Project Design Phase-I
Proposed Solution Template

Date	16 October 2022
Team ID	PNT2022TMID01115
Project Name	Project – Hazardous Area Monitoring for 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)	To detect and warn the employees of the danger due to fire that may breakout within the vicinity and to safeguard the employees
2.	Idea / Solution description	By installing modern-day temperature sensors like thermocouples ,RTD 's (Resistance temperature detector) thermistors to detect change in temperature ,if any . An alarm goes off and lights start blinking to show the change in temperature. By constructing big and long pipes on the ceiling which spray water or sand (According to the cause of fire)
3.	Novelty / Uniqueness	• Makes it easier to know the temperature (or) any hazardous gases present in the area without the worker having to constantly doing manual checks. • Provides different solution to ensure the safety of the workers. • Wearable devices display the current temperature present in the area all the time. • Alerts via SMS to mobiles of the workers when high temperature is detected. • Alerts on both the wearable device and mobile application occurs simultaneously to prevent the worker from entering into hazardous areas.
4.	Social Impact / Customer Satisfaction	• Very safe • Cost effective • Easy installation • User friendly • Easy detection and avoid accident
5.	Business Model (Revenue Model)	• By introducing non skip advertisements in social platforms

		• High quality sensors can be brought from good reputed companies through tenders approved by government
6.	Scalability of the Solution	• Good quality sensors detect the temperature very accurately before the fire explosion • Water and sand are always kept handy in large amounts to stop the fire from spreading • Every user is immediately alerted and comes to know of the difference in temperature through the chip that is present in his safety jacket • It ensures the safety of each and every worker working in harmful gases and high temperature environment. • Large no. of people can be supplied with the wearable devices to ensure their safety.