



**AISSMS**  
INSTITUTE OF INFORMATION TECHNOLOGY  
(I.O.I.T.)



ADDING VALUE TO ENGINEERING

An Autonomous Institute Affiliated to Savitribai Phule Pune University  
Approved by AICTE, New Delhi and Recognised by Govt. of Maharashtra  
Accredited by NAAC with "A+" Grade | NBA - 5 UG Programmes

DEPARTMENT OF COMPUTER ENGINEERING

## TECHNICAL MAGAZINE 2022-2023





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### Vision

- To be known for imparting quality education in computer engineering to serve the changing needs of global industry.

### Mission

- To create an environment that fosters technical and professional growth to make graduates globally competent.
- To develop industry ready professionals, researchers, and entrepreneurs to solve real world problems and societal issues.

### Program Education Objectives(PEOs)

- PEO1:** Work productively as successful computer professionals / entrepreneurs / researchers in global industry.
- PEO2:** Adapt latest technological skills to face challenges of the modern computing industry.
- PEO3:** Work in finance, healthcare, security and banking sectors as a team member or a leader with ethical values.

### Program Specific Outcomes (PSOs)

**PSO1 Problem Solving and Programming Skills:** Graduates will be able to apply knowledge of procedural or object oriented programming

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**PSO2 Professional Skills:** Graduates will be able to design and develop software systems using front end and back end technologies by following standard software engineering principles

**PSO3 Professional Skills:** Graduates will be able to analyse the algorithms and implement optimized solutions in the domain of machine learning, natural language processing, security and cloud computing.



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## **Program Outcomes (POs)**

**Graduates will be able to**

1. Apply the knowledge of mathematics, science, engineering fundamentals, and an engineering specialization to the solution of complex engineering problems. **[Engineering knowledge]**
2. Identify, formulate, research literature, and analyse complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences. **[Problem analysis]**
3. Design solutions for complex engineering problems and design system components or processes that meet the specified needs with appropriate consideration for the public health and safety, and the cultural, societal, and environmental considerations. **[Design/development of solutions]**
4. 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. **[Conduct investigations of complex problems]**
5. 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. **[Modern tool usage]**
6. 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. **[The engineer and society]**
7. Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development. **[Environment and sustainability]**
8. Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice. **[Ethics]**
9. Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings. **[Individual and team work]**
10. 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. **[Communication]**



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11. 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. **[Project management and finance]**
  12. 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. **[Life-long learning]**



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## **Editorial Team**



### **Faculty Coordinator : P.S.Jadhav**

I'm pleased to welcome you to the technical magazine for our department. I view technical magazines as an opportunity to concentrate on the projects and seminar subjects that the students pursue to further their education. Through the projects they complete, students have the opportunity and platform to demonstrate their talent, which may even be useful to anybody or everyone else in enhancing their technical knowledge. I believe that this magazine accomplishes its goal.

### **Student Coordinator:**



**Nileet Salve**





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## Objective behind Technical Magazine

The Department of Computer Engineering is ecstatic and honoured to present the 2022–2023 technical magazine. From our pupils, we had gathered seminar and project titles. Our goal in sharing this information is to inspire students and educate them about the current needs in the IT industry.

The department's goal is to increase technical proficiency among the students. The department has been working on this from the second year. The department organizes a lot of expert talks, seminars, industry trips, and learning materials outside of the curriculum for the students. There are planned activities to make students aware of the present demand for the IT industry. The results of those efforts are shown in their placement and entrance to further education during their final year.

Coordinator

Mrs. P.S.Jadhav

HOD

Dr. S.N.Zaware



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## I. TECH STARTUP BY B.E CLASS STUDENTS







## About Our Company

Search-In is an End-to-End provider of tech to digital service. People in the business community trust Search-In's service due to clarity and our work-ethic.

Search-In is one of the prominent companies with remarkable expertise & execution.

## Our Leadership



**Aniket Chopade**

CEO & Founder



**Nitish Bhise**

COO & Co-founder





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## Target Market

The goal is to support passionate entrepreneurs & established businesses to grow the scale of their business with the help of IT and smart solutions in the software era...





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## Our Vision

Being the best is good, but being the one who is ready to take on any challenge whatsoever.

Maintain and analyze the data that will help our clients to get the required results to improve their business

## Our Foundations

Startup-India DPIIT recognised -  
**DIPP96765**

National Startup Awards 2022 -  
**Finalist among top 30.**

Projects completed -  
**30+ with regional & overseas clients.**

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## Technical Expertise

Frontend				
Backend				
Mobile				
Databases				
CMS				
Hosting				
Custom Integration				






## Our Services




### Web Development

Web app development is one of our core competencies. We offer bang-up web app development solutions using cutting-edge tools and techniques.




### Mobile App Development

We employ masterful techniques to make mobile app development process a total success. We are competent enough to cater to your mobile app development needs expertly.




### AI and ML projects

We provide solutions in data analytics, computer vision, natural language processing and many other ML services to automate current business processes.



### Technical Consulting

To understand how digital products and technologies can skyrocket your business goals and streamline your current operations, drop us a call.



### Digital & Social Media Marketing

Creating campaigns, Social Media Handeling, Website SEO, SMO, PPC. Anything and everything you ever wanted to make your brand **stand out**





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## II. PLACEMENT OF ACADEMIC YEAR 2022-23

Sr.No.	Name Of Student	Name Of Company
1	Himank Tyagi	Hexaware Technologies limited
2	Aditya Kumar Jaiswal	Hexaware Technologies limited
3	Harshal Devman Raundal	Hexaware Technologies limited
4	Manish Bharat Bhamare	Hexaware Technologies limited
5	Rutul Dilip Wable	Hexaware Technologies limited
6	Prarthana Anup Chandak	Hexaware Technologies limited
7	Tushar Sharma	Hexaware Technologies limited
8	Tanishka Satyajeet Shinde	Hexaware Technologies limited
9	Ishika Mahajan	Hexaware Technologies limited
10	Harsh Arun Aswar	Hexaware Technologies limited
11	Akanksha Janardan Shelke	Hexaware Technologies limited
12	Shruti Rajendra Mehta	Hexaware Technologies limited
13	Om Abasaheb Autade	Hexaware Technologies limited
14	Nikita Manjunath Shetty	Hexaware Technologies limited
15	Rohit Laxman Divekar	Hexaware Technologies limited
16	Abhishek Mahendra Chirme	Hexaware Technologies limited
17	Ashitosh Shriram Kadam	Hexaware Technologies limited
18	Triveni Santosh Gawali	Hexaware Technologies limited
19	Vaishnavi Anil Patil	Hexaware Technologies limited



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20	Parth Rewoo	Hexaware Technologies limited
21	Ninad Nitin Shirsat	Hexaware Technologies limited
22	Ashish Patil	Betsol
23	Shrinivas Khond	Veritas
24	Bhargavi Mahashabde	Bristlecone
25	Hritika Gandhi	Bristlecone
26	Sucheta Rakshe	Bristlecone
27	Snehal Sutar	Centiro
28	Mayur Patil	Zeus Learning
29	Aniket Patil	Zeus Learning
30	Pratik Choudhari	Zeus Learning
31	Shubham Sontakke	Zeus Learning
32	Sidhesh Undre	Zeus Learning
33	Piyush Kumar Yadav	Zeus Learning
34	Sunit Lohade	Inspira Enterprise
35	Aakash Mete	TCS
36	Aishwarya Dhotre	Zensoft
37	Shriyash Band	Zensoft
38	Rajlaxmi Bhosale	Zensoft
39	Shubham Tarate	Zensoft
40	Aakankha Yadav	Zensoft



41	Pratik Jadhav	Zensoft
42	Sayali Joshi	Tata Communications
43	Aishwarya Soni	Tata Communications
44	Aniruddh Nitin Karekar	jio platforms
45	Durvesh Sham Mahajan	jio platforms
46	Himanshu Vikas Bendale	jio platforms
47	Sushil Satish Shinde	jio platforms
48	Aniruddh Sanjay Ghewade	jio platforms
49	Yash Vyankatrao Deshpande	jio platforms
50	Atharva Rahul Hendre	jio platforms
51	Aniket Shankar Aher	jio platforms
52	Onasvee Banarse	jio platforms
53	Sarthak Mukund Mane	L&T Infotech
54	Unnati Deshmukh	L&T Infotech
55	Anuj Chordia	L&T Infotech
56	Pallavi Shinde	L&T Infotech
57	Pournima Prashant Kamble	L&T Infotech
58	Sakshi Mandhana	L&T Infotech
59	Ankit Patil	L&T Infotech
60	Sarvesh Mungurwadi	L&T Infotech
61	Akshata Anil Wattamwar	L&T Infotech



62	Krishna Dilip Lagad	L&T Infotech
63	Aniket Ahir	TCS
64	Rushikesh Susar	TCS
65	Rishikesh Nagale	TCS
66	Vaishnavi Katkar	TCS
67	Snehal Baban Pattebahadur	Cognizant
68	Simran Joseph Mascarenhas	Johnson Control
69	Soham Shital Mulay	Johnson Control
70	Ashish Dinesh Patil	Johnson Control
71	Pratiksha Balkrishna Patil	Cognizant
72	Aditya Manish Bokade	Cognizant
73	Piyusha Balasaheb Khune	Cognizant
74	yash kondaji sonawane	Cognizant
75	Hitesh Hemant Bamb	Cognizant
76	Rajvardhan Pradipao Jadhavrao	Cognizant
77	Rana Dilawar Pathan	Cognizant
78	Aditya Dadabhau Pokharkar	Cognizant
79	Gargi Anil Agrawal	Cognizant
80	Anish Vishwas Dhawalikar	Cognizant
81	Shrutee Sagar Bothara	Cognizant
82	Sushant Ravindra Kulkarni	Cognizant





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83	Chetan Agarwal	Extentia Information Technology
84	Mayuri Umesh Chavan	NTT Data
85	Kunal Jaykumar Bumb	Cognizant
86	Rana Iqbal Shaikh	Cognizant
87	Komalika Sonawane	Vodafone
88	Sheetal Bendgude	Vodafone
89	Shubham Raut	Vodafone
90	Prasun Bhuniya	Teradata
91	Pragati Bhole	Seimens
92	Shraddha Pathare	Neilsoft
93	Mansi Hulke	Upgrad
94	Omkar Chaundkar	Pinclick
95	Pratik Ashok Landghule	Pinclick
96	Anuj Parmar	Pinclick
97	Pratham Jamkhande	Face Prep
98	Miraj Kadde	Face Prep
99	Jayesh Rankhambe	Inteliment Technologies Pvt. Ltd.
100	Pranav Ahire	Academor
101	Vinayak Girhe	Academor
102	Pratham Jamkhande	Academor
103	Miraj Kadde	ExcelR



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104	Kalyankumar Chintaguntla	ExcelR
105	Ronit Dipak Patil	Bajaj Finserv Direct Limited



### III. PROJECT LIST OF ACADEMIC YEAR 2022-23

Group No/ Group ID	Project Group Member Full Name	Title of Project	Name of Guide
1	Chintaguntla Kalyankumar Malakondayya	Yoga Pose Detection Using Deep Learning	Mrs. M. A. Zope
	Prasad Swapnil Chandrashekhar		
	Ghewade Aniruddha Sanjay		
	Patil Omkar Mansingrao		
2	Bothara Shreya Sagar	Intelligent System for Descriptive Answered Evaluation	Mrs. M. P. Nerkar
	Bothara Shrutee Sagar		
	Mehta Shruti Rajendra		
	Tanishka Shinde		
3	Sonawane Komalika Prashant	Tomato Plant Disease Detection and Automatic Pesticides Suggestion using CNN	Mrs. M. P. Nerkar
	Mascarenhas Simran Joseph		
	Shaikh Rana Iqbal		
	Soni Aishwarya Lakshmikant		
4	Susar Rushikesh Dilip	Vision Based Market Product Recognition System	Mrs. P. S. Gaikwad
	Patil Mayur Prakash		
	Patil Ankit Subhash		
	Undre Siddhesh Bhausaheb		
5	Hande Rutuja Kalyan	Blockchain Based Fake Drug Detection	Mrs. A. G. Said
	Gawali Triveni Santosh		
	Bendgude Sheetal Ramchandra		
	Chavan Mayuri Umesh		
6	Mandhana Sakshi Shyamsunder	Market Basket analysis for Real-time store	Mrs. N. S. Patil
	Sasane Prajakta Shirish		
	Pawar Devayani Rahul		
	Malshikare Vaishnavi Tatyaba		
7	Patil Vaishnavi Anil	Land Cover Mapping Using Satellite Imagery	Dr. S. N. Zaware
	Shetty Nikita Manjunath		
	Bhosale Rajlaxmi Vinod		
	Shah Vama Chetan		
8	Kabra Kaustubh Shrikant	Image Forgery Detection	Dr. K. S. Wagh



	Shah Harsh Amish	Using CNN and GAN	
	Banarse Onasvee Omikkumar		
	Mete Akash Bramhadeo		
9	Patil Ashish Dinesh	Indoor Navigation Using Augmented Reality and Vision Based Positioning System	Mrs. P. S. Gaikwad
	Chopade Aniket Ananda		
	Nitin Bhise		
	Aniket Aher		
10	Nagale Rishikesh Punjab	Football Player Head pose Detection by Using Low Resolution Footages	Mrs. N. S. Patil
	Rakshe Sucheta Sunil		
	Parmar Anuj Jitesh		
	Agrawal Gargi Anil		
11	Jadhavrao Rajvardhan Pradiprao	Electricity Prediction Using Demographic Factors	Mr. C. N. Aher
	Om Abasaheb Autade		
	Pratiksha Balkrishana Patil		
	Sarak Prachi Vijay		
12	Mungurwadi Sarvesh Anand	Social Behaviour Analysis During Farmer Protest	Mrs. N. S. Patil
	Prabhudas Savan Jadav		
	Sanas Prathamesh Sunil		
	Pradhan Manish		
13	Khond Shriniwas Shrikant	Academic Certificate Issuance and Verification Using Block chain	Mr. P. S. Sadaphule
	Mane Sarthak Mukund		
	Doshi Shivam Rajendra		
	Raundal Harshal Devman		
14	Wable Rutul Dilip	Context based Lexical Simplification	Mr. P. S. Sadaphule
	Kadam Ashitosh Shriram		
	Harihar Prasad Raosaheb		
	Rankhambe Jayesh Suresh		
15	Bhole Pragati Vilas	Real Time Vehicle Counting and Speed Detection Using CCTV Footage	Mrs. P. S. Gaikwad
	Karekar Aniruddha Nitin		
	Chaudhari Pratik Nitin		
	Girhe Vinayak Dinesh		
16	Bhamare Manish Bharat	Development of healthcare portal for regulations using machine learning	Mrs. M. A. Zope
	Joshi Sayali Jayant		
	Raut Shubham Ajit		
	Sontakke Shubham Gangadharrao		
17	Rakshita Rahul Khadtare	Fusion Data Security for	Mr. P. S.



	Siddhi Dhananjay Gaikwad	Sensitive E-Documents	Sadaphule
	Sampada Rajendra Ahinave		
	Shreyas Rahul Dalwale		
18	Chordia Anuj Satyen	Melanoma Detection Using CNN	Dr. K. S. Wagh
	Kadde Miraj Nitin		
	Mahashabde Bhargavi Mahesh		
	Deshmukh Unnati Rajshekhar		
19	Yadav Aakanksha Sandip	Multi Class Brain Tumor Detection Using Deep Transfer Learning	Dr. K. S. Wagh
	Dhotre Aishwarya Anil		
	Lagad Krishna Dilip		
	Aishwarya Kamble		
20	Shriyash Band	Machine Learning Approach for Automation of Supply Chain System	Dr. S. N. Zaware
	Himank Tyagi		
	Anish Dhawalikar		
	Aditya Pokharkar		
21	Kamble Pournima Prshant	Steganography System for Image, Audio, and Video Data	Dr. S. N. Zaware
	Jamkhande Pratham Ganesh		
	Shinde Sushil Satish		
	Hulke Manasi Laxmikant		
22	Dhurde Tejas Onkar	Automatic Depression Detection Using Audio and Test Sequences	Dr. S. N. Zaware
	Parthe Sneha Santosh		
	Wattamwar Akshata Anil		
	Nikam Aniket Dnyaneshwar		
23	Kate Apurva Yogesh	Marathi/Hindi Handwritten Character Recognition Using Deep Learning	Ms. P. D. Bormane
	Parkhi Vaishnavi Manoj		
	Honrao Shreyas Santosh		
	Sonawane Shubham Prabhakar		
24	Gandhi Hritika Pravin	Real Time Network Attack Detection Using Machine Learning Techniques	Mr. C. N. Aher
	Sutar Snehal Somanath		
	Khune Piyusha Balasaheb		
	Kumari Snehal Baban Pattebahadur		
25	Parth Rewoo	Cloud Based Document Processing and Digitization	Mrs. A. G. Said
	Aditya Kumar Jaiswal		
	Mahajan Durvesh Sham		
	Harshit Naidu		
26	Sonawane Yash Kondaji	Emotion and Activity	Mrs. M. P. Nerkar





	Tangle Parind Manikrao	Based Music System	
	MULAY Soham Shital		
	Giri Omkar Arjun		
27	Shelke Akanksha Janardan	Detection of Alzheimer Using ML	Mrs. M. A. Zope
	Mahajan Ishika Anurag		
	Yadav Peeyush Kumar		
	Katkar Vaishnavi Vilas		
28	Agarwal Chetan Sanjay	Surveillance Video Analysis Using Deep Learning	Dr. K. S. Wagh
	Pathan Rana Dilawar		
	Pathare Shraddha Raghu		
	Sayed Mustafa Nisar		
29	Divekar Rohit Laxman	Electronic Health Record System Using Blockchain	Mrs. A. G. Said
	Bhunja Prasun Pankaj		
	Kulkarni Sushant Ravindra		
	Shinde Pallavi Vijay		
30	Dange Yogesh Bharat	person re-identification in closed and open environment using CNN	Mr. G. J. Navale
	Jadhar Pratik Shivaji		
	Sangale Harshal Bhausaheb		
	Kshitija Shirke		
31	Ninad Shirsat	Identify Ingredients from Food Image and Generate Recipe	Mrs. A. S. Chavan
	Ronit Dipak Patil		
	Kunal Jaykumar Bumb		
	Atharv Vilas Satpute		
32	Bendale Himanshu Vikas	Solar Panel Fault Detection Based on Thermal Image Processing	Mr. C. N. Aher
	Aswar Harsh Arun		
	Bamb Hitesh Hemant		
	Desai Parth		
33	Parth Panse	Virtual Study Environment with ML Integration	Dr. K. S. Wagh
	Takalkar Archis Subhash		
	Chirme Abhishek Mahendra		
	Chandak Prarthana Anup		
34	Aditya Manish Bokade	Analysis of Echocardiogram Using CNN	Dr. S. N. Zaware
	Yash Vyankatrao Deshpande		
	Arjun Sunil Kakade		
	Janhvi Kridutta		
35	Bharvirkar Vedant Sandeep	Contactless Fingerprint	Mr. P. S.



	Hendre Atharva Rahul	Recongnization System for Attendance	Sadaphule
	Tarate Shubham Dnyandev		
	Umredkar Varshan Raju		
36	Saykar Pranav Ganpat	Time Table Generator and Management Using Genetic Algorithm	Mrs. A. G. Said
	Landghule Pratik Ashok		
	Tanmay Janrao		
	Parikshit Shinde		
37	Yadav Aditya Sambhaji	Music Instruments cord Analysis Using ML	Mrs. M. P. Nerkar
	Gaikwad Sourabh Laxman		
	Kuigade Tanmay Mahesh		
	Patil Athang S.		
38	Vincent Simon	Movie Success Prediction using Machine Learning	Mrs. N. S. Patil
	Tushar Sharma		
	Rohit Thakare		
	Sharvil Dholepatil		
39	Desai Prasad Babaso	Classification and Dispatching of Super Market Orders Based on Area Using ML	Mrs. M. A. Zope
	Chaundkar Omkar Madhukar		
	Amolic Prasad		
	Saish Anmal M		
40	Sanket Patil	Early Predication of Flood in Areas Using Machine Learning	Mrs. M. P. Nerkar
	Aryan Gupta		
	Pranav Ahire		
	Swapnil Sutar		
41	Sunit Lohade	Crime Rate Predication Using ML	Mrs. M. A. Zope
	Rutvik Korade		
	Bezan Nanavatti		
	Kavita Thakur		



#### IV. INTERNSHIP DETAILS OF YEAR 2022-23 TE DIVISION A

Roll No	Name of the student	Company Name
1	Aman Kumar Verma	Oytie Pvt. Ltd.
2	Anandhu Sathyaseel	TXON Pvt. Ltd.
3	Anuj Jeevan Karade	ProAzure Software Solution
4	Arnav C Amate	KasNet Pvt. Ltd.
5	Ashwin Bhagat	KasNet Pvt. Ltd.
6	Awachar Abhay Panjabrao	ProAzure Software Solution
7	Bachhav Yash Prashant	PRIMUS TECHSYSTEMS
8	Beldar Ajay Harishchandra	AHEN
9	Bhalerao Aditya Rajendra	AI Adventures
10	Bhandare Tejas Uday	Elite Softwares
11	Bora Arpit Atul	Elite Softwares
12	Chavan Aditya Vitthal	Oasis Info byte
13	Dalvi Rajveer Sangram	ProAzure Software Solution
14	Dhadwe Sanskruti Shirish	Oasis Info byte
15	Dharmadhikari Anurag Dhananjay	Oasis Info byte
16	Dudhade Kaushik Mukund	Oasis Info Byte
17	Falguni Takawale	KasNet Technologies Pvt. Ltd.
18	Ghatage Siddhesh Kishor	Oasis Info byte
19	Ghorpade Jayashri Sambhaji	Xartup Edutech Private Limited



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## DEPARTMENT OF COMPUTER ENGINEERING

20	Giri Rushikesh Subhash	acmegrade pvt.ltd
21	Gohire Karan Anand	TECHNOBRILLIANT LEARNING SOLUTIONS
22	Gole Sumedh Satish	1)Synzent 2)Prakash engineering
23	Het Bhalala	palmonas pvt. Ltd
24	Jain Ritik Sunil	WinLinTech Solutions Pvt.Ltd.
25	Jaiswal Dev Prashant	KasNet Technologies Pvt. Ltd.
26	Jaiswal Siddhi Akshaykumar	Oasis Info Byte
27	Jishan Shiledar	KasNet Technologies Pvt.Ltd.
28	Kacholia Niraj Rajendra	LetsGrowMore
29	Kadam Bhushan Sampat	Oytie Pvt. Ltd.
30	Kakde Om Kiran	Codeclause
31	Kale Ishwar Vijaykumar	AHEN
32	Karkikar Om Sachin	Codeclause
33	Khade Laukik Rahul	Codeclause
34	Kotangale Hardik Mahesh	Oytie Pvt. Ltd.
35	Kumbharkar Rohan Rajendra	AHEN
36	Lolap Ruchira Sachin	PRIMUS TECHSYSTEMS
37	Londhe Vaibhav Mahesh	Oytie Pvt. Ltd.
38	Madane Aarti Rajesh	CodeClause
39	Mane Kedar Pradeep	Oytie Pvt. Ltd.
40	Marke Shubham Dnyaneshwar	CodeClause



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42	Natekar Diksha Charudatta	Oytie Pvt. Ltd.
43	Nikam Anurag Vijay	TXON
44	Oam Jagtap	WinLinTech Solutions Pvt.Ltd.
45	Pathan Salonee Mustak	Oytie Pvt. Ltd.
46	Pathare Tejas Navnath	Oasis Infobyte.pvt.Ltd
47	Patil Gautam Jitendra	Elamigo E-Com
48	Patil Yadnesh Anil	Oytie Pvt. Ltd
49	Patwa Bhavik Nitin	TXON IT Services Pvt Ltd
50	Pawar Aditya Anil	Vishwaguru Infotech Pvt. Ltd
51	Pawar Jayesh Bhalerao	iNeuron Intelligence Pvt Ltd
52	Pawar Sanskruti Chandrakant	NullClass
53	Phatale Utkarsh Sanjay	LearnWik Solutions PVT LTD.
54	Priya Pathak	Codeclause
55	Rajpurohit Rahul Kuksingh	Vishwaguru Infotech Pvt. Ltd
56	Rajugade Pradnya Prakash	Information Technology Systems
57	Ramdasi Hrushikesh Hemkantrao	ProAzure Software Solution
58	Raskar Priyanka Sambhaji	Oytie Pvt. Ltd.
59	Rathod Pavan Ankush	OasisInfobyte Pvt.Ltd
60	Ritik Pandita	Oytie Pvt. Ltd.
61	Savardekar Suchitra Chandrakant	Codeclause





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63	Shaikh Tausif Rafiq	KasNet Technologies Pvt. Ltd.
64	Shirsathe Sakshi Rakesh	Codeclause
65	Shisode Yash Rajesh	NoQs Digital
66	Solankure Siddharth Sanjay	Codeclause
67	Supekar Atharva Arun	PRIMUS TECHSYSTEMS
68	Tathe Tanmay Rajendra	Ahen
69	Todkar Shreyas Sunil	Oasis Infobyte
70	Ugale Kaustubh Namdev	CodeClause
71	Vallakati Vedant Sushil	<a href="https://iNEURON.ai">iNEURON.ai</a>
72	Vanshiv Siddhi Vrushal	IANT
73	Vedika Pramod Gujalwar	Itelligence infotech Pvt. Ltd.
74	Vishal Shahaji Bawadkar	ProAzure Software Solution
75	Waghchoure Mahesh Narsing	Oasis Info Byte
76	Yashwardhan Hemant Deshmukh	Oasis Info Byte
77	Yegare Yash Dnyanoba	<a href="https://iNEURON.ai">iNEURON.ai</a>
78	Yerguntala Swapnil Purushottam	Codeclause



## INTERNSHIP DETAILS OF YEAR 2022-23

### TE Division B

Roll No	Full Name	Company Name
1	Aarushi Abhijeet Adnaik	Cybtreet Pvt. Ltd
2	Varun Akhilesh Agrawal	Oasis infobyte
3	Ajay Singh	Elite Softwares
4	Akanksha Yadav	Icomply life science solutions
5	Atharva Ashwin Achrekar	Let's grow more
6	Neha Pravin Avati	PRIMUS TECHSYSTEMS PVT.LTD
7	Avishi Abhishek Roy	Ksolves
8	Shantanu Yogesh Badwe	Oasis Infobyte
9	Prasanna Neelkanth Bhilegaonkar	PurpleBoat
10	Niraj Dhananjay Bondarde	TXON IT Services
11	Swaraj Buchude	Suven Consultants and Technology Pvt. Ltd.
12	Ishika Chandrashekhar Chandwadkar	Oytie
13	Anish Avinash Chavan	Nightingale Florence Trust
14	Kaushal Chavan	Netcron technologies
15	Daanish Shaikh	Oasis Infobyte
16	Shreya Sanjay Dalvi	Crysmatic Web and Media Solution Pvt Ltd
17	Ramit Desai	Seagull Advertising
18	Gauri Laxmikant Dhanorkar	wisdom sprouts Scalefull technologies
19	Sakshi Raghunath Dhondkar	TXON
20	Sakshi Annaso Dubile	Almond Technologies Pvt.Ltd.
21	Lucy Savio Fernandes	TXON
21	Lucy Savio Fernandes	TXON
22	Harshada Darshit Gaikwad	PaloAlto Networks(AICTE Eduskills)
25	Gaurav Pravin Chaudhari	Codeclause
27	Sarang Kishor Girase	Oasis infobyte
28	Amogh Gojamgunde	ScaleFull Technologies



30	Naman Tarun Guntiwar	Sync's Intern
30	Naman Tarun Guntiwar	Sync's Intern
31	Kushal Suresh Hedao	Oytie pvt Ltd
32	Ishan Mahesh Mankar	WinLinTech Soln. & CodeClause
33	Pranoti Somnath Jagtap	CODECLAUSE
34	Parth Satish Jamdade	Code Clause
35	Parul Nishikant Kakade	CodeClause
36	Yash Vivekanand Kalyani	Sync interns
37	Rohit Shamkant Khairnar	Quick Heal Technologies Ltd.
39	Siddhi Sunil Kothavale	CodeClause
40	Rohan Balasaheb Kshirsagar	CodeClauseInternship
41	Prajwal Harish Kuchewar	Vishwaguru Infotech Pvt. Ltd.
42	Pranav Jugalkishor Lohiya	LetsGrowMore
44	Manas Manish Chachra	Psy Tech Digi pvt ltd
44	Manas Manish Chachra	Psy Tech Digi pvt ltd
45	Harshad Balaji Mandavkar	Bolt-Iot
46	Swayamsiddha Amrutraj Mane Deshmukh	Almond Technologies Pvt. Ltd.
47	Omkar Nitin Mane	Squirrel's Info Tech
48	Sanika Pravin Mane	DopeTech Solutions
49	Sanket Sudesh Mane	Let's grow more
50	Vidhi Vikram Mane	Oasis Infobyte
51	Abhishek Dnyanoba Munde	OASIS INFOBYTE
52	Sarthak Rajesh Naik	Primus Techsys
53	Nirnay Digambar Patil	STL Technologies pvt ltd
54	Omkar Popat Lokhande	Inventrom Pvt. Ltd. (Bolt IoT)
55	Ashutosh Pandey	Code Clause
55	Ashutosh Manoj Pandey	Code Clause
56	Yash Chandrakant Paraswar	CodeClause
57	Aniket Rajendra Patil	Oasis Infobyte
58	Gaurav Pandharinath Patil	Oasis Infobyte



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## DEPARTMENT OF COMPUTER ENGINEERING

59	Mayuresh Pramod Patil	Oasis Infobyte
60	Sohan Mahendra Patil	Oasis infobyte
61	Vaishnavi Patil	Itelligence Infotech pvt. Ltd.
62	Yash Sunil Patil	LETS GROW MORE
63	Swapnil Santosh Phand	vishwaguru infotech pvt.ltd
64	Rudra Rahul Pingle	Wisdom sprouts scalefull technologies
65	Rohit Dhananjay Pol	Vishwaguru Infotech
66	Pranay Devkar	Oasis Infobyte
67	Pratham Milind Sonawane	CodeClause
68	Sanket Ravindra Raut	Code clause
68	Sanket Ravindra Raut	Code Clause
69	Pratik Ramakant Sarkate	Oasis Infobyte
70	Nileet Sumesh Savale	Oasis Infobyte
71	Aman Bapu Shaikh	ScaleFull Technologies
72	Anagha Sanjay Shete	CodeClause
73	Suyash Gokul Shewale	Oasis infobyte
74	Prashant Deepak Shigwan	Txon private ltd
74	Prashant Deepak Shigwan	Txon private limited
75	Ayush Kumar Singh	Bolt IoT
76	Atharva Mohan Tirkhunde	Ineuron Pvt. Ltd.
77	Madhura Anil Urunkar	Vishwaguru Infotech
78	Vaishnavi Nandkumar Veer	Inventrom Pvt. Ltd. (Bolt IoT) .
79	Dnyaneshwari Yogiraj Walde	CodeClause
79	Dnyaneshwari Yogiraj Walde	CodeClause
80	Sejal Santosh Zende	TXON



## V. GLIMPSES OF SPONSORED PROJECTS 2022-23

### TITLE: MACHINE LEARNING APPROACH FOR AUTOMATION OF SUPPLY CHAIN SYSTEM

#### Introduction

What exactly is a supply chain? A supply chain is a network of connections that helps the network distribute different goods and services both domestically and internationally. The supply chain uses a tabulated structure made up of an efficient network and fruitful informational media to confirm the delivery of products from raw materials to final consumers. Any product's primary supply chain includes raw materials, producers, distributors, retailers, and end users

#### Steps in Supply Chain:-

- Purchasing the raw ingredients necessary to create the finished product is the first step.
- Materials collection from suppliers: In order to create the final finished product, the producers needed raw materials.
- Production House: The manufacturer then initiates and concludes each step necessary to produce the finished good.
- Distribution: The act of giving the finished product to retailers or distributors.
- Consumption by final consumers The customer's purchase of the final goods is the last step.

#### System Architecture

Four components make up the bulk of the supply chain management architect. The company's prior sales and inventory data are used as input for the SCM system, as seen in the figures below. Data preparation is started by applying methods for features extraction and selection to the data. In subsequent steps, we must create an ML model that forecasts outcomes in accordance with the strategic strategy. After that, feed the test data to the model to obtain insightful findings. Additionally, we make the desirable results predictions. Finally, the customer application uses the outcomes or results provided by the system. This is the SCM System's basic system architecture.



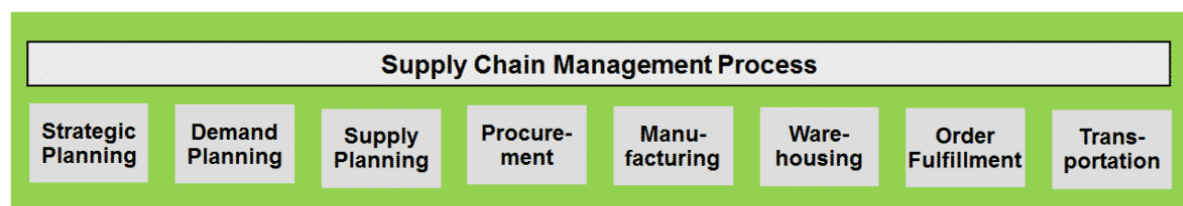
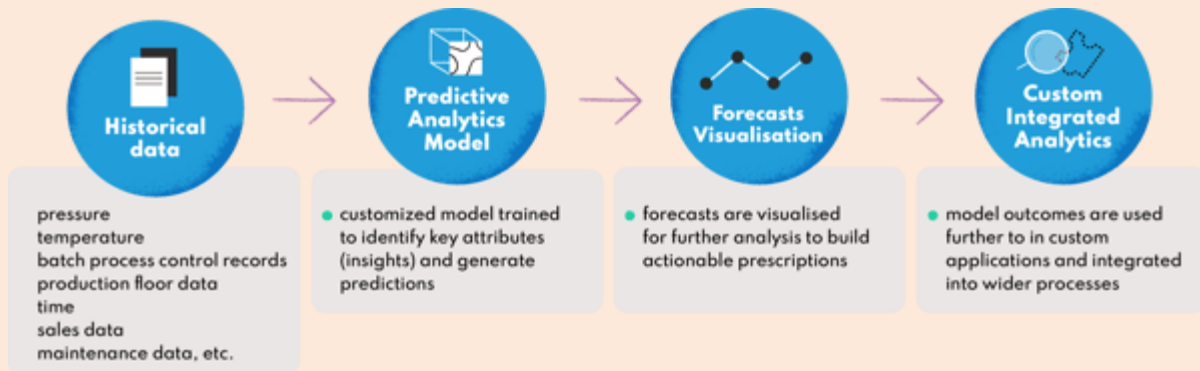


Figure 1: System architecture

## Conclusion

For the analysis and forecast of Supply chain Management challenges, we are implementing a novel technique based on the machine learning algorithm. This accomplishment can be achieved using machine learning techniques. real-time functionality, data processing, classification, location, and detection in order to resolve difficult problems. An important image processing method for data analysis for varied predictions is random forest with a transfer learning methodology. We are aware of its potential value because of the need for such a system in the modern day for better product quality and traceability. Numerous algorithms, including Random Forest, Decision Tree, XGBT, and others, can have their accuracy evaluated in order to evaluate these strategies.



## Future Scope

- Our goal is to create an automated system that can analyse and forecast Supply Chain Management problems.
- Manufacturers and distributors can utilise the technology to estimate demand. It is anticipated that the system, which combines data preprocessing, pattern analysis, and a model built using machine learning algorithms, will increase the sensitivity, specificity, and effectiveness of SCM.
- Build such a model which gives highest accuracy as compared to the previous techniques of SCM.

<b>Group Members:</b>
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Anish Dhawalikar
Himank Tyagi
Aditya Pokharkar
<b>Guide:</b>
Dr. Sarika Zaware



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## Title: Multiclass Brain Tumor Detection Using Deep Transfer Learning

### Introduction:

### Overview

In this proposed system, we are implementing a software that uses image processing and machine learning techniques such as Convolutional Neural Networks (CNN) and Deep Transfer Learning Algorithms to classify brain tumors into various types. The objective of this project is to create a brain tumor classification system that can aid in early detection and diagnosis of brain tumors.

### Motivation

Brain Tumor Detection using Deep Transfer Learning which can detect and classify brain tumor in four different classes-No tumor, Glioma, Meningioma, and Pituitary tumor. Some of the reasons for motivation are as follows:

- Early detection of brain tumor.
- To provide smart technique to detect brain tumor with highest accuracy and minimum false rate.
- Reducing the pressure on human judgement.
- Reducing the death rate by early detection.
- To simulate the work of intelligence analyst.
- Judge if a document is relevant to a topic of interest.
- Supporting faster communication , which will provide better treatment to patients in remote areas.

### Problem Definition and Objectives

Brain tumor has led to millions of deaths in the world and has become a leading factor of deaths. So early detection of brain tumor is of utmost importance and now with the advancements in the field of medical science and technology, it is possible. Through Deep Learning and Machine learning, softwares can be developed which can detect and also classify tumors into its various



types. With the help of image processing and machine learning a brain tumor classification system is proposed through CNN and Deep transfer Learning Algorithms.

### **Project Scope and Limitations**

This system involves determining the location and type of tumor in MRI images. The algorithms used today are not sufficient enough. On latest experiments, it is shown that transfer learning method is one of the most successful and proper method for tumor detection. We intend to use transfer learning method to detect whether or not brain tumor exists in MR Image. We want to show whether the tumor is cancerous or not. This way, the doctors will have second hand verification system for brain tumors. This proposed method/system will help the doctors in diagnosing brain tumors, and help the patients to start early medication/treatment.

### **Methodologies of Problem Solving**

Our system is implemented in different modules:

#### **1. Data Collection:**

The first step would be to collect MRI images of brain tumors and the corresponding labels for the types of brain tumors, i.e. gliomatumor, meningioma tumor, and pituitary tumor.

#### **2. Data Pre-processing:**

The collected data needs to be pre-processed before it can be used to train the deep learning models. This step could include resizing images, normalization, and augmentation to increase the size of the dataset.

#### **3. Transfer Learning:**

Pre-trained models such as VGG-16, ResNet-50, and Inception-v3 can be used as the base for transfer learning. These models can be fine-tuned on the collected brain tumor images to improve their performance in classifying the different types of tumors.

#### **4. Model Selection and Training:**

The pre-processed data can be split into training and testing sets. Different deep learning models can be trained on the training set using transfer learning techniques. The performance of these models can be compared using metrics such as accuracy, precision, recall, and F1 score.

#### **5. Model Evaluation:**



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The trained models can be evaluated on the testing set to measure their performance in classifying the three types of brain tumors. The results can be analyzed and compared to select the best-performing model.

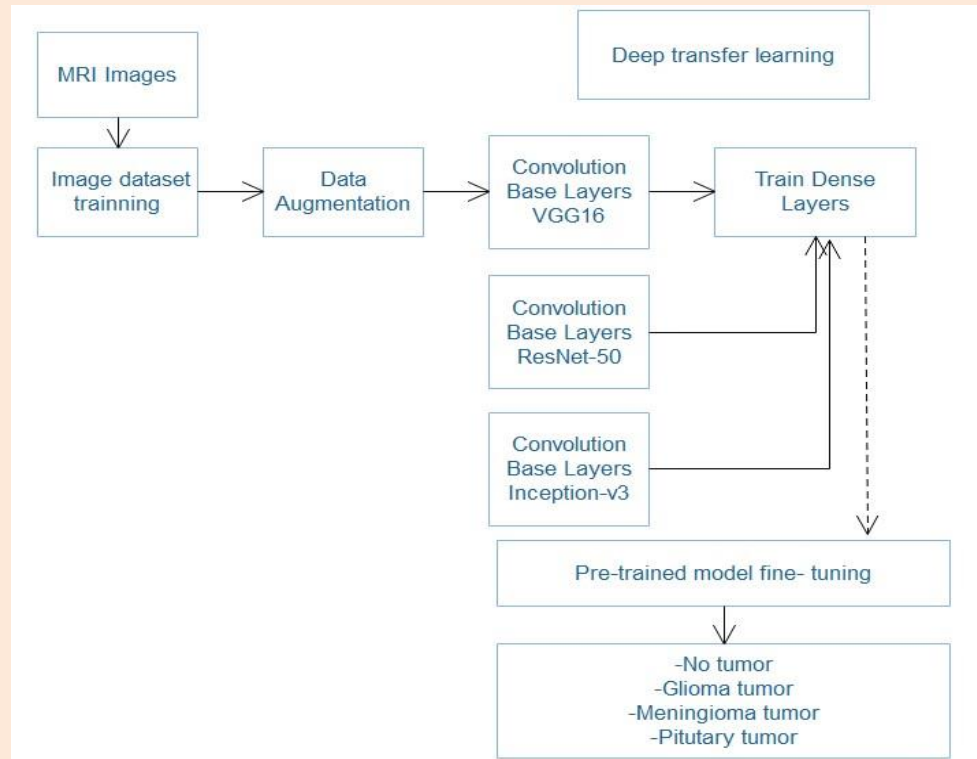
## 6. Deployment:

Once the best-performing model is selected, it can be deployed as a software tool that can take MRI images of brain tumors as input and classify them into the three different types of tumors. This tool can be made available to medical professionals to aid in the early detection and diagnosis of brain tumors.

## System Architecture:

Deep Transfer Learning algorithms based on CNN is used here to classify the MRI images. VGG16, ResNet-50, Incption-v3 are deep transfer learning algorithms proposed for classification of dataset. Dataset is divided into three parts: training data, validation data and test data. Training data is used to train the model. The model uses the training images to train itself. Validation data is used to verify the training process and also determine the validation accuracy. The test data is used to determine the accuracy of the model, it is unknown data which is used to test the model. In our proposed work we are doing comparative performance analysis of VGG16, ResNet-50 and Inception-v3 algorithm. The Vgg16, Inceptionv3, ResNet-50 are the pretrained model, We use the weights of those particular algorithms and will calculate the accuracy, performance, F1 score and recall score.





## Conclusion

The results of your project show that transfer learning algorithms are effective in detecting brain tumors using MRI images. Among the three algorithms used, Inception V3 demonstrated the best performance with a high testing accuracy of 87.074% and a reasonable training accuracy of 94.211%. VGG16 also performed well with a high training accuracy of 98.153%, but its testing accuracy was relatively lower at 75.88%. On the other hand, ResNet-50 showed a lower testing accuracy of 62.436%, despite having a high training accuracy of 97.421%. This suggests that the model may have overfit on the training data, causing it to perform poorly on the testing data. Overall, the results of your project indicate that Inception V3 and VGG16 are promising models for detecting brain tumors using MRI images **Applications**

### 1. Hospitals

Doctors and surgeons use more tests to diagnose a brain tumor and determine the brain tumor type. They also perform tests to find out if the tumor has spread from its site of origin to another part of the body. This is called metastasis and is infrequent in a primary brain tumor. Doctors and surgeons may also run tests to find out what treatments might do best.



## 2. Laboratories and healthcare centres

Laboratories can use the system based on MRI images of the brain to detect cancerous growth. Detecting cancerous growth at an early stage can help to cure the tumor efficiently, and this will definitely help patients to recover from brain tumor quickly.

## 3. Medical Colleges

Medical schools can use the system based on MRI images of the brain to familiarise their students with the application of machine learning in medical and to expand their knowledge. Student feedback on the system can also help the system to identify and correct errors.

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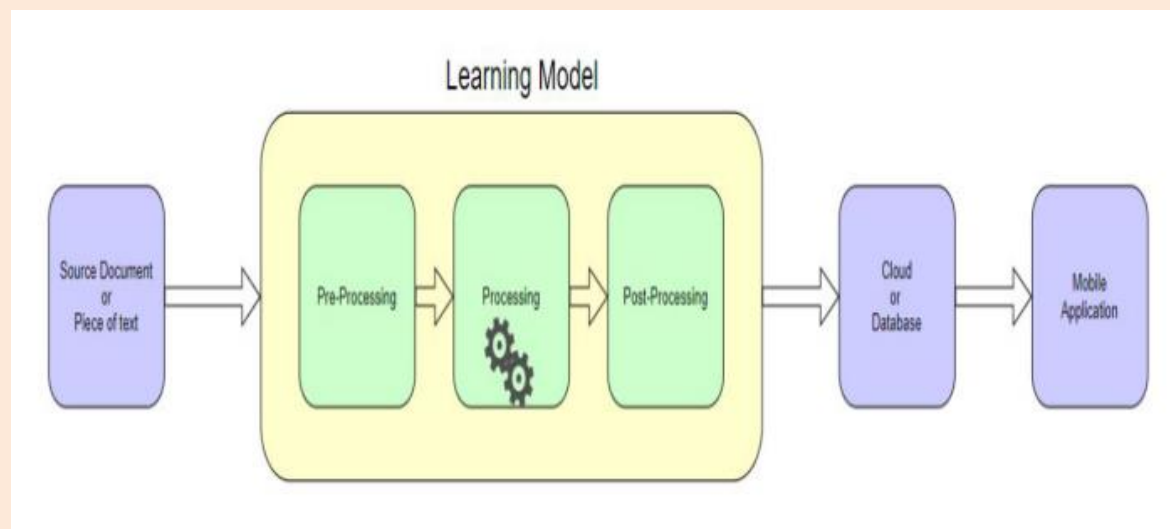
## TITLE: SOLAR PANEL FAULT DETECTION USING DEEP LEARNING

### Introduction :

The fastest-growing source of clean, sustainable energy, solar energy outperforms all other types of energy production. Solar panels typically require little upkeep and do not need ongoing maintenance. Numerous issues, however, might cause a production loss of up to 20 percent because a faulty panel can affect the generation of the entire array. The cost of repairs will be lower if the power plant is properly maintained on time, but more importantly, it will last longer and provide more electricity overall. Large solar plantations require expensive and time-consuming manual panel monitoring, and it is more difficult for people to get to remote solar plantations. In this article, deep learning-based methods for detecting faults in photovoltaic systems are presented utilizing thermal images from an unmanned aerial vehicle (UAV) equipped with infrared sensors.

The software which will be produced as an output of this research and work will be able to detect solar panel faults(internal) accurately and will be able to predict the amount of solar energy produced as a result of these defects using the voltage and current values which have been observed previously. In future scope, this software may also be able identify faults from images of solar panels.

### Architecture :



The flow of the proposed system is described and represented in following manner :

Preprocessing: In this Module Machine will be processing on given Input. In preprocessing



machine will train the dataset, removing Noisy part of given input and then resize the data-set.

Feature Extraction: In this module CNN extract the solar panel faults and store in the model file.

Classification: User testing value classify with train dataset using CNN Algorithm (regions with convolutional neural networks). Machine Learning will predicate given input of person is blood cell count . to getting more accuracy, here we use machine learning with CNN Algorithm.

The proposed system takes in a .csv file as input. This .csv file is generated by the solar panel system monitor which records the amount of energy generated and stored by the solar panel or array system in the terms of Voltage, Current, Capacity, etc.

The above .csv file is given as input to the Machine Learning Model which predicts the types of faults in the system based on the values of current and voltage which are recorded.

### Conclusion & Future Scope:

In this proposed system we are detecting the faults in the solar panel or array system via Deep Learning in order to get accuracy of this system, because accuracy is more important in machine learning and Deep Learning, as well as we are using CNN algorithm in deep learning.

It was concluded, too, that the more properties we use, the more detailed the model becomes.

The proposed system can be expanded to take in images of solar panel systems as input and then only find out faults which can be classified through binary classification rather than going through all the values of voltage and current which are recorded by the machine.

This will help improve the accuracy of the project as well as reduce the time required to execute and detect the fault.

### Applications :

1. To save solar energy from wastage.
2. To find out faults in solar array systems and find ways to resolve the faults.
3. To notify user of faults and suggest prescriptive actions.

<b>Group Members:</b>
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Aswar Harsh Arun
Bamb Hitesh Hemant
Desai Parth
<b>Guide:</b>
Dr.C.N.Aher



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## **TITLE: LOCALISATION INDOOR NAVIGATION USING A\* PATHFINDING ALGORITHM AR-CORE**

### **Introduction:**

The term 'navigation' collectively represents tasks that include tracking the user's position, planning feasible routes and guiding the user through the routes to reach the desired destination.

### **Overview:**

Indoor navigation systems have broad number of applications. The certain applications are wayfinding for humans in railway stations, bus stations, shopping malls, museums, airports, and libraries. Visually impaired people also benefit from indoor navigation systems. Unlike outdoor areas, navigation through indoor areas are more difficult.

### **Motivation:**

Our motivation for this project stems from the fact that people are increasingly relying upon their smartphones to solve some of their common daily problems. One such problem that smartphones have not yet completely solved is indoor navigation. At the time of writing, there is not a single low-cost scalable mobile phone solution available in the market that successfully navigated a user from one position to another indoors. In places such as museums and art galleries, the application could be extended to plan for the most optimal or 'popular' routes. We proposed a system in order to overcome all these issues and provide an easy to-use navigation interface.

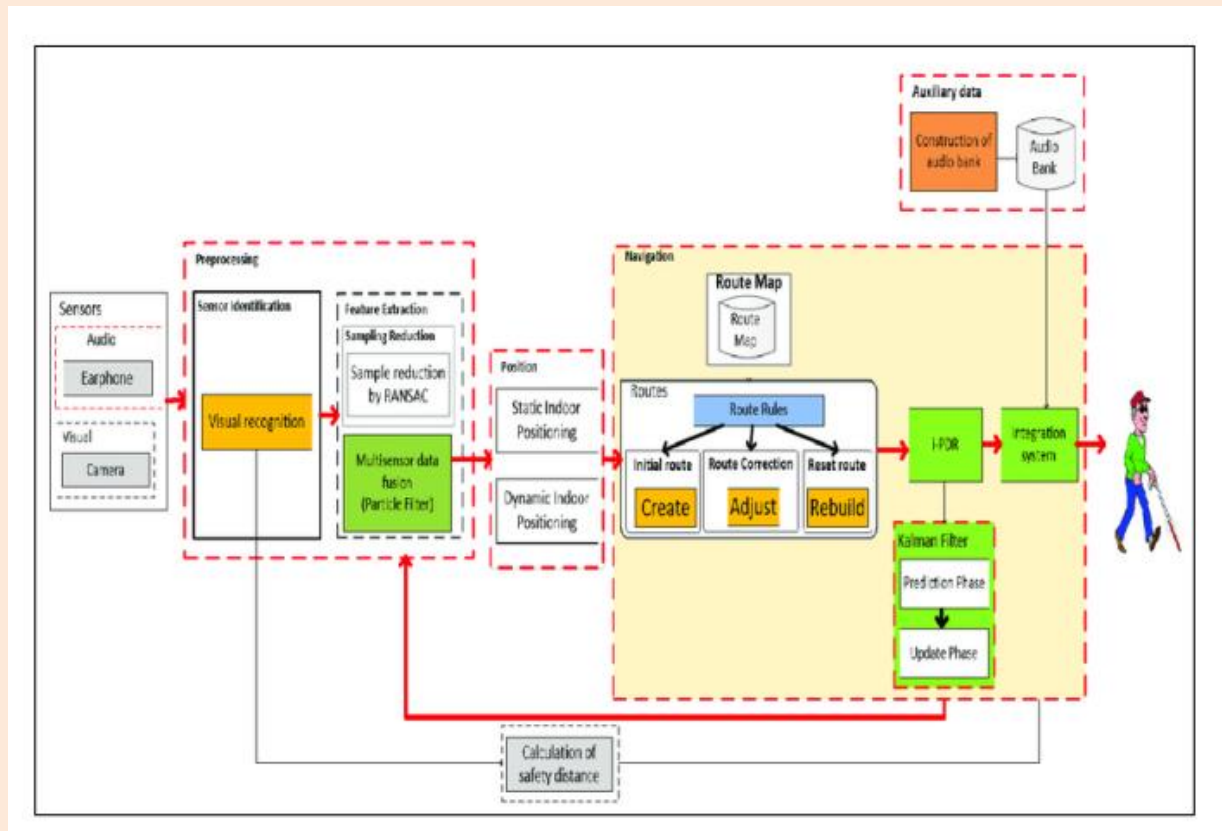
### **Problem Definition and Objectives:**

To solve the navigation problems faced by the user while traversing huge infrastructures like Large Scale Retail stores, Malls, Hospitals, Airports, Cineplex, Warehouses, Auditoriums, etc. with AR Indoor Navigation using A\* Path Finding Algorithm, we have this method developed. The primary objective of the proposed system is to provide indoor navigation with exact user positioning mechanism using inertial sensing and AR-core functionality. This work will eliminate the need of hardware-based indoor positioning system.





## System Architecture:



## Conclusion:

Our system generates the shortest path from source point to destination point using A\* pathfinding algorithm and AR-core libraries. Although, computer vision play an important role but inertial motion sensing helps to keeps the phone stable and predicts the accuracy of the input requirement. The system generates the supervised dataset automatically. The unlabelled dataset given as input is processed and a labelled dataset is given as the output.

## Applications:

1. Hospital Navigation Mapping all the facilities, rooms, ICUs and Doctor's cabins to help improve navigation indoors. Saving man-power time in emergencies.



2. Airport Gates Section management Navigating to Flight Gates is an ongoing problem as there are many gates at an airport and many different sections connecting to each other. To save time and effectively reaching the right destination indoor is a necessity as it may cost you losing a flight.

3. Shopping Malls Complex routing similar confusing lanes makes navigating hard and wastes time and effectiveness of shopping being an entertainment.

4. Architecturally Complex Infrastructures In large infrastructure there exists the problem of navigation. For example : Shopping malls, airports, hospitals, housing societies.

<b>Group Members:</b>
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Nitin Bhise
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<b>Guide:</b>
Mrs.P.S.Gaikwad

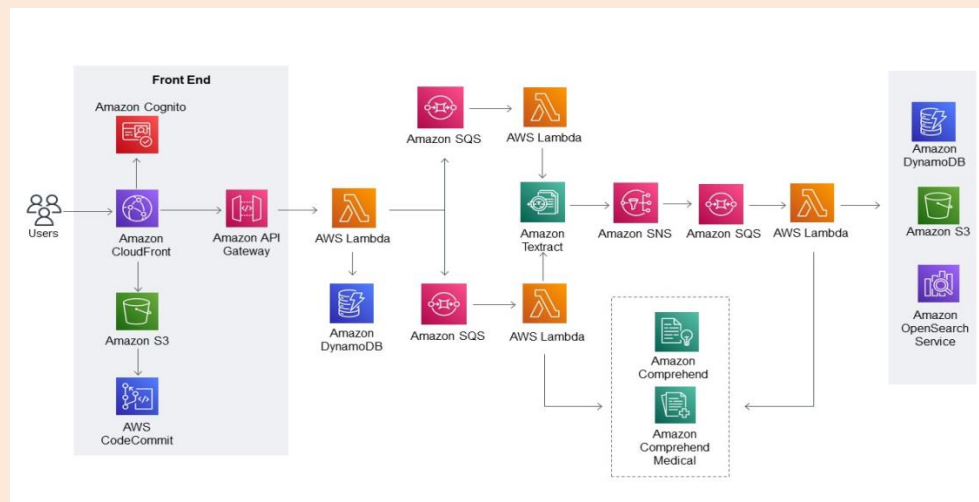


## TITLE: CLOUD BASED DOCUMENT UNDERSTANDING SYSTEM

### Introduction

A Cloud-based Document Understanding System is a software solution that utilizes cloud infrastructure to analyze and extract valuable information from documents without plagiarizing their content. By employing techniques such as natural language processing and machine learning, the system ensures efficient document management and comprehension. It enables secure document upload and storage, precise text extraction, entity recognition, and document classification. With scalability, accessibility, and data security measures in place, researchers can effectively automate tasks, gain valuable insights, and enhance research efficiency while maintaining the integrity of the original documents.

### Architecture



The Cloud based Document Understanding System's AWS Architecture Diagram shows us what all services have been used and what action they are providing. The system works together to process input document, extract and understand the relevant information present in the document.

### Conclusion

Cloud-based Document Understanding System not only improves document management and comprehension but also enables organizations to extract valuable insights efficiently. By optimizing document processing, it facilitates informed decision-making processes and enhances productivity. With its cloud-based architecture, the system ensures scalability and adaptability to



meet changing demands, making it a valuable asset across various domains, including business intelligence, legal document analysis, and academic research.

## Application

The application of Cloud-based Document Understanding System spans across various domains and industries, providing valuable solutions for efficient document management and analysis. Here are some potential applications:

1. Healthcare and Medical Records
2. Financial Services and Compliance
3. Data Extraction and Entry
4. Business Intelligence and Analytics
5. Academic Research

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