Project Design Phase-I Proposed Solution Template

Date	19 September 2022
Team ID	PNT2022TMID42321
Project Name	Emerging Methods for Early
	Detection of Forest Fires
Maximum Marks	2 Marks

Proposed Solution Template:

S.NO	Parameter	Description
1.	Problem Statement (Problemto be solved)	Detecting the forest fire at the most earliest possible time to reduce its impact in our environment in all possible ways
2.	Idea / Solution description	Use computer vision methods for recognition and detection of smoke or fire, based on the still images or thevideo input from the drone cameras.
3.	Novelty / Uniqueness	We classify the pixels using CNN algorithm with an efficient mobile alertsystem that sends messages to corresponding authorities
4.	Social Impact / Customer Satisfaction	Saves the environment and its related resources from great loss. Blocked roads and railway lines, electricity, mobile and land telephone lines cut, destruction of homes and industries
5.	Business Model (Revenue Model)	Prevents damaging of the electrical wires and optical fiber which may costthe government. Reports to the forest department and nearest police station quickly so as to take faster actions
6.	Scalability of the Solution	Computer vision models enable land cover classification and smoke detectionfrom satellite and ground cameras Automated analysis of fire detection. Improved accuracy rate. Reduced timefor computational complexity.