POWER PLANT-ROBO

Team Name: TEAM V

Team Members: MURALIDHARAN P, NARAIN KARTHIK V,SUSEENDRAN V,NIVETHASRI R

College: Bannari Amman Institute of Technology, Sathyamangalam, Erode.

PROBLEM:

A nuclear power plant accident which affected the most of the living and the future generation- Chernobyl disaster. The most notorious nuclear power plant accident occurred at the station of Pripyat in the north of Ukranian SSR in the Soviet Union. A disaster which shook the entire world in early months of '86. Till now, there are nuclear power plant all around the globe, but to the miracle the radiation affects due to those plants didn't reduce and it causes serious health problems. To overcome such kind of tragedy- We can use mobile robots for surveillance and other kind of jobs where the radiation affects are more. The mobile robots can be automated by humans- the sole purpose of this kind of attempt is to produce healthy society and also the technological improvement. And also, to ensure an event like Chernobyl doesn't occur in the future.

Abstract:

The jobs the Robot is designed to do is detect the level of Radioactivity, Reactor and Cooler surveillance and maintenance, Handling Nuclear waste. The nuclear Robot of ours work in the way of checking the flaws (surveillance) of the nuclear power plant . So it will check and reports the flaws it found. The nuclear Robot of ours work in the way of checking the flaws (surveillance) of the nuclear power plant around. So it will check and reports the flaws it found. First of all, this Robot is already in the market but our idea is to operate (surveillance) the Robot using mobile phones. If there is no flaw found, Robot keeps on checking the flaws present in the area. If error is found, it transmits error to the controller using GSM and the rest of the jobs are done for fixing by the nuclear station engineers.

SPECIFICATIONS:

Microcontroller used: 8051

Sensors used: Temperature sensor, Radiation sensor, Camera, Ultrasonic sensor, Proximity sensor, GSM and GPS

Keywords: nuclear, mobile, robots, future, technology.