

Project Design Phase-I
Proposed Solution Template

Date	09 NOV 2022
Team ID	PNT2022TMID43711
Project Name	HAZARDOUS AREA MONITORING INDUSTRIAL PLANT POWERED BY IOT
Maximum Marks	2 Marks

Proposed Solution Template:

Project team shall fill the following information in proposed solution template.

S. No	Parameter	Description
1.	Problem Statement (Problem to be solved)	Hazardous Area Monitoring Industrial Plant powered by IoT
2.	Idea / Solution description	Hazardous Area Monitoring Industrial Plant powered by IoT, we are developing a system which will automatically monitor the industrial applications and generate Alerts/Alarms or make intelligent decisions using the concept of IoT. Every device will be acting as a beacon and it is connected to temperature sensors. We can broadcast the temperature data along with the location of that particular area through beacons. The persons who generally monitor these places will be given a wearable device which will be acting as a beacon scanner.
3.	Novelty / Uniqueness	Industrial IoT is an application of IoT that enables control of industries over the Internet using smart devices and sensors. The two main entity which ensures effectiveness in any field is monitoring and control. Keeping a view on this aspect, we have designed a low-cost, low-power Wi-Fi based industrial monitoring system that controls and monitors the remote manufacturing plants and industries using a web application. In this model, the components are connected with a Wi-Fi module for internet connectivity to detect the temperature and pressure using sensor. These components are utilized to build a monitoring system. Apart from these components several other sensors are used to keep a check on the temperature, gas leakage,

		pressure, humidity, etc. in the work environment to ensure the workers safety.
4.	Social Impact / Customer Satisfaction	1) Real-time data is available 2) Reliable and consistent data 3) Automated detection 4) Environmentally Friendly 5) Excellent customer service
5.	Business Model (Revenue Model)	1) Through our mobile application the revenue can be made in the form of pop-up advertisement, over lay AD from third party services. 2) Wearable devices can be priced and sold by the industry to the workers.
6.	Scalability of the Solution	In some industrial plants, there are some areas which are to be monitored time to time. To monitor the conditions, we can integrate the smart devices in the areas which are needed to be monitored. This System can be deployed in many industrial areas like mining and factories and it will help to provide a safe and efficient working Environment