## Project proposal for TI-AKTU Entrepreneurship Program - SrishTI

| NAME        | COLLEGE     | UG/PG | COURSE/BRANCE | SEMESTER |
|-------------|-------------|-------|---------------|----------|
|             | ID/ROLL NO. |       |               |          |
| AMIT KUMAR  | 1406831026  | UG    | B.TECH/EC     | V        |
| YADAV       |             |       |               |          |
| CHEENA      | 1406831056  | UG    | B.TECH/EC     | V        |
| SINGHAL     |             |       |               |          |
| DEEPANSHU   | 1406831058  | UG    | B.TECH/EC     | V        |
| RANA        |             |       |               |          |
| CHITRA SAHU | 1406831055  | UG    | B.TECH/EC     | V        |

**Project Abstract:** This setup is combination of different parts including a main microcontroller, pressure and LPG sensors, Bluetooth and GSM module.

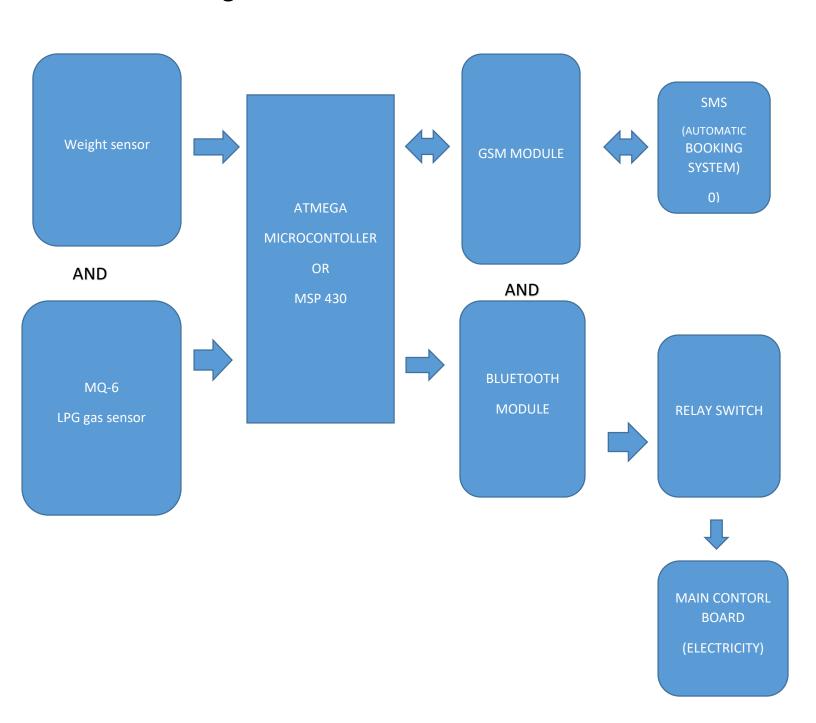
If the weight of the cylinder goes down indicating reduction in amount of LPG, the pressure sensor will send a warning input to the microcontroller using Bluetooth which will then inform the customer and on his approval it will send a message to booking authority pre-booking a new LPG cylinder using a GSM module.

In any case if there is a leakage from the cylinder, the LPG sensor will direct a command to the microcontroller using Bluetooth module that will raise a siren attached to it. It will also shut down the power supply using a relay in series with the main supply that will automatically turn on the supply once the leakage is over.

The only challenge that arises is the acceptance of this technology by the various LPG providers and moreover the LPG cylinder and the main power supply need to be in a range of 100 meters for the Bluetooth module to work properly.

### ❖ Proposed Design:

#### a. Block Diagram



#### **Component Used:**

- 1. Weight sensor(Pressure sensor)
- 2. MQ-6 (Lpg Sensor)
- 3. Atmega microcontroller or MSP430
- 4. Gsm module
- 5. Bluetooth module
- 6. Relay switch
- 7. Voltage regulator(LM1117)
- 8. Other basic component

# Innovativeness and Impact of the proposed idea/solution

In our project we basically focused on the need of customers. This project enables the customers to look whether their cooking gas cylinders are empty or going to empty so they can easily order for the gas automatically. This project is totally micro-controller based project in which all the tasks working by micro-controller due to which less power is required to operate the product. There is no rival of this project in the market so it can be used efficiently. This is a GSM based project so user can operate it by their mobile phones so it provides a user interface for which it can be easily handle. The demand of this product will be there in the market for 20-30 years and it is affordable for the people. The salient feature of this device is size as it provides compactness to the device. The reliability of this project makes it to buy easily for use and also it is a need in current generation. By help of this project people can easily update of their cooking gas cylinders status and easily manage their booking and replacement of cooking gas cylinders also they always in touch with updates via mobiles and it can automatically book your cooking gas cylinders as per your choice. So here we give you a thundering technology that enables your work easy in kitchen. So be stressfree and stay happy!!