



SmartParking

SmartDongle and SmartInstaller User Manual (Internal Use Only)

Date:

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Author:

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Version:

1.2

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1. Document Details

1.1. Sign-Off

| | | | |
|-------------|-------------------------|--|--|
| John Heard | Chief Technical Officer | | |
| Roly Rogers | Head of R&D | | |

1.2. Document Reviewers

| Name | Title | Version |
|------------|------------------------------|---------|
| Don Lokuge | Developer - SmartInstaller | 0.1 |
| Kin Chan | Developer – SmartSpots & IGS | 0.1 |

1.3. Distribution List

| Name | Title | Version |
|------|-------|---------|
| TBD | | |

1.4. Version Information

| Version | Date | Description |
|-------------|------------|-----------------------|
| 1.0 | 30/10/2017 | Initial Publication |
| 1.1 and 1.2 | 28/12/2017 | Include FCC Statement |

1.5. Document Contact

| | |
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1.6. Support Contacts

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| | |
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2. Federal Communications Commission (FCC) Statement:

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions:

- 1) this device may not cause harmful interference and
- 2) this device must accept any interference received, including interference that may cause undesired operation of the device.

You are cautioned that changes or modifications not expressly approved by Smart Parking Technology Ltd could void the user's authority to operate the equipment.

3. Introduction

3.1. Document Purpose

The purpose of this document is to provide instructions for using the SmartInstaller Software with the SmartDongle transceiver to program SmartSpots and IGS SmartSensors.

3.2. Background

This document was created as part of the documentation of V3 of the SmartParking System, which includes the on-site SmartSpot and IGS VDS equipment, the 3G network connecting it to the SmartParking Cloud components, the SmartRep reporting user interface, and in this case; the system configuration capability.

3.3. SmartInstaller and SmartDongle Overview

SmartInstaller is a [SmartParking Limited](#) application that runs on a device running both the Android Operating system and OTG ([USB On The Go.](#)), (i.e. a Samsung Galaxy III or later Smartphone, Galaxy Note Tablet, etc.).

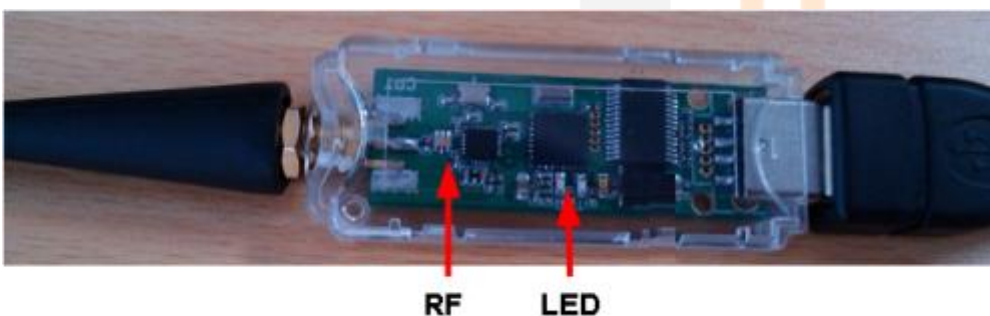
Also required is a [SmartParking Limited](#) proprietary SmartDongle capable of rf communication with the IGS Sensors and SmartSpots.

An example using a Samsung Galaxy Smartphone is shown below:

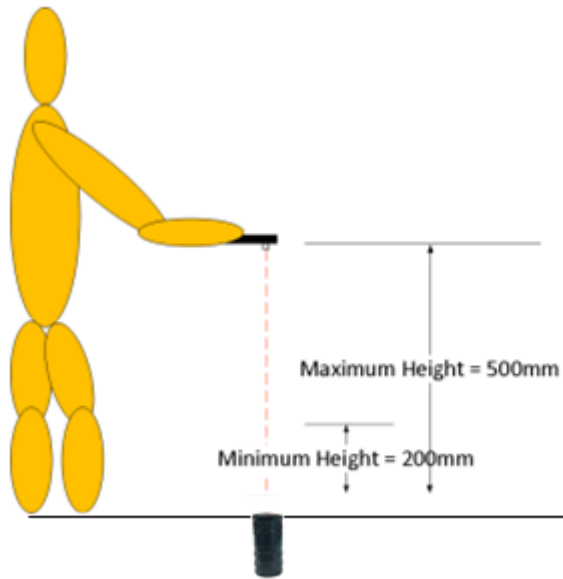


The SmartDongle connects to the Smartphone via the mini-USB port. Once connected, the LED on the dongle should flash and the Smartphone will state that a USB device is connected.

SmartDongle Functionality



- **RF** – This is the same 915MHz radio equipment and protocol as used in the IGS
- **LED** – These are the TX/RX indicators for the RF
- The transceiver and needs to be facing the IGS during Programming, within 500mm, as shown below:



NOTES:

- When programming SmartSpots, all that is required is to have the SmartInstaller in close proximity
- Prior to taking these actions, the IGSs and SmartSpots should be correctly installed, and ready to be programmed either one at a time, or in a sequence

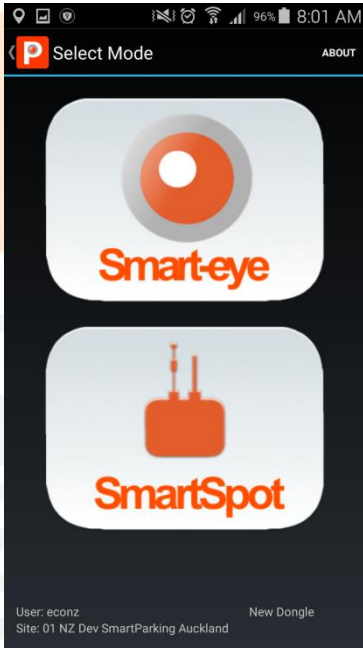
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4. SmartSpot Programing

4.1. Programing SmartSpots

This is done at the SmartSpot immediately after it is first powered up.

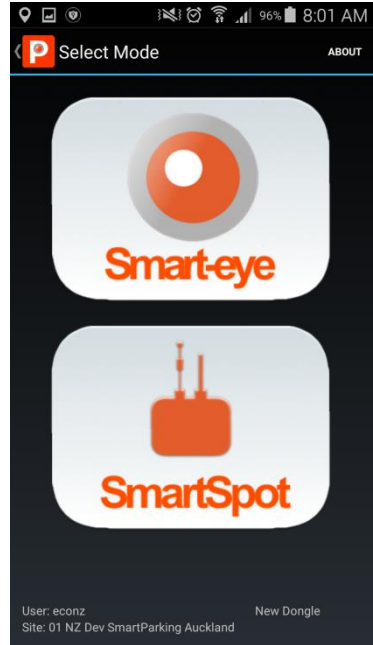
The SmartInstaller V2.3.4 application configures each SmartSpot and connects it to the site network.

| Step | Instructions | Example |
|------|---|---|
| 1. | On the Select Mode screen, choose SmartSpot: |  |
| 2. | Follow the step-by-step instructions in the V3 SmartSpot User Manual. | |

5. IGS Programing

5.1. Programing IGSs

These instructions assume you are about to program IGSs installed in bays within a sector (or sectors), beginning with the first IGS (Sector X, Bay 1.)

| Step | Description | Picture |
|------|--|--|
| 1. | <p>Once the SmartInstaller SmartDongle hardware has initialised (a flash from the LED and a screen message confirming the USB dongle is connected), start the SmartInstaller app. The following screen should appear.</p> <p>On the Select Mode screen, choose SmartEye:</p> |  |
| 2. | <p>Follow the step-by-step instructions in the V3 IGS Sensor User Manual.</p> | |

6. Appendix A – Glossary

This section contains a full list of all the terms and abbreviations used throughout this document.

| Term | Description |
|-------------|--|
| Dongle | A small device that plugs into a computer and serves as an adapter or as a security measure to enable the use of certain software |
| IR LED | Infra Red Light Emitting Diode |
| IR Receiver | Infra Red Light Emitting Receiver |
| OTG | USB On-The-Go allows USB devices such as digital audio players or mobile phones to act as hosts, so other USB devices like a USB flash drive, digital camera, mouse, or keyboard can be attached to them |
| SmartDongle | See Dongle |
| SmartSpot | Version 2.0 of the previous Zone controller – the sensor-to-internet gateway. |
| V3 IGS | Version 2.0 of the parking bay vehicle sensor. |
| WIFI | A means allowing computers, smartphones, or other devices to connect to the Internet or communicate with one another wirelessly within a particular area. |



7. Appendix B – Amendment History

This section contains a full listing of all amendments made to previous versions of this document

| Version | Section | Description |
|---------|---------|---|
| 0.1 | | Initial Draft. |
| 1.0 | | Initial Publication |
| 1.1 | 2. | Federal Communications Commission (FCC) Statement |
| 1.2 | 2 | Add 15.21 to FCC Statement |

