

## SECURITY BASED APPLICATIONS

SL NO	Project Title	SIMULATION
SB1	College Addressing System using a Voice Processor	
SB2	Anti Vehicle Theft Control Using GSM Networks	
SB3	Anti Vehicle Theft Control Using GSM Networks and Satellite Communication	
SB4	Vehicle Speed and Position Monitoring by Trucking and Taxi Services	
SB5	Password Operated Locking System for a Door	
SB6	Thumbwheel Operated Digital Countdown Timer set for Testing Quality of Device	
SB7	Secret Digital Code Operated Access System	
SB8	Development of a Microcontroller based Modern Voting System	
SB9	Airport Security System for metal detection and staff identification	
SB10	Implementation of a real time clock using microcontroller	
SB11	Predefined Time operated Home Appliance Control System for power saving	
SB12	Prototype Implementation of Solar Tracking System	
SB13	Low cost Alcohol Detector for scanning drunk drivers in the traffic	
SB14	Microcontroller based Vibration Sensing Alarm System	

## ROBOTIC PROJECTS

SL NO	PROJECT NAME	SIMULATION
RP1	Fire Fighting Robot	X
RP2	Floor Cleaning Robot	X
RP3	Industrial Surveillance Robot for Detecting Fire and Smoke (RF)	X
RP4	Spying Robot with Wireless Camera	X
RP5	Pick and Place Robot	X
RP6	Robotic Model of vehicle to avoid Collision Detection	X
RP7	Prototype of a Bomb Diffusing Robot	X
RP8	Six axis armed Robot	X
RP9	Path Finding Robot for Automatic Delivery of Goods	X
RP10	Slot Detection by a Trolley Robot for Automatic Loading and Unloading	X
RP11	Line following robot	X
RP12	IR based Robotic direction control	X
RP13	Robotic land mines detector (Metal) (IR)	X
RP14	Wireless supervisory robot	X
RP15	Color sensing robot	X
RP16	Grid Following Landmines detector	X
RP17	Tom & Jerry Robot	X
RP18	Password operated wireless robot	X
RP19	Automatic Parking of robotic vehicle	X
RP20	Wireless Mouse controlled Robotic movement	X
RP21	Humanoid Robot	
RP22	FAMPER (Fully Autonomous Mobile Pipeline Exploration Robot)	
RP23	Spying robot tracking Human Beings and Sensing Fire	

## PIR APPLICATION

SLNO	Project Title	SIMULATION
PIR1	Spying robot tracking Human Beings and Sensing Fire	
PIR2	PIR sensor based robbery(intrusion) detection system with alarm warning	
PIR3	Robbery (intrusion)detection system with alert intimation to police through GSM network	
PIR4	Robbery(intrusion) detection system with alarm warning and visualization through PC from remote place	
PIR5	PIR based automatic door controller	
PIR6	Developing concept of saving power using PIR sensor	

## PC APPLICATION

SLNO	Project Title	SIMULATION
PC1	Domestic Automation using PC(wire based)	
PC2	Near Field Communication between two terminals for mutual data transfer	
PC3	Wireless PC to LCD display to overcome Voice Announcement Failures	
PC4	PC to LCD Display	
PC5	PC enabled electrical load management from far flung places in a power grid	
PC6	PC controlled spying robot from a remote place using wireless communications	
PC7	Conventional TV remote operated PC mouse cursor position movement	
PC8	Touch screen based mouse operation in PC	

## RF BASED PROJECTS

SLNO	PROJECT NAME	SIMULATION
RF1	RF based security system for industries	X
RF2	Wireless Notice Board Display at Stations using PC	X
RF3	Wireless Health Monitoring System (Temperature)	X
RF4	Industrial Safeguard Security System with Intimation to Remote Control Room (Fire, Intrusion, Keypad)	X
RF5	Wireless Device Monitoring in a Large Complex	X
RF6	RF communications based operation of a Robotic Wheelchair (motor)	X
RF7	AV transmitting Robot using Wireless Communications	X
RF8	RF based Bidirectional Speed Control of College Motor (AC)	X
RF9	RF based Flash Flood Warning System	X
RF10	RF based speed control of fan (DC)	X
RF11	RF based speed control of fan (AC)	X
RF12	RF based data acquisition system (Temperature)	X
RF13	Wireless voice enabled blind stick	X
RF14	RF based PC mouse control	X
RF15	RF based tank water level indicator	X
RF16	Wireless Notice Board Display at Stations using keypad	X
RF17	Automated remote data logger using RFID technology	X
RF18	New generation Polling method using RF	X
RF19	RF based Accident intimation with vehicular identification	X

## ZIGBEE BASED PROJECTS

SL NO	PROJECT NAME	SIMULATION
<b>XB1</b>	<b>Wireless Energy Meter with Enhanced Range of Communications</b>	
<b>XB2</b>	<b>Vehicular Identification System using RFID &amp; ZIGBEE</b>	
<b>XB 3</b>	<b>Wireless Health Monitoring System (Temperature)</b>	
<b>XB 4</b>	<b>Industrial Parameter Monitoring System with Intimation to Remote Control Room (VIT)</b>	
<b>XB 5</b>	<b>Wireless Device Monitoring in a Large Complex</b>	
<b>XB 6</b>	<b>ZIGBEE Based SCADA(Supervisory Control and Acquisition Data)</b>	
<b>XB 7</b>	<b>Paper RFID based wireless sensing network</b>	
<b>XB 8</b>	<b>Spying Robot using Wireless Communications</b>	
<b>XB 9</b>	<b>ZIGBEE based Bidirectional Speed Control of College Motor</b>	
<b>XB 10</b>	<b>Secured chat device for army application</b>	
<b>XB 11</b>	<b>Smart Traffic Communication to Avoid Jams</b>	
<b>XB 12</b>	<b>Intrusion Detection System and Intimation System</b>	
<b>XB 13</b>	<b>Prototype ZIGBEE based Security Entrance System Model</b>	
<b>XB 14</b>	<b>Wireless Track Breakage Intimation to Train</b>	
<b>XB 15</b>	<b>ZIGBEE based Water level Indicator System</b>	
<b>XB16</b>	<b>Industrial Boiler Temperature Control using Wireless Communication</b>	
<b>XB17</b>	<b>Spying Camera based Access System using ZIGBEE communications.</b>	
<b>XB18</b>	<b>Fire Occurrence Intimation to a Crew in Industry</b>	
<b>XB19</b>	<b>Smart Helmet for Operation in Mines with Voice Announcement System</b>	
<b>XB20</b>	<b>ZIGBEE based PC to LCD display in stations</b>	

## BLUE TOOTH

SL NO	PROJECT NAME	SIMULATION
BT1	Secured data transfer for army application	
BT2	Wireless LAN using Blue tooth	
BT3	Bluetooth chatting	
BT4	Blue tooth controlled lightning system	
BT5	Showing Wireless Message on scrolling LED display	
BT6	Changing the pattern of stroboscopic light remotely	
BT7	Blue tooth controlled industrial surveillance Robot	
BT8	Wireless SCADA (Temperature,4-channel)	
BT9	Patient monitoring and treatment using Bluetooth	
BT10	Wireless Home appliance monitoring and controlling	
BT11	Setting parameter(Temp) for Boilers from a remote place	
BT12	RFID enabled wireless security system with enhanced range of communication	
BT13	Wireless Employee management and automation in MNC using SMART CARD	
BT14	Advanced wireless water pumping system with alert	
BT15	Improved transport management system (Voice)	
BT16	Auto voice announcement in train for passenger convenience	
BT17	Wireless mouse control using Bluetooth	
BT18	College load management with return STATUS display	
BT19	Wireless CAN based traffic light control	
BT20	Wireless cooling system for chemical laboratories (PC based)	

## TOUCH SCREEN – GLCD - SD Card

SL NO	PROJECT NAME	SIMULATION
	Touch screen based induction motor speed control	
	Speed and direction of induction control using touch screen	
	DC motor speed and direction control using H bridge and touch screen	
	Touch screen based password operated industrial security system	
	Touch screen based temperature monitoring and control system with GLCD	
	Touch screen based mouse-pad design	
	Touch screen XB based library automation	
	Universal remote controller with haptic interface for customer electronic devices	
	Talking touch home (TTH)	
	Touch screen and smart card based prepaid ticket booking	
	Touch screen based door controlling with auto image mail generation for security	
	Touch screen based advanced menu display and ordering system for restaurant.	
	Touch screen based wheel chair control system	
	ZIGBEE or BT based touch screen controlled PC	
	GPS based vehicle travel location data logger with 2GB MMC/SD memory card	
	GPS and GSM based office cab monitoring, alerting and logging system	
	Military person training system monitoring speed, position, time and maintaining database in memory card	

## GSM AND GPS APPLICATION

SLNO	PROJECT NAME	SIMULATION
GG1	Vehicle Speed and Position Monitoring System by Trucking an Taxing Services using GPS and GSM	X
GG2	Anti Vehicle Theft Control System using GPS & GSM	X
GG3	Person Intrusion Alarm System using GSM at Restricted Areas	
GG4	Implementation of GSM in ATM networks in order to Avoid Congestion	
GG5	Prototype of ATM with intimation to the A/C holder mobile phone.	
GG6	GSM based Positioning of a Dish Antenna	
GG7	Implementing GPS & GSM to Improve Public Transport Services (IEEE 2009)	X
GG8	GSM based SCADA.	
GG9	Animal tracking system using ZIGBEE and GSM.	X
GG10	GPS based navigation system with voice announcement.	X
GG11	GPS navigated robot.	X
GG12	Accident intimation system using GSM technology.	
GG13	GSM based bank robbery intimation to user programmable number.	
GG14	GSM based electricity billing system	
GG15	GSM based speed control of AC fan	
GG16	GSM & GPS enabled car security system	X
GG17	Home security and maintenance using GSM	
GG18	GSM based Door calling bell system	
GG19	GSM based security with auto image alert through E-mail	
GG20	Smart helmet design using GSM technology	



## RFID PROJECTS

SL NO	PROJECT NAME	SIMULATION
RD1	Airport Security System with Metal Detection for Authorized Entry	
RD2	Attendance System in Colleges for Database Management	
RD3	Paper RFID based Wireless Sensing Platform for Weather Monitoring and Database Management.	
RD4	Bus Arrival and Voice Announcement System by Identification for passenger convenience.	
RD5	RFID based office load management.	
RD6	Low cost RFID based employee attendance and automation.	
RD7	RFID based authenticated door locking	
RD8	RFID based shopping in malls	
RD9	RFID based voice enabled route map	
RD10	Voice authenticated RFID for strong security	
RD11	Intelligent parallel parking of a car using RFID	
RD12	E-passport (RFID based identification)	
RD13	Patient Management system in hospitals using RFID	
RD14	Transport management using low cost RFID	
RD15	Improving security and automation in MNC using RFID	
RD16	RFID and GSM based intelligent courier mailbox system with auto delivery notification	
RD17	RFID and 2GB SD card based patient data monitoring system with PC interface	

## SMART CARD PROJECTS

SL NO	PROJECT NAME	SIMULATION
SC1	Design and prototype implementation of a banking system	
SC 2	Product quality management in shopping malls using smart card	
SC 3	Nutrition content of barcode in malls	
SC 4	Smart card enabled employee management system	
SC 5	Smart card based power management system mnccs	
SC 6	Prepaid electricity through smart cards.	
SC 7	Implementation of ATM using Smart cards.	
SC 8	Smart card based authenticated device control	
SC 9	Shopping management with smart card	
SC 10	Smart card for transportation using prepaid service	
SC 11	Smart card vehicle for toll gate	
SC 12	Vehicle ignition control using smart card	
SC 13	Wireless sensing platform using smart card	
SC 14	Smart card based universal identification	
SC 15	Improving locking facility using GSM and Smart card	

## BIOMETRIC PROJECTS

SL NO	PROJECT NAME	SIMULATION
BM1	Temperature and heartbeat monitoring system	X
BM2	Wireless patient health monitoring system	X
BM3	Voice based operation of door	X
BM4	Operation of Domestic Electrical Loads using Voice commands	X
BM5	Automatic audio guidance system in a campus (RFID)	X
BM6	Gesture based operation of robotic wheel chair.	X
BM7	Finger print based smart attendance system	
BM8	Voice based PC mouse control	X
BM9	Voice authenticated ATM transaction using RFID	X
	Heartbeat monitoring with analog display on PC using Lab-VIEW	
	Design and Development of Modern Voting System with Thumb Identification (provides extreme authentication)	
	Office Security System using Optical Finger Print Scanner	
	Finger print based Interactive System for obtaining Student Details	

## MEMS APPLICATION

SL NO	PROJECT NAME	SIMULATION
MS1	Wireless Hand Movement based PC mouse controlling	X
MS2	Head gesture based wheel chair movement (RF)	X
MS3	Controlling various loads using MEM Sensor (RF)	X
MS4	Wireless Robot direction controlling with gestures from a remote place	X
MS5	MEMS based Fall detection system for patients (RF)	X

## SOCIAL PROJECTS

SL NO	PROJECT NAME	SIMULATION
SP1	Braille Code Generation using Microcontroller for Blind People	
SP2	Head Gesture Based Interface for PC operation	
SP3	Sensor integration using XBEE	
SP4	Wheelchair Operation using PC	
SP5	Synchronized Traffic Light Signaling System	
SP6	Power Saving System for Traffic Lights (Traffic Density based)	
SP7	Path Guiding System for visually impaired (RFID)	X
SP8	Drunken Driver Testing with Automatic Intimation.	X
SP9	Embedded specs for safety driving. (motor)	X
SP10	Adoptive lightning system for saving power.	
SP11	E-stick with voice announcement for blind people.(RF)	X
SP12	Synchronized traffic light signal system to ease traffic congestion	
SP13	Automatic irrigation system on sensing soil moisture content	X
SP14	Railway level crossing gate control through ZIGBEE. (IR)	X
SP15	Auto door opening system by PIRO Infrared sensor with interrupt monitored motor.	X
SP16	Passenger counters in transport to alert the driver for excess entry	
SP17	Proximity detector using ultrasonic sensors for industrial applications	X
SP18	Low cost SMART CARD based ticketing system using RFID (IEEE)	
SP19	Bus Detection Device for Blind People using Passive RFID Cards	X
SP20	Location Aware Fall Detection System for Patients in Hospitals (RF, Vibration)	X
SP21	Hidden cell phone detection in exam halls using RF with microcontroller	X
SP22	Auto door operation for shopping malls using ultrasonic sensor	X
SP23	Entry Exit Counter for vehicles	
SP24	Water Sprinkling system based on Fire Detection	X
SP25	Drunken driver detection for vehicle safety	X

SP26	Smoke detector with auto alert to control room using RF	X
SP27	Designing thermometer with display unit	
SP28	Temperature dependent speed regulation of fan using fuzzy logic	
SP29	RF based robot	X
SP30	Accident intimation of vehicle to owner using RF communication.	X
SP31	Intrusion detection system using wireless technology	X
SP32	Object counter for go-downs	
SP33	PC to LCD notice board display system	
SP34	Wireless Track breakage intimation to train	X
SP35	Wired Robot direction control	X
SP36	LCD display of dialed telephone number over a line	X
SP37	Internet based college load management system	
SP38	Intelligent Irrigation system with water level and soil moisture detection	
SP39	Operation of DC motor at an exact speed entered by PC	
SP40	RF based speed control of a motor	X
SP41	PC based Home automation system	
SP42	Automatic lights on when person is in	X
SP43	IR beam operated device control	X
SP44	Clap detected device control	X
SP45	Human detecting automatic gate operation	X
SP46	IR remote controlled robot movement	X
SP47	Boiler control system	
SP48	Street light intensity control	X
SP49	Traffic light control system based on traffic density	
SP50	TV remote based intelligent switch board	X

SP51	Wireless Energy Meter	X
SP52	Wireless Energy Meter with Cross Checking Facility	X
SP53	Prepaid Wireless Energy Meter	X
SP54	Prepaid Wireless Energy Meter with Cross Checking Facility	
SP55	Electricity Distribution System.	
SP56	Intelligent Street Lighting System. (Detects traffic & turns ON lights)	
SP57	Power supply failure alarm with QOS of machines for industrial application	
SP58	Solar Powered Traffic Lighting System.	X
SP59	Intelligent Street Lighting System. (All lights connected to central PC)	
SP60	PC based room lighting control.	
SP61	Wireless room lighting control.	X
SP62	Remote enabled mobile charger	X
SP63	Intelligent Room lighting. (Counts if person in room & turns ON light)	
SP64	RF based speed control of fan (DC)	X
SP65	PLC using microcontroller	
SP66	Stroboscopic display (LED)	
SP67	Illusion of vision (Rotating LED)	
SP68	Scrolling LED display controlled by PC	
	Automatic Headlight intensity control for vehicle to avoid accidents	
	Motor operated Gate Control with a Digital Display of Visitors Count that Automatically Generates a Warning on Limit Cross	
	Token number display system with voice announcement(can be operated from a remote place)	
	Fully Automated Room light Controlling System with Occupancy Sensors and Digital Display	

## SIMULATION (Lab-VIEW, MATLAB, PROTEUS)

SL NO	PROJECT TITLE	SIMULATION
SIM1	Industrial SCADA using Lab-VIEW	
SIM2	GUI based device controlling and monitoring	
SIM3	PC based industrial parameter monitoring with Graph indicator	
SIM4	PC based over voltage relay with report generation	
SIM5	IVRS based industrial automation	
SIM6	SMART card based industrial security system with virtual instrumentation	
SIM7	Security camera with auto door operation and image sending through E-mail	
SIM9	Simulation Servo mechanism using MATLAB (Simulink)	
SIM10	Buck Boost converter using Proteus SW	
SIM11	Speed control of CHOPPER using MOSFET (Proteus)	
SIM12	DC motor speed control using MATLAB	
SIM13	PLC using microcontroller (Proteus)	
SIM14	Measuring QOS of machine for quality test (Proteus)	
SIM15	Speed control of motor with V/F control	
SIM16	Substation monitoring using HMI	
SIM17	Power shading using ATM (Auto/Timed/Manual) operation	
SIM18	Temperature dependent speed regulation of DC motor using FUZZY LOGIC	
SIM19	Industrial parameter based IVR system	
SIM20	Graphical VIEW of VIT with voice feed back	
SIM21	Implementation of OLTC with graphical display	
SIM22	Improving security and automation in industries using RFID card	
SIM23	Hybrid PLC with RS232 Link	
SIM24	Wireless Hybrid PLC with RF	
SIM25	DC to DC converter using Buck, Boost, Buck-boost with MATLAB (simulink)	

## REALTIME PROJECTS

SL NO	PROJECT NAME	SIMULATION
1	RFID based door security system using magnetic lock	
2	Intelligent real time switch board design using Touch screen and IR remote with inbuilt memory	
3	Lab testing tool kit- voltage, current, analog signal probing using Lab-VIEW.	
4	Advanced hotel menu ordering system using touch screen, XB and GLCD	
5	Designing a PID controller for speed stabilization of motor	
6	Computer Automated Measurement and Control (CAMAC).	
7	Artificial intelligence with character recognition (Image processing) and voice generation	
8	A lab setup on virtual instrumentation	
9	Design and implementation of digital flow meter for real time application to detect theft and leakage with control	
10	Plasma speaker design – A Tesla experiment	
11	Conveyor belt design for product quality control using Image processing.	
12	Auto color sorting of balls using color classifiers on Lab-VIEW	
13	Artificial intelligence with character recognition (Image processing) and voice generation	
14	Real Time password protected Notice board (LED) using GSM and EEPROM	
15	Solar inverter design (500 Watt)	
16	CNC auto Router Machine design	
17	Hover Craft.	
18	Shadow Arm Design.	



## COURSE DETAILS

SL NO	NAME	DURATION (Hr)	PRICE
1	C and Advanced C Programming	45	2000
2	Embedded C and Microcontroller (8051)	45	3500
3	Embedded System + Project	180	20500
4	Lab-VIEW and Hardware Interface	45	3500
5	PLC and Industrial Automation	45	5000
6	Linux basics	30	3000
7	Linux Internal and Network Programming	60	6000
8	Advanced Embedded Systems (AVR,PIC)	30	5000
9	Basic Electronics and Electrical Drives	45	2000
10	Protocols, Communication and Interfaces Low Level Device Driver development	45	6000
11	PCB Designing	15	1500
12	ARM 7	60	10000
13	Real Time OS design	45	5000
14	Core Java	30	2000
15	Advance Java + J2EE	60	4500
16	Oracle	45	3500
17	PHP	45	3000
18	.NET (ASP + C# + VB)	90	6000
19	C and C++	60	3500
20	MATLAB SIMULINK Basics	30	2000