



IJRASET

International Journal For Research in
Applied Science and Engineering Technology



INTERNATIONAL JOURNAL FOR RESEARCH

IN APPLIED SCIENCE & ENGINEERING TECHNOLOGY

Volume: 12 **Issue:** III **Month of publication:** March 2024

DOI: <https://doi.org/10.22214/ijraset.2024.58829>

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Women Safety App Project

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Abstract: *Women's safety is a fundamental and ongoing issue affecting millions of women around the world. Fear of violence, harassment and persecution can create significant obstacles and limit their mobility and freedom. In response to these challenges, we developed the Women Safety Project app, an easy-to-use mobile app that aims to provide women with effective tools and resources to help them stay safe. The app takes into account women's particular safety concerns, such as traveling alone at night with the number or navigating in unfamiliar places. By providing a comprehensive and easily accessible solution, the Women Safety Project app aims to empower women to take back control of their safety and live happily ever after.*

Index Terms: *Women safety app, Location Tracking, Android development, Location tracking, Email alerts, Navigation, Violence, Panic buttons.*

I. INTRODUCTION

Millions of women worldwide are impacted by the critical and persistent issue of women's safety. Significant obstacles may be put in their way, restricting their freedom and mobility due to fear of assault, harassment, and stalking. We created the Women Safety Project App, a user-friendly smartphone application aimed at giving women useful tools and resources to improve their safety and security, in response to these difficulties.

The app takes into account the special safety concerns that women have, such going somewhere new alone at night. The Women Safety Project App strives to empower women to regain control over their safety and lead secure lives by providing a complete and convenient solution.

II. PROBLEM STATEMENT

With so many documented cases of physical attack, harassment, and violence against women, women's safety continues to be a problem. The current safety solutions frequently fall short in terms of offering useful and efficient support. Numerous safety apps and gadgets on the market have a small feature set and don't address the complicated safety issues that women face. Additionally, some of these remedies can be too expensive or difficult for women from underserved communities to access, widening the safety gap.

The Women Safety Project App aims to offer a complete and customized solution that solves the many safety needs of women and is available to everyone in order to close these gaps.

III. EXISTING SOLUTION

There are a number of products on the market now that can improve women's safety. Personal alarms and wearable technology, such as jewelry with a built-in computer, are popular safety measures that generate loud noises or notify emergency contacts when a person is in danger.

To support women's safety, some organizations provide services like self-defense lessons, helplines, and advocacy groups. While these solutions provide some assistance, they frequently lack the adaptability and all-inclusive approach required to deal with the complex safety issues that women encounter. This gap will be filled by The Women Safety Project App, which offers a more comprehensive and adaptable safety platform.

IV. PROPOSED SOLUTION

A comprehensive and user-centered approach to addressing women's safety concerns is represented by the Women Safety Project App. It includes a wide range of features that may be adjusted to meet the needs of each user, providing a customized level of safety. A panic button for instant distress alerts, emergency contacts with adjustable settings, and AI-powered safety alerts that identify potential risks and issue real-time warnings are among the key features. The software helps women plan safer journeys by taking into account elements like well-lit streets and busy locations. Women may take charge of their safety and make informed decisions about their everyday activities by combining these elements into a single app.

V. SOFTWARE AND HARDWARE REQUIREMENTS

The Women Safety Project App was created to work with a variety of users' devices. It works with both Android and iOS operating systems, needing a minimum of iOS 11 on Apple devices and Android 5.0 (Lollipop) on Android devices. A wide range of users can access the app thanks to its use of cross-platform mobile development frameworks like React Native, Flutter, or Ionic. The software uses GPS technology, thus for optimal performance, smartphones should have a minimum of a 1 GHz processor and 2 GB of RAM. The app is small, just requiring 50 MB of storage, and works well on a variety of handsets. Real-time updates and warnings also require an active internet connection, whether it is Wi-Fi or cellular data.

VI. MODULES

- 1) *Location tracking Module:* The Location Tracker is a core part of the Women Safety Project app, which uses GPS technology to provide users with real-time location updates. This module allows women to share their current location with selected emergency contacts, ensuring their trusted contacts are aware of their whereabouts. In the event of an emergency or potential emergency, information about nearby safe places like police stations, hospitals and emergency services. By providing accurate location data, this module increases women's sense of security and enables them to make informed decisions in their daily activities.
- 2) *Emergency Contact:* The emergency contact module is a key aspect of the Women Safety Project app and allows users to customize their emergency contact list. Users can add trusted contacts such as family, friends, or local authorities to receive emergency notifications. When a panic button or security alarm is triggered, this module notifies specific contacts of your location quickly and in real-time. This instant notification ensures help is sent immediately, and provides a safety net for women facing potential threats. The ability to customize the emergency contact list gives users the ability to customize their support network according to their personal preferences and security needs.
- 3) *Panic Button Module:* The Panic Button Module is an essential feature designed to provide immediate help and support to users in distress. In an emergency, users can activate the panic button with a single button press. Once activated, the app will immediately send distress signals to the emergency contacts of your choice, notifying them of a critical situation and sharing the user's real-time location. The panic button's quick response mechanism ensures help is at hand and provides women with a reliable and effective tool to call for help in emergency situations.
- 4) *Tracking:* The Safe Routes and Transportation Options Module is a practical tool that assists women in planning safer journeys. Users can select their preferred mode of transportation, such as walking, cycling, or public transportation. The module then provides route suggestions based on safety factors, including well-lit streets, high-traffic areas, and areas with reported incidents of violence or harassment. By offering secure route recommendations, this module empowers women to make informed decisions about their travel routes, avoiding potential danger zones and reducing their exposure to risks.

VII. EXECUTIVE SUMMARY

The Women Safety App project aims to develop a comprehensive mobile application that aims to increase safety for women in various situations. As women's safety concerns increase, especially in public places and during emergencies, our app aims to provide women with the tools and resources they need.

The app offers several key features, including a real-time GPS tracking system that allows users to share their location with trusted contacts, giving them a sense of security and surveillance. In addition, a panic button is integrated, which users can use to quickly alert the emergency services and notify selected contacts in an emergency. To encourage community engagement and support, the app will support a network of like-minded users through user forums where women can share safety tips, share experiences and ask for help to help other people.

VIII. BUSINESS VIABILITY

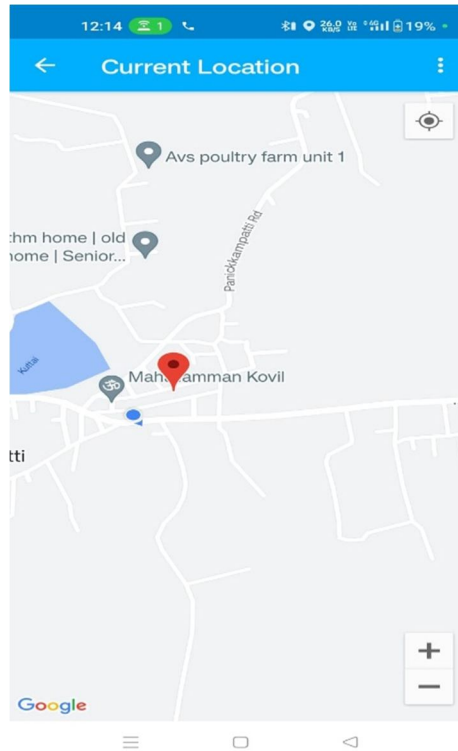
Assessing the business viability requires a comprehensive and realistic analysis of these factors. It's essential to conduct thorough research and seek professional advice when necessary. Remember that even with a viable business idea, success may not be guaranteed, but careful planning and execution increase the likelihood of building a sustainable and profitable venture. This has the scope for women in the project and it has the scope of maintaining the women safety and hence the growth of the safety for women. The model of the project is available in the society that it is useful for the young girls, young women and the working women it avoids many safety.

IX. OUTPUT

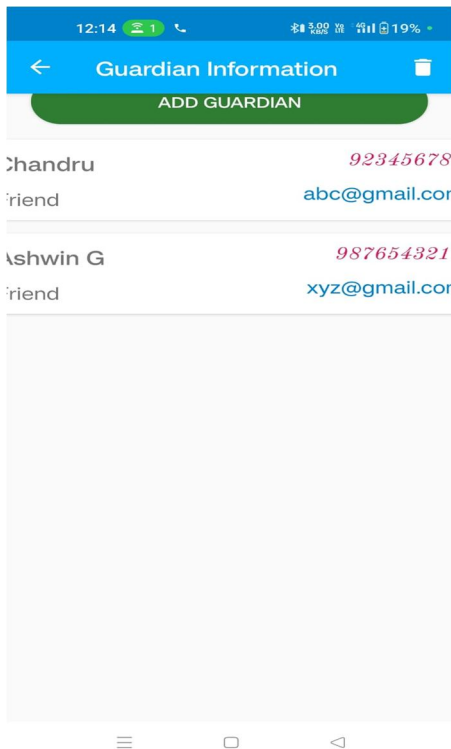
Appview



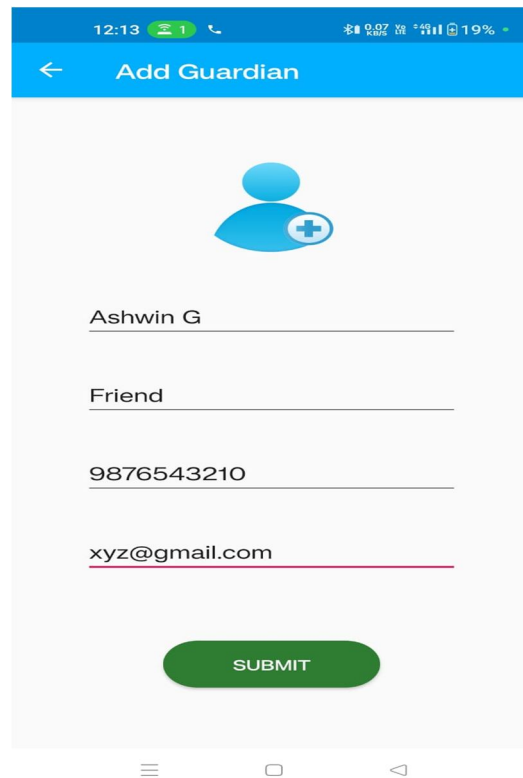
Location

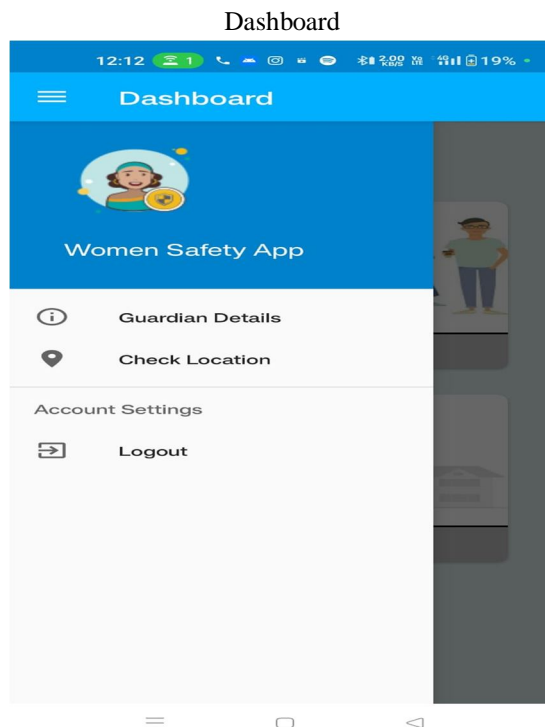


Guardian



Add Guardian





X. FUTURE SCOPE

There is a lot of room for improvement and development in the Women Safety Project app. Integration with smart home devices like security cameras and motion sensors is an area that may need further development. This would enable remote monitoring and alerting. Individual users can receive expert security advice by implementing machine learning algorithms for personalized risk assessments. While social media integration helps alert consumers to nearby safety issues, the voice-recognition capabilities can enable contactless activation of emergency notifications. Additionally, an AI-powered chatbot can provide consumers with on-demand security advice and support, increasing their sense of security. The software can also explore how wearable technology can work with it, improving its usability and accessibility.

XI. CONCLUSION

By providing a comprehensive and personalized safety platform, the Women Safety Project app serves as a vital safeguard against women's safety concerns. The software gives women the confidence and security they need to go about their daily lives with an easy-to-use interface and customizable features. Utilizing cutting-edge technology, it offers a significant advantage over currently available options, effectively solving women's safety concerns. The potential for future expansion and improvement of the app is increased by its contribution to creating a safer and more inclusive environment for all women. The Women Safety Project app aims to make a lasting impact on women's lives by focusing on their safety, providing the necessary resources and creating a culture where everyone has a fundamental right to safety.

REFERENCES

- [1] Laird Dornin "Programming Android" second edition "O'Reilly Media, Inc.", 2012.
- [2] "WOMEN'S SECURITY", Android App developed by AppSoftIndia, December 17, 2013.
- [3] "STREET SAFE", Android App by People Guard LLC, September.
- [4] Design of a women safety Devices" by IEEE Region Humanitarian technology Conferences 2016



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