REQUIREMENTS GATHERING

GROUP 22



OUTLINE

- I. Introduction
- 2. Review Existing Documentation
- 3. Identify Stakeholders
- 4. Business Requirements
- 5. Gather Functional Requirements
- 6. Non-Functional Requirements
- 7. Requirements Documentation
- 8. Manage Requirements Changes
- 9. Data Collection



1. INTRODUCTION

- Requirement gathering is the process of collecting information about what the stakeholders want to achieve.
- This task ensures there is clarity in the project and ease in its development as all other processes such as the requirement analysis or system design is dependent on what requirements are gathered.



2. Review Existing Documentation

- Overview of traditional methods for disaster management.
- Disadvantages of the traditional methods.
- Overview of mobile based disaster management system.
- ▶ Advantages of mobile based disaster management system.
- Limitations of existing mobile based disaster management system.
- Note: While disaster management applications offer significant benefits, they are not intended to replace traditional disaster management methods but rather to complement and enhance them.



3. Identify Stakeholders

Stakeholders in a disaster management system are the individuals, groups, or organizations that have a stake in its success. They can be impacted by disasters or play a role in mitigating them, preparing for them, responding to them, or recovering from them. Here are some key stakeholder groups



3. Identify Stakeholders

CITIZENS E. RESPONDERS NGO'S STAKEHOLDERS GOVERNMENT **MEDIA AGENCIES**



Roles Of Our Stakeholders

- Citizens: Prepared, informed, engaged for effective response.
- Emergency Responders: Trained, equipped, frontline heroes saving lives.
- 3. Government Agencies: **Plan, mitigate, lead recovery** for resilient communities.
- 4. NGOs: **Humanitarian aid, relief supplies, long-term support** for rebuilding.
- Media: Inform, raise awareness, report for prepared and informed communities.

By uniting these stakeholders, we can build stronger, more resilient communities.



4. Business Requirements

The business requirements define the high-level goals, objectives, and needs that the system is intended to fulfill. The business requirements for this project include:

- 1. Comprehensive Disaster Management Lifecycle Support
- 2. Real-Time Alerting and Notification
- 3. Incident Reporting and Coordinated Response
- 4. Geospatial Mapping and Situational Awareness
- 5. Community Engagement and Collaboration
- 6. Compliance and Security



5. Gather Functional Requirements

- User Registration and Authentication
- 2. Real-Time Alerts and Notifications
- Incident Reporting
- 4. Emergency Resource Access
- Communication with Authorities
- 6. Geospatial Data Integration
- 7. Community Engagement Features
- 8. Data Privacy and Security
- 9. Offline Functionality
- 10. Multilingual Support
- 11. User Feedback and Support



6. Non-Functional Requirements

- Usability
- 2. Performance
- 3. Security
- 4. Reliability
- 5. Scalability
- 6. Maintainability
- 7. Accessibility



7. Requirements Documentation

- Requirements documentation refers to the written document that captures and defines the requirements for a software system or product.
- The requirements documentation serves as a communication tool between the stakeholders and the development team.
- It ensures the final product meets the goals, addresses the stakeholders' needs, and provides a solid foundation for the design and development of the system.
- It will be helpful at the end of the project when you reflect back on goals achieved, updates accomplished, features added and bugs fixed.



8. Manage Requirements Changes

- Change Request Submission
- 2. Communication and Dissemination
- 3. Ongoing Monitoring and Evaluation



9. Data Collection

- It refers to the process of gathering and capturing relevant data necessary for defining and understanding the requirements of a project.
- It involves 3 methods:
 - Web-based Survey
 - 2. Citizen interview
 - 3. Document Review



Web-base Survey Form



- LINK: https://forms.gle/7ctGEsQNciEiSxNv8
- Quick & Wide Reach, Secure Data on Awareness & Mitigation.



Citizen Interviews



Citizen interviews go beyond the numbers. They unlock personal stories and deeper concerns about disaster preparedness. This allows us to tailor our approach, uncover hidden anxieties, and build trust with the community. By listening to their **experiences** and suggestions, we can work together for a more prepared future.

Document Reviews



Sources

- Local Emergency Response Plans:
 - https://floodready.vermont.gov/update_plans/local_ emergency_operations
 - https://www2.gov.bc.ca/assets/gov/public-safety-and-emergency-preparedness-response-recovery/local-government/em-planning_guide_for_la_fn.pdf
- Community Risk Assessments:

https://riskassessment.strategicfire.org/wpcontent/uploads/2016/03/Community-Risk-Assessment-Guide-v1.5.pdf

THE END!!!

