

**A**  
**SYNOPSIS REPORT**  
**On**  
**"COMMUNITY BASED REPORTING AND MONITORING TOOL FOR**  
**WOMEN SAFETY IN COLLEGE/UNIVERSITIES"**

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## **ABSTRACT**

Ensuring the safety of women within college and university campuses is of paramount importance for fostering a conducive learning environment. This abstract presents a community-based reporting and monitoring tool designed specifically to address the safety concerns of women in higher education institutions. The tool incorporates features such as SOS alert messaging, real-time location tracking capabilities to enhance the security measures available to female students.

The community-based approach leverages the collective responsibility of the campus community to actively participate in reporting and monitoring safety incidents. Users can quickly send SOS alerts to designated contacts or campus security personnel in emergency situations, accompanied by their precise location for swift assistance.

By harnessing technology and community engagement, this reporting and monitoring tool aims to empower women within college and university settings, fostering a culture of safety, support, and accountability. Implementation of such a tool has the potential to significantly enhance the overall security infrastructure of higher education institutions, promoting a safer and more inclusive learning environment for all.

*Keywords:Community-based,Monitoring, SOS alert messaging, Real time location tracking, Empowerment, Security infrastructure*

## **INTRODUCTION**

In recent years, there has been a significant increase in the recognition of the need for innovative solutions to address issues related to women's safety and security. One such solution that has gained prominence is the development of community-grounded reporting and monitoring apps. These apps leverage the power of technology to empower women to report incidents of harassment, violence, and other forms of abuse quickly and discreetly.

These apps typically feature a user-friendly interface that allows individuals to report incidents with just a few taps on their smartphones. They may also include advanced features such as geolocation tracking, which can help authorities respond more effectively to reports and provide timely assistance. Additionally, these apps often offer and connect users with support services for victims, such as access to helplines, legal assistance, and counseling.

By enabling women to report incidents in real-time and providing them with access to support services, community-based reporting and monitoring apps are playing a crucial role in creating safer environments for women. These apps not only empower individuals to take action against harassment and abuse but also contribute to raising awareness and fostering a sense of community solidarity in the fight against gender-based violence.

## **AIMS & OBJECTIVES OF PROJECT**

### **Aim**

To develop a comprehensive community-based reporting and monitoring tool aimed at enhancing the safety of women within council/ university premises.

### **Objectives**

- Develop an intuitive and user-friendly interface for the reporting and monitoring tool, ensuring accessibility for all users.
- Implement a panic button functionality within the application to allow users to send immediate distress signals to designated contacts or authorities in emergency situations.
- Enable the tool to send automated alert messages to predefined contacts or emergency services when triggered by the user or system.
- Integrate GPS technology to accurately track and share the user's real-time location with trusted contacts or emergency responders, facilitating timely assistance and intervention.
- Conduct workshops and awareness campaigns to educate students, faculty, and staff about the functionality and importance of the reporting and monitoring tool, encouraging widespread adoption and utilization.

## LITERATURE REVIEW

**Kohli, Priyanka, Kawaljeet Singh, and Brahmaleen K. Sidhu in their paper "An intelligent women safety app for educational campus."**

The Intelligent Women Safety App has been proposed with features like Authenticity by user and guard, Real-Time Location of user and guard, Geo-fencing technique, SOS facilities for the user. With the use of this app, the campus administration will attempt to provide a safe and secure environment especially for girls in the campus.

**Mareeswari, V., and Sunita S. Patil. In their paper "Smart device for ensuring women safety using android app."**

Summarizes current safety device available for women's self-protection in situations like rape and assaults and adds a new perspective of using Android smartphones with GPS for women's safety. By implementing and using our proposed system, not only the safety of women but also of valuable things will be just a click away at very cheap price and comfortable.

**Ashok K in his paper "A survey on design and application approaches in women-safety systems."**

Presents a comprehensive survey on design and application approaches in women safety systems. There are many promising technologies relied on women security systems using iot, embedded, artificial intelligence, machine learning, augmented reality, android Mobile apps etc. We have undergone with a comparative analysis of such techniques and open research issues that would enable the researchers to design a complete women security system for the beneficial of the entire women community in global level.

**Monisha, Dr G., In her paper "Women safety device and application-FEMME."**

The user has to carry multiple devices. We found an ALL-IN-ONE security device which has all the features in one click. Applications/Improvements: In this paper we used ARM controller and android application in which both the device and the smart phone are synchronized using bluetooth, hence both can be triggered independently. We can record audio for further investigation and can give an alert call and message to the pre-set contacts with the instant location every 2 minutes and can be tracked live using our application. Hidden camera detector is also a distinct feature using which we can ensure our privacy.

**Ashok, K., in his paper , "A Review on Women Safety in India using Machine Learning on Different Social Media Platform."**

It basically focuses on women's safety in social media and to protect them in every place. Tweets on twitter, posts on facebook, instagram which contains the videos and images, any written text and quote which are abusive the women's or treat to them and less protection to women's in different areas of India can be used to understand by the youth of India and to take the strict action on them who misuse the women's safety who harass them in social medias via tweets, posts, text should take the strict action on them. Tweets on twitter and the posts on Facebook and Instagram where the women share there views which spread all over the world as a stand for women or girls to explain their views, and opinions where they felt bad while when planned to go out for work and moving in a public places and transport and we can understand what actually they are feeling when they are in unknown place or harassed by unknown people and weather they are feeling safe or not.

## **PROPOSED WORK**

**User Registration and Profile Creation:** Users can create an account with basic information and a profile picture. They can also choose to provide additional details such as emergency contacts and medical information.

**Incident Reporting:** Users can report incidents of harassment, assault, or any other safety concerns. They can provide details such as the location, time, and nature of the incident. They can also choose to report anonymously if they wish.

**Real-time Monitoring:** The app can have a feature that allows users to monitor their surroundings in real-time. This can be done through a map interface that shows the location of other users and any reported incidents in the area.

**Emergency Alerts:** In case of an emergency, users can trigger an alert that notifies their emergency contacts and campus security. The app can also provide guidance on what to do in different emergency situations.

**Community Forum:** A forum where users can discuss safety issues, share tips, and support each other. This can help build a sense of community and solidarity among users..

**Feedback and Reporting Mechanism:** Users should be able to provide feedback on the app and report any issues or concerns they encounter. This can help improve the app's effectiveness and usability over time.

**Partnerships with Campus Authorities:** The app can establish partnerships with campus authorities to ensure that reported incidents are addressed promptly and effectively.

Implementing these features we create a safer environment for women in colleges and empower them to report and address safety concerns effectively.



**Figure.1 : General Architecture of Proposed work**

## **RESEARCH METHODOLOGY**

Through extensive examination of numerous research papers, this project to develop an application aimed at enhancing women's safety within college and university environments, employing both community engagement and monitoring functionalities. Initially, users will be prompted to register by providing their email and creating a password. For those not yet registered, a seamless registration process will follow. Subsequently, users will be prompted to input details of three trustworthy contacts for emergency situations. The application will then prompt users to enable location services, ensuring swift assistance in emergencies by transmitting the precise location of individuals in distress to pre-registered contacts as well as community members. Upon completion of these steps, users will access a user-friendly dashboard. In the event of danger, users can swiftly activate an SOS feature, triggering alert messages to both designated contacts and the community. Lastly, a feedback mechanism will be integrated, allowing users to share their experiences and suggest improvements.

The technologies mention below are being used in our project.

- **Flutter:** For application development.
- **MongoDB:** For backend development.
- **Firebase:** For authentication and database.
- **Figma:** For UI&UX designing.
- **API:** Google maps

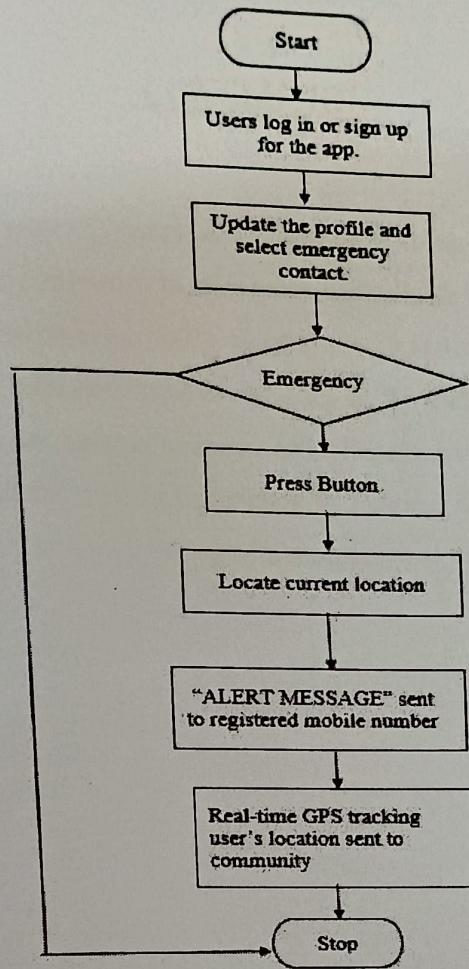


Figure.2: Flowchart of Methodology

## CONCLUSION

Now a days, there's a growing worry about how safe women feel on university/college campus. It's become really important to have quick and reliable ways to respond to problems. That's why our project has come up with a smart tool with features like SOS cautions, instant and alert messaging and with GPS locations tracking it. By using technology and community support, this tool enhances safety measures on college/university campus and empowers women's to report incidents such as harassment or ragging. Overall, it stands as a critical action in promoting safety and well-being within educational institutions.

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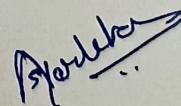
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