

## OBJECTIVE

The project GeoSpot is aimed to provide Bus Tracking software that makes use of Cell-ID and displays the source, destination and the current location of the bus on Google map, showing a route between them.

## INTRODUCTION

The term Location-Based Services (LBS), is used to describe a family of services that depend on the knowledge of the geographic location of mobile station. The main driving force for LBS provision has been the urge for more advanced personalized services. Motivated by the identified extensive diversity of Location Based Services and the need to introduce new services rapidly, in order to satisfy current market trends.

GeoSpot employs accurate, real-time positioning of a mobile device to the users to provide routing and tracking information via mobile devices, or provide information about the nearby location.

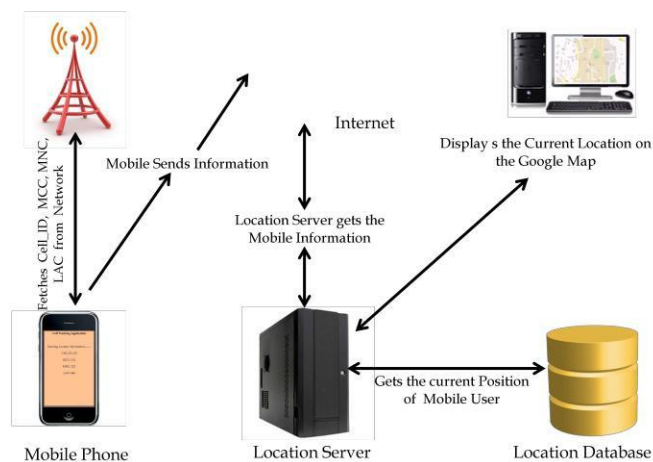
The GeoSpot focuses on the design and implementation of Bus Tracking application which is based on Location Based Service and is used to track the bus using a GSM phone.

## DESCRIPTION

In GeoSpot, the bus is tracked using the Cell-ID with the help of mobile phone in the bus. The mobile application is started by giving the Route-ID and the direction of bus. The mobile application will fetch the mobile information such as Cell-ID, IMEI, LAC, MCC, MNC and Time-stamp from the mobile phone and it will send it to Location Server through GPRS . The Location Server will receive the mobile information from the mobile and it will generate the KML file. The location server will do computation based on speed and common road segments to get more accurate location.

In the Web interface the users can enter the route-ID with direction. After this the user can select any one of the buses running on the particular route and the bus stop. The location server will plot the current location on Google map and calculate the time remaining to reach the bus stop.

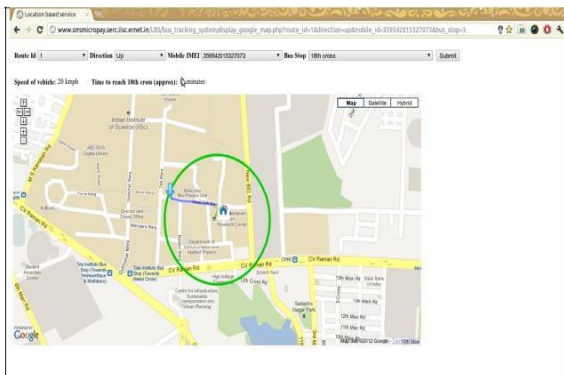
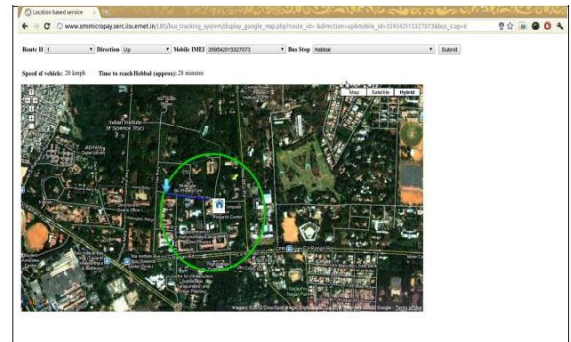
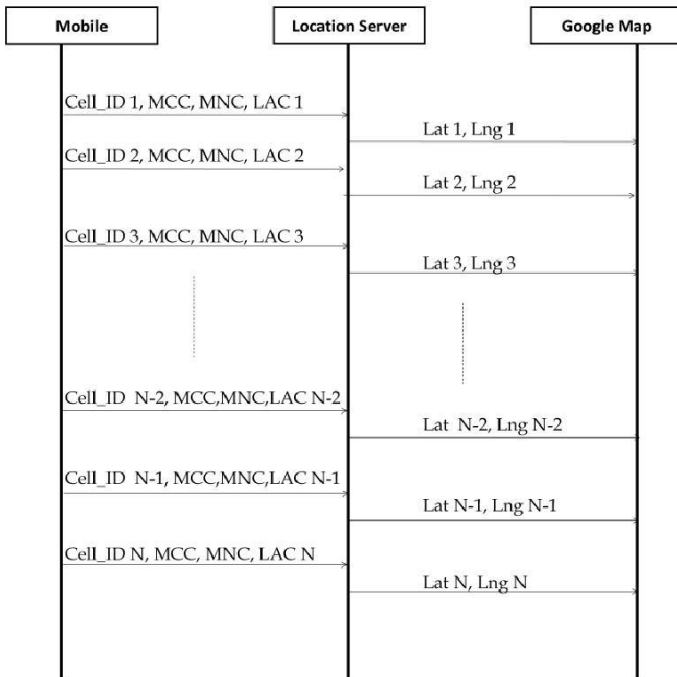
## GEO SPOT SYSTEM OVERVIEW



## KEY BENEFITS

- Public safety or emergency services: Since the location of the subscriber can be provided by the carrier, the mobile phone is a valuable access point in the times of emergency.
- Consumer services like Navigation, Location based advertising, Location based reminders, Family and friend finder, Location based search, Location based mobile gaming
- Enterprise services: LBS enables firms in fleet and asset tracking, field service dispatching, route and delivery optimization, and mobile workforce management.

## SEQUENCE DIAGRAM



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