

**WOMEN SECURITY USING RASPBERRY PI****RASPBERRY PI BASED SMART BRACELET**¹Swati Machhindra Shelar, ²Prof. Mrs. Nanada Kulkarni^{1,2}Department of Electronics & Telecommunications Engineering,
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Abstract — Every day every woman, every young girl, every mother and every woman from every corner of life Women are fighting to be protected and defend themselves from the roving eyes of incredibly ignorant men who regularly molest, abuse and disrespect women's integrity. In particular the highways, public transport, and public spaces have been the hunters' domain. Instead of these crimes that women are vulnerable to in the present situation, a digital protection monitoring app is suggested for women based on the Internet of Things. It is introduced in the shape of a smart network and includes Raspberry Pi Zero, Raspberry Pi monitor, buzzer and activation button for the services. This device is extremely portable and can be activated by the victim when assaulted by just clicking a button to capture the attacker's image via Raspberry Pi camera. The location and connection of the captured image will be transmitted to the victim's smartphone to anticipate 911 contact numbers or police, thereby avoiding the use of external hardware devices/modules and making the camera small.

Keywords: Raspberry PI , Buzzer , GSM , GPS

I. INTRODUCTION

IoT involves other technologies, such as autonomous vehicles, tracking apps and also Human implanted devices, home automation and lighting control systems; smart phones increasingly used to measure the world around them. Wireless sensor networks similarly measuring temperature, odddefense, tides and more. There are two key aspects to the IoT: the devices themselves and the server-side architecture that supports them The motivation for this wearable comes from the growing need for safety for little children in the current times as there could be scenarios of the child getting lost in the big crowded areas. The paper reflects on the main factor that the people surrounding the child can support the missing child, which can play a significant role in the welfare of the child before the parents are reunited. Many of today's wearables focus on supplying the parents with the child's location, movement, etc. through Wi-Fi and Bluetooth. But Wi-Fi and Bluetooth appear to be a very unreliable source for data transfer. This is why SMS is intended as the mode of contact between the Wearable app for parents and babies, because this has less risk of failure compared to on Bluetooth and to Wi-Fi..

II. MOTIVATION

The system's key purpose is to communicate an immediate location and a support message to a recorded list of contacts and the police via an Android app, so that unjust accidents can be avoided, and to provide real-time evidence for quick action against the victims of the crime depicts the IoT technologies that are slowly emerging across all human frontiers. Having a handheld tool is much harder to hide and touch, and can be comfortably used at much less chance of being misplaced or damaged in a scuffleand it can be used effectively to call for assistance.

III. PROBLEM DEFINITION AND OBJECTIVES

Creating an immediate familiar location to a recorded list of friends and police with an android app to avoid accidental accidents and provide evidence in real time. This app is a real-time, lightweight, safe system consisting of a button activating the Raspberry-Pi, transmitting the warning code, victim current position with a reported crime graphic, and even generating a high-frequency alarm to draw others' attention. While this system is specifically developed for women's health, it can also be used by other members of society, including elderly persons, a girl child or anyone facing an unsafe circumstance

III. LITERATURE SURVEY

Though responding to the same issue other developers have come to consider Up with new applications. Existing major applications are-

A. App: VithU

This is an emergency app, launched by a popular Indian crime TV series Gumrah aired on [V] Screen. VithU is an emergency program that clicks Your Smartphone's power button 2 times in a row starts sending warning messages to

your contacts every 2 minutes that you are fed into the device as assigned receivers or guardians. The message says "I'm in danger. I'm in need of support."

B. Stunned arms

This small arm fires an electric shock at an intruder. The shock feels weak Temporarily the intruder offers you a sample chance to flee the scene. A stun gun shoots about 700,000 volts into the attackers body when the trigger is pulled. Any stun weapons are small enough to conceal in a packet of cigarettes. They run on lithium batteries, which can either be held in handbags or in waist belts.

C. Wrestle back

Fightback app is a very simple, similar application to the ones mentioned above. Anyway, one Facebook status update is unique feature we like about the app. Outside Providing SMS and Email alerting solutions to the other party during crisis, Your Facebook status is also changed with software.

IV. SYSTEM ARCHITECTURE

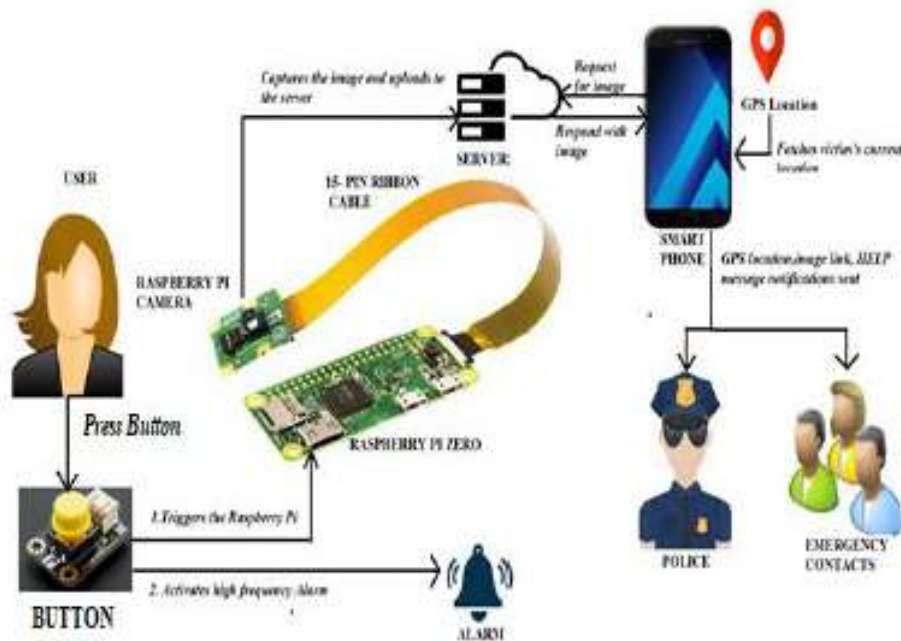


Fig.3 System Architecture

V. PROPOSED SYSTEM

Safety for women is proposed using Raspberry Pi. As shown in figure 1, below, The apparatus intends to operate in two sections. In the first part, if a wife is If the opponent is attacked, the switch must then be pressed manually, By her (which is ideally situated on the body in a convenient location). This is the controller (raspberrypi) will be triggered by the switch to capture the image / video Attacker, and by duplicity relay. Tentatives are under way to grow A method of transferring that image to a web server. Secondly Using the GSM module to transmit the emergency message "Please Help" to the designated mobile phone numbers (usually family and friends).

Considering today's women's problems, holding our people in safe hands is the need for the hour. The 21st century blooming innovations is best used in the production of numerous applications and tools for the safety of women in distress. Technologies such as IoT and Virtual Reality are in demand and have shown benevolence towards women's society[14]. Yet tragedies still exist suggesting the need for new solutions.

Advantages Of Proposed System:

- ✓ Crime Recognition
- ✓ Improved portability and flexibility
- ✓ A boon for seniors and people with medical problems
- ✓ Should also be used for the protection of children to deter violations such as sexual violence and monitoring children
- ✓ Need to move to safer environments

VI. APPLICATION APPLICATION

- ✓ Women Safety
- ✓ Criminal Identification
- ✓ Increased accessibility and portability
- ✓ A boon to senior citizens and people suffering from medical issues

VII. CONCLUSION

The new mechanisms aren't strong enough to protect Women from attacks. The system's main objective is speedy operation, low production cost, reasonable efficiency, reliable monitoring. This paper set forth a methodology in which a woman would immediately intimate the authority involved while in danger. The suggested strategy uses mobile GPS monitoring to provide co-ordinates between the units. This technique further uses URL of the image and alert message to inform the family and police personnel. However, this technique is effective only with the availability of smart phone to the victim and the contact personnel. Therefore, by using GSM and GPRS aspects of the strategy, there is room for more progress. Woman empowerment would make India a well-developed country. We need education not only for women in villages, but also for women in cities to be educated in physical defense. Women ought to be aware of all the programs and freedoms the government is offering to motivate them. To empower the girl students, each educational institution must have a Women Empowerment Cell. In all ways that makes them equal to men.

VIII. REFERENCE

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