than 694 students from 2021-22 batch have got job offers during campus placement in companies like TCS, Evive Health, Crimson Logic, Global Edge, Colors Software, SOCIETE GENERALE, ETHNUS etc. Highest salary offered during 2021-22 is Rs.19.5 Lakhs per annum and average salary is Rs.4.5 lakhs per annum.

#### Students Chapters of Professional Bodies:

Several professional bodies' Student Chapters are active in JNNCE, which help the students to become team players and develop leadership qualities. We have chapters of: Institution of Engineers (India), The Institution of Electronics and Telecommunication Engineers (IETE), Institute of Electrical and Electronics Engineers (IEEE) Students Branch, National Service Scheme (NSS), Computer Society of India, Society for Automotive, Indian Institute of Foundry men, SAE etc.

#### **Quality Improvement in Education:**

Unlike the conventional method of teaching, JNNCE is practicing 'Outcome Based Education', where every subject taught has certain objectives to be fulfilled, which further fulfill the objectives of the department.

In this direction, apart from the regular teaching,

- Many workshops and faculty development programs are organized to gain practical exposure about the latest technologies currently used in industries.
- Students are encouraged to participate in state and national level technical competitions conducted by various organizations throughout India.
- Department level committees are constituted for (i) Academic Improvement (ii) Placement and Training (iii) R&D, Industry-Institute interaction.
- Professional trainers are invited to teach life skills to students not only for campus interviews but also to prepare them for future.
- Student feed-back is taken, which helps self-assessment.
- Open textbook tests are conducted to ensure that students study throughout the semester and not only during the exam time.
- Google Class rooms are being used, where the notes, ppts and lecture videos are uploaded, so that it would help students to do better.
- Encouraging students to use web resources offered by VTU and NPTEL by IIT's

#### Conferences, Workshops, Symposiums organized:

On a regular basis, all the departments organize and participate in conferences and workshops as part of continuous learning program, in association with bodies like CSR, DRDO, NBHM, ISTE, IIT Bombay, IIT Khargpur, IETE etc. In last three years, JNNCE has organized about 30 workshops; the faculty has attended about 641 Faculty Development Programs / Seminars / Webinars and around 17 conferences and 100 resource persons have visited JNNCE as guest speakers, paving the way for knowledge enhancement.

#### Contribution to Society by Staff and Students:

Our staff and students are also involved in various activities contributing to the society. Be it visiting rural areas, blood donation camps, awareness camps, reaching to school children, go green projects, helping the district administration or reaching out to the needy for assistance, they are 11 | Page

everywhere! Few of them are: Participating in Pulse polio program, Cow donation and Youth parliament. Faculty from basic sciences departments are actively participating in CET coaching classes for PU students every year, Internet awareness program for housewives and senior citizens, Workshop on electronics, electrical and physics for high school students for over 400 students, staff as experts / committee members in district administration and Government departments, providing financial assistance to meritorious and economical backward students in the form of scholarships, organizing Blood Donation Camps in association with Rotary, Red Cross and Govt. McGann Hospital etc.

#### Library & Information System:

The institute library, housed in an exclusive and spacious block, has a collection of 1,24,274 books relating to all branches of Engineering and Management, digital library, subscribes to 25 National & International Journals with more than 2500 e-journals through VTU Consortium and DELNET. The Library has been computerized with e-Lib iNext Web based software. Also, institute is identified as NPTL local chapter.

#### ❖ Alumni:

More than 18,000 students who have passed out of this institution have been making significant contributions in Industries, R&D organizations, Academic Institutions and Govt. Organizations in India and abroad and serving their alma-mater.

The institute has registered alumni association which is active and supportive that meets regularly during the month of May every year and involves itself in the development of the institution by undertaking various activities. The vast alumni community has been brought on board by registration of Alumni Association, launching a dedicated website, holding Global Alumni Meet, instituting Distinguished Alumni Awards, co-opting alumni in various administrative cells and panels, securing scholarships, internships, placements & sponsorships for our students, etc.

Year of Estd.:	1980	Name of Principal:	Dr. K Nagendra Prasad
		Built Area:	53097.59 sqm
No. of UG Programmes:	08	Land Area	143056.38 square meters ( Excluding MBA – 4 Acres)
No. of PG Programmes:	04	Carpet Area:	45132.95 sqm

UG Program	nmes		PG Progra	ımmes	
Course	Year	Intake	Course	Year	Intake
Civil Engineering	1980	120	MBA	1996	120
Mechanical Engineering	1980	90	MCA	1995	60
Electrical & Electronics	1980	60	M.Tech. in Computer	1999	25
Engineering			Science and Engineering		
Electronics and	1980	120	M.Tech. in Transportation	2010	18
Communication Engineering			Engineering &		
			Management		
Computer Science and	1991	180			
Engineering					
Information Science and	1999	120			
Engineering					
Electronics &	2000	60			
Telecommunication					
Engineering					
Artificial Intelligence &	2022	60			
Machine Learning					

Research Centre			Total Students						
Departments	Year		Year			PG			
Civil Engineering	2002		Teal	Total	Boys	Girls	Total	Boys	Girls
Mechanical	2000		1 <sup>st</sup> year	686	340	346	192	86	106
Engineering			(2021-22)	080	340	340	132	80	100
Computer	2003								
Science and			2 <sup>nd</sup> year	711	412	299	185	67	118
Engineering									
Electronics and	2006								
Communication			3rd year	788	444	344	28	8	20
Engineering									
Electrical and	2002								
Electronics			4th year	766	433	333	-	-	-
Engineering									
MBA	2006								
Chemistry	2012		Total	2051	1620	1222	405	161	244
Physics	2016		Total	2951	1629	1322	405	161	244
Mathematics	2017								

# Faculty Cadre as on July 2022

Course	Professor	Associate	Assistant	Total
		Professor	Professor	
Principal	1	-	-	01
Civil Engineering	1	1	21	23
Mechanical Engineering	3	3	13	19
Electrical & Electronics Engineering	3	1	9	13
Electronics and Communication Engineering	2	1	18	21
Computer Science and Engineering	4	2	18	24
Information Science and Engineering	2	4	15	21
Electronics & Telecommunication Engineering	2	2	8	12
AI & ML	1	1	1	3
MBA	1	1	8	10
MCA	1	3	6	10
Physics	1	1	2	4
Chemistry	1	1	2	4
Mathematics	1	1	6	8
Physical Education	-	-	1	1
Librarian	-	-	1	1
Placement Officer	-	-	1	1
Humanities	-	-	1*	1
Total	24	22	130+1*	177

<sup>\*</sup>Guest Faculty

# Faculty Qualification as on July 2022

Course	Ph.D.	Ph.D. pursuing	PG	Total
Principal	1	-	-	1
Civil Engineering	2	8	13	23
Mechanical Engineering	7	2	10	19
Electrical & Electronics Engineering	3	1	9	13
Electronics and Communication Engineering	3	14	4	21
Computer Science and Engineering	7	8	9	24
Information Science and Engineering	6	6	9	21
Electronics & Telecommunication Engineering	3	4	5	12
AI & ML	2	1	0	3
MBA	8	1	1	10
MCA	4	2	4	10
Physics	3	0	0	3
Chemistry	2	2	0	4
Mathematics	3	2	3	8
Physical Education	0	1	0	1
Librarian	0	0	1	1
Placement Officer	0	0	1	1
Humanities	0	0	1	1
Total	54	52	71	177

## Staff details as on July 2022

Laboratory Staff		Principal's Offic	ce Staff
Designation	Number	Designation	Numbe
Foreman	05	Superintendent	3
Instructor	38	Project manager	1
Supporting Technical Staff	11	FDA	5
Supporting Non-Technical Staff	15	SDA	7
		Supporting Staff	44
Library Staff		Sports sta	ff
Designation	Number	Designation	Number
Asst. Librarian	2	Sports Assistant	1
Supporting Staff	7	Supporting Staff	3
Hostel Staff		Training& Placen	nent Cell
Designation	Number	Designation	Number
Supervisor	4	Placement Assistant	1
Supporting Staff	44	Supporting Staff	1
Transportation Staff			
Designation	Number		
FDA	1		
Driver/Conductor	46		

# List of HODs as on July 2022

Name	Department
Dr. Karthika B S	Civil Engineering
Dr. E Basavaraj	Mechanical Engineering
Dr. A H Thejaswi	Electrical & Electronics Engineering
Dr. S V Sathyanarayana	Electronics and Communication Engineering
Dr. Poornima K M	Computer Science and Engineering
Dr. R Sanjeev Kunte	Information Science and Engineering
Dr. S Surendra	Electronics & Telecommunication Engineering
Dr. Chetan K R	Artificial Intelligence & Machine Learning
Dr. C. Srikant	MBA
Dr. S Prabhudeva	MCA
Dr. B. N. Ananda Ram	Physics
Dr. M. H. Moinuddin Khan	Chemistry
Dr. Nirmal T	Mathematics
Mr. Chetan A. V.	Physical Education Director
Mr. Chandrakantha R. Bhat	Librarian
Mr. G. Suresh	Placement Officer

# Library Details as on July 2022

1.	Carpet area	2049.48Sq.m
2.	Software	e-Lib iNext Web based
3.	No. of volumes	1,24,274
4.	No. of titles	15818
5.	National Journals	16
6.	International Journals	09
7.	Member of VTU Consortium (Online Journals)	2500+
8.	Member of DELNET	On line journals, E-Books and Inter library loan
9.	NPTL Services	On line course materials
10.	General Magazines	12
11.	Website	www.libinfo.jnnce.ac.in
12.	Institute's on line journal	JNNCE Journal of Engineering & Management (JJEM)

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#### 6. STRATEGY-TRANSFORMATION FOR EXCELLENCE 2.0

#### "Transformation for Excellence"

An initiative for making JNNCE as one of the top engineering, research, innovation and enterprising institutes!

- i. Enhancing the academic atmosphere by emphasizing excellence in teaching, research, innovation
- ii. Engage the stake holders to explore strengths & opportunities across the institute
- iii. Identifying the problems & developing solutions, automating routine works to optimize the resources
- iv. Increase the competence level of Faculty and staff
- v. Making the work environment as fun to work
- vi. Collaboration for joint research and exchange programs
- vii. Accreditation of all depts and outbound education system
- viii. Preparing and going for Autonomous status

#### 1. Governance

- a. Identifying the problems & developing solutions, automating routine works to optimize the resources
- b. Fostering a more transparent, responsive, motivated and agile administrative machinery
- c. Ensuring meticulous planning, budgeting, costing, accounting, internal control and audit processes in all administrative operations
- d. Increased monitoring of revenues, expenditure, investments and human resources
- e. Launching of a more object-oriented HR Policies/Service Rules
- f. Systematic documentation, filing, and operations in Office Administration
- g. Better and more frequent communication with all stakeholders (management, employees, students, parents, etc)
- h. Enhancing visibility through more reaching-out, publicity & promotion, press & public relations, publications, extension & social & community participation

#### 2. Education Quality

#### Following are planned to increase the teaching quality:

- Faculty Development workshops on various topics in all depts. In coming months
- Identifying and developing Road map for topics based on current & future need
- Mentoring by inside and outside academic experts, Mentoring by industry experts

- Develop innovative, research groups working on emerging topics, faculty interest, and research infrastructure to increase externally funded projects
- Attending & organizing Conferences, Summits, Trainings by Faculty
- Organizing Faculty development programs for others
- Taking up as reviewers and chairing sessions in Journal & Conferences
- Arranging in-house workshops & Motivational programs
- Making use of Free Online resources
- Inviting Industry experts during weekend for teaching (Alumni, industry persons with passion for teaching, parents who can help us)

#### Metrics for measuring Education Quality:

#### To increase the rank holders in VTU

- Handholding by right Faculty & mentoring those students
- Connecting to experts, earlier rank holders in JNNCE or outside

#### • To increase the no: of distinctions in VTU

- Identifying probable students based on past data in University exams
- Handholding them by way of coaching, guiding them with all possible facilities by Dept Faculty

#### • To help below average students to do well in VTU

- Helping them to identify problems & assisting them to cope up by Faculty mentors in depts
- · Motivating them so that they can score well

#### 3. Infrastructure Development

- Developing and maintaining state-of-the-art infrastructure in the campus for administration, teaching-learning, research, consultancy, campus-living, and welfare of all the constituents
- Developing transparent and responsible system for identifying and indenting departmental needs, for non-recurring & capital expenditure budgeting, purchase/acquisition, maintenance and disposal of capital assets
- Ensuring optimum utilization of classrooms, laboratories, workshops, equipments, vehicles, open spaces, play-grounds, parking space etc and checking wasteful expenditure, idle capacities, duplication, stock-filing etc
- Developing and maintaining proper landscaping, effluent-treatment, safety & security, vigilance & surveillance on the campus

#### 4. Research & Innovation

#### Following is planned in the coming months:

- Identifying the areas of research based on strength of Faculty
- Create an environment for high-impact, cutting-edge research
- Identifying the current work to apply for patents
- Establishing the collaboration with DRDO, ISRO, Public Sector Companies, MNCs
- Applying for Contract Research work partnering with corporate
- Develop infrastructure to enhance research capacity
- Engage students on issues that shape our society

#### 5. Funding, Grants & Sponsorship

# To generate financial support for research, innovation and other, following are planned in coming months:

- Setting up the Technology Business Incubation Centre with support of funding from Govt of India, Govt of Karnataka, others
- Creating platform for setting up companies where in expertise of Faculty, students are made use of
- Invite companies to set up Technology Development Centres
- Setting up Engg. Teacher training cell to train Faculty across India
- Commercializing of research ideas, patents, technology transfer
- Providing Industrial Consultancy, Contract Research work
- Finishing school with optimal use current facilities ( NSDC, Govt. support, PPP model)

#### 6. Industry Collaboration

#### Following is the action plan for industry collaboration:

- Inviting industries for setting up competency centres in emerging technology areas
- To identify the various avenues through which we can interact with local firms, businesses and other intermediaries in relation to research and innovative activity.
- Contacting companies and getting consultancy, research work
- Having industry experts in college committees and advisory board
- Guest Lecture by experienced person from industry
- Organizing workshop/seminar periodically and invite the corporate people to deliver lecture and interact

- Industrial visit, Expos, Exhibitions for students, Faculty
- Panel Discussions, CEO Interactions

#### 7. Placement

#### Following is the action plan for improving the placement:

- Establishing contacts with more companies for placement using networking like through parents, Alumni's and other means
- Establishing center for preparing students to face placement test and interviews involving industry professionals, Alumni's, professionals
- Attracting core companies for placement

#### 8. Sports, Cultural Activities and Campus Living

#### Following is the action plan in coming months:

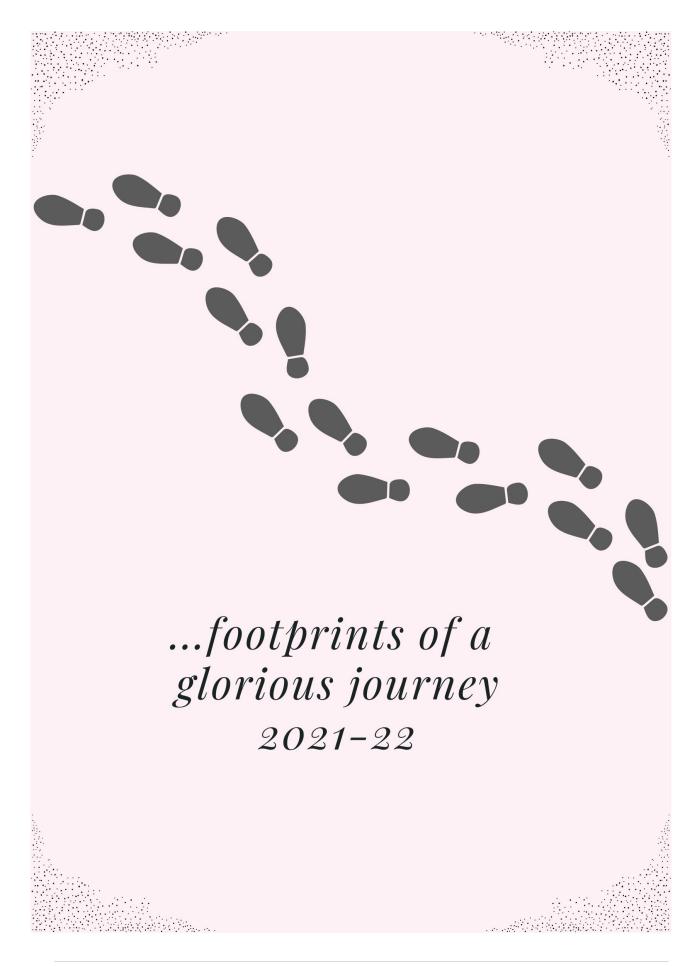
- Encouraging students to participate in various sports event conducted by VTU, International level
- Instituting awards for those who win prizes at University, State, National and International level
- Improving the infrastructure for sports and games
- Organizing family meets, cultural functions and team building games
- Improving the hostel facilities, food quality

#### 9. NES and Society

#### Following is the way to assist NES institutions:

- a. Assisting other NES Institution in areas of need to improve
- b. Enabling NES Institutions to make use of available facilities from Govt, Industries
- c. Assisting to arrange motivational, awareness programs to other NES Institutions
- d. Assisting to build centre for preparing competitive exams

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#### 7. GOVERNANCE

The institute is continuously striving towards the implementation of Transformation for Excellence 2.0. In this direction, the institute machinery is decentralized its working by following a hierarchical delegation of task management. Following are the details of the various committees.

- 1. JNNCE Governing Council
- 2. Council of Heads of the department
- 3. Internal Quality Assurance Cell IQAC
- 4. Statutory Committees:
  - a. Academic Monitoring Committee
  - b. Anti-ragging Committee
  - c. Anti-sexual harassment committee
  - d. Grievance Readdress Committee
  - e. Student Counseling Cell
  - f. SC/ST Cell
  - g. Universal Human Value Cell
- 5. Non Statutory Committee
  - a. Admission Committee
  - b. Examination Committee
  - c. Mentor Scheme Coordination Committee
  - d. NBA Core Committee
  - e. Placement & Training Committee
  - f. Research Committee
  - g. Industry Institute Interaction Committee
  - h. JJEM Editorial Committee
  - i. Purchase Committee
  - j. IT & Monitoring Committee
  - k. Delivery & Check Report Committee
  - I. CCTV Committee
  - m. Library Committee
  - n. Sports Committee.
  - o. Cultural Activity Committee
  - p. JNNCE News Letter Committee
  - q. Alumni Association

- r. Meritorious Award Committee
- s. AICTE /UGC/VTU/DTE Correspondence Committee
- t. NBA/NAAC/VTU visit coordination Committee
- **39th Meeting of Governing Council** of JNNCE was held on 8.6.2022 at 11.00 A.M in the Administrative Building and the agenda points along with the resolutions are published in the institution website

#### IQAC MEETINGS

IQAC meeting is scheduled periodically, with the Principal presiding over the meetings and all the Members taking part. During 2022, following are the details of IQAC meetings organized:

Meeting	Date	Main Agenda points
No.		
35	06.08.2021	Student Satisfaction Survey highlights, Project Impact Analysis of
		2020-21 (UG+PG), Performance Indicators, Placement and
		Training updates, Updates
36	01.09.2021	Preparation of NBA compliance report, Resubmission of SAR
		report of MBA department, Online submission of monthly IQAC
		report
37	20.12.2021	Student performance measure to be taken, Uniform policy to
		measure laboratory work, Measure to improve the standard of
		question papers, Improving research activities/ consultancy/
		industry institute interaction, Measure to increase the enrolment
		in MECH/CIVIL/EEE, Uniform policy for seminars/webinars/FDPs,
		NBA compliance report submission
38	25.05.2022	Result Analysis, Placement Analysis, Admission Analysis, NBA
		preparation for second visit
39	08.07.2022	Preparation of NBA compliance report, Resubmission of SAR
		report of MBA department, AQAR preparation
40	12.10.2022	Policy documents (Feedback format/ Remedial coaching/Statutory
		committees), API, Student Feedback Analysis, Result Analysis,
		Placement Analysis, Admission Analysis, NIRF and other updates
41	27.12.2022	Progress review of the year 2022, Academic improvement for first
		year, Placement Analysis, Accreditation process for MCA
		department, NIRF and other updates / NAAC Re-accreditation

IQAC coordinator convenes and moderates the meeting.

 Meeting notice & agenda were circulated in advance and Minutes of the Meetings are drawn and circulated among all Members and HoDs for their information and compliance with the resolutions;

- Review of previous meetings and action taken, updates on activities and developments are shared in the meetings;
- Various Quality initiatives topics were placed and discussed.
- Recommendations were circulated to the concerned stake holders and published in the institution website for necessary actions and follow up.

#### HODs MEETINGS

More than 45 scheduled and unscheduled meetings of HODs are conducted during the period, with the Principal presiding over the meetings and all the HODs taking part;

- Meeting notice & agenda were circulated in advance and Minutes of the Meetings are drawn and circulated among all HODs for their information and compliance with the resolutions;
- Updates on activities and developments are shared in the meetings;
- Both general and specific subjects pertaining to academics, administration, research & project funding, NAAC & NBA Accreditation, programmes & events, publications, departmental budgets, Training & placement, hostel, Campus infrastructure development & maintenance, examination & results, student & staff welfare measures, annual day functions, VIP Visits, VTU & JNNCE Academic Calendar, Staff Vacation, Circulars from VTU, AICTE, DTE & other regulatory bodies, LIC Visits, NES Management directives & decisions, etc are discussed/communicated in these meetings.

#### **STATUTARY COMMITTEE MEETINGS DETAILS**

SI.	Committee	Meeting	Main Agenda Points
No.		Date	
1.	Academic Monitoring Committee	06.12.2021	Calendar of events, Planning Department Academic audit
2.	Anti-ragging Committee	30.11.2021, 08.03.2022	Review of status, Formation of flying anti- ragging squad(Day time & Hostel visits flying night), Guidelines
3.	Anti-Sexual Harassment Committee	25.10.2021, 20.05.2022	Review of status, guidelines and reporting
4.	Grievance reddressal Committee	08.10.2021, 15.03.2022	Review of status, guidelines and reporting of the grievances addressed regarding infrastructure
5.	Student Counseling Cell	30.11.2021, 25.03.2022, 19.05.2022	Status review, Action taken report of the student counseling cases if any, future directions
6.	SC/ST Cell	23.09.2021, 01.12.2021, 26.04.2022	Status review, Action taken report of the student related issues, scholarships available, any other issues

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# 8. EDUCATION QUALITY

#### **❖** ADMISSION:

# 2021-22 Admission Details of 1st year B.E

## BE Final Admission details for the year 2021-22

SI.	Branch	Intake	CET	SNQ	PMSSS	CQ	MQ	Total	Vacancy
No.			Admitted			Admitted	Admitted	Admitted	
1.	Civil Engineering	126	48	6	1	1	11	67	59
2.	Mechanical Engineering	95	18	5	-	1	7	31	64
3.	Electronics & Communication Engineering	126	49	6	-	4	49	108	18
4.	Electronics & Telecommunication Engineering	63	30	3	-	0	21	54	9
5.	Electrical & Electronics Engineering	63	33	3	-	1	9	46	17
6.	Computer Science & Engineering	189	76	9	2	53	51	191	0
7.	Information Science & Engineering	126	53	6	-	20	47	126	0
8.	Artificial Intelligence & Machine Learning	63	27	3	-	15	18	63	0
	Total	851	334	41	03	95	213	686	167

Note: PMSSS-over and above admission

#### 2021-22 Admission Details of

# 1<sup>st</sup> year M.Tech, MBA & MCA

SI.	Branch	Total	GQ	MQ	Total	Vacancy
No.		Intake	Admitted	Admitted	Admitted	
1.	МВА	120	56	64	120	00
2.	MCA	60	30	30	60	00
3.	M.Tech-CSE	25	03	01	04	21
4.	M.Tech-CTM	18	08	00	08	10

- Inauguration of First Semester B.E. Programs (2021-22 Batch) was arranged on 5.1.2022. Sri Srinivas Ramanujam: Manager, TCS Ltd, delivered the keynote
- Institute Induction Program Cell (IIPC) organized **First year Induction Program** from 5.1.2022 to 23.1.2022 Some important sessions:
  - o College discipline, Rules and Procedures, VTU Regulations—Dr. B N Anandram
  - Stay focused for happy learningPatriotism Dr. H B Suresh
  - o Inspiration and motivational talk Mr. Sagar
  - o Road Safety & Precautions Dr. Fakruddin
  - o Yoga Mr. Anil Shettar and Team
  - Tree Plantation NSS Team
  - Health tips Dr. P. Narayan
  - o Skills for Personal grooming Dr Gayathri Bhat
  - o Post Covid Precautions Dr Shwetha Anirudda
  - o Stress Management & Human Values Dr. Vikrama & Ms. Roopa
  - o Internet Awareness and effects Dr Manish Kapmi
  - Self Confidence and Discipline
  - Literary Activities
  - o IPR
  - Alumni Interaction
  - Library Activity
  - o Cultural and Sports Activity
  - Time Management
  - Entrepreneurship
  - NSS Awareness
  - Anti-Ragging Awareness
- Inauguration & Orientation Program for PG Programs 2021-22 batch (M.Tech., MCA and MBA) was arranged on 14<sup>th</sup> Feb.2022. 200+ PG newly admitted students attended the program. Executive Committee members of National Education Society were the Guests of honor.
- Parents Meet: All the departments organized parents meet on during March 2022. Many parents attended the meet and interacted with the teachers. The teachers informed about the performance of the wards. The following were the overall opinion given the parents:
  - Positive Feedback about Teaching Learning Process
  - To arrange coaching classes for GATE, TOFEL
  - Some issues in Transportation Facility
  - To arrange more placement training
  - o To arrange training on Communication skills to rural students
  - To have common Class timings 9.00AM to 5.00PM

## Details of University Ranks Secured during 2020-21 [Announced in 2021-22]

Ms. PALLAVI P	B.E., Department of IS & E	I Rank
Mr. MADHUMURTHY B. S.	M.Tech., Transportation Engineering & Management	I Rank
Ms. MAMATHA G.	M.Tech., Power Electronics	I Rank

## Statement showing the statistics of Results pertaining to VII Sem UG in Jan 2022. Exams

Branch	Total Appeared	F.C.D.	F.C.	S.C.	Total Pass	% age
Civil	125	110	2	0	112	89.60
Mech.	113	97	0	0	97	85.84
E & E	65	51	0	0	51	78.46
E & C	121	110	0	0	110	90.91
TC & E	47	40	1	0	41	87.23
CS & E	140	122	14	0	136	97.14
IS&E	118	93	14	0	107	90.68
Total	729	623	31	0	654	90

## Statement showing the statistics of Results pertaining to VIII Sem UG in July/Aug. Exams

Branch	Total Appeared	F.C.D.	F.C.	S.C.	Total Pass	% age
Civil	134	80	51	0	131	97.76
Mech.,	114	100	10	0	110	97.35
E & E	65	49	11	0	60	92.31
E & C	133	100	30	0	130	97.74
TC & E	49	49	0	0	49	100.00
CS & E	144	125	17	0	142	98.61
IS&E	126	101	22	0	123	97.62
Total	765	604	141	0	745	97.39

# Statement showing the statistics of Results pertaining to Statement showing the statistics of Results pertaining to PG. I to V Sem Jan'2022 Exam

P.G. Course	Semester	Total Appeared	F.C.D.	F.C.	S.C.	Total Pass	% age
MBA	I Sem	120	83	22	0	105	88
IVIDA	III Sem	119	74	41	0	115	97
	I Sem	60	43	9	0	52	87
MCA	III Sem	45	40	1	0	41	91
	V Sem	28	26	0	0	26	93
M.Tech.,	I Sem	4	4	0	0	4	100
(CS&E)	III Sem	8	8	0	0	8	100
M.Tech.,	I Sem	8	8	0	0	8	100
(CTM)	III Sem	13	13	0	0	13	100

## Statement showing the statistics of Results pertaining to PG. II to VI Sem Aug'2022 Exam

P.G. Course	Semester	Total Appeared	F.C.D.	F.C.	S.C.	Total Pass	% age
NADA	II Sem	120	58	54	0	112	93
MBA	IV Sem	119	60	57	0	117	98.32
	II Sem	60	35	19	0	54	90
MCA	IV Sem	45	30	13	0	43	96
	VI Sem	28	28	0	0	28	100
M.Tech	II Sem	4	4	0	0	4	100
(CS&E)	IV Sem	8	8	0	0	8	100
M.Tech	II Sem	8	8	0	0	8	100
(CTM)	IV Sem	13	13	0	0	13	100

#### **\*** EDUCATION

#### **Steps** taken for quality improvement in Education:

- 1. In order to encourage academic excellence, scholarships at college level are offered to students by NES Management.
- 2. Mentor Scheme: For every 20 students a teacher will oversee the academic performance and send reports to parents regarding test / exam / attendance performance.
- 3. Additional books are provided to the class toppers at the library on recommendation from respective Department HOD.
- 4. Book bank scheme is successfully implemented in Library.
- 5. Academically weak students are identified and special tutorial classes are conducted.
- 6. JNNCE has been identified as Remote centre of IIT, Bombay / IIT Khargpur for a conduction of Faculty Development Programme for Engineering College / Polytechnic Faculty
- 7. JNNCE has been identified as a Nodal centre for the project E-Yantra A Robot based Project initiated by IIT, Bombay.
- 8. DST-SERB NewGen IEDC provides financial assistance for the innovative projects carried out by students upto 2.5 Lakhs
- 9. JNNCE Entrepreneurship Development Cell has been established to motivate students for self employment and Entrepreneurship Development.
- Remedial Classes: In order to help out the detained first year and second year students to clear the failed subjects, remedial classes were arranged.
- Calendar of Events of Even Semester was finalized by Academic Monitoring Committee and circulated to all departments.

# Short term Training programmes, Seminars & Workshops conducted during 2021-22 Faculty Development Programmes:

- 1. One week FDP on "Computing constructs for modeling biology" organized by ISE Dept, sponsored by AICTE-ATAL 3.10.2021 to 7.10.2021
- 2. One Week STTP on "Artificial Intelligence & Machine Learning" was organized by Department of Computer Science & Engineering from 27th September to 2nd October. 2021

#### **❖ LEARNING & DEVELOPMENT**

#### **Student Enrichment Programmes:**

- 1. Department of Electrical & Electronics Engineering organized Expert talk on "Introduction to Python" for 5th sem EE students on 15th June 2022.
- 2. Two days of SDP program was organized by Computer Science Department on Hybrid App Development with Flutter held in June 2022.
- 3. Two days of program Avishkaar-2022, a State Level Technical Symposium was organized by Computer Science Department during May 2022

- 4. Department of Electrical & Electronics Engineering organized One Day Robo Event "Blazin Wheels" on 14th May 2022.
- 5. The Department of Electronics and Communication Engineering, JNNCE in association with JNNCE IEI conducted two-days National Level Technical Symposium "PLASMA-22" on 30 th May and 31 st May 2022.
- 6. The department of Electronics and Communication Engineering conducted an SDP entitled "Effective document writing using Latex (With Hands-on training)" on 11/04/2022.
- 7. Mr. Raghuram, Senior developer, Dia systems Mangalore delivered a talk on "Placement and interview preparation guidance" for 6th Semester ETE students on 9.4.2022
- 8. Mr. Koushik R Udupa, Chief Technical officer, Ekatva innovations, Shivamogga, delivered a talk on "Entrepreneurship" on 9.3.2022 to ETE students
- 9. Department of Management Studies organized Special Student Development Workshop on the theme "Awaken the Super Hero in You" on 29-30 March 2022.
- 10. An invited talk by Mr. Sidde Gowda H M, Circle Inspector, Police Department, Shivamogga on "Road Safety and Traffic Rules" organized by Department of Civil Engineering on 03/02/2022
- 11. SDP program on "ANVESHANA Technical Fest 2K22" was organized by Computer Science Department during Jan 2022.
- 12. Department of Information Science & Engineering organized Student Development Program on "Document preparation using LaTex" during 10-01-2022 to 11-01-2022
- 13. Mysterio 2.0 is a two-day event conducted by the Department of Electronics and Communication Engineering, JNNCE from 31/12/2021 to 01/01/2022
- 14. The National level technical event SIGMA was organized by Department of Electronics and Telecommunication Engineering on 3rd and 4th of December 2021
- 15. Partial Delivery of the course Municipal Wastewater Engineering was handled by Miss Anusree, PMRF Scholar, IISc Bengaluru on "Wastewater Characteristics and Sampling" by Department of Civil Engineering during 18.11.2021 to 23.12.2021
- 16. Department of Information Science & Engineering organized Workshop on "Current IT industry requirements" on 15-11-2021
- 17. Department of Management Studies organized Hands-on Training on "Digital Marketing" in Sun Rise Digital for Marketing Students on 16th September 2021 to 27th October 2021.
- 18. Department of Management Studies organized Student Development Programme on "Finance Technical Skills" for finance students on 11-13 October 2021 and 22-23 October 2021.
- 19. The department of Electronics and Communication Engineering organized "One Week Bridge Course / Orientation Program for 3rd sem ECE Students" from 07/10/2021 to 13/10/2021.
- 20. Department of ECE & ETE organized Technical Skill development program from 27.092021 to 09.10.2021

- 21. Two Week SDP on C programming Skills, Arudino Uno, Node MCU organized by the Department of Electronics and Communication Engineering, JNNCE from 27/09/2021 to 09/10/2021
- 22. Department of Management Studies organized Alumni Speaks-Special Guest Lecture Series on "Keeping Self Motivated" on 24th September 2021 and 29th September 2021.
- 23. The department of Electronics and Communication Engineering conducted an SDP entitled "Advanced VLSI Design using cadence EDA Tool" from 21/09/2021 to 22/09/2021.
- 24. Department of Information Science & Engineering organized Student Development Program on "C Programming Skills" during 20-09-2021 to 21-09-2021
- 25. An invited talk by Dr. Rahul Patil, Associate Professor & HoD, Jain Institute of Technology, Davangere on "Application of Engineering Geology in Civil Engineering Practices - A Practical approach" was organized by Department of Civil Engineering on 17.9.2021
- 26. Department of Information Science & Engineering organized Student Development Program on "Campus network Maintenance" on 25-08-2021
- 27. Mini Project Competition was conducted by the department of Electronics and Communication Engineering on 21/08/2021
- 28. Three days online SDP on "Quantitative aptitude and e-quiz" was organized by the Department of Mathematics, JNNCE, from 18th to 21st August 2021.
- Department of Information Science & Engineering organized Student Development Program on "Application development using ARM and ATmega Microcontrollers" on 06-08-2021
- 30. Project Exhibition for Final year Students was conducted by the department of Electronics and Communication Engineering on 04/08/2021

#### Webinars Organized

Importance of Geotechnical Investigation for Civil Engineering	Dr. H N Ramesh, Principal, UVCE, Bangalore	Civil Engg	25.06.2022
Constructions and Earthquake Effects	over, builguloic	L1166	
Block Chain Technology in Health Care Sector	Mr. Deepak S N	ISE	29.04.2022
"Computer Networks: Routing and Switching	Mr. Guru Prasad K N	ISE	07.01.2022
Optimal placement of Relay stations in Wi-Max networks	Dr. J. Sangeetha	ISE	14.12.2021
Higher Education in Abroad	Ms Bhagyashree Kasal	ISE	17.07.2021
Data Analytics & its Applications	Mr. Sandeep Kumar E, Robert Bosch Engineering and Business Solutions Bengaluru.	ECE	17.07.2021

Blockchain: A new Technology of Trust Powered by Cryptography	Dr. G K Patra, CSIR-4PI, Bangalore	ECE	26.06.2021
Awareness Programme on NPTEL Courses	Dr.Smriti Sharma Bhatia, Professor, University of Delhi	Basic Sciences Depart ment	14.09.2021
"STAAD Pro Connect Edition -Design and Analysis Context Worlds Infrastructure"	Mr. K. Subash, Techapps Consultancy, Chennai	Civil Engg	08.09.2021

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#### 9. INFRASTRUCTURE DEVELOPMENT

■ The total expenditure during the year 2021-22 incurred towards construction of building, purchase of new equipments, furniture, fixtures and maintenance etc. is Rs.628.88 Lakhs as detailed below:

Item of expenditure	Amount (INR in Lakhs)
Building	0.92
Computer / Peripherals	4.43
Furniture	1.97
Lab Equipments	5.75
Land	390.01
Library Books	4.87
Fire Safety Equipment	15.07
UPS & Batteries	5.04
CCTV/others	9.89
Maintenance	190.92
Total	628.88

#### IT Infrastructure:

- o 155 computers are added and as on this year the institution has 1024 computers
- o Campus wide networking facility available with broad band internet facility.
- o The total amount spent for IT infrastructure and other peripherals is Rs.10.28 Lakhs
- Some of the Labs are shifted to Library Building. As a result of this, additional class rooms were made available in SJB & STEP Block.

#### Library Details for the year 2021-22

SI. No.	Branch	No. of Titles	No. of Copies	Amount
1.	Electronic & Communication Engineering	5	102	94,440.00
2.	Master of Computer Application	6	56	50,234.00
3.	Computer Science Engineering	1	10	7,250.00
4.	Information Science Engineering	3	200	1,46,800.00
5.	Mechanical Engineering	8	66	37,176.00
6.	B E Civil Engineering	8	57	46,745.00
7.	Electrical & Electronics Engineering	1	2	2,100.00
8.	Human Resource Management	1	2	850.00
9.	Electronics & Telecommunication Engineering	1	10	6,990.00
10.	English Language	1	60	21,000.00
11.	General	17	17	18,588.00
12.	M.Tech Computer Science Engineering	2	10	7,750.00
13.	Mathematics	1	25	5,750.00
	Total	55	617	4,45,673.00

**Journals & Periodicals** 

Sl. No.	Journals	No. Of Journals	Amount				
1.	National Journals	14	35,000.00				
2.	International Journals						
	Total	14	35,000.00				

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#### 10. RESEARCH, INNOVATION, CONSULTANCY & ENTREPRENEURSHIP

#### National and International Conferences

- National Workshop on Cryptology-NWC2021 was organized by Department of Electronics and Communication Engineering in association with Cryptology Research of India, Kolkata during 18-20 November 2021
- National Conference on "Recent Advances in Mathematical Science and Technology (NCRAIMST - 2021)", by the Department of Mathematics, JNNCE, held on 8th to 9th October 2021.

#### ■ JNNCE Journal of Engineering & Management: JJEM -

- 11th issue (Jan June 2022) comprises of 18 research papers including papers from outside state and country
- 10thissue (July-Dec. 2021) comprises of 10 research papers including papers from outside state and country

#### Center for Innovation & Entrepreneurship, JNNCE:

- Conducted IP Cell Launch & IPR Workshop/FDP in association with Patent Information Centre, KSCST, Govt. of Karnataka during 03-06-2022 to 04-06-2022
- World Entrepreneur's Day-2021 was celebrated on 24-08-2021
- JNNCE NewGen IEDC in the campus has sanctioned Rs. 35,03,547/- amount 14 projects.

#### Consultancy Details

Department	Revenue (in Rs. Lakhs) generated
	2021-22
Civil Engg.	13.72
Mechanical Engg.	5.07
Electrical & Electronics Engg.	-
Electronics & communication Engineering	0.70
Chemistry	0.34
Information Science	-
Computer Science	11.0

## Research Centre Details

SI. No.	Programme		No. of Guides	No. of Scholars Pursuing PhD/MSc	No. of Scholars Completed Phd/MSc
1.	Civil Engineering	2002	04	14	14/01
2.	Mechanical Engineering		09	10	09/02
3.	Electrical and Electronics Engg.,		03	02	01/01
4.	Electronics and Communication Engineering		04	14	07/01
5.	Computer Science and Engg.,		08	26/01	14/02
6.	MBA	2006	07	17	02
7.	Chemistry	2012	02	03	04
8.	Physics	2016	02	02	02
9.	Mathematics	2017	03	03	01
	Total	-	42	91/01	54/07

## 11. FUNDING, GRANTS & SPONSORSHIP

## **❖** PROJECT FUNDING

Project Title	Investigators	Amount	Agency
Electric Mobility vehicle for campus mobility	Dr. Amith Kumar S J	2.50	NewGen IEDC
Design and fabrication of automated system for controlled plant growth	Dr. E Basavaraj	0.25	CART
Development of farm machine for small and marginal farmers	Dr. E Basavaraj	0.15	CART
Smart Milk Vending Machine Using IOT	Dr. Shetty Pamod Kumar	0.05	VTU
MSW management strategy for waste minimization and vehicle routing using Web-interface	Dr. Sughosh P, & Mr. Dattareya S B,	2.50	NewGen IEDC
Development of Geopolymeric Syntactic Foam Embedded with Hollow Microbaloons as an Alternative to Portland Cement to Minimize Global Warming	Dr.Amith Kumar S J Ravikumar B N	8.00	VTU
Integrated smart pole	Dr.Ashwini S R	0.06	KSCST
JNN Spraying Machine For Arecanut And Black Pepper	Dr.Hemanth Kumar	0.35	KSTA
Development of Solar Heat Exchanger using solar water heater for cooking purpose	Dr.Ravi Kumar B N	2.50	NewGen IEDC
To study and characterization and performance analysis of different UCO with solvent blends as fuel source in IC Engines	Dr.Ravi Kumar B N	0.12	KSCST
Automation of areca nut boiling and drying processes using embedded system	Dr.Sabeel Ahmed K	0.07	KSCST
Multipurpose Agriculture Robot	Dr.Satyaprema	0.15	CART
Generation Of Motive Power In Electric Vehicle	Dr.Thejaswi A H and Dr.Veeresha K B	0.07	KSCST
Laboratory Study of Terrazyme Stabilized Soil for Pavements	Mr Arun V, Mrs Bindya K, & Mr Sreenivasa V	2.50	Avijeet Agencies (P) Ltd. Chennai
Laboratory Investigation on Composite Pavement	Mr. Anirudh N. and Mr. Arun V.	2.50	NewGen IEDC
Development of a cold bituminous mix for roads	Mr. Arun V and Mr. Anirudh N.	2.50	NewGen IEDC

Project Title	Investigators	Amount	Agency
Computing Constructs for Modelling Biology	Mr. Girish Mantha	0.93	AICTE
Intelligent Areca Drier	Mr. Jayavardhana Acharya N	2.50	NewGen IEDC
Green energy e-vehicle charging station	Mr. V K Deepankar, Mr. C G Chetan	2.50	NewGen IEDC
Thermal Analysis Of Waste Cooking Oil Extracted From Different Edible Oil Seeds	Mr.Abdul Saleem S	0.08	KSCST
To study characterization and performance analysis of different Used Cooking Oil (UCO) with solvent blends as fuel source in IC Engines.	Mr.Chethan S G	0.12	KSCST
A web based information system for the management of ICU beds during the COVID-19 outbreak	Mr.Madhukar C S	0.05	KSCST
Automatic Door Opening System With Covid- 19 Safety Measures	Mr.Sayed Aftab Ahamed	0.06	KSCST
EV Charging System through Mini vertical wind mills for smart city	Mr.Vidyashankar M	0.07	KSCST
Medical image security through feature based watermarking	Ms.Ayesha Siddiqa	0.06	KSCST
Real Time Fire Detection Using AI and ML	Ms.Rashmi R	0.06	KSCST
Crossbreeding of plant using IoT and Machine Learning	Ms.Samara Mubeen	2.50	NewGen IEDC
Two Way Charge-Discharge Cycling Based Dual-Motor Electric Vehicle	Padmashree H R	0.07	KSCST
IoT and Web Based Electrical Energy Monitoring System	Pradeep H K	2.50	NewGen IEDC
AI Trainer for Activity detection through HPE and HPC by deep learning networks	Prema K N	0.05	KSCST
Smart Irrigation Controller	Prema K N	2.50	NewGen IEDC
Automatic Packing Control Machine	Roopa B S	0.08	KSCST
Hand gesture to Speech and Text Conversion System	Smitha S M	0.65	KSCST
IOT Based Smart Ventilator	Supritha M R	0.07	KSCST

## 12. INDUSTRY COLLABORATION

#### ❖ MoUs:

- 1. Ekathva Innovations, Shivamogga
- 2. Tequed Labs, Bangalore.
- 3. National Highways Authority of India (NHAI)
- 4. Technology Informatics Design Endeavour(TIDE), Bangalore

These MoUs would offers internships, technical assistance for projects and eventually employment to our students.

## **13. PLACEMENT**

SL No	Companies Name	TOTAL SELECTED	MCA	CSE	ISE	ECE	TCE	EEE	MECH	CIVIL
1	TCS DIGITAL	2			2					
2	TCS NINJA	1			1					
3	WIPRO	45		20	14	7	1	1	2	
4	Robosoft Technologies	11		2	3	4	2			
5	Texas Instruments India(Intern)	2				2				
6	tietoEvry India	11		4	3	3	1			
7	TECHNOLOGICS	3		1		1			1	
8	Tech Mahindra	13		3	4	4	2			
9	CSG System	0								
10	TCS	83	5	34	22	13	5	1	3	
11	Tata Elxsi	0								
12	BETSOL	1		1						
13	BETSOL	3		2	1					
14	SLK Software	31		3	7	10	3	3	5	
15	Birla Soft	1		1						
16	Zensar	20		6	4	8		2		
17	KPIT	3				2		1		
18	CrimsonLogic	9		5	2	2				
19	IBM	2		1	1					
20	Virtusa	1		1						
21	Revature	9		2	3	4				
22	HCL	4		1		3				
23	ETON Solutions	10		5		3		2		
24	QuEST Global	12			5	3	2	2		
25	Coditas Technologies	1			1					
26	Persistent Systems	2		1	1					
27	Infogain	6		4	2					
28	Edelweiss General Insurance	6		4	1	1				
29	MResult	1			1					
30	Societe Generale GSC Pvt. Ltd	5			3	1	1			
31	Prolifics Corporation	1		1						

SL No	Companies Name	TOTAL	MCA	CSE	ISE	ECE	TCE	EEE	MECH	CIVIL
32	Worksbot	SELECTED	13	7	3	7	3	7	10	
	Vodafone Intelligent	58	13	/				/	18	
34	Solutions	11			4	5	2			
35	Capgemini	45	3	11	6	13	3	2	7	
36	Hexaware Technologies	2	1					1		
37	TuringMinds.ai	10	1	3	1	1		3		1
38	Innominds	1		1						
39	Birla Soft	2		1		1				
40	Aloha Technology	2		2						
41	Avin System	9		4	1	1	1	2		
42	Wipro	34		7	5	10	1	3	8	
43	Infosys	32	2	7	6	6	2	2	7	
44	Infosys(SP)	2			1	1				
45	Raja Software	1		1						
46	Infinite Computer Solutions	10		3	1	2	3	1		
47	Qualitest Group	9	4	3		2				
48	Mindteck India Ltd	3		3						
49	Pentagon Space Pvt Ltd	6			1	1	1	2	1	
50	TVS Supply Chain Solutions	2							2	
51	NTT Data(Digital)	4		1	3					
52	NTT Data	3				1		2		
53	Skuad	1		1						
54	Legato Health Technologies	2		1	1					
55	Daimler Truck Innovation Center India	5		3	2					
56	Qspiders	24	1	1	1	3	1	4	11	2
57	SecPod Technologies	1		1						
58	ETHNUS	12	6	2	1		1	2		
59	Brigosha Technologies	10		2		4	1	3		
60	Tessolve Semiconductor	1				1				
61	First American	7		6		1				
62	Danlaw	1		1						
63	Microland Ltd	3		1	1			1		
64	UiPath	1				1				
65	Accord Soft	5		2	3					
66	KodNest	8	3	1	1	1		1	1	

SL No	Companies Name	TOTAL SELECTED	MCA	CSE	ISE	ECE	TCE	EEE	MECH	CIVIL
67	Pentagon Space Pvt Ltd	5	5							
68	Thales India	2		1		1				
69	Tantragyaan Solutions	3		1				2		
70	Federal Bank	1							1	
71	EverestIMS Technologies	2		1	1					
72	Solifi Software	1				1				
73	Cadence Design Systems	2				2				
74	Synopsys	3				3				
75	Robosoft Technologies	1						1		
76	Verzeo	43		4	6	10	4	8	3	8
77	Wells Fargo	1		1						
78	Yokogawa	1				1				
79	Suprajit Engineering	3				1	1	1		
	Total		44	186	130	152	41	60	70	11

#### 14. SPORTS, CULTURAL ACTIVITIES & CAMPUS LIVING

#### Programs organized at the Institution level

- 1. JNNCE-Tech Anveshan -2022: Innovative Project Exhibition was organized on 27.5.2022 & 28.5.2022. Sri. N. Gopinath, President, Shimoga District Chamber of Commerce inaugurated the program.
- 2. JNNCE Global Alumni Meet was organized on 21.5.2022 and Sri. K Govardhan Reddy, MLA, Sarvepally Constituency, AP, Distinguished Alumni, Civil Department was the Chief Guest.
- 3. International Women's Day was celebrated on 15.3.2022. Dr. Uma H M, Senior Medical Officer, Urban Health Centre, Bommanakatte, Shivamogga was the Chief Guest.
- 4. First Invited talk of Invited Lecture Series in view of Diamond Jubilee Celebration of National Education Society was hosted at JNNCE campus on 12.3.2022. Dr. Kailasavadivoo Sivan, Former chairman, ISRO, Bangalore delivered talk on the topic: Impact of space technology in day to day life.

#### **❖** SPORTS

## Achievements in sports: 2021-22

#### A. Team Achievements

SI. No.	Month & Year	Event / Games	Held at	Place secured
1.	November 2021 VTU Central Karnataka zone		JNNCE,	Runners
	November 2021	Badminton Men tournament	Shivamogga	Ramicis
2.	November 2021	VTU Central Karnataka zone	JNNCE,	Runners
۷.	November 2021	Badminton Women tournament	Shivamogga	Ruilleis
3.	November 2021	VTU Central Karnataka zone Table	SIT, Tumkur	Dunners
5.	November 2021	tennis Men tournament	SII, TUITIKUI	Runners
4	Doggraph on 2021	VTU Central Karnataka zone		Third
4.	December 2021	Football Men tournament	BIET, Davanagere	Place
5.	Docombor 2021	VTU Central Karnataka zone	JNNCE,	Third
5.	December 2021	Hockey Men tournament	Shivamogga	Place
6.	January 2022	VTU Central Karnataka zone	VIT Tintur	Third
0.	January 2022	Throwball Women tournament	KIT, Tiptur	Place
7.	January 2022	VTU Central Karnataka zone	CIT, Gubbi	Winners
/.	January 2022	Cricket Men tournament	CH, Gubbi	williers
0	January 2022	VTU Central Karnataka zone	AIT,	Third
٥.	8. January 2022 Handball Men tournam		Chikkamagaluru	place
0	January 2022	VTU Rest of Bangalore zone Chess	SJMIT,	Eth place
9.	January 2022	women tournament	Chitradurga	5 <sup>th</sup> place

#### **B.** Individual achievements:

SI. No.	Name of the student	Event / Games	Held at	Place secured
1.	Hithesh S 7 <sup>th</sup> sem MECH	11 <sup>th</sup> Kudo National championship	Green Hills College of Engineering, Gandhi Gram , Himachala pradesh	1 Silver
2.	Mohammed Ibrahim 4 <sup>th</sup> sem MTECH	11 <sup>th</sup> Kudo National championship	Green Hills College of Engineering, Gandhi Gram , Himachala pradesh	1 Bronze
3.	Vinodraj M U 7 <sup>th</sup> sem MECH	VTU Single zone Wrestling competition	KLSVDIT, Halliyal	1 Bronze
4.	Yashwanth K R 5 <sup>th</sup> sem MECH	VTU Single zone Judo competition	KLSVDIT, Halliyal	1 Bronze

## C. Inter University achievements

SI. No.	Name of the student	Event / Games	Held at
1	Raghuveer S  3 <sup>rd</sup> sem MBA	South zone Inter university Kabaddi Men tournament 2021- 22	Bharathidasan University, South zone Inter university Kabaddi Men tournament 2021-22

## **Achievements in Cultural Competitions**

JNNCE Cultural Team -EKYAM of 37 Students represented 21<sup>st</sup> VTU Fest-2022 held at BMSCE, Bangalore during 29-31, July 2022

Events	Prize Secured
Music–Solo Percussion	III
Photography	II

#### **15. NES AND SOCIETY**

#### Institution Social Responsibility - ISR Activities & Outreach Programs

- Three days online for MCA aspirants on Cracking PGCET Exam was conducted by Department of MCA from 8<sup>th</sup>November 2022 to 10<sup>th</sup>November 2022
- 2. Department of Management Studies JNNCE, Shimoga has organized A One Day State Level Management and Cultural Fest "Utthana-2022" on July 13, 2022.
- 3. Department of Management Studies, JNNCE had organized one day "Malenadu Mela" on 29/06/2022.
- 4. The department of Electronics and Communication Engineering conducted "Training program for government high school students, Kommanal" under IEEE Government School Adoption Program on 25/06/2022.
- 5. "International Yoga Day"-2022 was celebrated on 20/06/2022 and 21/06/2022
- 6. School Bell activity Renovation of Government School at Chennamambapura. Shivamogga in association with Yuvaka Sanga and Rotary club Midtown Bengaluru was organized on 27/05/2022 and 28/05/2022
- 7. One day special camp at Government School, Basavanaganguru, Shivamogga in view of Historical Monument Cleaning in association with department of Archaeology, museums and Heritage at Basavanaganguru was organized on 12.3.2022
- 8. Biofuel awareness & Demonstration for the Gram Panchayat women SIG Group association with Chyathanaya Rural Development Society® was organized on 17.2.2022
- 9. JNNCE NSS Units organized Mega Blood Donation and Health Check-up camp on 12.1.2022
- 10. 5th semester students of ETE department visited "Taranga Higher Primary School" for deaf children on 20<sup>th</sup> December 2021 and conducted few activities namely Art and Drawing, brain development games and sports
- 11. Three days online for MCA aspirants on Cracking PGCET Exam was conducted by Department of MCA from 29<sup>th</sup> October 2021 to 30<sup>th</sup> October 2021
- 12. The department of Civil Engineering in association with Ultra Tech Cements Pvt. Ltd organized an outreach program on "Applicator's Training Programme on Water Proofing for Civil Contractors" on 8.10.2021
- 13. Department of Management Studies JNNCE, Shimoga has organized One Day State Level Management and Cultural Fest "Utthana-2021" on September 6, 2021.
- 14. "Sadhbhavan Divas" was observed by JNNCE NSS units on 20.8.2021









# Highest Placement Package

**Texas Instruments-19.6 LPA** 



Vidyashree R, ECE Dept.

## Daimler Truck Innovation Center India-10 LPA



Kayana M Gowda, CSE Dept.



Shumbhavi MS, CSE Dept.



Jeevan, ISE Dept.



Robul N. CSE Dept.



Shishira S Jois, ISE Dept.

## Infosys Ltd.-9.5 LPA

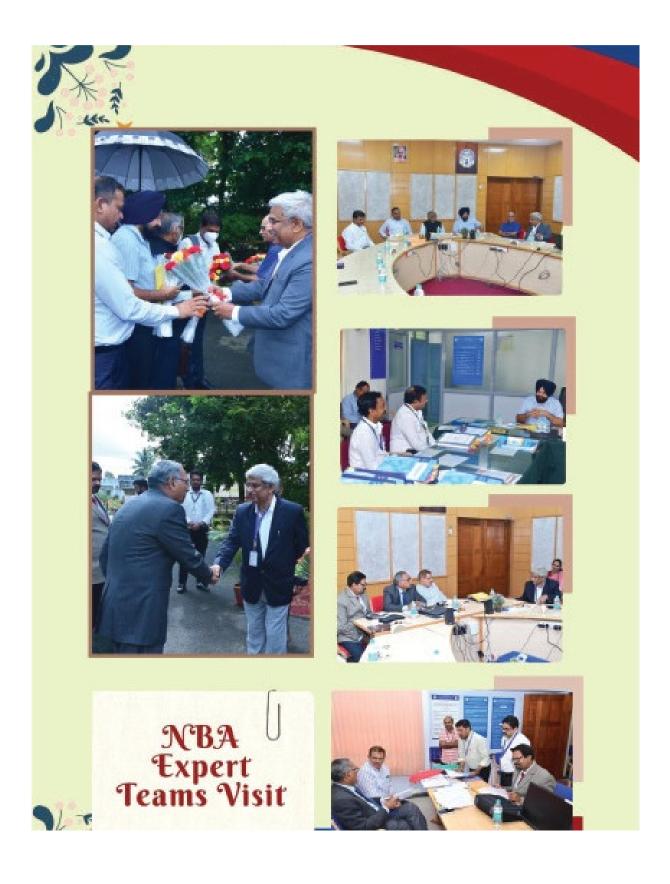


Subramanya K.S. ISE Dept.



Promod R, ECE Dept.









## MPCIT-2020 Inauguration

Applicator's
Training
Programme on
Water Proofing
for
Civil Contractors





Work Shop on Road Safety and Traffic Rules









## 5 Day AICTE-ATAL FDP on Computing Constructs for Modelling Biology



National Conference on Recent Advances in Mathematical Science and Technology







One Week STTP on Artificial Intelligence & Machine Learning



Avishkaar-2022





International Women's Day





## POWERTRON Valedictory Programme

Blazin Wheels 3





ISE - Insight Inauguration





## Institutional Social Responsibility

# Chirantana Activities





## Institutional Social Responsibility



# **NSS Activities**













VTU Youth Festival-2022















Janvey 2022





## **NATIONAL EDUCATION SOCIETY (R)**



# JAWAHARLAL NEHRU NEW COLLEGE OF ENGINEERING



Shivamogga, Karnataka

F







## **LIBRARY & INFORMATION CENTRE**







## HOSTELS











## **ANNUAL REPORT 2021-22**

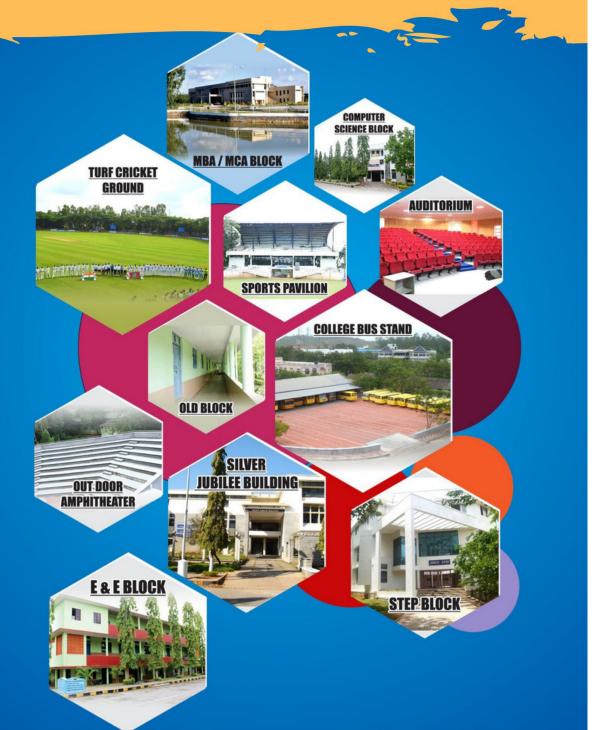


## **NATIONAL EDUCATION SOCIETY (R)**

# JAWAHARLAL NEHRU NEW COLLEGE OF ENGINEERING



Shivamogga, Karnataka



**ANNUAL REPORT 2021-22**