



Department of INFORMATION TECHNOLOGY Brief Profile

Kasegaon Education Society's

Rajarambapu Institute of Technology, Rajaramnagar.

(An Autonomous Institute)

(Approved by AICTE, affiliated to Shivaji University, Kolhapur)

INDEX

Sr. No.	Description		
1.	Department Profile		
	 Vision, Mission, PEO, PO, PSOs 	1	
	Infrastructure Details	3	
2.	Academic Processes	5	
	• Curriculum	7	
	Teaching Learning Process		
3.	Interaction with Industries • Placement statistics	8	
	 MOUs with Companies 	9	
	 IIP Activities 	9	
4.	Student Professional Development		
••	Students Associations, Clubs	12	
	,	12	
	Trainings organized for students by Department Trainings organized for students by Department	19	
	 Entrepreneurship Development (ED) activities 	19	
	Student Achievements	20	
	Higher studies statistics	21	
5.	Research and Development Activities		
	Research Facilities at Information Technology Department	22	
	Publication Details	22	
	 Research Projects and Funding 	23	
	Consultancy / Internal Revenue Generation	24	
	• Undergraduate Research Experience (URE) activities	25	
6.	Faculty Activities and Achievements		
	Faculty Achievements	26	
	 Training programs Attended by the Faculties 	28	
	 Training Program Organized by the department for faculty 	28	
	 Faculty interaction with outside world 	30	

Department Profile

Brief Description:

The Department of Information Technology was started in the year 2001. The intake capacity of the department is 60 students. From year 2019-20 department has offering B. Tech. in **Computer Science & Information Technology.** The department has got two years of Accreditation by NBA (National Board of Accreditation) in the academic year 2013-14.

The Department has well experienced faculties from academia as well as a team of young teachers who contribute immensely to the establishment of necessary infrastructure and procedures for conducting an undergraduate program. The faculty profile comprises of personnel with doctorates, postgraduates in respective fields and undergraduate qualifications to meet the curriculum requirements. Faculty members are encouraged to enhance their qualifications, by participating in higher studies and research activities.

Vision:

To become a prominent department of Information Technology producing competent IT professionals with research and innovation skills, inculcating moral values and societal concerns.

Mission:

- To offer high quality education through state of art curriculum and innovative teaching & learning practices.
- To establish state of art laboratories and center of excellence in the field of technology.
- To adopt professional practice, standards, and values.
- To inculcate problem solving aptitude in graduates with lifelong learning skills to become valuable resource for IT industry and society.
- To create, share, and apply knowledge in Computer Science and Information Technology, including in interdisciplinary areas that extend the scope of Computer Science and Information Technology to benefit society.

Program Educational Objectives (PEOs)

- Graduates will a pursue successful career as an IT professionals, researcher, and entrepreneur with high degree of professionalism and values.
- Graduates will demonstrate independent thinking, professionalism, and function effectively in team oriented and open-ended activities in industry, business, and society.
- Graduates will demonstrate adaptation to rapidly changing computer technology through continuous learning leading to self-improvement.

Program Outcomes (POs)

- **PO1:** Engineering knowledge: Apply the knowledge of mathematics, science, engineering fundamentals, and IT engineering specialization to the solution of complex engineering problems.
- **PO2: Problem analysis:** Identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics and engineering sciences.
- PO3: Design/Development of solutions: Design and develop IT solutions using domain knowledge for engineering problems that meet the specified needs with

- appropriate consideration for the public health and safety, and the cultural, societal, and environmental considerations.
- **PO4:** Conduct investigations of problems: Use fundamental knowledge and engineering skills including design of experiments, analysis and interpretation of data, and synthesis of the information to provide valid conclusions.
- **PO5: Modern tool usage:** Create, select, and apply appropriate techniques, resources, modern engineering, and IT tools including prediction and modeling to complex engineering activities with an engineering and IT tools including prediction and modeling to complex engineering activities with an understanding of the limitations.
- **PO6:** The engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal and cultural issues, and the consequent responsibilities relevant to the professional engineering practice.
- **PO7: Environment and sustainability:** Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of and need for sustainable development.
- **PO8: Ethics:** Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- **PO9: Individual and team work:** Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- **PO10: Communication:** Communicate effectively on complex engineering activities with the engineering community and with society at large, such as, being able to comprehend and write effective reports and design documentation, make effective presentations, and give and receive clear instructions.
- **PO11: Project management and finance:** Demonstrate knowledge and understanding of the engineering and management principles and apply these to one own work, as a member and leader in a team, to manage projects and in multidisciplinary environments.
- **PO12:** Life-long learning: Recognize the need for, and have the preparation and ability to engage in independent and life-long learning in the broadest context of technological change.
- **♣** Program Specific Outcomes (PSOs)
- **PSO1: Domain Specific Knowledge:** Apply the relevant methods and techniques to develop solutions in the domains of automation and intelligent systems.
- **PSO2: Software Product Development**: Apply the design and deployment principles to deliver a quality software product for the success of business of varying complexity.

Human Resources:

Sr. No.	Description	Total
1	Professors	00
2	Associate Professors	01
3	Assistant Professors	13
4	Lab Technician	03
5	Lab Attendant	02

Table 1: Details of Human Resources

♣ Infrastructure Details:

✓ Total Investment: Rs. 1,84,63,615.61/-

✓ Number of Laboratories: 9✓ Number of Computers: 276

✓ Number of Licensed software: 250

✓ Number of Servers: 4✓ Number of Printers: 15

• Department laboratories and total investment:

Sr. No.	Name of Laboratory	Total Investment (Rs.)			
51.140.	Name of Laboratory	Hardware	Softwar	e	Total
1	Software Engg. Laboratory	1143175.09	129260.00)	1272435.09
2	Advanced Development Tools Laboratory	1113125.59	87665.00		1200790.59
3	Programming Laboratory	1495491.37	85540.00		1581031.37
4	Internet Technology Laboratory	1450379.37	201016.00)	1651395.37
5	Operating System Laboratory	2214827.92	240580.00		2455407.92
6	Electronics Laboratory	1238822.05	0.00		1238822.05
7	Network Laboratory	1897029.00	122600.00		2019629.00
8	Computational Laboratory	1953550.00	122600.00	122600.00 207	
9	Project Laboratory 2383488.80 148252.00 25317-		2531740.80		
	Total Amount (Rs.) 1,48,89,889.19 1,13,7513				1,60,27,402.19
	IT Department Furniture Investm		24,	,36,213.42	
	Total Investment including Hardware, Software's & Furniture				34,63,615.61

Table 2: Details of Department Laboratories and Investment

• Servers Available at the Department:

Sr. No.	Description of Item
1	Dell PowerEdge 2900 ARB - Intel Quad Core Xeon 5405, 4 GB RAM, 2x146 GB
	15K RPM SAS Hard Drive
2	Dell Server R-310 - Intel Xeon Processor X3440, 8 GB Memory, 2 x 300 GB 15 K
	RPM HDD
3	Dell Precision 3640 - Intel Core i9-10900 Processor, 128 GB DDR4 RAM, 512 GB
	PCIe NVMe Class 40 M.2 SSD, 2 TB PCIe Class 40 M.2 SSD, Nvidia Quadro
	RTX 5000
4	Dell Precision 3650 - Intel Core i9-10900K, 128 GB DDR4, 4 TB HDD, 512 GB
	PCIe NVMeSSD, Nvidia Quadro P1000

Table 3: Details of department servers

• Major Software List:

Sr. No.	Name of the Software	Quantity
1	Microsoft SQL Server 2014 SNGL OLP NL Aca 228-10333	1
2	RedHat Enterprise Linux Desktop Self Support 1 Yr. RH0844913 Paper License	1
3	Microsoft Windows Server STD 2012 SNGL OLP Aca. P73-06272	6
4	Microsoft Visual Studio Pro 2013 SNGL OLP NL Aca C5E-01120 Paper License R1804273	1
5	Microsoft Windows 10 Pro SNGL OLP NL Upgrade FQC-09512	164
6	Microsoft Windows Server 2016 Academic	28
7	Microsoft Office 2021 LTSC	10
8	Burp Suite Professional	1
9	Microsoft Visual Studio Professional 2022 Educational DGGMGF0F6Q1	10

Table 4: List of major Software's

• Class Room Details:

Sr. No	Particulars	Number of rooms
1	Class Rooms	02
2	Tutorial Rooms	01
3	Seminar Halls	01

Table 5: Details of Class Rooms

• Department Library:

Sr. No.	Particulars	Availability
1.	Number of Titles of the books	34
2.	Number of Volumes of the books	466
3.	Project Reports	120

Table 6: Details of Department Library

4 Department photos:



Programming Laboratory



Class Room 212

Academic Processes

The Curriculum of Information Technology:

Silent features of the curriculum:

- Curriculum of IT is in adherence with the AICTE model curriculum.
- Curriculum is industry oriented and covers the GATE syllabus.
- The outcome-based education is a prime aspect of curriculum design.
- Curriculum maintains the balance in the composition of basic science, humanities and professional courses and their distribution in the core and elective offerings.
- Curriculum is categorized into Core Courses, Programming, Inter Disciplinary, Projects / Lab Practices, etc.
- Curriculum consist of electives from various domains like Networking, Database,
 Programming, and Machine Learning.
- It gives opportunities for Internship, Research, Entrepreneurship, Global certification programs and MOOCs.

❖ IT Curriculum Comparison with AICTE Curriculum:

Sr. No.	Category	AICTE Breakup of Credits	IT Breakup of Credits		
1	Humanities and Social Sciences including Management Courses	12*	8		
2	Basic Science courses	24*	23		
3	Engineering Science courses including workshop, drawing, basics of electrical/mechanical/computer etc.	29*	21		
4	Professional core courses	49*	66		
5	Professional Elective courses relevant to chosen specialization/branch	18*	15		
6	Open subjects – Electives from other technical and /or emerging subjects	12*	8		
7	Project work, seminar and internship in industry	15*	20		
8	Mandatory Courses [Environmental Sciences, Induction Program, Indian Constitution, Essence of Indian Traditional Knowledge]	(non-credit)	2		
	Total	159*	163		
	*Minor variation is allowed as per need of the respective disciplines				

Table 7: Comparison with AICTE Curriculum

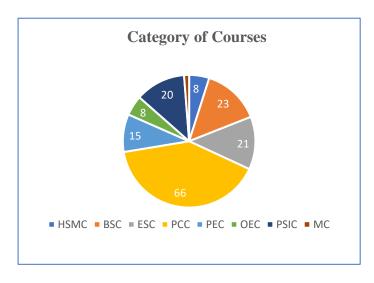


Figure 1: Categories of courses offered by department

List of External Board of Studies (BoS) Members:

Sr.	Name of the	Designation & Organization	Category of
No.	Members	Designation & Organization	Nomination
1	Dr. Gopakumaran	Professor & Principal	Academic
1	Thampi	Department of Information Technology, Mumbai	Expert
		Professor & HOD	
2	Dr. Sanjeev Wagh	Department of Information Technology,	
		Govt. College of Engineering, Karad	
	Dr. Bashirahamad	Associate Professor,	
3	Momin	Department of Computer Science & Engg,	
	WIOIIIII	Walchand College of Engineering, Sangli	
		Vice President - Digital Services &	Industry
4	Mr. Sachin Ghaisas	Head Global Delivery Centres,	Representative
		Board Member Emtec, India.	
5	Mr. Rajesh Vartak	Independent Consultant for many organizations	
6	Mr. Cunny Vucayya	Staff Products Development,	Alumni
	Mr. Sunny Kusawa	BMC Software's, Pune	Representative
7	Mr. Vrushabh	Ctudent TV D Teels IT DIT Colcherale	Student
7	Kupwade	Student, TY B Tech IT, RIT, Sakharale.	Representative

Table 8: List of Board of Studies (BoS) Members

4 Teaching Learning Process:

Student Centric Teaching-Learning process:

The use of active learning methods improves classroom delivery and ensures students' participation in classroom activities. To improve the classroom delivery, faculties are using different active and collaborative teaching-learning tools and techniques.

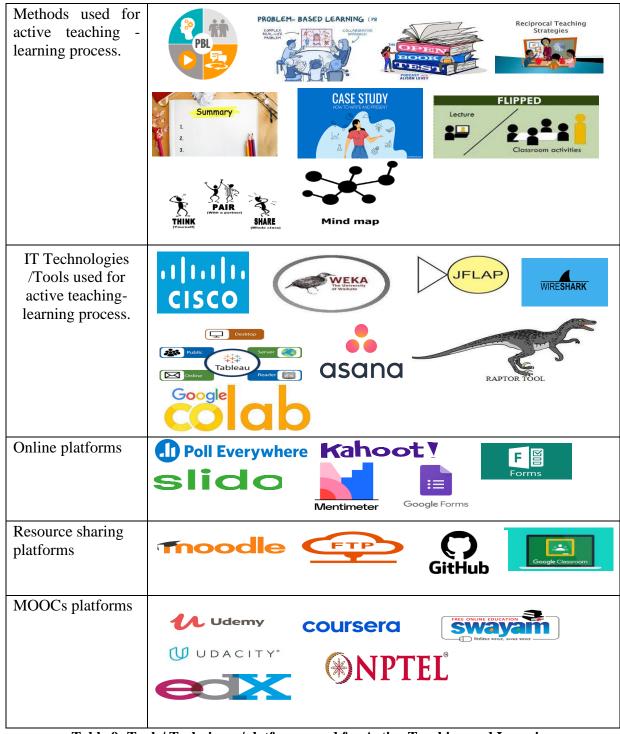
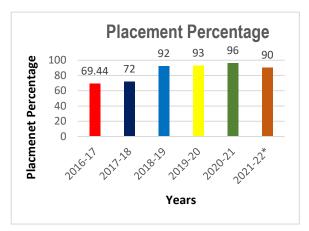


Table 9: Tools/ Techniques/platforms used for Active Teaching and Learning

Interaction with Industries

Placement Statistics:

The Training and Placement Cell of the IT Department, guide students to choose the right career and gives knowledge, skill, and aptitude and meet the workforce requirements of the industry.



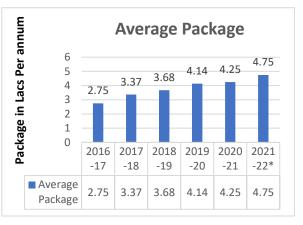


Figure 2: Placement percentage

Figure 3: Average Package

4 Major Recruiters:





MOUs with Companies:

Sr. No	Year	Name of Company	
1	2021-22	Deep Sagar Agro Enviro Services Pvt. Ltd., Sangli.	
		Open Education and Development Group, Poland.	
2		Experteze Pvt. Ltd. Monrovia CA.	
2	2020-21	XenStack Solutions Pvt. Ltd., India.	
		JSR Pvt. Ltd. Pune.	
		Pristine Infosolutions, Kolhapur.	
		Sadguru College, Karad.	
3	2019-20	Arts, Commerce & Science College, Palus.	
		Pristine Infosolutions, Kolhapur.	
		MituSkillologies, Pune.	
4	2018-19	Emtec Inc., Pune.	
Infosys, Pune.		Infosys, Pune.	
	Amrata Technologies Pvt.Ltd., Pune.		
5	2017-18 NVIDIA, Pune.		
College Campus Cash, Pune.		College Campus Cash, Pune.	

Table 10: List of MOUs

IIP Activities:

Sr. No	Year	Total Number of Students in B. Tech.	Number of students opted Internship	Percentage of students undergone Internship
1	2021-22	70	68	97.14%
2	2020-21	73	28	38.35%
3	2019-20	68	32	47.05%
4	2018-19	71	21	29.57%
5	2017-18	70	14	20%

Table 11: Details of IIP Activities



Industry visit to WPGenius Solutions LLP, Kolhapur by Mr. P. R. Gavali



Industry visit to Techpool Solutions, Kolhapur by Mr. G. B. Patil

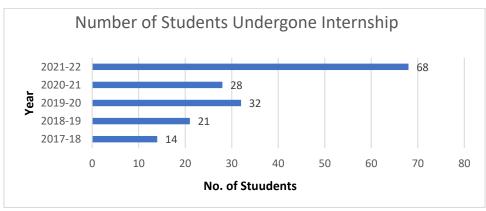


Figure 4: No. of Students Undergone Internship

↓ Internship Program at Asia University, Taiwan:

Sr. No.	Name of Student	Class	Current Status
1	Sanjana J. More	Final Year B. Tech	Selected for MNC at Pune
2	Shubham V. Dalavi	Third Year B. Tech	Selected In Techprimelab Software Pvt Ltd
3	Vivek R. Bhure	Final Year B. Tech	Selected for MNC at Pune
4	Aditya N. Ayare	Final Year B. Tech	Selected in Kirusa Software at Bangalore
5	Sachin S. Mane	Final Year B. Tech	Selected in Rise Smart Inc. at Pune
6	Samruddhi S. Bulbule	Third Year B. Tech	Selected In Capgemini
7	Aboli C. Sundarkar	Final Year B. Tech	Selected in TCS, Pune





Internship Program at Asia University, Taiwan

♣ Industry Expert Lectures conducted by Alumni:

		U
Sr. No	Year	No. of Activities
1	2021-22	4
2	2020-21	2
3	2019-20	
4	2018-19	3
5	2017-18	
6	2016-17	3

Table 12: List of Industry expert lectures conducted by alumni



Two days' workshop on "Software Testing: Basics to Advance" on 18-19 February, 2017



A webinar on Cloud Computing, 5 March,2021

Training organized for students related with placement:

Sr. No	Year	No. Training Programs
1	2020-21	2
2	2019-20	4
3	2018-19	1
4	2017-18	1
5	2016-17	2

Table 13: List of Training organized for placement



Expert lecture on "How to improve communication skills and confidence building"



A Guest lecture on "How to prepare for Civil Services Examination"

Student Professional Development

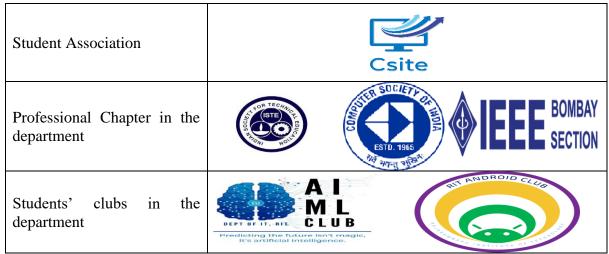


Table 14: Student association, professional chapters, clubs in the department

Learning Department Students Associations (CSITE)

Computer Science and Information Technology Engineers (CSITE) is a student association run by students of IT, for students of IT. The main objective of the CSITE is to provide platform to students to explore their skills and knowledge through curricular and extra-curricular activities in the field of IT.

✓ Activities conducted under CSITE:

Sr. No.	Year	Name of the activity	No. of Participants
1	2021-22	Engineer's Day	102
		Farewell function	150
2	2020-21	Farewell function	46
		Infotsav 5.0	50
3	2019-20	Farewell function	30
		Infotsav 4.0	295
		Teacher's Day	52
4	2018-19	Fresher's Welcome	55
		Farewell function	60
		Infotsav 3.0	346
		Teacher's Day	55
5	2017-18	Fresher's Welcome	40
		Farewell function	45
		Infotsav 2.0	211
		Teacher's Day	50
		Engineer's Day	40

Table 15: List of CSITE activities





Engineer's Day Celebration, 15th September, 2018

Fresher's Welcome

• Computer Society of India (CSI) Student Chapter RIT:

✓ CSI Membership of Students and Faculties:

Sr. No	Year	Students Membership	Faculty Membership
1	2019-20	62 Students	03
2	2018-19	41 Students	03
3	2017-18	38 Students	03
4	2016-17	(For 2 Yr.)	03

Table 16: Details of CSI Membership

✓ Activities conducted under CSI:

Sr. No.	Year	No. of events conducted under CSI activity
1	2021-22	02
2	2020-21	02
3	2019-20	03
4	2018-19	02
5	2017-18	03

Table 17: List of CSI Activities



5-days online training on "Programming in Python", during 20th to 24th July, 2020.



One week online FDP on "Recent IT Technologies, Writing Papers and Funding Proposals", 20th June to 24th June, 2020

• Indian Society for Technical Education (ISTE):

✓ ISTE Membership Details:

All Faculty members of IT department have ISTE Life Membership.

Student Membership details:

Sr. No.	Academic Year	No. of ISTE Student membership
1	2020-21	67
2	2019-20	69
3	2018-19	21
4	2017-18	30
5	2016-17	22
	Total	2,067

Table 18: Details of ISTE student membership

✓ Activities under ISTE:

Sr. No.	Year	No. of events conducted under ISTE
1	2021-22	03
2	2020-21	03
3	2019-20	02
4	2018-19	02
5	2017-18	02

Table 19: List of ISTE activities



One week ISTE approved self-funded STTP on "Mobile Application development using Android" from 9th to 13th Dec., 2019



Programming Challenge Series for SY and TY (CSIT) students from July 2019 on "C Programming" and "Data Structures and Algorithm"

• IEEE Student Branch:

IEEE student branch of Information Technology department has organized many events including industry expert sessions, Paper presentation events, Programming Challenge, Accelerator program for Android development for students of IT department as well as for outside students. The main objective is to improve the student's skill in the field of programming, recent technology in industry and to change the student's perspective about the research.

✓ Activities under IEEE:

Sr. No	Event Details	Date	No of students attended
1	Webinar on "Industry practices for Software	26 th February 2022	81
2	Accelerator Program for Android Developer	23 rd to 30 th April 2022	81
3	Webinar on "Intellectual Property Rights"	15 th December 2020	40
4	Recent Trends in Business Intelligence	13 th to 14 th April 2021	
5	Programming Challenge Series	27 th July to 24 th August 2019	15
6	Paper Presentation event	4 th March 2020	22 Groups
7	Industry expert session on "Career Guidance for Higher Education, Job opportunities and Recent IT Technology"	14 th January 2020	150
8	Industry expert session on "Freelancing Concepts and its Importance"	28 th February 2020	330
9	Expert Lecture on "Software Testing and its' opportunities in Industry"	18 th May 2019	50

Table 20: List of IEEE student chapter activities



Webinar on "Intellectual Property Right",15th
December 2020



"Accelerator program for Android Developer", 23rd to 30th April, 2022

• AI-ML Club:

The Department for Information Technology started the AI-ML Student club. The main goal of this club is to make the students excel in this area and establish the center of excellence in AL-ML. This club helps the students to learn the Python, Machine Learning, Deep Learning concepts, take/arrange training session for other students, undertake the mini /Mega project in said area, take part in various competitions in AI-ML area and present research papers in conference or journal in said area.

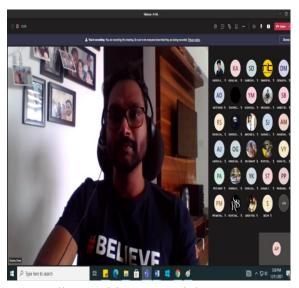
✓ Activities under AI-ML club:

Sr. No	Title of Program	Date of Program	No. of students attended
1	Online Webinar on "Kick Start to	11 th Dec. 2021	147
	Machine Learning"		
2	Online webinar on "Blockchain for	29 th Jan. 2022	149
	Sustainability" in association with		
	RAAH RIT		
3	Seminar on "Project Topic Selection	23 rd April. 2022	76
	and Report Writing"		

Table 21: List of AI-ML club activities



Seminar on "Project Topic Selection and Report Writing", 23rd April, 2022



Online Webinar on "Kick Start to Machine Learning", 11th Dec., 2021

• Android Club:

Android club was started in Rajarambapu Institute of Technology, Rajaramnagar under the Aakash Center of RIT in collaboration with IIT Bombay in 2016 by students of the Information Technology Department.

✓ Objectives:

- To create awareness about android technology among students.
- To solve social problems using Android Technology.
- To learn and gain detailed knowledge about android and other new technologies required for mobile application development.
- To develop and publish android mobile applications.

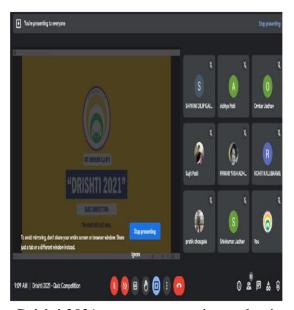
✓ Activities under Android club:

Sr. No.		Date	
1	Trainings and workshops	Training programs and workshops and guest lectures conducted for the students	Throughout the year
2	Orientation Session for F. Y. B. Tech 2021-22	An introduction about the Android club and events organize under the club and outcomes were shared to the students.	16 th August 2021
3	Drishti 2021	A poster presentation and quiz competition commemorating Engineers Day	2 nd October 2021
4	App-A-Thon	App-A-Thon is an app development	16 th September 2017
5	App- A-Thon 2.0	competition commenced yearly by the RIT Android Club jointly in collaboration with the Department of Information	8 th September 2018
6	App- A-Thon 3.0	Technology, the lead college scheme Shivaji University, and UNNAT	14 th September 2019
7	Exhibition of Android apps	First Exhibition of native android apps developed by students showcased on AAKASH tablets	21st January 2016
8	Inaugural of Android Club	Inaugurated Android Club with a goal is to learn and implement the new technology in Android platform.	21st January 2016

Table 22: List of Android club activities



Inaugural of App- A-Thon app development competition, 16th September 2017

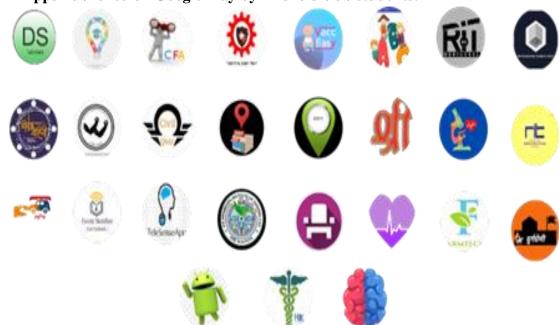


Drishti 2021 poster presentation and quiz competition, 2nd October, 2021

✓ Achievements:

- ➤ A total of 35 Android apps are developed and deployed on the Google Play store.
- Reached more than 60,000 downloads for all apps.
- ➤ Faculty Advisor Mr. R. J. Mandale received invitation from Google, MountainView, US for Google IO 2018 to became part of Google developer ecosystem and doing Android publicity.
- ➤ Total 10 Android applications developed by Prof. R. J. Mandale that are TeleSensor App, Compiler Master, RIT VivekVahini App, College Selector App, Civil Engg. Quiz Apps, Health_Mantra: pink of health, RIT Music Cell, Play to Learn, Kids Katta, Shree Driving School.
- ➤ Total 16 students (Developers of Android app) won Rs.500/- Google play balance as a Gift from Google (Rs. 8000/- Total).

✓ Apps Published on Google Play by Android club students:



Student Association News Letter

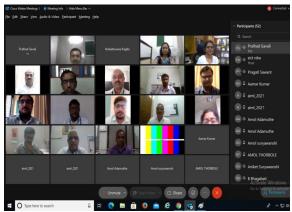
Department student association CSITE publishes newsletter quarterly.



4 Trainings organized for students by Department

Sr. No	Year	No. Training Programs
1	2021-22	3
2	2020-21	6
3	2019-20	10
4	2018-19	8
5	2017-18	10
6	2016-17	7

Table 23: Details of Training organized for students





Two Days Online Workshop On "Recent Trends in Business Intelligence", 13th to 14th April, 2021

Two Week Training Program on "Cyber Security Certification", 2nd to14th Dec. 2019

Let up Entrepreneurship Development (ED) activities

Entrepreneurship development is the means of enhancing the knowledge and skill of entrepreneurs through several classroom coaching and programs, and training. The main point of the development process is to strengthen and increase the number of entrepreneurs.

Sr. No	Year	Total Number of students in ED Track	List of Start-up projects guided in the ED track
1	2021-22	1	Cold Storage chains,
2	2020-21		AKGSurgicals, Fruits imports and
3	2019-20	ů .	exports, Online Shopping system,
4	2018-19	1	Maize Flour, Fashio Street, Trio
5	2017-18	4	Solutions India.

Table 24: Details of ED track

4 Industry Visits

abely vibits				
Sr. No	Year	No. of Industry Visits		
1	2021-22	5		
2	2020-21	1		
3	2019-20	6		
4	2018-19	11		
5	2017-18	17		
6	2016-17	2		

Table 25: List of Industry Visits





Industry visit to Deshpande Startups, Hubali, 29th April 2022

Industry visit to Prodevans Pvt Ltd., Bangaluru, 17th Feb., 2019

♣ Student Achievements in Technical, Co-curricular & Extra-curricular Activities

Student Award details:

Sr. No	Year	No. of Students
1	2021-22	2
2	2020-21	8
3	2019-20	8
4	2018-19	2
5	2017-18	14
6	2016-17	4

Table 26: List of Student Achievement

Major list of Awards:

Sr. No.	Name of Event/Award/ University	Name of Students	Date	Award
1	Infra Innovation Labs (I2L) Republic Day Hackathon 2021	Akash Mahajan & team from T.Y. B. Tech	26 th January 2021	Second Prize
2	Infra Innovation Labs (I2L) Republic Day Hackathon 2021	Sugandha Dhanawade & Team from T.Y. B. Tech	26 th January 2021	Third Prize
3	IITB-ISRO-AICTE Mapathon, FOSSE (Free/Libre and Open- Source Software in Education) Project	Akash Mahajan T.Y. B. Tech	7 th -22 nd December 2020	First Prize (2000 Rs.)
4	IUCEE NEP Students Competition 2020-21	Akash Ashok Mahajan TY B. Tech Digvijay Mahamuni S.Y.B. Tech	Feb – April 2021	Second Prize (1000 Rs.)
5	IUCEE NEP Students Competition 2020-21	Shantanu Bokey First Year B. Tech	Feb – April 2021	First Prize
6	Ignition- Debate Championship – Akraman	Sushant Vijay Pavashe	28 th February 2020	Winner

7	Hallabol - Etron 2020	Sushant Vijay Pavashe T.Y.B. Tech	2 nd March 2020	Winner
8	Innovation 2019 National Level Innovative Project Exhibition & Competition.	Mr. Sanket Shinde And team from B. Tech	11 th March 2019+	Runner Up
9	NAPSTER 2K18 (Codewar)	Mr. Rushikesh Shirkar Mr. Harshad Jadhav T.Y.B. Tech	7 th & 8 th March 2017	Runner up
10	TECHNOPHILIA 2K17 (Project)	Mr. Suraj Ahuja And team B.Tech	11 th March 2017	Second Prize

Table 27: List of major awards

• MOOCs course floated by student:

Title of course: Android App Development Bootcamp

with Java

Course Instructor: Mr. Abhishek Sanjay Barkade

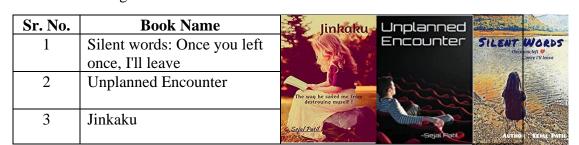
(T.Y. B.Tech. CSIT) **Platform:** Udemy

Total Students enrolled for the course: 339

Published On: 29th Jan 2022

Course Link: https://bit.ly/3qEux9N
Book Publications by Student:

Ms. Sejal Patil, S. Y. B. Tech (CSIT) published 3 books and available on Kindle Direct Publishing.



↓ Higher studies statistics

Sr. No	Year	Number of students went to higher studies
1	2020-21	2
2	2019-20	5
3	2018-19	5
4	2017-18	2
5	2016-17	2

5 2016-17 2 2019-20 • 2020-21

Table 28: List of students went to higher studies

Figure 5: No. of students went to higher studies



Number of Students went to higher Studies

2016-17 2017-18 2018-19

Research and Development Activities

Research Facilities at Information Technology Department:

In the Research areas, Information Technology department is focusing on the Centre of Excellence in Machine Learning, Cyber Security, and Internet of Things (IoT).

Hardware and Software:

- Haiuwaic a	iu boitware.
Hardware	✓ Workstation: Dell Precision 3650 (Intel Core
	i9/3.7/128GB/4TB/512 GB SSD/4GB Graphics/DRW/WIN 11
	Prof)
	✓ IoT Kits: IoT Gateway Solution based on Intel Quark Processor,
	11 No. of Sensors/ Actuators, USB Pen drive with Custom OS for
	easy programming, Ethernet Cable, 150 MBPS Wi-Fi Adapter,
	USB to FTDI cable, 8GB Micro SD Card, Two Antennas.
Softwares	✓ Free and Opensource software: Python, R Studio, MATLAB
	✓ Framework: Keras, TensorFlow, Numpy, Pandas, Sklearn,
	Matplotlib, Seaborn, Pytorch, Skimage, Flask.
	✓ Burp Suite Professional, Kali Linux, Turnitin, Grammarly, LaTex

4 Publication Details:

F	Student's		
Academic Year	Journal Publications	Conference Paper Publications	Publications
2021-22	7	7	1
2020-21	12	7	7
2019-20	9	5	3
2018-19	5	9	2
2017-18	4	4	-

Faculty Publications

Journal Publications

Conference Paper Publication

15
10
2021-22 2020-21 2019-20 2018-19 2017-18
ACADEMIC YEAR

Table 29: Faculty and Students Publications

Figure 6: Faculty Publications

Best Paper Awards in Conference:

Sr. No.	Authors name	Paper title	Journal name	Year and month of publication
1	Jayashree A. Patil,	Tipping Point	International	
	Dr. Amol C.	Leadership	Conference on	
	Adamuthe	Theory to	Transformations in	
		Improve Research	Engineering	7 th to 9 th Jan 2022
		Culture in	Education organized	
		Engineering	by IUCEE (ICTIEE	
		Education	2022)	

2	Ashwini B. Patil	Incorporating	International	
	Dadaso T. Mane	Visualization	Conference on	
	Nitish M. Shinde	Tools and Active	Transformations in	
		Learning	Engineering	7 th to 9 th Jan 2022
		Approach for	Education organized	
		Programming	by IUCEE (ICTIEE	
		Courses	2022)	
3	Sushant Pawashe	Online House	International E-	
	Dr. Amol C.	Rental System	Conference on	
	Adamuthe	using Multi-	Emerging	
		criteria Decision-	Technologies in	24-25 th Feb 2022
		Making Methods	Information	
			Technology 2022	
4	Dr. A. C. Adamuthe	Hierarchical Text	4 th National	
	Ms.Sneha N. Jagtap	Classification	Conference for	
		using Dictionary	Engineering Post	
		Based Approach	Graduate Students	13 th April 2018
		and	RIT NConPG-18	
		Convolutional		
		Neural Network		

Table 30: Best Paper Awards

♣ Research Projects and Funding

Sr. No.	Title of Project	PI/Co-PI	Amount Sanctioned	Scheme			
	Year 2020-21						
1							
1	AICTE ATAL Training	Dr. A C. Adamuthe	Rs.93,000/-	AICTE			
	Programming Data Science			Training &			
	for Societal development			Learning			
				(ATAL)			
		Year 2019-20					
1	Company Connect RGSTC	Dr. A C. Adamuthe	Rs.3,10,000/-	RGSTC			
	Scheme Assistance to S & T			Scheme			
	Applications through						
	University System						
		Year 2017-18					
1	Enhancing Technical Skills in	Dr.A.C.Adamuthe	Rs.3,00,000/-	AICTE-ISTE			
	Recent IT Technologies	Mrs.A.B.Patil		Induction/			
		Mr.S.S.Sawant		Refresher			
				Programs			
2	Funding under Assistance for	Dr.A.C. Adamuthe	Rs.5,00,000/-	RGSTC			
	University & Rajiv Gandhi						
	Science & Technology						
	Commission						

Table 31: Research Projects and Funding

4 Conference Organized by the Department:

Department of Information Technology, RIT, Rajaramnagar organized an international conference on Advancement in Technology (ICONAT 2022) on 22nd and 23rd Jan 2022. The conference was technically co-sponsored by IEEE Bombay Section.

- ➤ No. of Paper received: 1046
- ➤ No. of presented: 327
- ➤ No. of Contributed Countries: 23 (China, Japan, Indonesia, Myanmar, Iran, Iraq, Bangladesh, Srilanka, India, etc)
- \triangleright No. of sessions: 40
- ➤ Key Note session by:

Dr. Kashif Nisar, Faculty of Computing and Informatics University Malaysia Sabah, and Dr. Hussain Mahdi from Diyala University, Iraq.



↓ Consultancy / Internal Revenue Generation (IRG):

Sr. No.	Academic Year	Consultancy/IRG	Activities
1	2021-22	Rs.69,800/-	Internal revenue generated through
2	2020-21	Rs.9,000/-	different types of consultancies like virtual internship programs, expert
3	2019-20	Rs.1,82,670/-	lectures, online training programs,
4	2018-19	Rs.1,04,065/-	a state- level competition &
5	2017-18	Rs.2,46,320/-	exhibition APP-A-Thon 3.0, ISTE Approved STTP, online FDP, Mini Project, and IT Consultancy.

Table 32: Consultancy and IRG

Books Publication:

Sr. No.	Authors Name	Title of the Book	Publisher Name	ISSN/ISBN	Year and month of publication
1	Mr. S. S. Sawant	PHP And	Aruta	ISBN 978-	
	Mrs. A. B. Patil	MySQL	Publishers,	93-81476-	August 2014
			Ratanagiri	13-0	
2	Dr. S. A. Thorat	C Interview	Shroff	ISBN	
		Q & A	Publishers &	13:978-93-	
			Distributors	5023-390-0	September 2012
			Pvt. Ltd., Navi		
			Mumbai		
3	Dr. S. A. Thorat	C Interview	Shroff	ISBN	July 2011
		Q & A	Publishers &	13:978-93-	
			Distributors	5023-390-0	

Table 33: Book Publications

↓ Undergraduate Research Experience (URE) activities:

- ✓ URE-builds resume of students as a researcher.
- ✓ Students aspiring higher studies get an edge as a research experience through URE.
- ✓ Research culture is inculcated in students.
- ✓ Opportunities in foreign universities for further studies.

Achievements under URE Track:

Journal Paper Publication:

- Aboli Sundarkar and Amol C. Adamuthe, "Solving 01 Knapsack Problem with variations of Flower Pollination Algorithm," Journal of scientific research, Volume 65, Issue 1 (January 2021). ISSN 0447-9483.
- 2. Amol C. Adamuthe, Vaishnavi N. Sale and Sandeep U. Mane, "Solving single and multi-objective 01 Knapsack Problem using Harmony Search Algorithm," Journal of scientific research, Vol. 64, Issue 1, pp. 160-167, Jan 2020. ISSN 0447-9483.
- 3. Shivam S. Kadam, Amol C. Adamuthe, Ashwini B. Patil, "CNN model for image classification on MNIST and Fashion-MNIST Dataset," Journal of scientific research, Volume 64, Issue 2, pp. 374-384, June 2020. ISSN 0447-9483.
- 4. Ashish Ashok Magdum, Ashwini Patil received the **Best paper award** for the paper entitled "A review paper on security in IoT" in the World Journal of Technology Engineering and Research in Jan 2018.

Faculty Activities and Achievements **Faculty Achievements**:

Sr. No	Year	Faculty
1	2021-22	5
2	2020-21	2
3	2019-20	3
4	2018-19	3
5	2017-18	3
6	2016-17	4

Table 34: No. of Faculty Achievements

Year	Major Achievements of the Faculties		
2021-22	 Mrs. Ashwini B. Patil received the "Best Chapter Chairman Award 2020" of Indian Society for Technical Education (ISTE) Maharashtra-Goa Section. Dr. A. C. Adamuthe and Mrs. J. A. Patil received the best paper Award in International Conference on Transformations in Engineering Education 2022. Mrs. A. B. Patil, Mr. D. T. Mane, Mr. N. M. Shinde received the best paper award in International Conference on Transformations in Engineering Education 2022. Dr. A. C Adamuthe received the best paper Award in International E-Conference on Emerging Technologies in Information Technology 2022. Mrs. Ashwini B. Patil received the 1stPrize in Institute Level Innovate Practice League (IPL 2020), Organized by Centre for Teaching and Learning (RIT-CTL), RIT Rajaramnagar, conducted on 1st and 2nd July 		
2020-21	 Mr. M. A. Patil got Certificate of Appreciation for Faculty Mentor and EWB India, Student grader IUCEE Leadership Course of 2020. Mrs. A. B. Patil has received "Maa Saraswati Award 2021" for contribution to overall development of the students in Academic year 19-20, ISTE RIT, Chapter. 		
2019-20	 Mr. R. J. Mandale got the 1st Prize in IPL Award at Institute Level on 5th September 2019 Mr. R. J. Mandale, Mrs. A. B. Patil and Mr. M. A. Patil has achieved GOLD AWARD in 34th Chapter Conversation Quality Circle (CCQC), Pune Chapter on 31st August 2019. Mr. R. J. Mandale, Mrs. A. B. Patil and Mr. M. A. Patil has achieved Excellent award in Quality Circle Form (CCQC) National Convention on Quality Concepts Theme: "Quality Concepts for Cultural Breakthrough", Varanasi chapter on 26 - 30 December 2019. 		
2018-19	 Dr. A. C. Adamuthe rewarded "IEI Young Engineers Award 2018-19" by the Institution of Engineers (India) Kolkata. Mr. R.J. Mandale Received the Promising Young Teacher Award. 		

	KRA Award - as per RIT's Strategic Plan for Institutional Growth and	
	Development to 6 faculties: Mrs. A. B. Patil, Mrs. S. P. Patil, Mr. S. S.	
	Sawant, Mr. S. S. Mane, Mr. D. T. Mane, Mr. R. J. Mandale.	
2017-18	• Mrs. A. B. Patil received the best paper Award in "World Journal of	
	Technology Engineering and Research" in Jan 2018	
	• Dr. A. C. Adamuthe received the best paper Award in 4 th National	
	Conference for Engineering Post Graduate Students RIT NConPG-18	
	 Mr. S. S. Sawant received the Promising Young Teacher Award. 	
2016-17	• Mr. D. Rajesh, Mr. S. D. Yalpale, Mr. M. A. Patil received the Par	
	Excellence in National Convention on Quality Concepts, Pune Chapter	
	on 16 th to 19 th December 2016	
	• Mr. D. Rajesh and Mr. S. C. Pawar received the Inspiration Award in	
	Smart India Hackathon 2017.	
	Mr. D. Rajesh Received the Promising Young Teacher Award	
	• Ms. V. T. Lokare, Mr. M. A. Patil and Mr. P. R. Gavali received the	
	FIRST prize in Best Practices Activity	

Table 35: Details of Faculty Achievements

MOOCs Course Floated by Faculty:

Dr. S. A. Thorat floated 2 courses on Udemy platform.

Total Students = 43,000+ from 156 countries

Average Rating = 4.52 / 5

Udemy MOOCs course on "Learn C By Examples: Build and Test C Programming Skills" Rating of Course = 4.65 2500+ Students registered from 103 different countries. Course Launched: April 2018.

Link: https://www.udemy.com/test-your-c-programming-skills/

 Udemy MOOCs course on "Latex A-Z Simplified: Basic to Advanced Comprehensive Guide" Rating of Course=4.52, 940+ students registered from worldwide. Course launched May 2020.

Link: https://www.udemy.com/course/masteringlatex/

Android App. published by Faculty:

- o Application Name: C Programming App for Interview Preparation
- o Faculty Name: Dr. S. A. Thorat
- Link: <u>https://play.google.com/store/apps/details?id=com.crackitinterview.cinterview.qa</u>

Promoting Faculty members:

✓	Faculty Appraisals
	☐ Academic Performance Index (API)
	☐ Key Result Area (KRA)
✓	Faculty members completed/deputed for Ph.D.
	☐ Completed (2): Dr. S. A. Thorat, Dr. A.C. Adamuthe
	Ongoing (3): Prof. P. R. Gavali, Prof. M. S. Kanase. Prof. P. P. Patil

Training programs Attended by the Faculties:

81 8 V			
Sr. No.	Academic Year	No. of Training programs attended	No. of Man-days
1	2021-22	23	140
2	2020-21	34	151
3	2019-20	59	280
4	2018-19	21	109
5	2017-18	31	89
6	2016-17	70	163

Table 36: Number of Training Programs attended by Faculties

4 Training Program Organized by the department for faculty:

Sr. No.	Academic Year	No. of Training programming Organized for Faculty
1	2021-22	01
2	2020-21	06
3	2019-20	06
4	2018-19	05
5	2017-18	06
6	2016-17	03

Table 37: Number of Training Program Organized by department

Sr. No.	Title of Workshop	Date and Duration of Program	Sponsored by
1	Online (FDP) on "Artificial Intelligence and Machine Learning"	21 st to 30 th August 2021	Under the scheme of Electronics and ICT Academy sponsored by Ministry of Electronics and Information Technology, Govt. of India.
2	One Week FDP on "Effective Conduction of Online Lectures Using ICT Tools"	6 th to 10 th July, 2020	Under RIT-Center for Teaching and Learning (CTL)
3	One Week Online Training Program on "Programming in Python"	20 th to 24 th July 2020	Under RIT-Centre for Teaching & Learning (RIT- CTL) In Association with CSI & ISTE Student chapter, RIT
4	One-Week Online FDP on "Data Science for Societal Development"	16 th to 20 th September 2020	AICTE ATAL Training Programming
5	One-week online FDP on "Recent IT Technologies, Writing Papers and Funding Proposals"	20 th to 24 th June 2020	Under RIT- Center for Teaching & Learning (RIT- CTL) in Association with IEEE Bombay Section and CSI.
6	A Virtual STTP on "Recent Project Development Practices in IT Industry"	26 th -30 th June 2020	Under RIT-CTL (Center for Teaching & Learning in

			Association with CSI & IEEE
			Bombay Section.
7	One-Week STTP on Data	17 th June to 21 st	ISTE sponsored
	Science using Python	June 2019	
8	Two-week ISTE Approved	28 Nov 11 Dec.	ISTE sponsored
	STTP on SQL & NoSQL	2018	
9	Two Week Foundation	3 rd Aug7 th Sept.	AICTE, MHRD Sponsored,
	Program in ICT for	2017	conducted in association with
	Education		IIT Bombay
10	Two Week Pedagogy for	14 th Sept 12th	AICTE, MHRD Sponsored,
	Online and Blended	Oct. 2017	conducted in association with
	Teaching-Learning Process		IIT Bombay
11	One Week ISTE Refresher	$21^{st} - 26^{th}$ May	AICTE -ISTE
	training programing on	2018	
	Recent Trends in IT		
	Technologies		
12	One-week ISTE Training	6 th -10 th December	ISTE sponsored, Conducted in
	Program on Python	2017	association with Lead college
	Programming		activity, Shivaji University.

Table 38: List of some major training programs organized by the department



ATAL Online FDP on "Data Science for Societal Development"



ISTE Approved STTP on "SQL & NoSQL"



ISTE approved refresher training program on Recent Trends in IT Technologies



Online Training Program on "Programming in Python" Under RIT-CTL

Faculty interaction with outside world:

Virtual Internship program offered by Department:

Four week online virtual internship program on "**Problem solving using Python**" was organized by Department of Information Technology, RIT in collaboration with GEDC (Global Education Deans' Council) India Chapter in July 2021. Total 54 students joined and successfully completed this internship.

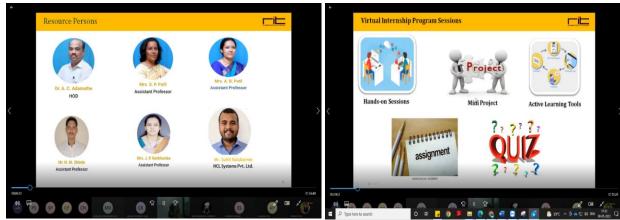


Figure 7: Virtual internship program on "Problem solving using Python"

Session Chair Outside College:

Sr. No.	Academic Year	Expert Lecture /Webinar /
		Session Chair Outside College
1	2021-22	08
2	2020-21	04
3	2019-20	11
4	2018-19	14
5	2017-18	10
6	2016-17	11

Table 39: Number of expert lecture /webinars/ session chair outside college





Kasegaon Education Society's

Rajarambapu Institute of Technology, Rajaramnagar

Post. Sakhrale (Islampur). Tal. Walwa. Dist. Sangli

Maharashtra, India-415414.

E-Mail: director@ritindia.edu

Tel: +91-2342-220329,9970700700

Fax: +91- 2342-220989