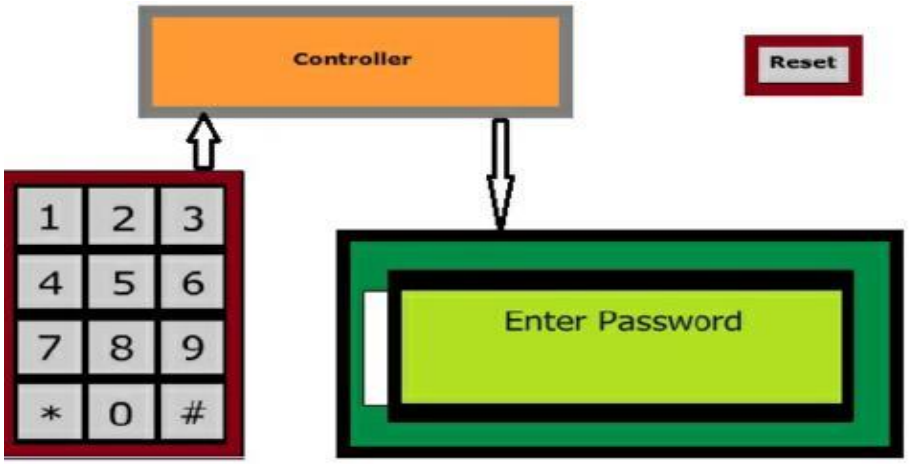
Pin Based Door Lock

Introduction

Often times, we need to secure a room at our home or office so that no one can access the room without our permission and ensure protection against theft or loss of our important accessories and assets. There are so many types of security systems present today but behind the scene, for authentication they all relay on fingerprint, retina scanner, iris scanner, face id, tongue scanner, RFID reader, password, pin, patterns, etc. Off all the solutions the low-cost one is to use a password or pin-based system. So, in this project, I have built a Keypad Door Lock which can be mounted to any of your existing doors to secure them with a digital password.

Block Diagram



Component

1. Microcontroller
2. 16 x 2 LCD (Liquid Crystal Display)
3. 4 x 3 or 4 x 4 matrix keypad
4. Servo motor
5. 3D printed door locker/customized door locker
6. Additional components for power supply of 1 Amp 5 Volt mobile charger
7. 4'' / 6''plastics boxes, jumper wires, nuts bolts, plastic casing, etc.

Advantage

- Convenience of a Keyless System.
- Higher Security
- Enhanced Durability
- Easy Installation