ABSTRACT

A fire detection surveillance camera is a security or prevention system so that fires do not have a major impact on the place. Fire can occur if there is a trigger and can spread to flammable areas. To reduce the risk of fire. To reduce the risk of fire, it can be done by taking advantage of current technological developments, one of which is using the internet as a warning for the safety of an environment, especially a flammable place.

In this study, we will try to design a fire detection system using a camera as a supervisor, the camera detects a fire which is then processed by the microcontroller. Furthermore, data from the microcontroller will be sent to a smartphone by utilizing an internet cloud application based on the Internet of Things and sending data in the form of room temperature notifications and real time videos that users can monitor remotely. It is hoped that this system can help humans to monitor fire-prone areas, so that it can be an early prevention in the event of a fire.

The purpose of making this tool is to prevent the occurrence of fire and reduce the risk of fire spreading to the surrounding area. Using real-time firebase data, the DHT 22 sensor is obtained from the Arduino program and detects objects using a camera with python which then enters the real-time data firebase and is sent directly to the application with a success rate of sending notifications 100%.

Keyword*: Fire, Camera, Internet of Things, internet cloud*