

GSM GPS BASED VEHICLE THEFT DETECTION AND TRACKING

AIM:

Design and Development of GSM GPS based Vehicle theft detection and tracking.

PURPOSE:

Now a day most of the people have their own vehicles. Vehicle theft can happen in few places like parking areas, roadside parking and insecure areas. After theft of vehicle It is very tough to identify vehicle. Here we propose solution like GSM GPS based vehicle theft detection and tracking.

DESCRIPTION:

This project includes GSM (Sim800C) module, which is connected to Arduino through UART. GPS (NEO-6M) module connected to Arduino UART. Two pin switch connected to Arduino digital pin. DC motor (Vehicle Engine) interfacing to Arduino along with L293d ic.

WORKING:

After parked in any location user has to press button. Then it will enter into parking mode. If anyone wants to start vehicle, should start from duplicate key. In Parking mode if any key inserted it assumes that theft happen. SMS will be send to mobile number along with GPS data. User can track vehicle in Google maps using GPS data. By sending code to GSM it unlocks from parking mode and stay in drive mode. Motor won't start in parking mode. Motor only runs in drive mode. We can get GPS location of vehicle by sending request SMS.

TECHNICAL SPECIFICATIONS

HARDWARE:

Microcontroller	:	Arduino Uno
Crystal	:	16 MHz
LCD	:	16X2 LCD
GSM	:	SIM800C
GPS	:	NEO-6M
Motor Driver	:	L293D
Motor	:	5v/12v DC
Buzzer	:	5v/12v DC
Power Source	:	12v 2 amp Adaptor

SOFTWARE:

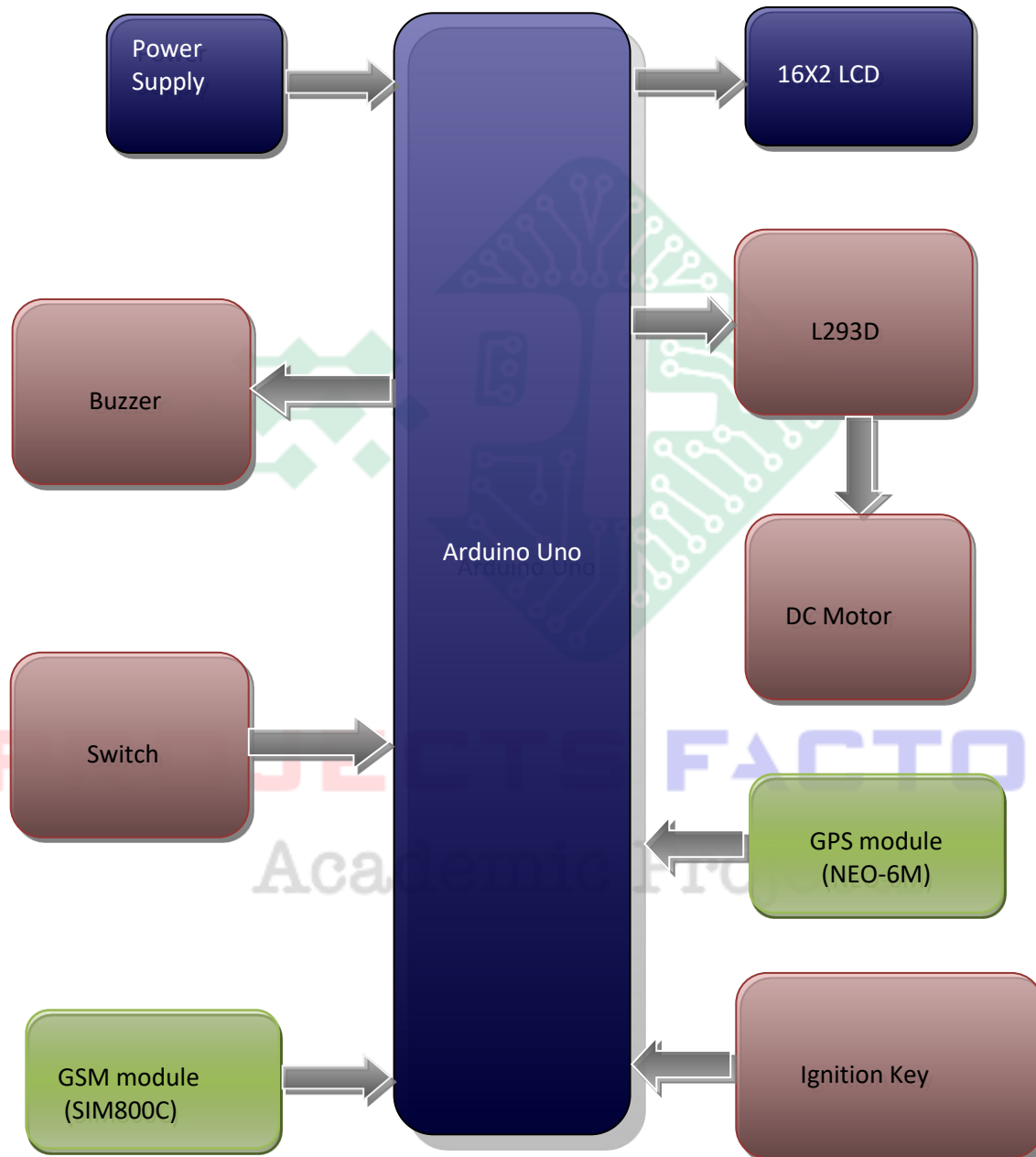
Arduino IDE

Proteus based circuit diagram

APPLICATIONS:

- Vehicle Security
- Transport Applications
- Private Travels
- Personal Vehicles

BLOCK DIAGRAM:



POWER SUPPLY BLOCKDIAGRAM:



INTERFACES COVERED:

- We have covered GSM (SIM800C) module interfacing
- GPS (NEO-6M) module interfacing
- Motor control and key interface

PROJECTS FACTORY
Academic Projects