

iGP: Smart City

iGP Module: Smart Indoor Navigation and Context Based Messaging over BLE

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Bluetooth Low Energy "BLE" - Bluetooth 4 Smart - ibeacon is a class of Bluetooth devices that broadcast their identifier to nearby portable electronic devices, which enables smartphones, tablets and other devices to perform actions when in close proximity to an iBeacon.

Can be used to determine the device's physical location, track customers, or trigger a location-based action on the device such as a check-in on social media or a push notification.

Another application is an indoor positioning system, which helps smartphones determine their approximate location or context. With the help of an iBeacon, a smartphone's software can approximately find its relative location to an iBeacon in a store.

Solution – Value Proposition

- Retailers could send relevant advertising for promotions, etc. in malls.
- Retailers could get insight data about their products, which one is frequently handled by customers, etc.
- In Banks, Airports, Hospitals, and any public places could send awarenesses, relevant, guiding messages to their customers and visitors.
- Monitoring Valuable assets in stores, kids at kindergartens, etc.
- Customers and visitors could easily navigate through indoor buildings Save time.

Customer Segment

- Retailers buy our devices
- Banks, Airports, Restaurants, and any public places.
- Kindergartens.
- Customers get our app. And services for free.

Key Activities Required

- Develop Advertising messages for retailers over BLE, for nearby customers.
- Develop indoor localization and mapping for customers to needed retailers over BLE using Al algorithms.



- Develop a statistics platform for retailers, with relevant info of there products like which product handled by customers via accelerometer sensors.
- Related Web and Mobile application for above points.

Key Resources Required

- Machine Learning developers.
- Php web developers.
- Java Mobile App. developers.
- Embedded system developers excellent at C programming, H.W interfacing.
- All must have a very good knowledge of Linux.