



AJ INSTITUTE OF ENGINEERING & TECHNOLOGY

A Unit of Laxmi Memorial Education Trust[®]

(Approved by AICTE, New Delhi, Affiliated to Visvesvaraya Technological University, Belgavi)

Accredited By NBA (BE : CV, CSE, ECE, ISE & ME)

Date: 18/09/2023

Proposal

Subject: To organize the “**Internal Hackathon**” Competition

The Technical Committee, In Association with (clubs) Institution Innovation Council -IIC cell – YUKTI NIR AJIET is organizing the “**Internal Hackathon**” as a part of SMART INDIA HACKATHON-23 on 23-09-2023 from 10.00AM- 3.00PM, for the students of all the semester. The objective of the event is to create an innovative & Problem-Solving capability among students, to provide a formal platform for students to demonstrate and communicate about their ideas and encourages innovative thinking towards sustainable solutions.

Mapping to Program Outcomes (PO's): The event is relevant to **PO1, PO2, PO3, PO4, PO5, PO6, PO8, PO9, PO10, PO11, PO12**

PO1: Engineering knowledge: Apply the knowledge of mathematics, science, engineering fundamentals and an engineering specialization to the solution of complex engineering problems.

PO2: Problem Analysis: Identify, formulate, review research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural science and engineering sciences.

PO3: Design/Development of Solutions: The ability to design solutions for complex engineering problems and design system components or processes that meet the specified needs with appropriate consideration for public health and safety, cultural, societal, and environmental considerations.

PO4: Conduct investigations of complex problems: Use research-based knowledge and research methods 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 and modern engineering and IT tools including prediction and modelling to complex engineering activities with an understanding of the limitations.

Principal
A.J. Institute of Engineering & Technology
Mangaluru - 575 006

email: dean@ajiet.edu.in



AJ INSTITUTE OF ENGINEERING & TECHNOLOGY

A Unit of Laxmi Memorial Education Trust®

(Approved by AICTE, New Delhi, Affiliated to Visvesvaraya Technological University, Belgavi)

Accredited By NBA (BE : CV, CSE, ECE, ISE & ME)

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 sustainability: Understand the impact of the professional engineering solutions in the 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's 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.

Technical Co-Ordinator

Principal

Principal
A.J. Institute of Engineering & Technology
Mangaluru - 575 006



AJ INSTITUTE OF ENGINEERING & TECHNOLOGY

A Unit of Laxmi Memorial Education Trust[®]

(Approved by AICTE, New Delhi, Affiliated to Visvesvaraya Technological University, Belgavi)

Accredited By NBA (BE : CV, CSE, ECE, ISE & ME)

Date: 21/09/2023

Circular

Technical Committee, In Association with (clubs) Institution Innovation Council -IIC cell – YUKTI NIR AJIET is organizing the “Internal Hackathon” on 23-09-2023, all the participants are here by informed actively participate and to be in the venue on time.

A handwritten signature in blue ink, appearing to be 'J. P.', is written over a circular stamp.

Technical Coordinator

A handwritten signature in green ink, appearing to be 'V.', is written over a circular stamp.

Principal

Principal
A.J. Institute of Engineering & Technology
Mangalore - 575 006



AJ INSTITUTE OF ENGINEERING & TECHNOLOGY

A Unit of Laxmi Memorial Education Trust

(Approved by AICTE, New Delhi, Affiliated to Visvesvaraya Technological University, Belgavi)

Date: 25-09-2023

Internal Hackathon

Name of the Program:	Internal Hackathon	Program Dates & Timings:	23-09-2023 10.00AM- 3.00PM
Name & Details of the Judges:	Mr.Jobin Joseph P J Senior Administrator - Operations & Administration Codecraft Technologies,mangalore	Mr.Ujwal Dsouza Managing partner, Marian infrastructures Mangalore	Mr.Akhilesh Kombraje Technical leadInfosys limited
Organized by (Clubs/ Dept.)	Technical Committee	In Association with (clubs)	Institution Innovation Council -IIC cell – YUKTI NIR
No. of Participants	255	Students	235
		Faculty	20
Program Outcome (PO) Mapping	PO1,PO2,PO3, PO4, PO5, PO6, PO8, PO9, PO10, PO11, PO12		
Coordinators	Mr. Chanchal Antony		

About the Program:

Agenda:

Sl No.	Topic	Speaker
1	Welcome Note	Mr. Chanchal Antony – CSE
2.	Prayer	
3	Introduction about Event	Mr. Chanchal Antony – CSE
4.	Presidential Remarks	Dr. Shantharama Rai C – Principal
3	Vote of Thanks	Dr Sangeetha D M – CV

The Technical Committee of AJIET organized an Internal Hackathon as a part of SMART INDIA HACKATHON-23 to evaluate the ideas presented by the students of all the departments. Mr. Jobin Joseph , Mr.Ujwal Dsouza & Mr.Akhilesh Kombraje were the Jury Members & Guests of the event. The event started with Welcome Note by Prof.Chanchal Antony – Assoc. Prof ,CSE the Technical Committee Incharge & SPOC SIH-23, the invocation was done by Mr.Athreya and team . Prof.Chanchal Antony – Assoc. Prof ,CSE also gave a brief Introduction about Event.

Dr. Shantharama Rai C ,Principal gave the presidential address and Dr Sangeetha D M – Assoc. Prof ,CV proposed the vote of thanks. Presentation for the event started in Seminar hall 2 for IT branches (CS/IS/ECE) and in CAED lab for Non-IT branches (ME/CIV).

Principal
A.J. Institute of Engineering & Technology
Mangaluru - 575 006

Mr.Jobin Joseph P J & Mr.Akhilesh Kombraje were the judges for the IT branches related presentation and Mr.Ujwal Dsouza & Dr,Shreejith ,Assoc Prof ,MECH were the judges for the Non-IT branches related presentation.

Objectives: The program to enable students/ faculty in

- To create of an innovative & Problem Solving capability among students.
- To provide a formal platform for students to demonstrate and communicate about their ideas.

Outcomes: On successful completion of presentation program the student should able to:

- To implement their idea for the benefit of society.
- To demonstrate technical expertise and collaborative teamwork abilities.
- Developing skills in innovation and entrepreneurship.

Articulation Matrix:

Course Outcomes	Program Outcomes											
	1	2	3	4	5	6	7	8	9	10	11	12
1	2	2	2	2	2	2	2	2	2	2	2	2
2	2	2	2	2	2	2	2	2	2	2	2	2
3	2	2	2	2	2	2	2	2	2	2	2	2
Average	2	2	2	2	2	2	2	2	2	2	2	2


Problem Statements Chosen

Si No	Problem Statements	PS NO
1	Develop a Proctored exam tool for shortlisting the candidates for the national and international level hackathons.	SIH1498
2	Ideate and implement a system to enhance the quality of education in rural areas.	SIH1326
3	Self-identifying the mental health status and get guidance for support.	SIH1363
4	Using technology to develop a moving/mobile education system/software or equipment so that the children of nomadic communities such as Bakarwals /Gujjars can have proper education at least till primary.	SIH1354
5	Student innovation	SIH1491
6	360-degree feedback software for the Government of India related News Stories in Regional Media using Artificial Intelligence / Machine Learning	SIH1329
7	Making career choices and AI based counselling accessible to every child at secondary level along with aptitude tests and detailed career paths.	SIH1434
8	AI Assisted Tele-medicine KIOSK for Rural India	SIH1325
9	Student Innovation	SIH1477
10	Automated public lighting	SIH1300
11	Call for low-cost desalination technology for Lakshadweep and Inland saline water sources.	SIH1424
12	Development of Small Scale Wind energy device	SIH1361

13	Estimation of inflow to a reservoir from the rainfall considering soil moisture in its catchment and releases from upstream reservoirs and automatically opening of reservoir gates for moderately releasing the water to avoid the flooding in a basin.	SIH1294
14	Green option for milk packaging (Low-cost environment friendly and extended self-life packing for milk)	SIH1449
15	Development of Smart Toilet	SIH1323
16	Call for cost-effective ways of making water source for piped drinking water supply sustainable in Rural areas	SIH1328
17	Automatic regulation of valves for release of water based upon soil moisture availability in the root zone of the crop, using artificial intelligence, in a piped and micro irrigation network of irrigation systems.	SIH1293
18	Effective management of construction and demolition (C&D) waste.	SIH1513
19	A solution/idea that can boost the current situation of the tourism industries including hotels, travel and others.	SIH1486
20	Development of gamified platform on Children's Rights to increase legal literacy and awareness among children in India.	SIH1281
21	AI based Automatic alarm generation and dropping of payload at a particular object through a Drone.	SIH1416
22	Tech-Driven Solutions for Undertrial Prisoners in India	SIH1282
23	Real-Time Vehicle Tracking system.	SIH1382
24	AI-powered Legal Documentation Assistant	SIH1285
25	Startup-AYUSH Portal	SIH1345
26	Intelligent chatbot to answer queries pertaining to various Maintenance Processes within Substation	SIH1380
27	App-Based Solution to identify and solve disease in plants/crops	SIH1401
28	A mobile app that crowd sources water-related problems from around a community, open sources data, etc. and display them on a map.	SIH1291
29	Domestic Waste Management	SIH1322
30	Ideas that can boost fitness activities and assist in keeping fit.	SIH1494
31	International Comparative System to Launch Integrated Real-Time Data Management System (IDMS) for Chemical and Petrochemicals Sector.	SIH1278
32	Development of motion amplification video techniques for vibration analysis	SIH1415
33	Developing a system for patient care in the Health sector	SIH1327
34	Centralized monitoring system for streetlight fault detection and location tracking	SIH1512
35	Pro-planet person app	SIH1390

Judgement Sheet:

Evaluation criteria included novelty of the idea, complexity, clarity and details in the prescribed format, feasibility, practicability, sustainability, scale of impact, user experience and potential for future work progression.


 Principal
 A.J. Institute of Engineering & Technology
 Mangaluru - 575 006



A.J. Institute of Engineering & Technology

Conducting Internal Hackathon for SIH 2023

23 September 2023
At 10:00 AM



Mr.Chanchal Antony
SPOC,SIH-23,AJIET

Dr.Shantharama Rai C
Principal,AJIET

Our Patrons

Dr. A.J Shetty
President,LMET

Mr.Prashanth Shetty
Vice President,LMET

Mrs.Ashritha P Shetty
Director,LMET

Mrs.Sharadha Shetty
Director,LMET

Mr.Prashanth Marla K
Director,LMET

Dr.Amitha P Marla
Director,LMET

[/A J Institute of Engineering & Technology](#) | [/aj_institute_manglore](#) | [/aj_institute_manglore](#) | [A.J. Institute of Engineering & technology manglore](#)



Mangalore Division, Karnataka, India

575006, Bangrakuloor, Kodikal, Mangaluru, Karnataka

Long 74.829736°

Lat 12.914775°

23/9/2023 10:10 AM

Address by Principal

Principal
A.J. Institute of Engineering & Technology
Mangaluru-575006

Total number of teams	45
Total number of students	235
Male students	154
Female Students	81
Total Number of team shortlisted	30
Total number of student Waitlisted	5

Participating Teams:



Glimpses of Internal Hackathon

SPOC SIH-23

Mr.Chanchal Antony

PRINCIPAL

Dr. Shantharama Rai

Principal
A.J. Institute of Engineering & Technology
Mangaluru - 575 006



AJ INSTITUTE OF ENGINEERING & TECHNOLOGY

A Unit of Laxmi Memorial Education Trust
(Approved by AICTE, New Delhi, Affiliated to Vignansaraya Technological University, Belgaavi)

SIH-23(Internal Hackathon)

ATTENDANCE SHEET

Department: Civil Engineering

SI No.	Team Name	USN	Name	Signature
1	CIVILIZATION	4JK21CV401	NITHIN RAT P	
		4JK20CV017	N. Laxmikant Shet	
		4JK20CV026	Wahidun Paduwalha	
		4JK21CV01H	Mavyas. K	
		4JK21CV022	Mallika. G	
		4JK21CV008	Deepa GK	
2.	VAGMI	4JK20CV016	MOHAMMADTHAMEEN	
		4JK20CV017	TANVISH RAT	
		4JK21CV002	PREETHAM	
		4JK20CV001	ARHINAV MOHAN	
		4JK20CV018	NAVYA. K	
		4JK21CV012	HARSHITHA	
3.	SATTVA	4JK20CV024	SHIVANI. KODIKAL	
		4JK20CV023	SAGAR. SURESH	
		4JK20CV012	EERANNA.	
		4JK21CV026	NOCA MUMBA SOLOMON	
		4JK21CV018	KARTHIK. RATESH	
		4JK21CV020	MJ SAKTHI MAGENDHIRA	
4.	HYDROHEROES	4JK20CV019	Nikhitha. KN	
		4JK21CV404	SAL TEJA	
		4JK21CV024	Rahul	
		4JK21CV403	ROYSTON	
		4JK20CV019	KUSHAN	
		4JK21CV011	Flavitha Park	
5	SRSTI	4JK20CV025	Shruyan Shetty	
		4JK20CV015	MAHESHA	
		4JK21CV017	KARTHIK. H	
		4JK20CV402	Nanda Kumar, P.S.	
		4JK21CV010	DILEEP RAS	
		4JK20CV021	Pishana. NS.	
6	Inspiring Roots	4JK20CV13	Fusco. A	
		4JK20CV010	Dan. S. K	
		4JK20CV005	Amegh	
		4JK20CV006	Ayush shetty	
		4JK21CV002	Akha	
		4JK21CV004	Aparna. Vinod	

SIH-23 Coordinator

Principal

Principal



AJ INSTITUTE OF ENGINEERING & TECHNOLOGY

A Unit of Laxmi Memorial Education Trust
(Approved by AICTE, New Delhi, Affiliated to Vignveswaraaya Technological University, Belgaui)

SIH -23(Internal Hackathon)

ATTENDANCE SHEET

Department: Computer Science

SI No.	Team Name	USN	Name	Signature
1	ALPHA - 360	4JK20CS047	Thejaswi . D . S	<i>Thejaswi</i>
		4JK20CS044	Sharath Kumar	<i>Sharath</i>
		4JK20CS051	Varsha B. Shetty	<i>Varsha</i>
		4JK20CS022	Lakshmi V. Kumbhara	<i>Lakshmi</i>
		4JK20CS025	Manvitha . K . Amin	<i>Manvitha</i>
		4JK20CS048	Tikeshraj	<i>Tikeshraj</i>
2	Team Vegshell	4JK20CS014	Deviprasad . Rai . P	<i>Deviprasad</i>
		4JK20CS015	Dhruv Kishore Shetty	<i>Dhruv</i>
		4JK20CS041	S Athreya Shankar	<i>S Athreya</i>
		4JK20CS036	Prateek C Kothan	<i>Prateek</i>
		4JK20CS035	Pranya	<i>Pranya</i>
		4JK21CS020	Gururaj Shivaram Surathkal	<i>Gururaj</i>
3	Innovisionaries	4JK20CS005	Ahmad Midraj B	<i>Ahmad</i>
		4JK20CS013	Cliva Rhea Moraes	<i>Cliva</i>
		4JK20CS056	Zaid Ali Ahmad	<i>Zaid</i>
		4JK21CS030	Lekshmi Kumar	<i>Lekshmi</i>
		4JK21CS033	Mokshitha S N	<i>Mokshitha</i>
		4JK20CS039	Rahul . M . Moolya	<i>Rahul</i>
4	Void Walkers	4JK20CS008	Anvitha	<i>Anvitha</i>
		4JK20CS018	Zha Cheith Bashir	<i>Zha</i>
		4JK20CS023	Mammy Anasam	<i>Mammy</i>
		4JK20CS042	Sanvidhi S Rai	<i>Sanvidhi</i>
		4JK20CS040	Ramsha Piyaz	<i>Ramsha</i>
		4JK21CS016	Parshan Bhandary	<i>Parshan</i>
5	Unique Minds	4JK20CS012	C . A . Praveen	<i>C . A . Praveen</i>
		4JK20CS029	Namratha Shetty	<i>Namratha</i>
		4JK20CS007	Ananya G Adyathaya	<i>Ananya</i>
		4JK20CS046	Swarthik Achar	<i>Swarthik</i>
		4JK20CS049	Vaashak	<i>Vaashak</i>
		4JK21CS048	Rakshitha Shetty	<i>Rakshitha</i>
6	Bit Squad	4JK20CS034	Prakruthi . S . Shetty	<i>Prakruthi</i>
		4JK20CS045	Sheeya . S . Shetty	<i>Sheeya</i>
		4JK20CS054	Ujeth . Kumar	<i>Ujeth</i>
		4JK20CS050	Vaishvata	<i>Vaishvata</i>
		4JK21CS036	Nalagavashini	<i>Nalagavashini</i>
		4JK21CS042	Nitish . S . Kothan	<i>Nitish</i>

[Signature]

SIH-23 Coordinator

[Signature]

Principal

Principal

A.J. Institute of Engineering & Technology
Mangaluru - 575 006



AJ INSTITUTE OF ENGINEERING & TECHNOLOGY

A Unit of Laxmi Memorial Education Trust

(Approved by AICTE, New Delhi. Affiliated to Visvesvaraya Technological University, Belgaavi)

SIH -23(Internal Hackathon)

ATTENDANCE SHEET

Department: Informatics Sci

SI No.	Team Name	USN	Name	Signature
1	Hack - A - Thought	4JK20IS012	Asik Raj E	
		45K21IS017	harshav B S	
		47K21IS031	Nidhi JM	
2	Spx pitals	HJK2013022	Kavya	
		HJK2013046	Shama	
		HJK2013048	Shifali Shetty	
		HJK2013049	Shravya	
		HJK2013033	Nisha Hubbat	
3	Crime Crackers	HJK2013054	Sneha Ghode	
		4JK2013034	Monisha	
		4JK2013020	Tushara	
		4JK2013037	Pooja	
		4JK2013042	Samantha	
4	Dynamo - Craft	4JK2013032	Nischik Kotal	
		4JK2013024	Kiran Shetty	
5	Eco Engineers	4JK2013028	Moyoori P	
		HJK2013004	Ashya Shetty P	
		HJK2013013	Ashwatha	
		HJK2013061	V. Dhanya	
6	ERROR 606	4JK2013087	VIGNESH S NAYAK	
		4JK2013085	YASHAS M BHANDARY	
		4JK2013052	SWASTHIK	
		4JK2013066	SANJANA	
		4JK2013088	JUDEEKSHA SHETTY	
		4JK2113018	GAUTHAM SHETTY	

SIH-23 Coordinator

Principal

Principal
A.J. Institute of Engineering & Technology
Mangaluru - 575006



AJ INSTITUTE OF ENGINEERING & TECHNOLOGY

A Unit of Laxmi Memorial Education Trust

(Approved by AICTE, New Delhi, Affiliated to Visvesvaraya Technological University, Belgaovi)

SIH -23(Internal Hackathon)

ATTENDANCE SHEET

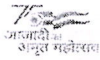
Department: ISE & ECE

SI No.	Team Name	USN	Name	Signature
13	Tour wizards	4JK20IS034	Prasthuthi Hegde	
		4JK20IS002	Abhiram.k.R	
		4JK20IS005	Adithya.P	
		4JK21IS012	Devesh	
14	INNOVATORS	4JK21EC066	Shouya.D K	
		4JK21EC046	Sharna Shetty	
		4JK21EC048	Shradha	
		4JK21EC029	Aarwan.S	
		4JK21EC002	Semanth.S	
		4JK21EC059	Thejas.S	
15	AXIS	4JK21EC063	Vishnu Sanibosh	
		4JK21EC030	Mohammed Misbah	
		4JK21EC032	Munes sand	
		4JK21EC044	Sandesh mathai	
		4JK21EC057	Sushma	
		4JK22EC401	Karthik C Nayak	
16	Digital Dynamo	4JK21EC020	Kaaryu	
		4JK21EC012	Dhanush.S	
		4JK21EC011	Dhanush	
		4JK21EC001	Abhishek	
		4JK21EC064	Rakshith.shetty	
		4JK21EC033	Mundiqua.sadiya	
17	Team electric hub	4JK21EC050	Shraon Kumar (shel)	
		4JK21EC034	Nilesh D lohan	
		4JK21EC007	Avish V shetty	
		4JK21EC061	Vaishnavi.	
		4JK21EC019	Karan Kumar shetty	
		4JK21EC056	Sumonsh	
18	Team Orion	4JK21EC005	Anirudh Srivathsa.T.S	
		4JK21EC037	Pree-hesh KD	
		4JK21EC045	sevith K	
		4JK21EC053	Suhan Rai K	
		4JK21EC054	Sujan DB	
		4JK21EC055	Sujanaya P	

SIH-23 Coordinator

Principal

Principal Institute of Engineering & Technology
A.J. Institute of Engineering & Technology
Mangalore - 575 006



AJ INSTITUTE OF ENGINEERING & TECHNOLOGY

A Unit of Laxmi Memorial Education Trust

(Approved by AICTE, New Delhi, Affiliated to Visvesvaraya Technological University, Belgaavi)

SIH -23(Internal Hackathon)

ATTENDANCE SHEET

Department: *Mechanical Eng*

SI No.	Team Name	USN	Name	Signature
1	StreetSense	4JK20ME019	Vikith V salian	
		4JK20ME009	Jeriel Sean	
		4JK20ME020	sandeep K.U	
		4JK20EG034	Seema J. Rai	
		4JK20EC038	Suasthik Kamath	
		4JK20EC015	Durgesh	
2	INNOVATORS	4JK20ME001	Abishkek. Kumar	
		4JK20ME003	Akil Sajeeb	
		4JK20ME014	Muhammad Sng T.P	
		4JK20EC007	Aubotha	
		4JK20KE005	Mayusha.	
		4JK20ME004	Ashik. H.S	
3	line of sight	4JK21ME004	Abhishhek Bhat P	
		4JK21ME011	AKASH W	
		4JK21ME046	NAVEENA C K	
		4JK21ME010	m ruthula	
		4JK21ME000	Bhavan C S	
		4JK21ME403	Manumantha	
4	TAAGY	4JK21ME019	Bvtushor	
		4JK21ME023	Gautham	
		4JK21ME035	Ashur	
		4JK21ME059	Yashwin T	
		4JK21ME052	Azeem	
		4JK21CS062	Alkhattha	
5	ASPLJ- Team	4JK21ME029	Lalan kumar s	
		4JK21ME405	Prajwal K	
		4JK21ME024	Jayantha	
		4JK21ME406	Shreeathi K	
		4JK21ME015	Ankith Alva	
		4JK22CV013	Tomal	
6	Musketeers	4JK22ME402	Ayaan Thome	
		4JK21ME001	Abdul Masfal	
		4JK21ME039	Mohammed Shakeel	
		4JK21ME038	Mohammed Masook	
		4JK21CS	Kanasa M Shetty	
		4JK21ME050	Safuddkeer Ahmed.	

SIH-23 Coordinator

Principal
A.J. Institute of Engineering & Technology
Mangaluru - 575 006