



Shri Vile Parle Kelavani Mandal's

**DWARKADAS J. SANGHVI COLLEGE OF ENGINEERING**

(Autonomous College Affiliated to the University of Mumbai)

NAAC Accredited with "A" Grade (CGPA : 3.18)



## **Department of Information Technology**

### **Final Year Projects**

The course intends to enable students to apply knowledge from different areas or courses, which they have studied in their curriculum using methods, tools, and techniques, which they learned to a real-world scenario. It allows students to apply their engineering knowledge and proficiencies (hard skills), and demonstrate their competence in generic, professional skills (soft skills). It also emphasizes the importance of life-long learning as a fundamental attribute of graduate engineers.

The projects undertaken in IT department range from research projects to applications catering to societal needs. Few of the novel applications are also filed for patent.

### **Following is the list of academic projects year wise:**

**Academic Year 2023-24**

**Academic Year 2022-23**

**Academic Year 2021-22**

**Academic Year 2020-21**

**Academic Year 2019-20**



## Department of Information Technology

Academic Year 2023-24

Project Titles:

1. AI Enhanced Construction Site Monitoring Safety and Efficiency Analysis
2. Solar Panel Defect Detection using CV
3. Medical Product Tracking using NFT, self custodial wallets & QR codes
4. PragatiEdu-A comprehensive Learning Ecosystem for rural education
5. Ascertain presence of individuals in scenes using facial recognition (TASL)
6. Picture Minator
7. Material-Aware Multilayered Garment Draping for Digital Humans
8. A device threat Identification and Risk Assessment using Feature Analysis using Machine Learning
9. Automated Chart Summarization
10. Brain Tumor Classification using FedML & XAI
11. YogaPedia
12. IntelliTutor
13. Ai Style Mate: Fashion Design Helper
14. Legal Eagle-Legal Assistance for Citizens
15. Interior Design Using AI
16. Emotion and Genre Classification of Hindi Songs using ML
17. Deep Learning-Based Video Colorization
18. Enhancing Safety Products: Modernizing and Validating Safety Products.
19. Tree Enumeration & Analysis of Gir Forest
20. Cognitive Vision System to Identifying Alies and Hostiles
21. Exam perp assistant using LLMS
22. An augmented Reality Based Mental Health Therapy Platform
23. Cryptanalysis Attack on RSA and ECC using Back Propagation Deep Neural Network
24. GPS-Based Distance-Driven Toll Pricing System Using Blockchain
25. World Building Tool with Map Generator
26. LawSafari: Navigate your Legal Path
27. Parkinson's Disease Detection using Drawings and Speech
28. TASL-Face Recognition System for Police Officials
29. Content Creators Platform



## **Department of Information Technology**

30. Document search by using its caption
31. TrutiShodhak
32. Intelligent System to convert Natural Language Queries to Finite State Automata
33. Distributed Computing using Android Devices
34. Multiple Sensor Fusion and Target Tracking
35. Cyberbullying Detection and Classification
36. Image Generation Using Diffusion Model
37. Reckless Driving Detection using Deep Learning
38. External Ballistics Trajectory Computation
39. PrivacyGuard : Image Privacy through automated information detection and blurring
40. Early Detection and diagnosis of Brain related Diseases
41. Ergonomics Improvement App
42. Ai based Legal Assistant
43. Detection of Political Hate Speech for Social Media Monitoring
44. Gamified and Interactive Visual Learning Platform
45. Handwritten text recognition and grammer correction using NLP and CV
46. Implementing Rules in Graylog+suricata to achieve Cyber Secure Data Centre
47. Type of cancer detection & Survival Prediction



## Department of Information Technology

### Academic Year 2022-23

Project Title:

1. Decentralized Marketplace for Farmers using Blockchain
2. DataViz: Augmented Insights Generation and Visualization Tool
3. Health harvest
4. Satellite Image Analysis and Crisis Management Support
5. Detecting price manipulations in stock market using Reinforcement Learning
6. Scene graph generator
7. Helping dyslexia patients through AR/VR
8. Heart rate monitoring using Edge Computing
9. Development of Breach attack simulation and security operations center
10. Decentralized property dealing system
11. Cataract detection using explainable AI
12. Player tracking and metric generation through AI & CV
13. Aggregation of online articles
14. Integrating distributed IoT based sensors into C3 (Central Command and Control application)
15. Wireless Biometric lock
16. Vioogle
17. Lung - disorders Classification and Detection from Chest X-ray using GANs
18. Web based system to support students with ASD (autism spectrum disorder)
19. Detecting Anomalies from surveillance videos
20. Cry Reason Detection
21. A Secure Platform for Crowdfunding through auctions using blockchain
22. Multilingual Processing of Native Indian Languages
23. Enhancing Recruitment Process using Explainable AI
24. Rural Health Tracker
25. AR based preschool phonics tutor



## **Department of Information Technology**

### **Academic Year 2021-22**

Project Title:

1. FitLife
2. Automated Database and API Management
3. Mall route generator
4. Gujrati Shikshak
5. Pro-Nuance: English Pronunciation Trainer
6. Visual Question Answering
7. Knowledge Based Recommendation system for web based learning
8. E-Learning Summarizer
9. Honest Grade
10. Note your Notes: A Music Trainer App
11. Unmute the muted
12. App for recording and storing medical history using blockchain
13. Football Analysis
14. Truly Scalable and Reusable SOA Services
15. Pallicare
16. Conversion of Indian Sign Language to Hindi Audio and Text
17. Restaurant Insights
18. Intelligent Virtual Assistant for computer commands
19. Smart living (Industry project)
20. Project Selection System
21. MyRoomie (Bachelor App)
22. Intelligent Devanagari Text Recognizer
23. Dance with AI
24. Real Estate Management



## **Department of Information Technology**

### **Academic Year 2020-21**

Project Title:

1. DeepFake
2. Automated and Adaptive Forex Trading
3. Insurance Fraud Detection System
4. Generation of Instrumental cover for songs
5. Smart Wardrobe
6. PhotoOCR
7. Decentralized Social Media
8. Real Time App for Blind
9. Intelligent Tutoring System
10. Generating story from a series of Images
11. MindMap Generator
12. Gesture to Voice
13. Automated Cricket Trainer
14. Aptitude Test for Visually and Hearing Impaired
15. Cryptocurrency Analyser and Predictor
16. Phishing Website Detection
17. Psychological Guidance
18. Improvised Learning for Hearing Disabled
19. Brain Wave Analysis
20. Shoplifting: Prevention and Inventory Tracking
21. Children Chat App
22. Text Predictor
23. Retinopathy
24. Vision and Language Navigation
25. Motor Skills Development



## **Department of Information Technology**

### **Academic Year 2019-20**

Project Title:

1. Content based Search Engine for E-books
2. Orion: An Organic Programming Challenge
3. D-Dining
4. Detection and classification of Arrhythmia
5. Blockchain to Manage Medicine Supply Chain
6. Loyalty Program Using Blockchain
7. Real Estate Record Keeping
8. Smart Kitchen
9. Farm Direct
10. CareerInsights
11. Automated Technical Interview System
12. Smart Learning
13. Know Your Internal Potential (KYIP)
14. Online Shopping App for Visually Challenged
15. Smart Farming
16. Distributed P2P Storage Network
17. Financial Investment Recommendation and Decentralised A/c Management System
18. Learning Ecosystem for Dyslexic People
19. Fake News Detection
20. Power Level Classification and Relation Analysis
21. Face Generation
22. Post Disaster Management using Block-chain
23. Memorizing App for Alzheimer and Dementia Patient
24. SupAR
25. Voice and Gesture-based App for Blind people
26. Pool `Em Up
27. Detecting and Analyzing Stress Levels