LITERATURE SURVEY

ABSTRACT:

This scheme is meant to fulfill the daily needs of the people. In our country 40 percent people die due to gas explosion at home. That number keeps growing. Even pregnant women and small children are affected.Using a GSM module and a mobile phone, the Gas Leakage Monitor is used to find, intimate leaks. The buzzer and LED are then activated after the gas leak is detected using a bracket sensor. When the designated time has passed, it will automatically turn off.

INRODUCTION:

Liquefied petroleum gas (LPG) is currently the most used gas in our home for cooking purposes. LPG gas is a flammable gas, if leaked it can cause major damage to life and property. Therefore it should be used in safe handling manner and additional care has to be taken in order to prevent any leakage possible. The main features of LPG is that being heavier than air, it do not disperse easily and may lead to suffocation when inhaled. The leaked gases when ignited may lead to explosion. The number of deaths due to the explosion of gas cylinders has been increasing in recent years. A major amount of gas is being wasted due to the carelessness of consumer's .Sometimes they forget to turn off the burner which may also could lead to damages. Our proposed topic aims at detection of gas leakage and automatic controlling of gas valve. The smart gas system which provides home safety, detects the leakage of the LPG and alerts the consumer about the leak by a notification through by using android app through Internet Of Things (IOT) and consumer can turn off the gas valve , from anywhere in the world. An added feature is that if the users accidently forget to turn off the gas burner, the system will inform by activating an alarm. so the problem of wastage of the energy is solved.

LITERATURE SURVEY:

In the proposed system we have designed “IOT based Smart Gas Monitoring System”. This proposed system aims to detect the economic fuels like petroleum, liquid petroleum gas, alcohol etc and allows a provision for controlling the gas leakage by closing the valve automatically. The functioning the sensors detect the leaked gas from the sensor and send it to the internet .by programming on the internet, the sensed signal is directed to the android app by using the android app we give the signal for switching off gas valve from distant place. So it redirects again to the internet and close the gas cylinder valve through IOT. The problem of gas wastage could also be avoided using this system. Sometimes if the burner is left on by mistake, the consumer could be alerted about the problem.

Gas sensors have been specifically utilized which has high affectability for propane (C3H8) and butane (C4H10). Gas leakage system consists of GSM (Worldwide System for versatile communication) module, which sends SMS as soon as gas leakage is detected. Keywords: Arduino, MQ-6 Gas Sensor, LCD, LPG, Stepper.

The objective of this project is to present the design of a automatic alarming system, which can detect and prevent liquefied petroleum gas leakage in various premises. This system alerts the user by sending him a phone call and alerting the neighbors by buzzer alarm after the gas leaks above setpoint1.The servo motor is used to close the gas pipe valves. This device ensures safety and prevents suffocation and explosion due to gas leakage. This project is implemented using Arduino uno and simulated using Arduino ide and proteus software

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