Using Ad Hoc Networking in Emergency Situations

Spreading information in an emergency situation to help both people in danger and the emergency services

Project Specification

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Abstract

When an emergency situation occurs, people want to tell others where they are and get help. This can often be difficult to do because key infrastructure that is heavily relied on could be damaged. Situations around the world show there is a significant need for systems to help peope connect with no, or very little, working cellular infrastructure. By using commodity hardware in our devices, survivors can oppurtunistically send information to nearby devices. This could then be sent to an internet connected device for transmission, other nearby devices or, the emergency services. Moving information in emergency situations could get alert those who save lives and could aid rescue efforts.

Keywords: Bluetooth, Ad Hoc, MANET, Emergency, Disaster

Abbreviations

MANET - Mobile Ad Hoc Network

Contents

Chapter 1

Introduction

Discuss some general background about MANETs and how they are currently used and what form

1.1 Motivations

Write something here about how natural disasters are happening more frequently

1.2 Project Aims

Discuss what the project will aim to accomplish, such as producing a system which could acutally help people

1.3 Stakeholders

Who is involved in the project and who could benefit from it

Chapter 2

Research

Discuss the research that I've done so far. Talk about different approaches to the problem which have been implemented already. Discuss what they have done well and what could be improved. Also discuss other aspects such as routing.

Chapter 3

Ethical, Social, Legal and Professional Issues

Talk about issues around data privacy issues relating to holding other peoples data. Also talk about other issues that I could consider

Chapter 4

Project Requirements

Come up with some basic functional and non-functional requirements

Chapter 5

Project Management

Do a gantt chart to go here and what tools I am going to use, e.g Git and Trello

Chapter 6

Testing

Discuss the different approaches to testing that could be taken, Unit testing, integration testing etc

Chapter 7

Conclusion

Short part with some final thoughts

Bibliography