Safety Clothing for Mining

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PROBLEM STATEMENT

Work clothing that has sensors embedded in it to securely transmit data to managers about hazardous conditions and the workers' physical conditions, improving safety overall.

ABSTRACT

Engineer is the person who is always been interested in providing the best alternative solution to any social problem. Keeping this in mind and visualizing social problems in several countries, it is observed that annually several people die working inside coal mines. By identifying this problem, this project suggests a wearable smart jacket design for securing the life of coal miners. This Prototype senses the various health related parameters i.e. the presence of hazardous gas (Carbon monoxide, Methane, Smoke, Hydrogen Sulphide), temperature/humidity & location of the miner. All these parameters will then be transmitted through a Wi-Fi shield to a dynamic internet protocol. In this way, one may monitor all the labours working inside the mine and moreover in case of disaster the life of miner can be secured immediately.