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Virtual Heart Monitoring System Using IoT

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Abstract: Cardiovascular disease is one of the leading causes of mortality worldwide. Early detection and diagnosis of heart conditions are essential for effective management of the disease. Heart monitoring systems have become increasingly popular, and the advent of IoT technology has provided an opportunity to develop wearable heart monitoring systems for real-time heart monitoring. In this project, we propose a heart monitoring system using the MAX30100 pulse oximeter and the ECG sensor. The system is designed to monitor heart rate, oxygen saturation level, and pulse rate. The ECG sensor detects the presence or absence of the pulse, and the MAX30100 pulse oximeter measures the oxygen saturation level and heart rate. The data collected from the sensors are transmitted wirelessly to a Blynk application through a microcontroller. The Blynk application is used to display the heart rate, oxygen saturation level, and pulse detection status

Keywords: IOT(Internet of Things), Sensors, Micro Controllers, Heart Disease, Bluetooth module, Data Analytics, Blynk App

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