Contents

1.0   Library Collections (as on 31 May 2023)

Library Collections		Titles	Volumes
Book		25074	62621
Reference Books		1018	1091
Book Bank Books		718	3319
Student's Projects (Since 2004)			5725
Back Volumes (Since 1993)			3476
Book's & Periodical's CDs			3372
NPTEL Videos			24 TB
Dailies			19
Periodicals			
National Journals			72
International Online Journals			538
Technical Magazines			38
E-Resources			
E – Journals	Science Direct (Elsevier)		376
	IEEE (ASPP)		162
E – Books	EBSCO Engineering Core Collections		6567
Institutional Membership			
DELNET (Developing Library Network)			
NDLI Club (National Digital Library of India Club)			
N-List (National Library & Information Services Infrastructure for Scholarly Content)			
e-Shodh Sindhu Consortia			
Online Self-Learning Courses			
SWAYAM – NPTEL, IITM, Chennai			
FOSS Courses, Spoken Tutorial, IIT Bombay			
Coursera			
Question Bank (Since 2002 – Anna University & Since 2011 – Autonomous)			

2.0   Utility Report (June 2022 to May 2023):

- 58,501 students [including UG & PG Students and Research Scholars] visited our Central Library. [4,875 per month, 222 per day]

- 285 staff members [including Faculty members and Non-teaching Staff members] visited our Central Library. [24 per month, 1 per day]

- 18,856 transactions (issue & return) of books are made during the period of June 2022 to May 2023. [1,571 per month, 71 per day]

- 25,921 pages of required documents have been photocopied and printed by the students and faculty members.

- 6,062 library books and journals were searched by our students and faculty members through WebOPAC (Web Online Public Access Catalogue).

- A total of 2, 23, 013 IEEE (ASPP) online journal articles were searched, accessed & downloaded. [18,584 per month, 845 per day]

- A total of 4, 00, 447 Elsevier (Science Direct) online journal articles were searched, accessed & downloaded. [33,371 per month, 1,517 per day]

- The A.V. Hall of Central Library has been utilized by 1097 students and faculty members.

- A total of 8,040 students made use of the e-Library services provided by the Central Library.

- The Central Library Readers Park has the successful organization of 16 national-level seminars, workshops, and events.

2.1   Operational and Financial Activities (June 2022 to May 2023):

- The acquisition processes for 420 new books were completed and added to the Central Library Collection (Acc. No. 62202 to 62621 and an amount of ₹ 2, 49, 786/-).

- Nearly 110 periodicals are renewed and have completed the acquisition processes (An amount of ₹ 3, 84, 868/-.)

- The Central Library has renewed the online journals such as Science Direct (Elsevier) - Engineering & Computer Science and IEEE (ASPP) core collection of Engineering, Electronics, and Computer Science journals (An amount of ₹ 14, 54, 568/-)

- The Central Library has renewed the EBSCO Engineering core collections of e-Books (An amount of ₹ 83,806/-), the Institutional memberships of DELNET (₹ 13,570/-), NDLI Club, e-Shodh Sindhu, and N-LIST (₹ 5,900/-).

- Nearly 300 books, which had damaged books or missing bar codes, have been updated with new ones, and the process of pasting spine labels on these books has been successfully completed.

- Printed 6th issue of Central Library Bulletin.

- The NEC Central Library Readers Park organized a various activities, including seminars, expert talks, discussions and competitions etc. These initiatives were aimed at promoting reading habits and encouraging the better utilization of library resources.

- IIT Bombay, Spoken Tutorial, FOSS course training fee has been paid for an amount of ₹ 25,000/-

- NPTEL registration fee of ₹ 49,000/- for 14 faculty members and 35 Students have been reimbursed by college in appreciation of gold tag (>=90%) certificate holders / toppers (both faculty and students) of SWAYAM-NPTEL online certification course(s) held during January - December 2022 and January - June 2023 sessions.

- Amount of ₹ 91, 892/- has been spent for miscellaneous expenses towards library bulletin printing, newspaper subscription and other required items purchased etc.

- A total amount of ₹ 23, 58, 390/- has been spent in the Central Library for the academic year 2022 - 2023.

2.2   Utility Statistics - Section wise (June 2022 to May 2023):

	Library Visits		Transactions		Searches & Downloads		Web OPAC	e-Library	Xerox	Periodicals	Laptop	A.V.Hall
	Students	Staff	Issue	Return	IEEE	Science Direct						
Jun-22	3504	12	699	739	13187	18479	206	121	818	180	106	29
Jul-22	2205	10	605	854	8540	22331	286	29	122	103	35	131
Aug-22	4307	27	1419	741	27487	42591	1989	101	199	232	294	110
Sep-22	5483	4	715	667	44792	62803	3	133	1529	243	857	110
Oct-22	5238	18	650	642	11599	34331	94	107	3694	133	581	125
Nov-22	8082	51	451	491	24867	68420	499	54	3437	153	658	110
Dec-22	4261	22	388	838	8815	22130	813	183	1374	265	263	0
Jan-23	5633	34	1162	949	18309	31798	806	232	1940	354	424	85
Feb-23	5293	27	903	982	21366	33257	259	280	4034	369	528	2
Mar-23	5147	28	900	943	22211	33368	359	293	1041	250	634	225
Apr-23	5910	25	800	856	12234	18493	239	258	4231	324	727	98
May-23	3438	27	624	838	9606	12446	509	187	3434	169	269	72
Total	**58501**	**285**	**9316**	**9540**	**223013**	**400447**	**6062**	**1978**	**25853**	**2775**	**5376**	**1097**
Average P/M	4875	24	776	795	18584	33371	505	165	2154	231	448	91
Average P/D	222	1	35	36	845	1517	23	7	98	11	20	4

3. Self-Learning & Extension Services:

Even the brightest and most outstanding students may find self-learning to be challenging. Successful independent study requires students to develop various essential skills and abilities to enhance their learning experience.

3.1 Central Library Readers Park

Reading is a creative, mind-expanding, adventurous and exciting activity. Through reading, we can experience what it is like to be somebody else in a different age, culture, in another part of the world, at another time in history. Readers embark on a journey every time they open a book.

All the students from our college who are determined to enhance their reading skills, which factually run with the latest current affairs and are interested in having interdisciplinary knowledge on various aspects are encouraged to enroll in Readers Park. The members of the Readers Park will meet once a week / month, online or offline with presentations / discussions based on the trends of different topics.

Review Meetings

Central Library Readers Park 8th Annual Executive Committee Members meeting for Academic Year 2022 – 2023 was held at Central Library on 01st September 2022.

- ✓ Tentative schedule was prepared for conducting upcoming events and various activities, both technical and non-technical.
- ✓ The Executive Committee Members provided suggestions and recommendations for improving reading ability, policy taken, development of leadership quality among students and Central Library Readers Park activities.
- ✓ The office bearer's selection of the Central Library Readers Park was discussed during the meeting.

Members actively participated in this meeting and came up with different innovative ideas to improve the participation in Central Library Readers Park.

NEC Central Library Readers Park Organized the following Events and Activities:

3.1.1 75th Anniversary Celebration of Independent India: A Overview

The NEC Central Library Readers Park, National Engineering College, Kovilpatti and NDLI Club jointly organized an Elocution on **'75th Anniversary Celebration of Independent India: A Overview'** at Central Library on 5th August 2022 at 3.30 p.m. in connection with the celebrating 75th Azadika Amrit Mahotsav i.e. 75வது சுதந்திரத் திருநாள் அமுதப் பெருவிழா.

The event started with Tamilthai Vazhthu followed with a welcome address by Dr.V.Kalaivani, Professor & Coordinator / EOC, CSE. K.Vaidyanathan, IV – CSE student briefly explained about

India's 75th Independence Day celebrations. Dr.S.Tamil Selvi, Professor / ECE & Dean (Academic) delivered the presidential address.

V.Siva Sankari, IV – IT introduced the resource person. Dr.N.B.Prakash, Professor, EEE acted as one of the resource persons of the event and mentioned some important key points about the developments in Education in Independent India. i.e., In Independent India, developments in education are focused on promoting universal access to education, establishing institutes of national importance, and fostering research and innovation to drive social and economic progress.

R.Bagawathi, IV – EEE introduced another resource person. Dr.A.Arul Marcel Moshi, Assistant Professor (SG), Department of Mechanical Engineering, who acted as one of the resource persons of the event and highlighted some important points about the social and economic development of Independent India. i.e. the social and economic development of Independent India has been characterized by efforts to alleviate poverty, promote inclusive growth, and advance industrialization and technological advancements.

R.Arjun, III – Mech. introduced another resource person. Dr.S.Iyahraja, Professor, Department of Mechanical Engineering, who acted as one of the resource persons of the event and highlighted some important points about industrial and technological development of independent India. He also said that the industrial and technological development of Independent India has been marked by significant growth in various sectors, modernization of industries, and advancements in information technology, contributing to the country's economic progress and global competitiveness.

G.Keerthikasri, III - CSE introduced another resource person. G.R.Hema Lakshmi, Assistant Professor (SG), CSE, who acted as one of the resource persons of the event and spoke about the tremendous socio-economic development and empowerment of women in Independent India.

The event was concluded by 5.10 p.m. with the vote of thanks by C.A.Narain, IV – CSE and the National anthem. M.Shanmuga Bharathi, III - C.S.E. student hosted the event. Nearly **sixty five** students and faculty members from various departments attended the event. The Central Library Readers Park Coordinator Dr.K.Karunai Raghavan, Librarian and active members made the arrangements for this entire event in a successful manner.

3.1.2　　Webinar on இன்றைய இளைஞர்கள் எதிர்கொள்ளும் சவால்கள்

The Central Library Readers Park, National Engineering College, Kovilpatti and NDLI Club jointly organized a webinar on 'இன்றைய இளைஞர்கள் எதிர்கொள்ளும் சவால்கள்' on 12th August 2022, 08.00 p.m. through online, in connection with the National Librarian's Day Celebrations. K.S.Bibinsha, III – CSE, welcomed the online gathering. G.Keerthikasri, III - CSE explained about National Librarians' Day. C.A.Narain, IV – CSE introduced the Resource Person. S.Cammillus, Assistant Professor (SG), Dept. of ECE, who acted as the resource person and he delivered an online lecture on 'இன்றைய இளைஞர்கள் எதிர்கொள்ளும் சவால்கள்'.

S.Cammillus

He emotionally explained various challenges faced by youth. Every generation has its own struggles. However, it can sometimes be tough for one generation to relate to another, understanding the anxieties and concerns of young people in 2022, whilst parents may want to understand and support their child, it can sometimes be difficult to know where to start. Further, he also identified some key challenges youth are facing today in the society. They are

- Education and Employment
- Mental Health Difficulties
- Social Media
- Uncertainty
- Single Parent Households

- Drug/Alcohol Abuse
- Stress & Time Management
- Materialism
- Obesity
- Education Inequality

Feedback: At the end of the session, participants expressed their views and gave constructive feedback on the understanding of today trend & challenges they come across in the day to day life. 65% of participants said that the event was very good and wonderful, remaining 35% of participants said that the event was good and further arrangements were excellent.

F.Harini, III - IT, proposed the vote of thanks. C.A.Narain, IV – CSE hosted the event. Nearly **twenty six** participants had actively participated in the event. Active Readers Park members coordinated the entire event in a successful manner. The webinar came to an end by 09.10 p.m.

3.1.3   Webinar on Empowering Yourself with Reading Habits

The Central Library Readers Park of National Engineering College in collaboration with the NDLI Club and Society for the Advancement of Library and Information Science (SALIS) organized a webinar on 'Empowering Yourself with Reading Habits' on 14th November 2022 at 07.00 p.m. through CISCO WebEx in connection with the National Library Week Celebrations 2022. Dr.K.Karunai Raghavan, Librarian welcomed the online gathering. C.A.Narain, IV - CSE explained about National Library Week.

Dr.M.Umai Arasi

Dr.S.Tamil Selvi, Professor, ECE & Dean (Academic), delivered the presidential address. M.Kaviguru, IV – ECE introduced the Chief Guest. Dr.M.Umai Arasi, Associate Professor, Department of English, K.S.Rangasamy College of Technology, Tiruchengode and she delivered an online lecture on 'Empowering Yourself with Reading Habits'. She explained that books are known as a person's best friend. But many people find it difficult to start a reading habit even after several trials and high desires to read. She has explained the importance & benefits of reading habit.

- ✓ Reading is a stress buster
- ✓ Reading improves our state of mind
- ✓ Reading improves overall wellness
- ✓ Improves general knowledge
- ✓ Expands vocabulary
- ✓ Improves writing skills
- ✓ Stronger analytical thinking skills
- ✓ Improves memory
- ✓ Improves focus and concentration
- ✓ Free entertainment
- ✓ Boosts sleep
- ✓ Inner tranquility

Several noteworthy novels have been successfully adapted into movies, showcasing the seamless transition of literature to the silver screen. For instance, 'Asuran' is a compelling movie based on the novel 'Vekkai' by Poomani. Similarly, 'Soorarai Potru' draws inspiration from the novel 'Simply Fly: A Deccan Odyssey.' The epic historical novel 'Ponniyin Selvan Part-1' by Kalki has also been brought to life in a movie adaptation. Additionally, 'Naan Kadavul' is a gripping film adapted from the novel 'Yezhaam Ulagam' by Jeyamohan, while 'Paradesi' resonates from the novel 'Red Tea' by Paul Harris Daniel. These movie adaptations exemplify the timeless appeal of literature and its ability to captivate audiences through cinematic storytelling.

Student's Feedback: The reading session conducted by our esteemed chief guest was exceptional and incredibly relaxing. She eloquently highlighted the significance of reading, making it a captivating and interesting session. We express our heartfelt gratitude to her for delivering such a wonderful presentation. Feedback from the participants was overwhelmingly positive, with 75% rating the event as excellent or very good. The remaining 25% of participants also appreciated the event, describing as good, with high praise for the overall arrangements.

Dr.A.M.Venkatachalam, President, SALIS, proposed the vote of thanks. C.A.Narain, IV – CSE hosted the event. Nearly **forty three** participants actively participated in the event. Active Readers Park members coordinated the entire event in a successful manner.

3.1.4   Intra College Quiz 2022: Newspaper Review Quiz

The Central Library Readers Park, National Engineering College and NDLI Club of NEC jointly conducted an Intra College Quiz 2022: 'Newspaper Review Quiz' on 16th November 2022, 02.30 p.m. in connection with the National Library Week Celebrations 2022.

S.Suji, IV – CSE student conducted the preliminary round, **forty six** (23 teams) students participated in the preliminary round, out of which six teams were selected for the final round.

The quiz was conducted by T.Anandhavel of IV year Mechanical Engineering and assisted by S.Roshini of IV year CSE.

The quiz had 4 rounds, the first round was based on day wise newspaper, the second round was technical questions, the third round was important national and international news, and the final round questions based on sports. The Newspaper Review Quiz questions were taken from the Hindu English newspapers 23-29 October 2022.

Dr.S.Tamil Selvi, Professor of ECE & Dean (Academic), Dr.K.Karunai Raghavan, Librarian, and M.Kaviguru of IV year ECE acted as a judge for Newspaper Review Quiz Competition.

The judges congratulated the participants and announced the winners of the Newspaper Review Quiz Competition 2022.

I Prize	1.	Mr.K.Vishnu Aravind, III – ECE (2011407)
	2.	Mr.V.Gowtham, III – ECE (2011410)
II Prize	1.	Mr.S.K.Premarasu, II – IT (2115019)
	2.	Mr.J.Selva Prakash, II – IT (2110043)
III Prize	1.	Mr.S.Sridharan, III – ECE (2011088)
	2.	Mr.K.Tharun Prasath, III – ECE (2011116)
Participants	1.	Mr.R.Vijay, III – ECE (2011408)
	2.	Mr.L.Pradeep, III – ECE (2011401)
	3.	Ms.K.Priya Dharshini, II – IT (2115062)
	4.	Ms.S.Divya Shree, II – IT (2115006)
	5.	Ms.V.Renuka Sre, II – IT (2115056)
	6.	Ms.S.Ruthra Varshini, II – IT (2115040)

Dr.K.Karunai Raghavan, Librarian coordinated the entire event in a successful manner.

3.1.5 Intra College Quiz 2022: Magazine Review Quiz

The Central Library Readers Park, National Engineering College and NDLI Club of NEC jointly conducted an Intra College Quiz 2022: 'Magazine Review Quiz' on 18th November 2022, 02.30 p.m. in connection with the National Library Week Celebrations 2022.

M.Shanmugabharathi, III – CSE student conducted the preliminary round. **Fifty eight** (29 teams) students participated in the preliminary round, out of which six teams were selected for the final round.

A magazine review quiz is a quiz activity that involves participants answering questions from the 'Engineering Success Review Magazine' reviews, which testing their knowledge and understanding of the content covered in the November 2022 Issue.

The quiz was conducted by S.Suji, IV - CSE and assisted by M.Kaviguru, IV - ECE. The quiz consisted of 4 rounds, namely 'Train through Success', 'English Proficiency', 'Abbreviations' and 'Who is who'.

Dr.S.Tamil Selvi, Professor of ECE & Dean (Academic), Dr.K.Karunai Raghavan, Librarian, and M.Shanmugabharathi, III – CSE acted as judges for Magazine Review Quiz Competition.

The judges congratulated the participants and announced the winners of the Magazine Review Quiz Competition 2022.

I Prize	1.	Mr.A.Ramana, III – EEE (2013010)
	2.	Mr.K.Muthumariappan, III – EEE (2013013)
II Prize	1.	Mr.A.Divine Ebinraj, III – ECE (2111034)
	2.	Mr.A.Sanjivaguru, III – EEE (2013035)
III Prize	1.	Mr.C.Selvakrishnan, III – EEE (2013012)
	2.	Mr.U.Bibin, III – EEE (2013054)

Participants   1.   Mr.S.Azhagan, IV – ECE (1911060)

                  2.   Mr.M.Shenbagaruban, IV – ECE (1911102)

                  3.   Mr.J.Dinesh, III – EEE (2013049)

                  4.   Mr.J.Kishore, III – EEE (2013014)

                  5.   Ms.J.Ninshiya Mary, IV – ECE (1911092)

                  6.   Ms.S.Suvalakshmi, IV – ECE (1911019)

Dr.K.Karunai Raghavan, Librarian coordinated the entire event in a successful manner.

3.1.6   Webinar on Empowering Yourself with Life Skills

Central Library Readers Park of National Engineering College in collaboration with the NDLI Club and Society for the Advancement of Library and Information Science (SALIS) organized a webinar on 'Empowering Yourself with Life Skills' on 19th November 2022 at 07.00 p.m. through CISCO WebEx in connection with the National Library Week Celebrations 2022. Dr.K.Karunai Raghavan, Librarian welcomed the online gathering. Dr.S.Tamil Selvi, Professor, ECE & Dean (Academic), delivered the presidential address. S.Roshini,

S.Chandralekha

IV – CSE introduced the Chief Guest. S.Chandralekha, Assistant Professor, Department of Mechatronics Engineering, K.S.Rangasamy College of Technology, Tiruchengode has acted as the chief guest and delivered an online lecture on 'Empowering Yourself by Life Skills'.

The term 'Life Skills' refers to the skills you need to make the most out of life. Any skill that is useful in your life can be considered a life skill. Tying your shoe laces, swimming, driving a car and using a computer are useful life skills for most people. Broadly speaking, the term 'life skills' is usually used for any of the skills needed to deal well and effectively with the challenges of life. The World Health Organization has defined life skills as, "the abilities for adaptive and positive behavior that enables individuals to deal effectively with the demands and challenges of everyday life"

In this regard, the Chief Guest explained the following points clearly and also defined the objectives for society so that an organized, acceptable, and beneficial lifestyle is developed for everyone.

- ✓ Problem Solving
- ✓ Decision Making
- ✓ Creative Thinking
- ✓ Critical Thinking
- ✓ Self-Awareness

- ✓ Empathy
- ✓ Interpersonal Relationship
- ✓ Good Communication
- ✓ Management of Stress
- ✓ Management of Emotions

Further, she also explained some important points to the participants:

- ✓ Be friendly and kind to all.
- ✓ Show Love & Affection to others without expecting anything in return.
- ✓ Appreciate their good gestures, talk, and behavior.

- ✓ Avoid them when they misbehave. Help them if you can.
- ✓ Share the resources. Accommodate, if there are differences of opinion.
- ✓ Have a few common activities.

Encourage good communication which brings harmony among the family, friends and the public. She suggested the above mentioned things which were mentioned by WHO and are applicable to all humans.

Major Dr.T.Magudeeswaran, General Secretary, SALIS proposed the vote of thanks. G.Keerthikasri, III – CSE hosted the event. Nearly **seventy one** participants had actively participated in the event. Active Readers Park members coordinated the entire event in a successful manner. The webinar came to an end at 09.30 p.m.

3.1.7	Intra College Quiz 2022: Book Review Quiz

The Central Library Readers Park, National Engineering College and NDLI Club of NEC jointly conducted an Intra College Quiz 2022: 'Book Review Quiz' on 21st November 2022, 02.30 p.m. at our Central Library in connection with the National Library Week Celebrations 2022.

P.Vidhya, IV - ECE student conducted the preliminary round **thirty six** (18 teams) students participated in the preliminary round, out of which six teams were selected for the final round.

The quiz was conducted by M.Kaviguru, IV – ECE. The quiz consisted of 4 rounds, the first round is 'The preamble of the Indian Constitution', the second round is 'Parliamentary System', the third round is 'State Government' and the final round is 'Non-Constitutional Bodies'. The Book Review Quiz questions were carried out from the book titled 'Indian Policy for Civil Service Examination'.

Dr.S.Tamil Selvi, Professor of ECE & Dean (Academic), Dr.K.Karunai Raghavan, Librarian, and G.Keerthikasri, III – CSE acted as judges for Book Review Quiz Competition.

The judges congratulated the participants and announced the winners of the Book Review Quiz Competition 2022.

I Prize	1.	Mr.K.Vishnu Aravind, III – ECE (2011407)
	2.	Mr.V.Gowtham, III – ECE (2011410)
II Prize	1.	Mr.J.Parthiban, II – Mech. (2110041)
	2.	Mr.B.J.Mathesh, II – Mech. (2110037)
III Prize	1.	Mr.R.M.Prakash, III – ECE (2011046)
	2.	Mr.T.Mathish Kumar, III – ECE (2011006)
Participants	1.	Mr.P.Surendhar, III – Mech. (2010075)
	2.	Mr.E.Hebron Jones, III – Mech. (2010061)
	3.	Mr.A.Baskar Sethu, II – CSE (2112072)
	4.	Mr.P.Arumugam, III – ECE (2011411)
	5.	Mr.G.Arivignesh, III – ECE (2011405)
	6.	Mr.M.Bharath, III – ECE (2011409)

Dr.K.Karunai Raghavan, Librarian coordinated the entire event in a successful manner. The event was concluded by 5.00 p.m.

3.1.8   IIT Bombay Spoken Tutorial FOSS Workshop on Advanced C++

The NEC Central Library, Quality Improvement Cell, National Engineering College, Kovilpatti and NDLI Club jointly organized an 'IIT Bombay Spoken Tutorial FOSS Workshop on Advanced C++' on 16th February 2023 (Thursday) by 03.30 p.m.

M.Mathumitha, III – IT welcomed the gathering. Dr.S.Tamil Selvi, Professor / ECE & Dean (Academic), delivered the presidential address. S.Krithika, III – IT introduced the Resource

Person. Dr.S.Chidambaram**,** AP (SG) / IT acted as the resource person and delivered a lecture on 'Advanced C++'.

He discussed the further application of Advanced C++ programming techniques, including file access, abstract data structures, class inheritance, and other advanced techniques.

He has also explained the Advanced C++ programming topics such as classes, objects, function and operator overloading, inheritance and dynamic polymorphism, templates, exception handling, standard template library, data structures, complex input/output standard and file handling techniques, program documentation, bit manipulation.

The event was concluded by 05.30 p.m. with a vote of thanks by S.Nagarajan, III – IT. R.Anushya, III - IT student hosted the event. Nearly **fifty three** students actively participated in the event. Dr.K.Karunai Raghavan, Librarian, made all the necessary arrangements for this workshop in a successful manner.

| 6.1.9 | IIT Bombay Spoken Tutorial FOSS Workshop on C++ |

The NEC Central Library, Quality Improvement Cell, National Engineering College, Kovilpatti and NDLI Club jointly organized an 'IIT Bombay Spoken Tutorial FOSS Workshop on C++' on 17th February 2023 (Friday) by 03.30 p.m.

M.Guru Prasad, III – ECE welcomed the gathering. Dr.S.Tamil Selvi, Professor / ECE & Dean (Academic) delivered the presidential address. S.Rajeswari, III – ECE introduced the resource person. S.Cammillus, AP (SG) / ECE acted as the resource person and delivered a lecture on 'C++'.

He explained that C++ is also one of the popular programming languages and can be implemented on most hardware and OS platforms. C++ is a cross-platform language that can be used to create high-performance applications. C++ gives programmers a high level of control over system resources and memory. He explained about some basic level points of C and C++:

- ✓ First C and C++ Program
- ✓ Tokens in C and C++
- ✓ Functions in C and C++

- ✔ Scope of variables in C and C++
- ✔ If and else if statement in C and C++
- ✔ Nested if and switch statement in C and C++
- ✔ Increment and decrement operators in C and C++
- ✔ Arithmetic, Relational and Logical operators in C and C++

The event was concluded by 05.30 p.m. with a vote of thanks by K.Meenakshi, II – ECE. A.S.Arun Kumar, II - ECE student hosted the event. Nearly **forty seven** students participated in the event. Dr.K.Karunai Raghavan, Librarian, made all the necessary arrangements for this workshop in a successful manner.
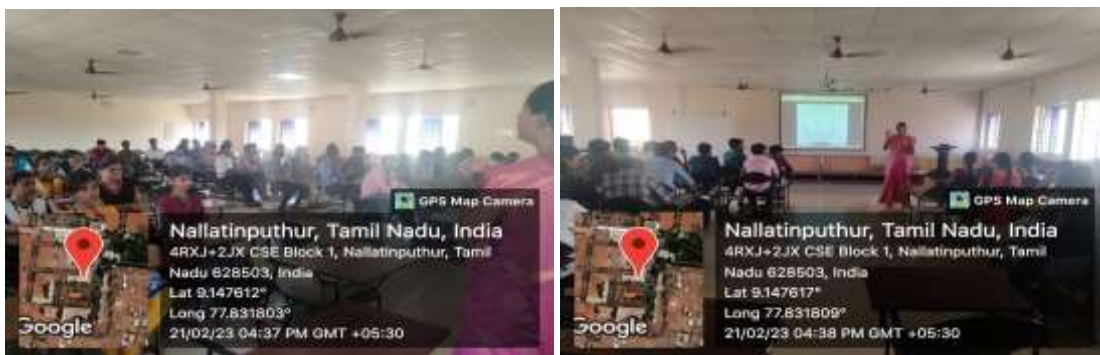
3.1.10   IIT Bombay Spoken Tutorial FOSS Workshop on JAVA

The NEC Central Library, Quality Improvement Cell, National Engineering College, Kovilpatti and NDLI Club jointly organized an 'IIT Bombay Spoken Tutorial FOSS Workshop on Java' on 18th February 2023 (Saturday) by 03.30 p.m.

A.Ramya, II – IT welcomed the gathering. Dr.S.Tamil Selvi, Professor / ECE & Dean (Academic) delivered the presidential address. J.Santhosh, II – IT introduced the Chief Guest. Dr.L.Jerart Julus, Associate Professor / IT was the Resource Person and delivered a lecture on 'JAVA'.

He explained that JAVA is the most popular class-based, object oriented, high-level programming language. Is typically compiled to bytecode (class file). It can be run on any Java Virtual Machine (JVM) regardless of the architecture. Java is specifically designed to have few implementation dependencies. Java is intended to let application developers write a code that runs on one platform & does not need to be recompiled to run on another.

The event was concluded by 05.30 p.m. with a vote of thanks by T.Mahalakshmi, II – IT. M.Murugeswari, II - IT student hosted the event. Nearly **sixty three** students participated in the event. Dr.K.Karunai Raghavan, Librarian, made all the necessary arrangements for this workshop.

3.1.11   IIT Bombay Spoken Tutorial FOSS Workshop on Linux

The NEC Central Library, Quality Improvement Cell, National Engineering College, Kovilpatti and NDLI Club jointly organized an 'IIT Bombay Spoken Tutorial FOSS Workshop on Linux' on 20th February 2023 (Monday) by 03.30 p.m.

S.Shalini, III – ECE welcomed the gathering. Dr.S.Tamil Selvi, Professor / ECE & Dean (Academic) delivered the presidential address. A.Selva Archana, III – ECE introduced the Resource Person. I.Vivek Anand, AP (SG) / ECE acted as the resource person and delivered a lecture on 'Linux'.

He explained that Linux is one of the most popular Operating Systems used in today's world. Linux refers to the family of Unix-like computer operating systems using the Linux kernel. Linux can be installed on a wide variety of computer hardware, ranging from mobile phones, tablet computers and video game consoles to mainframes and supercomputers.

It is an open source software. As Linux kernel is released under the GNU General Public License it can be freely created, modified and distributed.

The real power of Linux can be tapped by using its wide and powerful storehouse of commands which need to be typed in on the terminal. The reason is that Linux can trace its intellectual heritage, if not its source code, to the Unix OS. Unix was developed much before GUI environments were dreamt of. Thus, Unix (and hence Linux) provides a wide array of flexible text-mode commands

The event was concluded by 05.30 p.m. with a vote of thanks by R.Sindhuja, III – ECE. K.Harshini, III - ECE student hosted the event. Nearly **thirty four** students participated in the event. Dr.K.Karunai Raghavan, Librarian, made all the necessary arrangements for this workshop in a successful manner.

3.1.12   IIT Bombay Spoken Tutorial FOSS Workshop on PHP & MySQL

The NEC Central Library, Quality Improvement Cell, National Engineering College, Kovilpatti and NDLI Club jointly organized an 'IIT Bombay Spoken Tutorial FOSS Workshop on PHP & MySQL' on 21st February 2023(Tuesday) by 03.30 p.m.

M.Rathi Asha, II – IT welcomed the gathering. Dr.S.Tamil Selvi, Professor / ECE & Dean (Academic), National Engineering College, Kovilpatti delivered the presidential address. T.Nivetha, II – IT introduced the resource person. N.Gowthami, AP / IT acted as the resource person and delivered a lecture on 'PHP & MySQL'.

She explained that PHP or "PHP: Hypertext Preprocessor" is a widely-used open source general purpose scripting language that is especially suited for web development and can be embedded into HTML. Its syntax draws upon C, JAVA, and Perl and is easy to learn. The main goal of the language is to allow web developers to write dynamically generated web pages quickly, but one can more with PHP. MySQL is a RDBMS (Relational Database Management System). We use such a system to store, retrieve and manage data related to our applications. Apache is an Open Source web server in wide usage. A web-server is required to host a web application (webpage) on a remote server and is responsible for processing the request from the client, who wants to access the application.

The event was concluded by 05.30 p.m. with a vote of thanks by M.Murugeswari, II – IT. A.Arun, II - IT student hosted the event. Nearly **sixty three** students participated in the event. Dr.K.Karunai Raghavan, Librarian, made all the necessary arrangements for this workshop in a successful manner.

3.1.13 IIT Bombay Spoken Tutorial FOSS Workshop on Blender

The NEC Central Library, Quality Improvement Cell, National Engineering College, Kovilpatti and NDLI Club jointly organized an 'IIT Bombay Spoken Tutorial FOSS Workshop on Blender' on 22nd February 2023(Wednesday) by 03.30 p.m.

G.Manjula, II – Civil welcomed the gathering. Dr.S.Tamil Selvi, Professor / ECE & Dean (Academic) delivered the presidential address. B.Arun Pandian, II – Civil introduced the resource person. S.Daniel Raj, AP / Civil acted as the resource person and delivered a lecture on 'Blender'.

He explained that Blender is a free open source 3D graphics application, available under the GNU General Public License for the Linux, Mac OS X, FreeBSD, OpenBSD and Microsoft Windows operating systems.

He has explained that some important Blender's features include 3D modeling, UV unwrapping, texturing, rigging, water and smoke simulations, skinning, animating, rendering, particle and other simulations, video editing software, compositing and the ability to create interactive 3D applications, video games, animated film, or visual effects.

More advanced tools include rigid, realistic body, fluid, cloth and soft body dynamics simulation, modifier-based modeling, character animation, a node-based material and compositing system, and embedded scripting in Python.

The event was concluded by 5.30 p.m. with a vote of thanks by S.Kabilan, II – Civil. M.Lakshita,II - Civil student hosted the event.

Nearly **fifty seven** students participated in the event. Dr.K.Karunai Raghavan, Librarian, made all the necessary arrangements for this workshop in a successful manner.

3.1.14   IIT Bombay Spoken Tutorial FOSS Workshop on Arduino

The NEC Central Library, Quality Improvement Cell, National Engineering College, Kovilpatti and NDLI Club jointly organized an 'IIT Bombay Spoken Tutorial FOSS Workshop on Arduino' on 23rd February 2023 (Thursday) by 03.30 p.m..

M.Varshini, II – ECE welcomed the gathering. Dr.S.Tamil Selvi, Professor / ECE & Dean (Academic) delivered the presidential address. S.Yuvasri, II – ECE introduced the resource person. A.Apsara, AP / ECE acted as the resource person and delivered a lecture on 'Arduino'.

She explained that Arduino is an open source platform used for building electronics projects. Arduino consists of both a physical programmable circuit board or microcontroller and a software, IDE (Integrated Development Environment) that runs on the computer. It is used to write and upload computer code to the physical board.

Arduino board designs use a variety of microprocessors and controllers. The boards are equipped with sets of digital and analog input / output pins and USB connection which is used for loading programs from computers, power jack, reset button etc.

A program written with the IDE for Arduino is called a sketch. The Arduino IDE supports the languages C and C++ using special rules of code structuring. It consists of only two functions, setup and loop. The setup function is used to initialize variables, input and output pin modes.

After setup has been called, function loop is executed repeatedly in the main program. It controls the board until the board is powered off or reset. Arduino can interact with buttons, LEDs, motors, speakers, cameras, TV and smart phones etc. It can used for almost any electronics projects.

The event was concluded by 5.30 p.m. with a vote of thanks by K.Kaviya, II – ECE. K.Meenakshi, II - ECE student hosted the event. Nearly **thirty nine** students participated in the event. Dr.K.Karunai Raghavan, Librarian, made all the necessary arrangements for this workshop in a successful manner.

3.1.15   IIT Bombay Spoken Tutorial FOSS Workshop on Python 3.4.3

The NEC Central Library, Quality Improvement Cell, National Engineering College, Kovilpatti and NDLI Club jointly organized an 'IIT Bombay Spoken Tutorial FOSS Workshop on Python 3.4.3' on 24th February 2023(Friday) by 03.30 p.m.

S.Krishna, II – CSE welcomed the gathering. Dr.S.Tamil Selvi, Professor / ECE & Dean (Academic) delivered the presidential address. B.Sahanna, II – CSE introduced the resource person. Dr.S.Dheenathayalan, AP (SG) / CSE acted as the resource person and delivered a lecture on 'Python 3.4.3'.

Python 3.4.3 is a very popular general-purpose interpreted, interactive, object-oriented, and high-level programming language. Python is dynamically-typed and garbage-collected programming language. It was created by Guido van Rossum during 1985- 1990. Like Perl, Python source code is also available under the GNU General Public License (GPL).

Python can be used on a server to create web applications. Python supports multiple programming paradigms, including procedural, object oriented and functional programming language. Python design philosophy emphasizes code readability with the use of significant indentation.

The event was concluded by 05.30 p.m. with a vote of thanks by S.Keerthana, II – CSE. P.Abinaya, II - CSE student hosted the event. Nearly **seventy one** students participated in the event. Dr.K.Karunai Raghavan, Librarian, made all the necessary arrangements for this workshop in a successful manner.

3.1.16   IIT Bombay Spoken Tutorial FOSS Workshop on QCAD

The NEC Central Library, Quality Improvement Cell, National Engineering College, Kovilpatti and NDLI Club jointly organized an 'IIT Bombay Spoken Tutorial FOSS Workshop on QCAD' on 27th February 2023 (Monday) by 03.30 p.m.

M.Santhiya, II – Mechanical welcomed the gathering. Dr.S.Tamil Selvi, Professor / ECE & Dean (Academic) delivered the presidential address. M.Kavitha Srinithi, II – Mechanical introduced the resource person. R.Vigneshkumar, AP (SG) / Department of Mechanical Engineering acted as the resource person and delivered a lecture on 'QCAD'.

He explained that QCAD is an application for computer aided drafting in two dimensions (2D). It is a simple 2D CAD system for everyone. Using QCAD you can create technical drawings such as plans for buildings, interiors, mechanical parts or schemas and diagrams. QCAD works on Windows, Mac OS X and many Linux and Unix Systems.

The source code of the QCAD community edition is released under the GPL (Open Source). He also has explained that some important basic concepts:

- ✓ Introduction to QCAD
- ✓ Drawing Methods in QCAD
- ✓ Using Modification Tools
- ✓ Modification Tools to Stretch and Mirror in QCAD
- ✓ Modification Tools to Scale and Rotate in QCAD

The event was concluded by 05.20 p.m. with a vote of thanks by R.G.Aishwarya, II – Mechanical. V.Rithikesh, II – Mechanical student hosted the event.

Nearly **fifty eight** students participated in the event. Dr.K.Karunai Raghavan, Librarian, made all the necessary arrangements for this workshop in a successful manner.
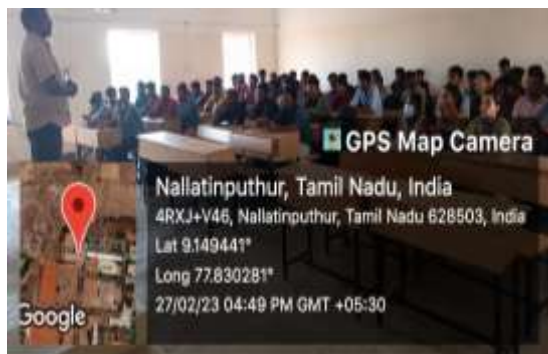
3.2   Readers Park – Office Bearers 2022 - 23

Advisors	:	Dr.S.Shanmugavel, Director
		Dr.K.Kalidasa Murugavel, Principal
Convener	:	Dr.S.Tamil Selvi, Prof. / ECE & Dean (Academic)
Coordinators	:	Dr.K.Karunai Raghavan, Librarian
Members (Staff)	:	Mr.S.Cammillus, AP (SG) / ECE
		Mr.R.Vigneshkumar, AP (SG) / Mech.
		Mr.T.Rajan, Assistant Librarian

President	:	Ms.S.Suji,	-	IV - CSE
Vice Presidents	:	Mr.C.A.Narain	-	III - CSE
		Mr.T.Vaidyanathan	-	IV - CSE
		Ms.G.Keerthikasri	-	III - CSE
		Ms.D.Harini	-	III - IT
		Ms.M.Murugeshwari	-	II - IT
Secretary	:	Mr.T.Anandhavel	-	IV - MECH
Joint Secretaries	:	Mr.T.N.Ragul	-	IV – CSE
		Ms.S.Roshini	-	IV – CSE
		Ms.A.Thejaswini	-	III – CSE
		Ms.R.Inisha Sallove	-	II – IT
		Mr.S.Baladinesh	-	II – CSE
Executive Members	:	Ms.M.Shanmugabharathi	-	III – CSE
		Ms.G.Vasuki	-	IV – EEE
		Mr.D.Arjun	-	IV – ECE
		Mr.G.Dhanarajan	-	IV – CSE
		Mr.J.Joyson	-	IV - CSE
		Mr.J.Kishore	-	III – EEE
		Mr.K.Vignesh Shankar	-	IV – CSE
		Mr.M.Mathan Babu	-	IV – CSE
		Mr.M.Ramkumar	-	IV – CSE

Mr.M.Tirugnanam	-	IV – CSE
Mr.S.Ajay Ragendran	-	IV – CSE
Mr.S.Aruneswaran	-	IV – MECH
Mr.S.K.Ganapathy	-	III – ECE
Mr.S.Leyo Jaffrin Clington	-	III – CSE
Mr.Vijaya Krishan	-	IV – ECE
Mr.V.Tamilkumar	-	IV – ECE
Ms.A.Muthulakshmi	-	IV – IT
Ms.A.S.N.Jannu	-	IV – EEE
Ms.C.Sowmiya	-	III – IT
Ms.E.R.Bagawathi	-	IV – EEE
Ms.G.Nithya	-	IV – CSE
Ms.K.M.Alhaseena	-	IV – CSE
Ms.M.Bhuvaneswari	-	IV –CSE
Mr.M.Kaviguru	-	IV – ECE
Ms.M.Vinothini	-	IV – EEE
Mr.N.Abinaya	-	IV – Civil
Ms.P.J.Keerthana	-	IV – IT
Ms.P.Vidhya	-	IV – ECE
Ms.R.Ananthi	-	IV – IT
Ms.R.Anu	-	IV – IT
Ms.R.Yamini Rajam	-	IV – EEE
Ms.S.Anumala	-	IV – ECE
Ms.S.Karishma	-	III – IT
Ms.S.V.Anshio	-	IV – CSE
Ms.S.Varshini	-	III – CSE
Ms.T.Pavithra	-	IV – ECE
Ms.V.Dharini	-	IV – Civil
Ms.V.Nithya	-	IV – CSE
Ms.V.Sharmie	-	IV – EEE

4.0   Central Library Readers Park Members Awards & Achivements

4.1   Microsoft Learn Student Ambassador

NEC Central Library Readers Park member
Ms.G.Keerthikasri (2012115) III B.E. – C.S.E.
In recognition of hard work and dedication.
She has been nominating as a member of
the **Microsoft Learn Student Ambassador BETA 2022**.

4.2   Best NEC Central Library Readers Park Volunteer Award 2022 - 23

Mr.C.A.Narain, IV – CSE (1912017) won the
'Best NEC Central Library Readers Park Volunteer Award' for the
Academic year 2022 – 23, which appreciates his
excellent work in the overall Central Library Readers Park Activities.

4.3   Best Outgoing Student (Male) Award 2022 - 23

Mr.T.Anandhavel, (2019 - 2023 Batch) final year student of Mechanical
Engineering and Secretary of Central Library Readers Park received the
Best Outgoing Student (Male) Award for the Academic Year 2022 - 23 in
the 39th NEC College Day function held on 24 April 2023.

5. Support to the Students for Self e-Learning & Extension Services / Activities

Even for the brightest and most outstanding students, self-learning can be challenging. Successful independent study requires students to develop various essential skills and abilities to enhance their learning experience. Understanding this need, NEC Central Library has established the Quality Improvement Cell (QIC) under the guidelines of Anna University, Chennai. The QIC aims to provide the necessary support and resources for successful self-learning among the users.

5.1 Quality Improvement Cell (QIC)

Since 2014, the Quality Improvement Cell (QIC) at NEC Central Library has been actively facilitating faculty members and students in accessing a wide range of resources to enhance their teaching and learning processes via the SWAYAM NPTEL, IIT Madras, as well as Free and Open Source Software (FOSS) Courses, Spoken Tutorials from IIT Bombay, and various other online courses. Through the QIC, faculty members and students continually improve their skills, knowledge, and culture in both teaching and learning.

5.2 SWAYAM NPTEL Local Chapter (IIT Madras)

NPTEL, IIT Madras has been offering self-study courses across Engineering, Humanities and Science streams for more than a decade. Central Library took this initiative forward and encouraged more students and faculty members across the colleges to participate. NPTEL, IIT Madras has set up SWAYAM-NPTEL Local chapter in colleges. In NEC, **Dr.K.Karunai Raghavan,** Librarian of the college, acts as **Single Point of Contact (SPOC)**.

5.2.1   NPTEL Local Chapter Rating:

SWAYAM NPTEL, IIT Madras has recognized our College as a valuable SWAYAM NPTEL Local Chapter with a rating of 'AA' based on the performance in NPTEL Online Certification courses during July – December 2022. *[Rating: AAA (1-10), AA (11–50) and A (51-100)]*

Dr.K.Karunai Raghavan, SPOC, NEC NPTEL Local Chapter & Librarian has received top performing 'SWAYAM NPTEL Local Chapters' with a rating of 'AA' citation from IIT Madras held on 28th January 2023.

5.2.2   SWAYAM NPTEL Toppers & Results:

5.2.2.1 July - December 2022 Session - Toppers:

During the period of July to December 2022, faculty members and students actively enrolled in SWAYAM NPTEL Online courses to enhance their knowledge in their respective fields. Several faculty members have secured top positions in the SWAYAM NPTEL online exams during this period.

Faculty Members:

DC Microgrid and Control System	Wastewater Treatment and Recycling	Selection of Nanomaterials for Energy Harvesting and Storage Application	Problem Solving Through Programming in C
Dr.M.P.E.Rajamani AP (SG) / EEE, 95% 5% Topper	Gowtham, B. AP / Civil, 90% 1% Topper	Dr.M.Bakrutheen AP (SG) / EEE, 88% 5% Topper	Gowthami, N. AP / IT, 88% 2% Topper

Cloud Computing	Introduction to Internet of Things	Environmental BioTechnology
Siva Sharma Karthick, B. AP / IT, 84% 2% Topper	Dr.T.Vijayanandh AP (SG) / ECE, 81% 5% Topper	Gowtham, B. AP / Civil, 78% 5% Topper

Students:

Introduction to Industry 4.0 and Industrial Internet of Things		Cloud Computing	Introduction to Industry 4.0 and Industrial Internet of Things
Udaya Kumar, K. IV - B.E. - CSE 85% - 1% Topper	Kalyana Sundaram, M. III - B.E. - CSE 84% - 1% Topper	Anandha Rishikesavan, K. III - B.Tech. - IT 82% - 5% Topper	Archana, V. III - M.E. - CSE 81% - 2% Topper

Introduction to Industry 4.0 and Industrial Internet of Things	Software Testing	Cloud Computing	Introduction to Industry 4.0 and Industrial Internet of Things
Hariram, M. III - B.E. – CSE, 81% - 2% Topper	Shivram, U. II - B.E. – CSE, 81% - 2% Topper	Thejaswini, A. III - B.E. – CSE, 80% - 5% Topper	Ram Praveen, V. IV - B.E. – CSE, 79% - 5% Topper

Introduction to Industry 4.0 and Industrial Internet of Things			Cloud Computing
Manobharathi, V. III - B.E. – CSE, 79% - 5% Topper	Vigneshwaran, J. III - B.E. – CSE, 79% - 5% Topper	Guru Prasad, M. III - B.E. – ECE, 79% - 5% Topper	Esa Warshini, S. III - B.E. – CSE, 79% - 5% Topper

Rapid Manufacturing	Introduction to Industry 4.0 and Industrial Internet of Things		
Sivaprakash, R. III - B.E. – Mech., 78% - 5% Topper	Anandha Rishikesavan, K. III - B.Tech. – IT, 78% - 5% Topper	Heena Fathima, P. III - B.E. – CSE, 78% - 5% Topper	Hari Narayanan, R. III - B.E. – CSE, 78% - 5% Topper

Introduction to Industry 4.0 and Industrial Internet of Things	
Soundaryaa, S. III - B.E. - CSE 78% - 5% Topper	Mahalakshmi, M. III - B.E. - CSE 77% - 5% Topper

5.2.2.2 January - June 2023 Session - Toppers:

During the period of January to June 2023, faculty members and students actively enrolled in SWAYAM NPTEL online courses to enhance their knowledge in their respective fields. Several faculty members have secured top positions in the SWAYAM NPTEL online exams.

Faculty Members:

Foundation of Cloud IoT Edge ML	Electronic Waste Management - Issues and Challenges	Computer Networks and Internet Protocol
Manimegalai, M. AP / IT, 96% 1% Topper	Kasirajan, P. AP / Civil, 86% 5% Topper	Gowthami, N. AP / IT, 82% 2% Topper

Students:

Enhancing Soft skills and Personality	Introduction to Industry 4.0 & Industrial Internet of Things	Introduction to Internet of Things	
Ainoon Faaizah Khan, F.	Shivram, U.	Madhusudhanan S.	Kayathri, S.
I - B.E. - CSE	II - B.E. - CSE	III - B.E. - Mech.	II - B.Tech. - IT
92% - 1% Topper	87% - 1% Topper	86% - 2% Topper	85% - 5% Topper

Introduction to Internet of Things		Enhancing Soft skills and Personality	
Saranraj, K.	Tazveen Zanab, S.	Jaya Chithra, N.	Samantha, S.
II - B.Tech. - IT	II - B.E. - CSE	I - B.E. - CSE	I - B.Tech. - IT
84% - 5% Topper	84% - 5% Topper	84% - 5% Topper	84% - 5% Topper

Introduction to Internet of Things			
Murugeshwari, M.	Muthu Rajeswari, V.	Renuka Sre, V.	Sangeetha, G.
II - B.Tech. - IT	II - B.E. - CSE	II - B.Tech. - IT	II - B.E. – CSE
83% - 5% Topper	83% - 5% Topper	83% - 5% Topper	83% - 5% Topper

Introduction to Industry 4.0 & Industrial Internet of Things	Cloud Computing		
Bala Subramanian, M. II - B.E. - CSE 82% - 2% Topper	Hariram, M. III - B.E. - CSE 82% - 5% Topper	DInesh ram, A. I - B.E. - CSE 81% - 5% Topper	Alagu Nagash, G. II - B.E. - CSE 79% - 5% Topper

Cloud Computing	Safety in Construction	Introduction To Industry 4.0 & Industrial Internet of Things	
Archana Pown, T. II - B.E. - CSE 79% - 5% Topper	Ishfaq Rasool Hajam II - B.E. - Civil 79% - 5% Topper	Gayathri, J. III - B.E. - CSE 78% - 5% Topper	Rajeshwarr, R. III - B.E. - CSE 78% - 5% Topper

5.2.2.3 SWAYAM NPTEL Results (July – December 2022 – Dept. wise):

Sl. No.	Dept.	Appeared		Success	Elite	Elite + Silver	Elite + Gold	Toppers
		Students	Staff					
1	E.C.E.	299	16	71	137	19	-	2
2	C.S.E.	260	9	79	135	38	-	14
3	I.T.	197	5	45	61	9	-	4
4	Mech.	164	7	71	79	10	-	1
5	Civil	109	6	20	26	8	1	2
6	E.E.E.	104	10	10	68	18	1	2
7	S&H	0	13	2	5	5	-	-
Total		**1133**	**66**	**298**	**511**	**107**	**2**	**25**
Total Appeared - 1199				**Total Certified – 918 (76.56% - Pass)**				

5.2.2.4 SWAYAM NPTEL Results (July – December 2022 - Course wise):

Sl. No.	Name of the Course	Appeared	Certified
1	Accreditation and Outcome Based Learning	1	1
2	Advanced Distributed System	1	1
3	Advanced Transition Metal Chemistry	1	0
4	Analytical Chemistry	1	1
5	Automation in Manufacturing	1	1
6	Big Data Computing	1	0
7	Biological Inorganic Chemistry	2	2
8	Business and Sustainable Development	1	1
9	C Programming and Assembly Language	37	26
10	Cloud Computing	180	161
11	Control systems	1	1
12	Data Structure and Algorithm using Java	21	13
13	DC Microgrid and Control Systems	4	4
14	Design of Connection in Steel Structures	2	2
15	Design of Steel Structures	1	1
16	Developing Soft Skills and Personality	57	18
17	Discrete Mathematics –IIITB	1	1
18	Ecology and Environment	1	1
19	Electromagnetic Theory	2	1
20	Environment and Development	1	1
21	Environmental Bio-Technology	1	1
22	Fundamental of Electronic Devices and Fabrications	1	1
23	GPS Surveying	28	7
24	Great Experiments in Psychology	1	0
25	Hardware Modeling Using Verilog	8	5
26	History of English Language and Literature	1	1
27	Industrial Safety Engineering	1	1
28	Integrated Waste Management for a Smart City	3	3
29	Introduction to Industry 4.0 and Industrial Internet of Things	128	123
30	Introduction to Internet of Things	75	73

31	Introduction to Machine Learning	3	0
32	Introduction to Research	2	2
33	Management Information System	1	0
34	Matrix Analysis with Application	1	1
35	Metals in Biology	1	1
36	Municipal Solid Waste Management	84	60
37	Nano-Technology, Science and Application	1	0
38	Operating system Fundamentals	49	17
39	Physics of Renewable Energy Systems	1	1
40	Plastic Waste Management	39	37
41	Power System Analysis	1	1
42	Problem Solving Through Programming in C	3	1
43	Programming in Modern C++	5	0
44	Python for Data Science	28	12
45	Rapid manufacturing	47	46
46	Selection of Nanomaterials for Energy Harvesting and Storage Application	3	3
47	Signal Processing for MM Wavw Communication For 5G and Beyond	2	2
48	Social Network Analysis	3	2
49	Software Project Management	52	15
50	Software Testing	87	85
51	Solid State Physics	2	2
52	Stress Management	3	0
53	Subsurface Exploration: Importance and Techniques Involved	1	1
54	System Design for Sustainability	13	1
55	System Design Through Verilog	1	1
56	The Joy of Computing using Python	77	58
57	Theory of Production Processes	1	1
58	Wastewater Treatment and Recycling	11	11
59	Work System Design	113	105
Total		**1199**	**918**

5.2.2.5 SWAYAM NPTEL Results (January – June 2023 - Dept. wise)

Sl. No.	Dept.	Appeared		Success	Elite	Elite + Silver	Elite + Gold	Toppers
		Students	Staff					
1	S & H	546	6	151	211	34	1	4
2	C.S.E	279	8	43	147	57	-	10
3	Civil	240	3	91	65	7	-	2
4	I.T	166	5	68	66	22	1	6
5	Mechanical	164	5	25	14	6	-	1
6	E.C.E.	139	5	45	41	10	-	0
7	E.E.E.	122	3	35	59	15	-	0
Total		**1656**	**35**	**458**	**603**	**151**	**2**	**23**
Total Appeared - 1691				**Total Certified – 1214 (71.79% - Pass)**				

5.2.2.6 SWAYAM NPTEL Results (January – June 2023 - Course wise)

Sl. No.	Name of the Course	Appeared	Certified
1	Advanced Computer Networks	2	1
2	Advanced Robotics	1	1
3	An Introduction to Artificial Intelligence	1	0
4	BioInformatics: Algorithms and applications	1	0
5	Bio-inorganic Chemistry	1	1
6	Biophotonics	1	1
7	Cloud Computing	212	185
8	CMOS Digital VLSI Design	1	1
9	Computer Networks and Internet Protocol	2	1
10	Concrete Technology	1	1
11	Data Analytics with Python	7	7
12	Data Mining	1	1
13	Deep Learning	1	1
14	Digital Land Surveying and Mapping (DLS&M)	2	2
15	Electric Vehicles - Part 1	2	1
16	Electronic Waste Management - Issues and Challenges	29	26
17	Emotional Intelligence	2	2
18	Engineering Mathematics II	1	1
19	Enhancing Soft Skills and Personality	461	334
20	Ethical Hacking	18	1
21	Foundation of Cloud IoT Edge ML	2	2
22	Fundamental of Power Electronics	3	0

23	Fundamentals of Electronic Materials and Devices	1	1
24	Hydraulic Engineering	1	1
25	Introduction to Embedded System Design	1	1
26	Introduction to Industry 4.0 and Industrial Internet of Things	112	106
27	Introduction to Internet of Things	212	207
28	Introduction to Mechanical Micro Machining	137	24
29	Maintenance and Repair of Concrete Structures	37	11
30	Material Characterization	10	0
31	MATLAP Programming for Numerical Computation	52	16
32	Mechatronics	2	1
33	Microprocessors and Microcontrollers	1	1
34	Natural Hazards	84	65
35	Natural Language Processing	1	1
36	NBA Accreditation and Teaching and Learning in Engineering	1	1
37	Optical Wireless Communications for Beyond 5G Networks and IoT	1	1
38	Patent Drafting for Beginners	1	1
39	Principles of Management	2	2
40	Privacy and Security in Online Social Media	57	52
41	Problem Solving Through Programming in C	5	3
42	Programming In Java	24	17
43	Programming ,Data structures and Algorithms Using Python	2	0
44	Quantum Algorithms and Cryptography	1	1
45	Recent Advances in Transmission Insulators	1	1
46	Reinforcement Learning	1	0
47	Remote Sensing and GIS for Rural Development	1	1
48	Renewable Energy Engi.: Solar, Wind and Biomass Energy Systems	6	2
49	Rural Water Resources Management	4	4
50	Safety in Construction	54	42
51	Scientific Computing using MATLAP	1	1
52	Semiconductor device modeling and Simulation	1	0
53	Sensors and actuators	2	2
54	Social Networks	2	1
55	Software Testing	7	6
56	The Joy of Computing using Python	56	24
57	Thermal Engineering : Basic and Applied	1	1
58	Usability Engineering	57	46
Total		**1691**	**1214**

5.2.3   NPTEL Discipline Star:

The following faculty members are recognized as NPTEL Discipline Star during the period July – December 2022. *[Candidates have to be certified in courses of same discipline, completed more than 50 weeks of learning.]*

Electrical Engineering	Computer Science & Engineering
Dr.S.Tamil Selvi Professor, ECE & Dean (Academic) (July – December 2022)	Shunmugapriya, B. AP (SG) / CSE (July – December 2022)

5.2.4   NPTEL Registration fee Paid by College:

Registration fee of ₹ 49,000/- for 14 faculty members and 35 Students have been reimbursed by college in appreciation of gold tag (>=90%) certificate holders / toppers (both faculty and students) of SWAYAM-NPTEL online certification course(s) held during January - December 2022 and January - June 2023 sessions.

5.3   FOSS Courses, Spoken Tutorial, IIT Bombay:

5.3.1   Workshops / Training

NEC Central Library has organized various FOSS workshops and training programmes offered by the Spoken Tutorial, IIT Bombay during the period July 2022 to May 2023 funded by NMEICT, MHRD, Government of India, coordinated by Dr.K.Karunai Raghavan, Librarian.

✓ Dr.S.Chidambaram, AP (SG) / IT, organized FOSS Workshop titled 'Advanced C++' through Spoken Tutorial, IIT Bombay on 16th February, 2023. Nearly 77 students participated.

✓ Mr.S.Cammillus, AP (SG) / ECE, organized FOSS Workshop titled 'C++' through Spoken Tutorial, IIT Bombay on 17th February, 2023. Nearly 61 students participated.

✓ Dr.l.Jerartb Julus Asso. Prof. / IT, organized FOSS Workshop titled 'JAVA' through Spoken Tutorial, IIT Bombay on 18th February, 2023. Nearly 62 students participated.

✓ Mr.I.Vivek Anand, AP (SG) / ECE, organized FOSS Workshop titled 'Linux' through Spoken Tutorial, IIT Bombay on 20th February, 2023. Nearly 61 students participated.

- ✓ Ms.N.Gowthami, AP / IT, organized FOSS Workshop titled 'PHP & MySQL' through Spoken Tutorial, IIT Bombay on 21st February, 2023. Nearly 62 students participated.

- ✓ Mr.S.Daniel Raj, AP / Civil, organized FOSS Workshop titled 'Blender' through Spoken Tutorial, IIT Bombay on 22nd February, 2023. Nearly 56 students participated.

- ✓ Ms.A.Apsara, AP / ECE, organized FOSS Workshop titled 'Arduino' through Spoken Tutorial, IIT Bombay on 23rd February, 2023. Nearly 61 students participated.

- ✓ Dr.S.Dheenathayalan, AP (SG) / CSE, organized FOSS Workshop titled 'Python 3.4.3' through Spoken Tutorial, IIT Bombay on 24th February, 2023. Nearly 63 students participated.

- ✓ Mr.R.Vigneshkumar, AP / Mech., organized FOSS Workshop titled 'QCAD' through Spoken Tutorial, IIT Bombay on 27th February, 2023. Nearly 62 students participated.

5.3.2 Assessment Test (Online)

Free and Open Source Software (FOSS) Online Assessment test was conducted by Spoken Tutorial, IIT Bombay through online during July 2022 - May 2023 & the details were given below:

Sl. No.	Name of the FOSS Course	Date of Exam	Name of the Invigilator	No. of Students Appeared	No. of Students Certified
1	Advanced C++	21.03.2023	Ms.J.E.Jeyanthi, AP / ECE	95	80
2	C++	22.03.2023	Dr.S.Dheenathayalan, AP (SG) / CSE	71	68
3	JAVA	23.03.2023	Ms.N.Gowthami,AP/IT	86	76
4	Linux	24.03.2023	Mr.S.Cammillus, AP (SG) / ECE	68	50
5	PHP & MySQL	27.03.2023	Dr.S.Chidambaram, AP (SG) / IT	63	59
6	Blender	28.03.2023	Dr.K.Karunai Raghavan, Librarian	68	48
7	Arduino	29.03.2023	Mr.I.Vivek Anand, AP (SG) / ECE	52	52
8	Python 3.4.3	30.03.2023	Ms.A.Apsara, AP/ECE	106	106
9	QCAD	31.03.2023	Mr.K.Sudalaiyandi, AP / Mech.	72	66
Total				**681**	**605**