SAFEZONE: AN ANDROID BASED MOBILE APP FOR UNIVERSITY STUDENTS TO PREVENT VIOLENCE AND RAGGING

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Ragging, a practice involving the hazing of new students by senior students, can result in various negative outcomes, including mental, physical, and verbal abuse. To address this issue, we need a mechanism to secretly inform the officials when an incident happens to safeguards students from ragging incidents. This project aims to design a mobile app dedicated to enhancing security alert systems for university students. Our study focuses on creating an application that provides protection for newly entered university students, specifically against ragging incidents. By adopting this app, students can easily and secretly share their current location and send an alert via SMS to required officials. One of the key advantages of this prototype is the ability to report incidents anonymously without revealing any personal information like phone numbers or names. By pressing a single button, this prototype allows students to share their current location and send SMS alerts. This app utilizes OpenAPI for secure data exchange, alongside the Google Maps API for location services and the Android SMS API for alert delivery. The is developed using Android Studio by utilizing an Android mobile device to send location-based SMS alerts within few minutes to security people, so that they can track the victim casually and prevent any dangerous harm to the victims. The functionality of this prototype is tested with 50 users, demonstrating high accuracy in location sharing and positive user feedback regarding its anonymity and ease of use. Further, we have designed the app to be adaptable for various locations and platforms. By emphasizing the importance of students' safety and utilizing technology, this prototype offers a solution to address the issue of ragging incidents in universities. Also, will plan to collaborate with universities to integrate Safe Zone with existing security systems and promote it as an official safety resource, conduct user testing with diverse group of university students. This will allow us to refine the app's usability, effectiveness and user experience based on real user feedback, develop and integrate advanced safety features such as emergency contacts, real-time tracking, panic buttons and AI integration for incident detection and continuously improve security and privacy measures to ensure strong data protection and user anonymity.

Keywords*: Mobile App, SafeZone, Android, Security, SMS Alert*