JITEC TECHNOLOGIES

PROJECT TITLES 2017-2018

PROJECT CODE	PROJECT TITLES
	EMBEDDED SYSTEMS
ABTECE001	Home automation and personalization through individual location determination
ABTECE002	Optical self-excitation and detection for inertial MEMS Sensors
ABTECE003	Monolithic Multi-Sensor Design With Resonator-Based MEMS Structures
ABTECE004	Ultrasonic Radar System (URAS): Arduino and Virtual Reality for a light-free mapping of indoor environments
ABTECE005	Comparison of electric vehicles with single drive and four-wheel drive system concerning regenerative braking
ABTECE006	Towards Real-Time Object Detection on Embedded Systems
ABTECE007	Embedded Home Surveillance System
ABTECE008	Modeling and Simulation of a Moving Robotic Arm Mounted on Wheelchair
ABTECE009	Face Recognition System for Smartphone based on LBP
ABTECE0010	On-line impedance monitoring of transformer based on inductive coupling approach
ABTECE0011	Embedded Home Surveillance System
ABTECE0012	You Can Clone but You Can't Hide: A Survey of Clone Prevention and Detection for RFID
ABTECE0013	IoT Localization for Bistatic Passive UHF RFID Systems with 3D Radiation Pattern
ABTECE0014	Defense against Impersonating Attackers: An Efficient RFID Mutual Authentication Protocol Based on Standard
ABTECE0015	Smartphone Application to Evaluate the individual possibilities for the Application of Electric Vehicles
ABTECE0016	Face Recognition System for Smartphone based on LBP
ABTECE0017	Motion Analysis in Vocalized Surprise Expressions and Motion Generation in Android Robots
ABTECE0018	Lighting Control and Monitoring for Energy Efficiency: A Case Study

8	Focused on the Interoperability of Building Management Systems
ABTECE0019	Security Implications of Third-Party Accelerators
ABTECE0020	Statistical Modeling of PMA Detector for Ship Detection in High-Resolution Dual- Polarization SAR Images
ABTECE0021	Designing Cybersecurity into Defense Systems: An Information Economics Approach
ABTECE0022	Core identification and attack strategies against regenerative complex networks
ABTECE0023	Road Slope Aided Vehicle Position Estimation System Based on Sensor Fusion of GPS and Automotive Onboard Sensor
ABTECE0024	Profiling Aquatic Diffusion Process Using Robotic Sensor Networks
ABTECE0025	Biomimetic Design for Unmanned Aerial Vehicle Safe Landing in Hazardous Terrain
ABTECE0026	Design of Driver-Assist Systems under Probabilistic Safety Specifications Near Stop Signs
ABTECE0027	Emergency Traffic-Light Control System Design for Intersections Subject to Accidents
ABTECE028	Standalone Wearable Driver Drowsiness Detection System in a Smartwatch
ABTECE029	A Location-Based Attendance Confirming System
ABTECE030	Short term re-identification of Automatic Teller Machine (ATM) users via face and body appearance features

	COMMUNICATION SYSTEMS
ABTECE031	A smart meter design and implementation using ZigBee based Wireless Sensor Network in Smart Grid
ABTECE032	Evolving Machine Intelligence Toward Tomorrows Intelligent Network Traffic Control Systems
ABTECE033	Signal Processing in Cyber-Physical MEMS Sensors: Inertial Measurement and Navigation Systems
ABTECE034	Based on MEMS sensors man-machine interface for mechatronic objects control
ABTECE035	Evaluating Secrecy Outage of Physical Layer Security in Large-Scale MIMO Wireless Communications for Cyber-Physical System
ABTECE036	Congestion Detection and Propagation in Urban Areas Using Histogram Models
ABTECE037	A Survey on the industrial Internet: Enabling Technologies, Applications, and Challenges
ABTECE038	Current Challenges for Visible Light Communications Usage in Vehicle Applications: A Survey An SDR Based Channel Sounding Technique for Embedded Systems
ABTECE039	Evolving Machine Intelligence Toward Tomorrows Intelligent Network Traffic Control Systems
ABTECE040	UltrasonicRAdar System (URAS): Arduino and Virtual Reality for a light-free mapping of indoor environments
ABTECE041	Embedded System for Prosthetic Control Using Implanted Neuromuscular Interfaces Accessed Via an OsseointegratedImplan
ABTECE042	Optical self-excitation and detection for inertial MEMS Sensor

ABTECE043	Monolithic Multi-Sensor Design With Resonator-Based MEMS Structures
ABTECE044	Toward a Forensic Analysis of Voting Systems
ABTECE045	Automatic Toll E-Ticketing System for Transportation Systems
ABTECE046	The puzzle of police body cams
ABTECE047	Automated Crack Detection on Concrete Bridges
ABTECE048	Quick Find: Fast and contact-free object detection using a depth sensor
ABTECE049	An Indoor Location-Aware System for an IoT-Based Smart Museum
ABTECE050	Test bed for a LiFi system integrated in streetlights
ABTECE051	A task-oriented service personalization scheme for smart environments using reinforcement learning
ABTECE052	Irrigation Impacts on Scaling Properties of Soil Moisture and the Calibration of a Multifractal Downscaling Model
ABTECE053	Intelligent hands free speech based SMS system on Android
ABTECE054	Tracing Emergent Structure in Self-Organized Citizen Journalism
ABTECE055	Electromagnetic compatibility and lightning current impacts in the railway equipment buildings
ABTECE056	Automatic Recognition of Long Period Events From Volcano Tectonic Earthquakes at Cotopaxi Volcano
ABTECE057	Red Eye: Preventing Collisions Caused by Red-Light Running Scooters With Smartphones
ABTECE058	Looking into HMD: A method of latency measurement for head mounted display
ABTECE059	A mobile phone application to improve the quality of college education
ABTECE060	A Mobile ZigBee Module in a Traffic Control System
ABTECE061	Indoor Positioning for Multi-photodiode Device Using Visible-Light Communications

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ABTECE062	Road Traffic Congestion Management Using VANET
ABTECE063	Green Banking: A Proposed Model for Green Housing Loan
ABTECE064	Estimating control delays at signalized intersections using low-resolution transit bus- based global positioning system data
INTELLIGENT TRANSPORTATION SYSTEM	
ABTECE065	DASITS: Driver Assistance System in Intelligent Transport System (School Children Transportation safety)
ABTECE066	An Active Safety System for Low-Speed Bus Braking Assistance
ABTECE067	A Blind-Zone Detection Method Using a Rear-Mounted Fisheye Camera With Combination of Vehicle Detection Methods
ABTECE068	Using Viewing Statistics to Control Energy and Traffic Overhead in Mobile Video Streaming
ABTECE069	Vision for Looking at Traffic Lights: Issues, Survey, and Perspectives
ABTECE070	Demand Forecast Using Data Analytics for the Pre allocation of Ambulances
ABTECE071	Design of Driver-Assist Systems Under Probabilistic Safety Specifications Near Stop Sign
ABTECE072	Design and implementation of an eye blinking detector system for automobile accident prevention
AUTOMATION	
ABTECE073	An SDR Based Channel Sounding Technique for Embedded Systems
ABTECE074	Towards Real-Time Object Detection on Embedded Systems
ABTECE075	Embedded Control System for Smart Walking Assistance Device
ABTECE076	Comparison of electric vehicles with single drive and four-wheel drive system concerning regenerative braking
ABTECE0	Secure and Efficient Protocol for Route Optimization in PMIPv6-based Smart Home

77	IoT Networks
ABTECE078	Home automation and personalization through individual location determination
ABTECE079	Embedded System for Prosthetic Control Using Implanted Neuromuscular Interfaces Accessed Via an Osseointegrated Implant
ABTECE080	Direct and indirect sensing two-axis solar tracking system
ABTECE081	Access Control Schemes for Implantable Medical Devices: A Survey
ABTECE082	SmartphoneApplicatoin to Evaluate the individual
ABTECE083	Quality of Service Management for Home Networks Using Online Service Response Prediction
ABTECE084	possibilities for the Application of Electric Vehicles
ABTECE085	Embedded Control System for Smart Walking Assistance Device
ABTECE086	Direct and indirect sensing two-axis solar tracking system
ABTECE087	sufficient number of optimal tilt angle adjustment to maximize residential solar panels yield
ABTECE088	Hazards in the installation and maintenance of solar panels
ABTECE089	Power System Reliability Analysis with Intrusion Tolerance in SCADA Systems
ABTECE090	A Multi-Mode Dead Reckoning System for Pedestrian Tracking Using Smartphones
ABTECE091	A Web-Based Approach for Classifying Environmental Pollutants Using Portable E- nose Devices
ABTECE092	Development and Validation of an Automated Steering Control System for Bus Revenue Service
ABTECE093	Industrial Wireless IP-Based Cyber –Physical Systems

ABTECE094	Microwave Sensing of Quality Attributes of Agricultural and Food Products
ABTECE095	Optimizing Time of Arrival localization solutions for challenging industrial environments
ABTECE096	AUTO-FIR - Automobile's first information record
ABTECE097	Vision0based forest fire detection in aerial images for firefighting using UAVs
ABTECE098	Development of remote monitoring analysis and reporting system for industrial machines
	ELECTRONICS
ABTECE099	Introduction to a network forensics system for cyber incidents analysis
ABTECE100	Wireless sensor/actuator device configuration by NFC
ABTECE101	A smart helmet for air quality and hazardous event detection for the mining industry
ABTECE102	Audio multicast by Visible Light Communication for location information for the visually impaired
ABTECE103	BARRACUDA: An augmented reality display for increased motorcyclist en route hazard awareness
	Field Testing of a Cyclist Collision Avoidance System for Heavy Goods Vehicles
ABTECE104	Multi-Factors Based Road Accident Prevention System
ABTECE105	RFID-based system for school children transportation safety enhancement
ABTECE106	Automated Trace-Explosives Detection for Passenger and Baggage Screening
ABTECE107	Integrated Control of Airport and Terminal Airspace Operations
ABTECE108	An RFID based Smartphone Proximity Absence Alert System
ABTECE109	Attendance generating system using RFID and GSM
ABTECE110	Adaptive Path Isolation for Elephant and Mice Flows by Exploiting Path Diversity in Datacente

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ABTECE1 11	IBEACON for New-borns Localization in Hospitals	
ABTECE1 12	New generation ATM terminal services	
	ROBOTICS	
ABTECE1 13	Efficient Visual Obstacle Avoidance for Robotic Mower	
ABTECE1 14	Modeling and Simulation of a Moving Robotic Arm Mounted on Wheelchair	
ABTECE1 15	Robotic Assistant for Mobility-Impaired Patients	
ABTECE1 16	Low-cost robotic assessment of visuomotor deficits in Alzheimer disease	
ABTECE1 17	Closed-Chain Manipulation of Large Objects by Multi-Arm Robotic Systems	
	BioinspiredCiliary Force Sensor for Robotic Platforms	
ABTECE1 18	Efficient Visual Obstacle Avoidance for Robotic Mower	
ABTECE1 19	Managing robot kinematics based on Arduino controllers using a Unity system	
ABTECE1 20	Real-Time Panoramic Image Generation and Motion De blurring by Using Dynamics- Based Robotic Vision	
ABTECE1 21	Design and implementation of a semi-autonomous waste segregation robot	
ABTECE1 22	Equilibrium state control for climbing robot	
ABTECE1 23	Enhancing the Professional Vision of Teachers: A Physiological Study of Teaching Analytics Dashboards of Students' Repertory Grid Exercises in Business Education	
ABTECE1 24	Auto Calibrated Head Orientation Controller for Robotic-Wheelchair Using MEMS Sensors and Embedded Technologies	
ABTECE1 25	Loading of Hanging Trolleys on Overhead Conveyor with Industrial Robots	
ABTECE1 26	Port-based modeling of human-robot collaboration towards safety-enhancing energy shaping control	

ABTECE1 27	Autonomous Learning of Object Models on a Mobile Robot
	WIRELESS SENSOR NETWORK
ABTECE1 28	Student Information Report System with SMS (SIRS)
ABTECE1 29	NoC based advanced communication systems for smart city management programs
ABTECE1 30	A Survey on Gas Leakage Source Detection and Boundary Tracking with Wireless Sensor Networks
ABTECE1 31	Passenger acceptance of counter-terrorism security measures in stations
ABTECE1 32	Wi-metal: Detecting metal by using wireless networks
ABTECE1 33	Next generation public safety networks: A spectrum sharing approach
ABTECE1 34	Robust ambulance allocation using risk-based metrics
ABTECE1 35	Safety Marginal Value as a Traffic Safety Metric for the Trailing Vehicle
ABTECE1 36	Energy efficient smart cooling system using WSN
ABTECE1 37	A crowd-assisted real-time public transport information service: No more endless wait
ABTECE1 38	Spectral analysis of forest fire noise for early detection using wireless sensor networks
ABTECE1 39	Modeling of flowing underground waters and leakage of syngas from Underground Coal Gasification
	Path Loss model for indoor parking environments in a wireless sensor network
ABTECE1 40	Smart cable for Radio Frequency Identification in aeronautical applications
ABTECE1 41	Remotely monitored fertility control by ion selective electrodes using novel sensor networks
ABTECE1 42	Smart traffic light control system
ABTECE1 43	SafeCam: Analyzing intersection-related driver behaviors using multi-sensor smartphones

ABTECE144	Passenger Journey Destination Estimation From Automated Fare Collection System Data Using Spatial Validation
ABTECE145	Identification of outliers in pollution concentration levels using anomaly detection
	DIGITAL IMAGE PROCESSING (with Hardware)
ABTECE146	Hand Posture Recognition Using a Three-Dimensional Light Field Camera
ABTECE147	Small scanners used in mobile devices: impact on fingerprint the biometric performance
ABTECE148	Object Tracking by Color and Active Contour Models Segmentation
ABTECE149	Yawning Detection Using Embedded Smart Cameras
ABTECE150	Automatic Crack Detection and Measurement Based on Image Analysis
ABTECE151	Objectless to assist salient object detection
ABTECE152	Face an Spoofing Syste Adapte To Visually-Recognition d Detection m d Impaired People
ABTECE153	Biometric- Authentication Machines: A Open- Real-Enabled Survey of Set World Applications
ABTECE154	Dilation-aware enrolment for iris recognition
ABTECE155	Real-time NIR imaging of Palm Dorsa subcutaneous vein pattern based biometrics: An SRC based approach
ABTECE156	Authentic mobile-biometric signature verification system
ABTECE157	Activity with Smart Sensor: Recognition Polymer Floor Application to Human Footstep Recognition
ABTECE158	Facial Position and Expression-Based Human–Computer Interface for Persons with Tetraplegia

ABTECE1 59	IEDs on the Road to Fingerprint Authentication: Biometrics have vulnerabilities that PINs and passwords don't
	INTERNET OF THINGS
ABTECE1 60	Secure and Efficient Protocol for Route Optimization in PMIPv6-based Smart Home IoT Networks
ABTECE1 61	Home automation and personalization through individual location determination
ABTECE1 62	Agricultural crop monitoring using IOT
ABTECE1 63	Wearable sensors for analyzing personal exposure to air pollution
ABTECE1 64	Electromagnetic pollution measurement in the system rooms of a university
ABTECE1 65	Security and Privacy Preservation of Face Identification and Resolution Scheme Framework Using Fog Computing in Internet of Things
ABTECE1 66	Indoor localization framework with WiFi fingerprinting
ABTECE1 67	Accurate indoor localization and tracking using mobile phone inertial sensors, WiFi and iBeacon
ABTECE1 68	On-line impedance monitoring of transformer based on inductive coupling approach
ABTECE1 69	Machine-to-Machine Communications in Ultra-Dense Networks A Survey
ABTECE1 70	A Survey of Network Lifetime Maximization Techniques in Wireless Sensor Networks
ABTECE1 71	A Survey on Network Methodologies for Real-Time Analytics of Massive IoT Data and Open Research Issues
ABTECE1 72	Security Vulnerabilities of Internet of Things: A Case Study of the Smart Plug System
ABTECE1 73	A Privacy Preserving Communication Protocol for IoT Applications in Smart Homes
ABTECE1 74	Environmental Monitoring in Grain Granary Based on Embedded System
ABTECE1 75	sufficient number of optimal tilt angle adjustment to maximize residential solar panels yield
ABTECE1 76	Hazards in the installation and maintenance of solar panels

	DIGITAL IMAGE PROCESSING
ABTECE177	Visual Face Recognition Using Bag of Dense Derivative Depth Patterns
ABTECE178	Real-Time Traffic Light Detection with Adaptive Background Suppression Filter
ABTECE179	Facial video-based detection of physical fatigue for maximal muscle activity
ABTECE180	Exemplar-Based Recognition of Human–Object Interactions
	BIO-MEDICAL
ABTECE181	coexistence of ZigBee-Based WBAN and WiFi for Health Telemonitoring Systems
ABTECE182	Access Control Schemes for Implantable Medical Devices: A Survey
ABTECE183	A Wireless Health Monitoring System Using Mobile Phone Accessories
ABTECE184	Automating Vector Auto regression on Electronic Patient Diary Data
ABTECE185	Design, Implementation, and Wide Pilot Deployment of FitForAll: An Easy to use Exergaming Platform Improving Physical Fitness and Life Quality of Senior Citizens
ABTECE186	A Context-Aware, Interactive M-Health System for Diabetics
ABTECE187	Convergence Revolution Comes to Wearables: Multiple Advances are Taking Biosensor Networks to the Next Level in Health Care
ABTECE188	The Personal Health Technology Design Space
ABTECE189	Elucidating the Hemodynamic Ballisto-cardiographic Toward Origin of Forces: d Improved Monitoring of Cardiovascular Health at Home
ABTECE190	Guest Editorial an Overview of Biomedical Robotics and Bio-Mechatronics Systems and Applications
ABTECE191	Monitoring Activities of Daily Living in Smart Homes: Understanding human behavior