LPG GAS ACCIDENT PREVENTION WITH GSM ALERT

DESCRIPTION:

➢ Now a days the home safety detection system plays the important role for the security of people. Since all the people from the home goes to work on daily bases, it makes Impossible to have check on the appliances available at home specially LPG gas cylinder, wired circuits, etc. whereas in industrial system it also makes difficult for the labours to keep the track of every second so to work on this problem. The system is developed which will keep the track on various home appliances such as LPG gas cylinder, wired circuit, etc. this system uses MQ gas sensor to detect inflammable gas leakage and LM35 temperature sensor which will sense the sudden rise in temperature than above the room temperature. The objectives of this gas detector using Arduino is to sense the surroundings for occurrence of gas detector with help of LM35 temperature sensor and send 3 SMS alerts to two mobile numbers stored inside the Arduino program if gas is detected (using GSM Module). This makes easy for both the commercial as well as domestic sector to keep the track on problem faced on daily bases. This system effectively tracks the problems arises in day-to-day life.

REQUIREMENTS:

High level requirements:

Objective:

- In this project, I'm going to design **a LPG Gas Accident prevention using GSM & Arduino with SMS Alert**.

- We will **interface Sim800 GSM Module as well as MQ6Gas Sensor with Arduino**.

Flexibility:

It is very simple and easy in installation.

Life span:

Indefinite.

Low level requirements:

- MQ6 Gas Sensor.
- Arduino.
- regulated power supply.
- GSM modem.
- Buzzer.
- LCD display.

SWOT Analysis:

Strengths:

- Low-cost
- Low power
- Light weight
- Portable
- Safe
- User friendly
- Efficient
- Feasibility
- Simple system device

Weaknesses:

- Applicable only as an indicator or alerting device.
- Depends on humidity and temperature.

Opportunities:

Regional excellence attracts global talent.

Threats:

Economic crises.

4W'S & 1H:

Who:

Every household.

What:

Installation of device.

When:

At the time of installation of gas connection.

Where:

Applicable to every household.

How:

Locate near to the kitchen: