Honeywell

IH45

UHF RFID Reader



User Guide

Disclaimer

Honeywell International Inc. (“HII”) reserves the right to make changes in specifications and other information contained in this document without prior notice, and the reader should in all cases consult HII to determine whether any such changes have been made. HII makes no representation or warranties regarding the information provided in this publication.

HII shall not be liable for technical or editorial errors or omissions contained herein; nor for incidental or consequential damages resulting from the furnishing, performance, or use of this material. HII disclaims all responsibility for the selection and use of software and/or hardware to achieve intended results.

This document contains proprietary information that is protected by copyright. All rights are reserved. No part of this document may be photocopied, reproduced, or translated into another language without the prior written consent of HII.

Copyright © 2024 Honeywell Group of Companies. All rights reserved.

Web Address: sps.honeywell.com

Trademarks

Android is a trademark of Google LLC.

Bluetooth trademarks are owned by Bluetooth SIG, Inc., U.S.A. and licensed to Honeywell.

Other product names or marks mentioned in this document may be trademarks or registered trademarks of other companies and are the property of their respective owners.

Patents

For patent information, refer to www.hsmpats.com.

TABLE OF CONTENTS

Customer Support iii
Technical Assistance iii
Product Service and Repair iii
Limited Warranty iii

Chapter 1 - Introduction 1

IH45 Features 1
Battery Installation 2
Charging 4
Docking Station Charge 4
Installing/Removing Device Bracket and Attaching Device 6
Install Device 6
Remove the Device 8
Reading RFID Tags 9
MODE Button and Status Indicators 10
Modify RFID Connection Settings 11
Add or Modify RFID Profiles 11
Cyber Security 12

Chapter 2 - HonRFID Mobile Application for Android 13

Overview 13
Using the HonRFID Mobile Application for Android 13
Download the App 13
Basic Operation 14
Home Screen 14
Connect 15

Connect by USB 15
Connect by Bluetooth 16
Auto Connect by Bluetooth 17
QR Code Connect 17
NFC Connect 18
Scan 18
Edit Tag 19
Write Tag 19
Lock Tag 20
Locate Tag 20
Settings 22
Common Settings 22
About 23
Update Firmware 24
About Software Updates 24
Update BLE Firmware 24
Update RFID Firmware 25
Update USB Firmware 25

Chapter 3 - RFID Discovery App 27

About the RFID Discovery App 27
Prerequisites 27
Pair a Device 28
Barcode Pairing 28
Bluetooth Pairing 28
Manual Pairing 29
Deactivate a Reader 29
Remove a Reader 29
View Reader Information 30

Chapter 4 - Maintenance and Troubleshooting 31

Maintenance 31
Troubleshooting 31

Customer Support

Technical Assistance

Go to honeywell.com/PSStechnicalsupport to search our knowledge base for a solution or to log into the Technical Support portal.

Product Service and Repair

Honeywell International Inc. provides service for all of its products through service centers throughout the world. Go to sps.honeywell.com and select Support to find a service center near you or to get a Return Material Authorization number (RMA #) before returning a product.

Limited Warranty

For warranty information, go to sps.honeywell.com and select **Support > Productivity > Warranties**.

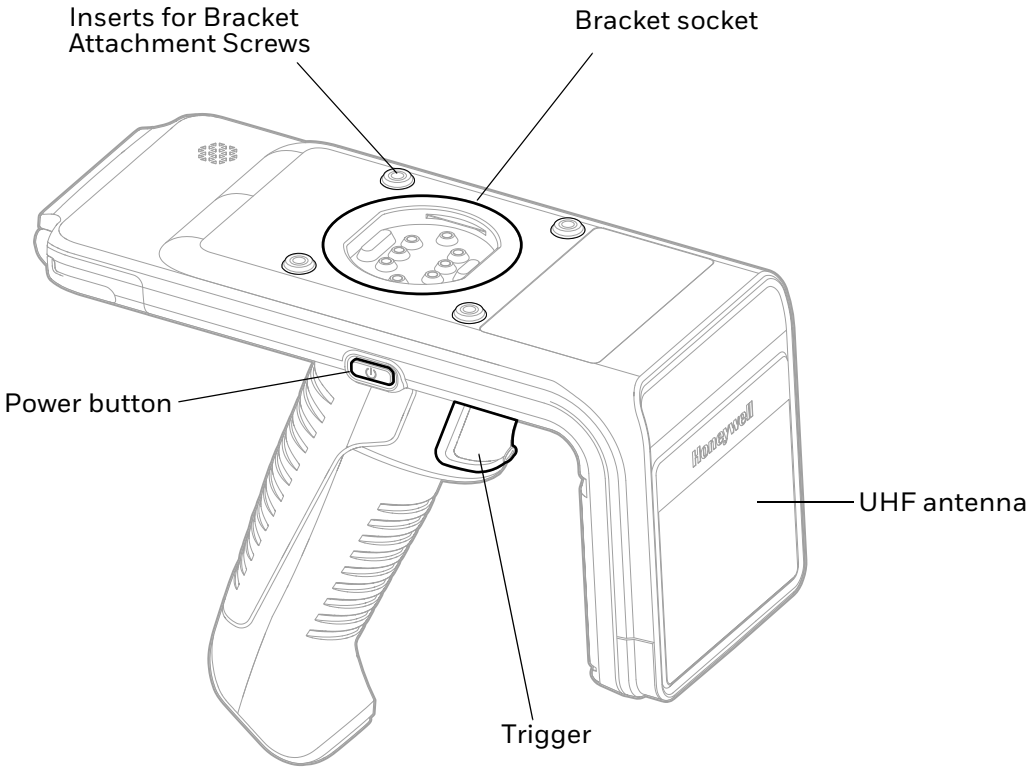
CHAPTER

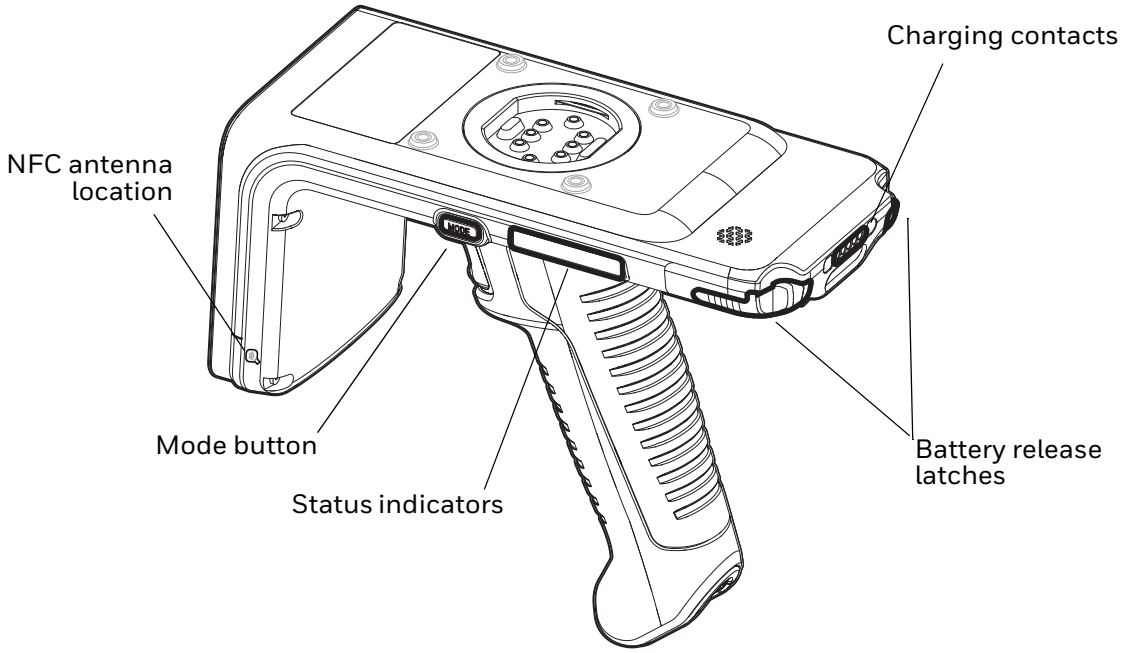
1 INTRODUCTION

The IH45 UHF RFID Reader provides Ultra High Frequency (UHF) Radio Frequency Identification (RFID) connected to a mobile terminal. The unit can read and write to bar code, QR code and UHF RFID tags.

Note: *RFID reader may differ slightly from illustrations depending on the model.*

IH45 Features





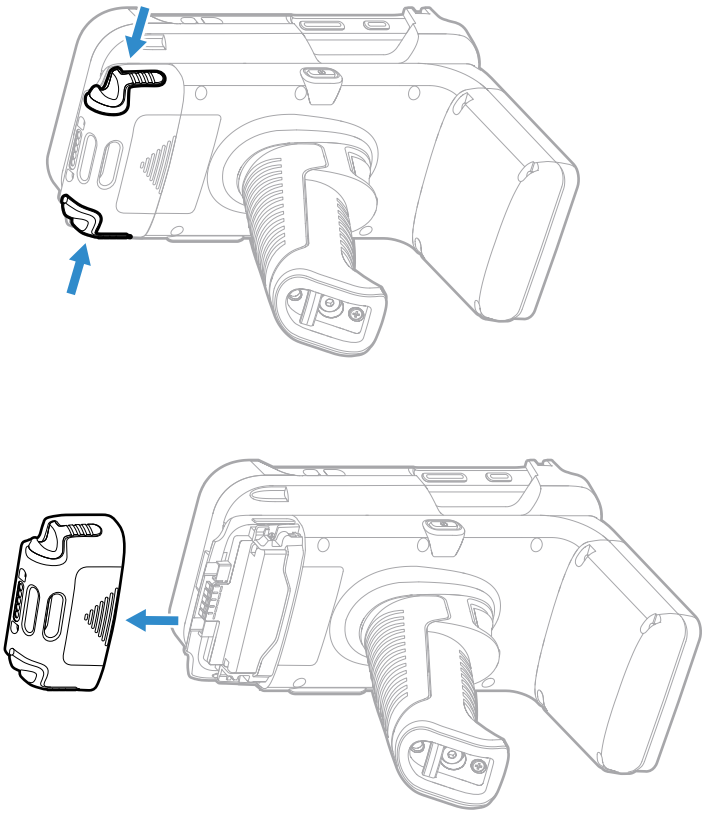
Battery Installation

Caution: Before you attempt to use, charge or replace the battery in the device, carefully read all labels, markings and product documentation provided in the box or online at sps.honeywell.com. To learn more about Battery Maintenance for Portable Devices, go to honeywell.com/PSS-BatteryMaintenance.

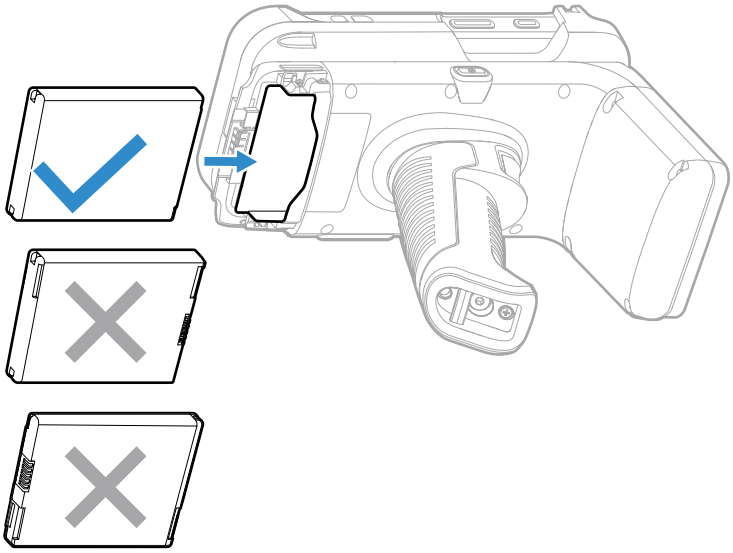
Avant d'essayer d'utiliser, de charger ou de remplacer la batterie de l'appareil, lisez attentivement toutes les étiquettes, marquages et documentation du produit fournis dans la boîte ou en ligne à sps.honeywell.com. Pour en savoir plus sur l'Entretien de Batteries pour Appareils Portables, consultez-le honeywell.com/PSS-BatteryMaintenance.

Install the battery before using the reader for the first time. When installing or removing the battery, hold the unit upside down in the palm of your hand.

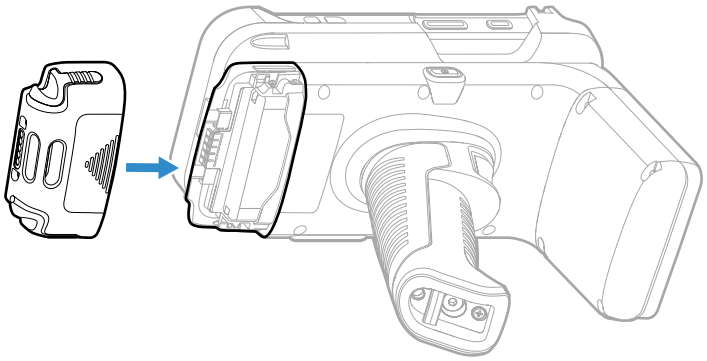
1. To access the battery compartment, squeeze the battery cover latches and slide the door out.



2. Insert the battery into the battery compartment.

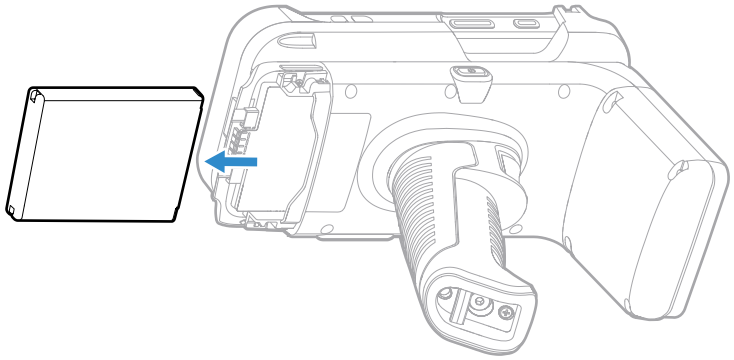


3. Slide the battery cover into the unit.



To uninstall the battery:

1. Squeeze the battery cover latches then slide the battery cover out.
2. Slide the battery out of the unit.



Charging

Before using the reader for the first time, ensure the battery is fully charged.

1. Attach the battery cover. Make sure that the cover clicks into place.
2. Attach the handle. Make sure that the handle clicks into place.

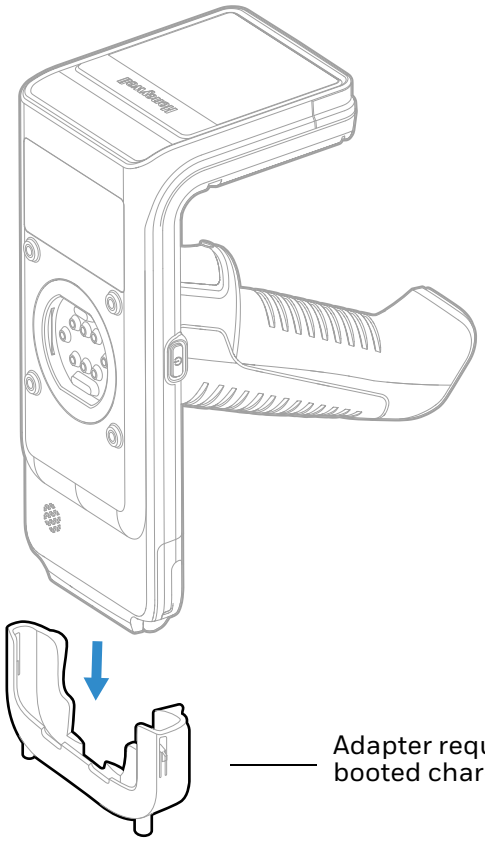
Docking Station Charge

The IH45 RFID Reader is compatible with all existing CT40 charge bases and universal dock chargers. To charge the IH45 RFID Reader with a booted charge base, place a non-booted device adapter sleeve into the charging cup.

The RFID Reader can be charged alone or with a mobile device attached. If a mobile computer is attached to the IH45 when it is placed in the charger, both devices will charge simultaneously.

Note: *When charging, make sure the charging indicator is always on.*

1. If the charge base has a booted cup, insert the device adapter sleeve into the charge dock.
2. Place the RFID Reader into the cup.



Installing/Removing Device Bracket and Attaching Device

Place the mobile computer in the bracket and attach it to the RFID reader to connect in USB mode. To connect to the RFID reader in Bluetooth mode, do not put the mobile computer in a bracket.

Note: *Bracket model IH25-BR-X supports Bluetooth connection only.*

Before installing the device, ensure that the charge base plug and charge base socket on the reader are clean and free from dirt or debris.

The bracket for the mobile computer is sold separately. Refer to the accessories catalog for the RFID reader or the mobile computer for information on selecting the correct bracket. Accessories catalogs are available at sps.honeywell.com.

Note: *Some bracket models do not have the holes for the attachment screws. These models attach to the RFID reader socket only .*

Install Device

Note: *Bracket may differ slightly from illustration depending on the model.*

1. Align the bracket with the socket and press the two parts together firmly until they click into place. Verify that the bracket is securely attached.

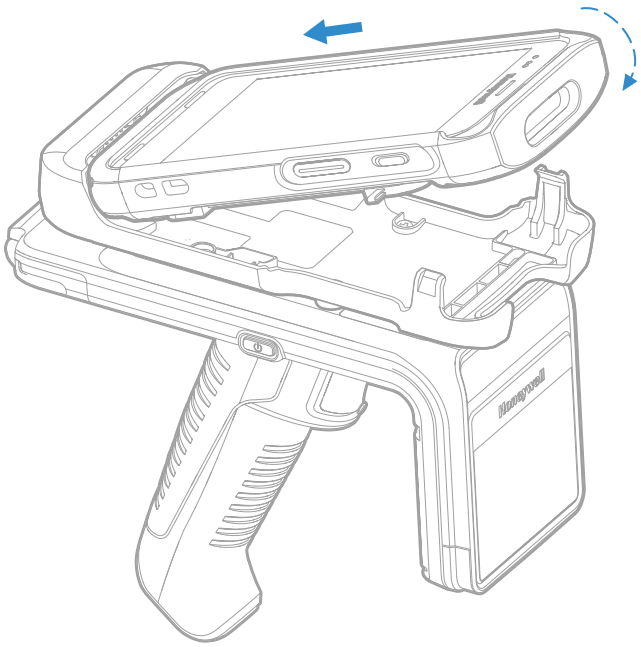


2. Insert the four screws provided with the bracket and tighten.



Note: *The attachment screws ship with the bracket for the mobile computer. The screws are size M3x.5x6. Using a different size screw than those provided with the bracket may damage the RFID reader.*

3. Insert the mobile device into the bracket and press it down.

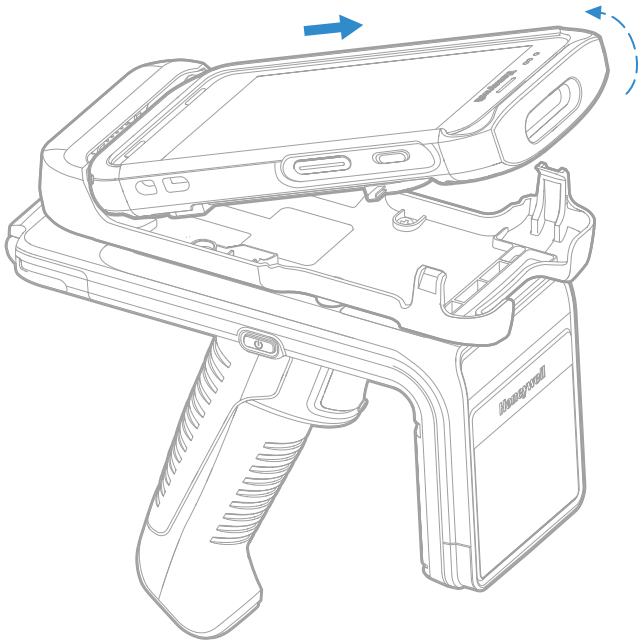


Assembled unit:

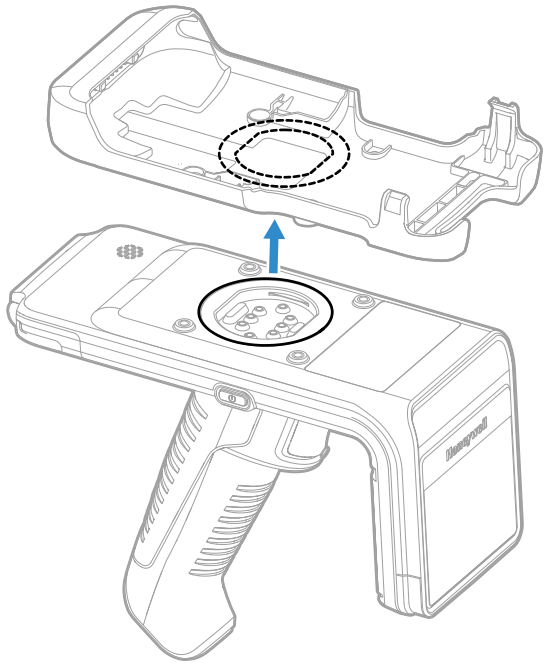


Remove the Device

1. Hold the unit by the handle.
2. Pull the mobile computer upwards out of the bracket.



3. Remove the four attachment screws.
4. To remove the bracket, hold the handle with one hand and lift the bracket up from the RFID Reader with the other hand.



Reading RFID Tags

RFID tags can be read when they are in range. The range (typically 0.2ft-20ft) at which a tag can be read depends on the tag type and size and the number of tags in the field.

1. Turn on power to the reader. It beeps one time.
2. Power on the mobile device and launch the HONRFID app. See Connect on page 15 for instructions on connecting the mobile device to the RFID reader.
3. Press the MODE button and release within 3 seconds to check the IH45's operation mode.
   - If the RFID LED lights up, the IH45 is in RFID mode.
   - If the 1D/2D LED lights up, the IH45 is in Barcode mode.
   - Press and hold the MODE button for at least 3 seconds to switch to RFID mode.
4. Press the trigger button to read tags.

MODE Button and Status Indicators

This section describes the mode and status indicators on the IH45 RFID Reader.



Indicator	Definition
MODE 1D/2D RFID	Press the MODE button to display the current mode indicator. Release the button within 3 seconds to turn the mode light off. Press and hold the MODE button for at least 3 seconds to switch between 1D/2D and RFID mode; the current mode light is on. Release the button: the current mode light is off.
	Solid amber: Charging Solid green: Fully charged Red flash/Green and amber flash alternately: Charge error Solid red: Battery low warning (<20% capacity remaining)
	Blue slow flash: Bluetooth disconnected (two beeps when disconnected from PDA) Solid blue: Bluetooth connected (one beep when connected successfully)

Modify RFID Connection Settings

A Honeywell mobile computer can connect to an RFID reader using either Bluetooth or an RFID reader bracket that supports a USB connection. An RFID reader bracket is required for the mobile device to establish a USB connection to an RFID reader. Refer to the accessories catalog for your mobile device available at sps.honeywell.com for information on compatible RFID brackets.

Note: *The Communication Interface setting is applicable only when the mobile computer is being connected to the RFID reader with a bracket that supports a USB connection.*

The following options are available:

- **AutoDetect-USB or Bluetooth** - In this mode, the mobile computer automatically detects the connection type to use. If the mobile computer is not connected to the RFID reader with a bracket, a Bluetooth connection will be established. If the mobile computer is attached to the RFID reader using an RFID reader bracket that supports a USB connection, the connection method will be USB. If the mobile computer is removed from the RFID bracket, it will automatically reconnect to the RFID reader using the Bluetooth signal.
- **USB only** - In this mode, the mobile computer can only activate the RFID reader when it is connected by USB in an RFID reader bracket that supports USB. The mobile computer may still detect and pair with the RFID reader, but it will not be able to activate the reader.

1. Swipe up from the bottom of the Home screen to access all apps.
2. Tap **Settings** > **Honeywell Settings** > **RFID**.
3. Tap **GENERAL**.
4. Tap **Communication interface**.
5. Select **AutoDetect-USB or Bluetooth** or **USB Only**.
   The selected mode is displayed.

Add or Modify RFID Profiles

Honeywell mobile computers have a default RFID profile for each type of Honeywell RFID reader (IH40, IH45, etc.). You can modify the default profile or create custom profiles to meet your requirements.

To view profile settings on the device:

1. Swipe up from the bottom of the Home screen to access all apps.
2. Tap **Settings** > **Honeywell Settings** > **RFID**.
3. Tap an RFID reader model (IP30, IH25, IH40, IH45).
4. Tap **Default profile**.

Refer to the mobile computer user guide for descriptions of RFID settings and information on how to add or modify RFID profiles.

Cyber Security

The Bluetooth connection between a supported Honeywell RFID reader and a mobile computer is not secure. The message exchanges are in clear text and have not been subjected to any form of encryption.

The operational risk of an exploit is considered low due to Bluetooth's low energy radio waves preventing long distance operation. To exploit the connection, a cyber-criminal or cyber-crime related equipment would need to be near the operation of the RFID reader and the mobile computer. Users are advised to check the surroundings of the environment where the RFID reader and mobile computer will be used for unusual devices and unusual personnel.

Refer to the Android Network and Security Guide available at sps.honeywell.com for more information.

CHAPTER

2 HONRFID MOBILE APPLICATION FOR ANDROID

Overview

This chapter describes the HonRFID Mobile Application for Android that can be used with the IH45 UHF RFID Reader.

This application runs on Android mobile devices and demonstrates IH45 functions and tag operation. It allows the user to navigate to all screens whether or not the device is connected to the IH45 reader and when the inventory/locate operation is in progress.

Note: *The content of this chapter is only based on the demo app demonstrating the basic RFID function of the IH45 RFID Reader. Customers should eventually integrate the proper SDK into the source code of their own app to fully implement the function. To get the demo app and SDK files, see Download the App or ask local sales staff for help. Refer to the SDK quick start guide available at sps.honeywell.com for information on integrating the SDK.*

Using the HonRFID Mobile Application for Android

To use this application for RFID operations:

1. Ensure the HonRFID Mobile Application for Android is installed on the Android mobile device.
2. Ensure the IH45 is in RFID mode.
3. Launch the HonRFID Mobile Application for Android on the mobile device.

Download the App

To download the HonRFID Mobile Application for Android:

1. Go to the *Technical Support Downloads Portal* at honeywell.com/PSSsoftware-downloads.
2. Create an account if you have not already created one. You must login to download the software.
3. Install the *Honeywell Download Manager* tool on your workstation (e.g., laptop or desktop computer) prior to trying to download any files.
4. To navigate to the HonRFID app, click on **Software** > **RFID** > **RFID Handheld Readers** > **IH45** > **Software**.
5. To navigate to the RFID SDK, click on **Software** > **RFID** > **RFID Handheld Readers** > **IH45** > **Software**.
   To navigate to the Mobility SDK, click on **Software** > **Software and Tools** > **Developer Library** > **SDK for Android**.

Note: *Both the RFID SDK and Mobility SDK are required to enable connection by Bluetooth or USB.*

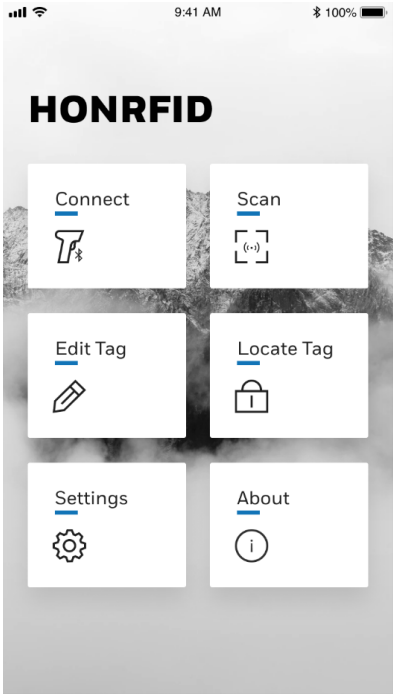
6. Select **Download** next to the software zip file.

Basic Operation

The following section explains how to use the HonRFID application.

Home Screen

To access the HonRFID Mobile Application for Android, touch the App icon on the mobile device to display the Home screen.



Connect

This section describes the methods available to connect a mobile device to the RFID reader. The mobile computer can be connected in either Bluetooth or USB mode. To connect in USB mode, the mobile computer must be attached to the RFID reader in a bracket.

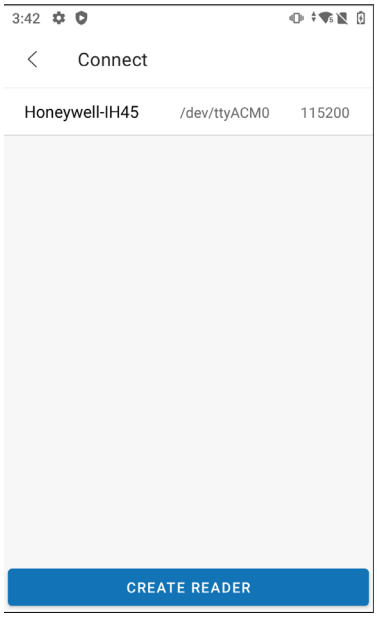
Available connection methods depend on the bracket used to attach the mobile computer.

- Model IH25-BR-X supports Bluetooth connection only.
- Models IH40-BR, IH40-BK and CT30P-IH40 support USB connection only.

Connect by USB

Follow these steps to connect the mobile computer to the RFID Reader by USB.

1. Attach the mobile computer to the RFID Reader. (See Installing/Removing Device Bracket and Attaching Device.)
2. Launch the HonRFID app on the mobile computer and tap the Connect icon on the Home Screen to go to the Connect screen.



3. Tap **CREATE READER** at the bottom of the screen to pair the mobile computer with the RFID Reader and go to the Scan screen.

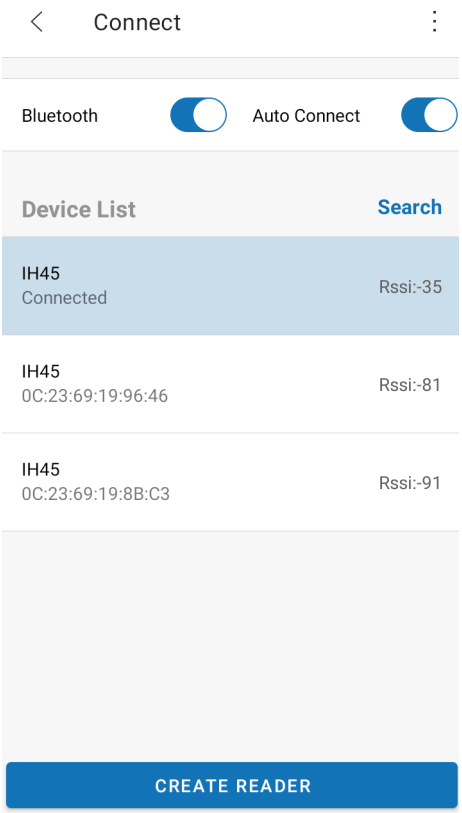
Note: *If the name of the RFID Reader is not displayed or the Bluetooth connection screen is displayed, remove the bracket and reattach to make sure it is firmly in the socket.*

Connect by Bluetooth

Follow these steps to connect the mobile computer to the RFID Reader using Bluetooth. A Bluetooth connection can be achieved manually, by using Auto Connect, by scanning the QR code on the RFID Reader, or by using NFC.

Note: *Before connecting, switch on the Bluetooth function on the mobile device.*

1. Tap the Connect icon on the Home Screen to go to the Connect screen.



2. **Bluetooth** should be on by default. Switch Bluetooth on if necessary.
3. Tap **Search** to display a list of available Bluetooth devices.
4. Tap IH45 to connect.
5. Tap **CREATE READER** at the bottom of the screen to pair the mobile computer with the RFID Reader and go to the Scan screen.

Auto Connect by Bluetooth

1. On the Connect screen, tap **Auto Connect** to switch on this function.
2. Tap the Search button. The mobile device will search for an available Bluetooth device and connect to it automatically. It beeps one time when successfully connected.
3. Tap **CREATE READER** at the bottom of the screen to pair with the IH45 RFID Reader and go to the Scan screen.

QR Code Connect

You can scan the QR code on the RFID reader to connect by Bluetooth.

Note: *The QR code reading option is only supported by Honeywell mobile devices.*

1. Tap the Connect icon on the Home Screen to go to the Connect screen.
2. Tap ⋮ on the right top corner of the Connect screen and select **Barcode Way**.
3. Point the imager on the mobile computer at the QR code on the RFID Reader and press the scan button on the mobile computer. It beeps one time when successfully connected.

NFC Connect

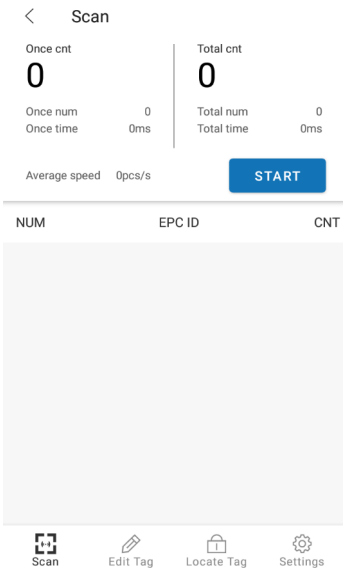
If the mobile computer is equipped with NFC, follow these steps to connect it to the RFID Reader.

1. Tap the Connect icon on the Home Screen to go to the Connect screen.
2. Tap ⋮ on the right top corner of the Connect screen and select **NFC Way**.
3. Bring the NFC antenna on the mobile computer near the NFC antenna location on the RFID Reader. It beeps one time when successfully connected.

Scan

Note: *The mobile device must be successfully connected with an IH45 RFID Reader before scanning.*

1. Touch the Scan icon on the Home screen to go to the Scan screen.

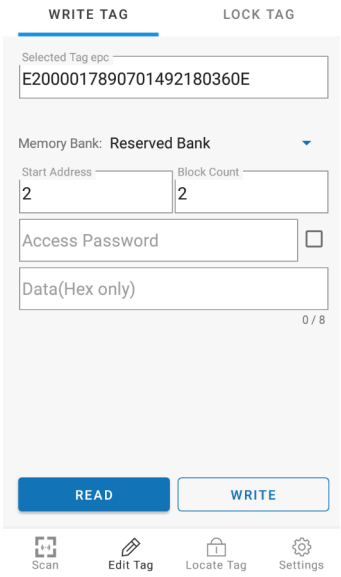


2. Tap **START** to start scanning tags that are in range.
3. Tap **STOP** to stop scanning. The scanned tags information is displayed in the list.

Note: *You can also press and hold the trigger button on the IH45 to start scanning tags and release the trigger button to stop scanning in RFID mode.*

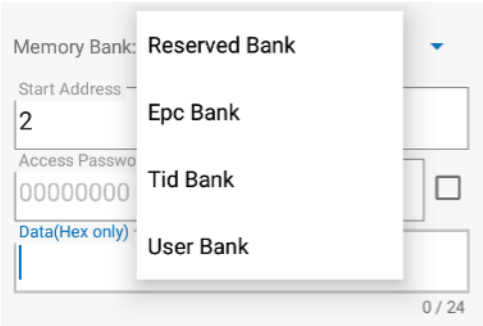
Edit Tag

Tap a tag to select it then tap **Edit Tag** at the bottom of the screen to go to the edit screen.



Write Tag

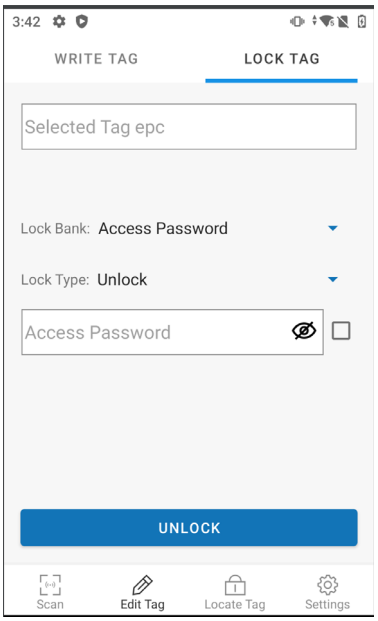
Touch ▾ to choose the **Memory Bank** type.

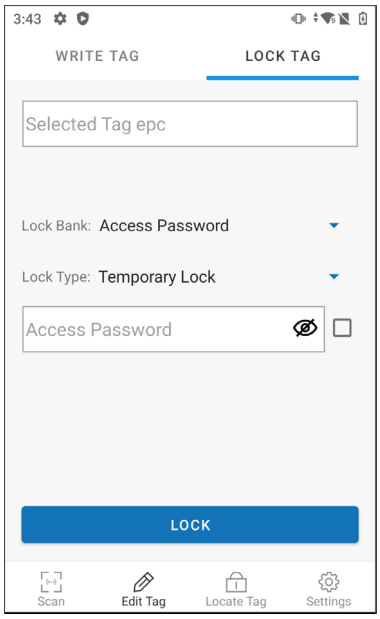


Edit the **Start Address** and **Block Count** according to needs.

Lock Tag

Touch **LOCK TAG** to switch to the Lock Tag screen.

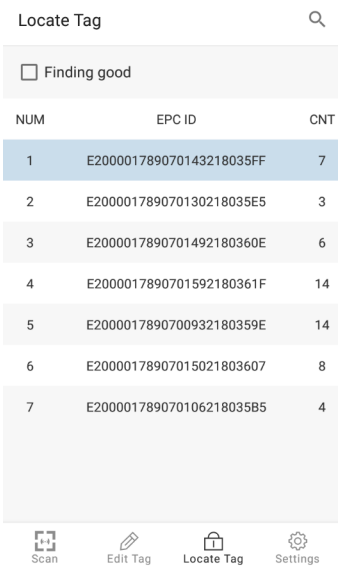




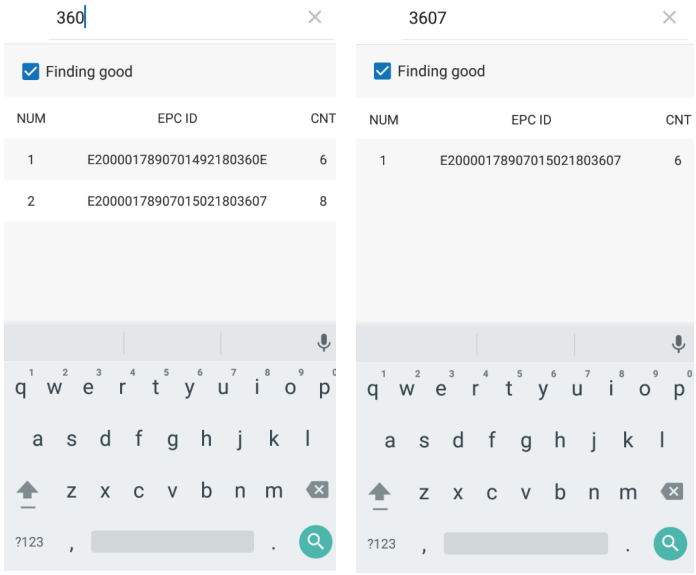
Touch ▾ to choose the **Lock Bank** and the **Lock Type** from the drop-down list. Enter the access password if necessary and touch **LOCK** or **UNLOCK**.

Locate Tag

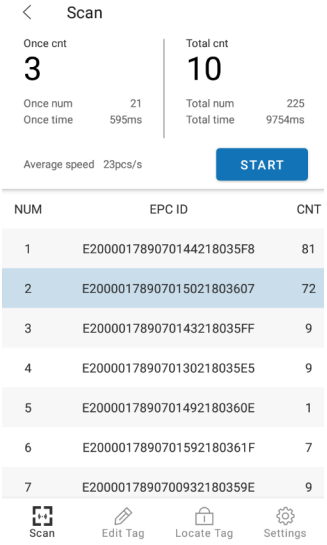
1. Touch **Locate Tag** at the bottom of the screen to go to the locate tag screen.



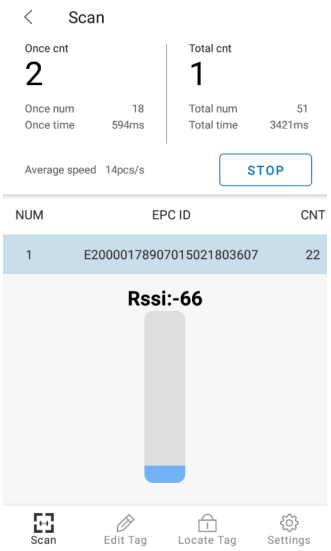
2. Touch 🔍 to type the content you want to locate in the search bar. As you type, the app automatically filters to the target tag.



3. Select the tag you want and check "Finding good". Touch Scan to go back to the Scan screen. The located tag is highlighted in the list.



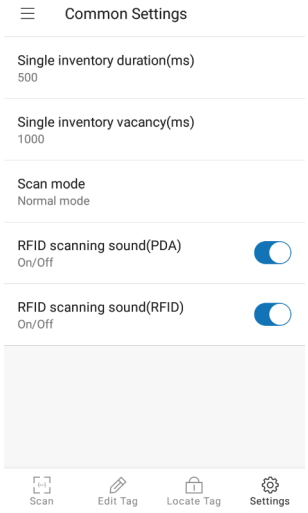
4. Touch **START** and move the mobile device to start finding the target good.



5. The IH45 beeps constantly when the target good is in the available range.

Settings

Touch Settings at the bottom of the screen to go to the Common Settings screen.

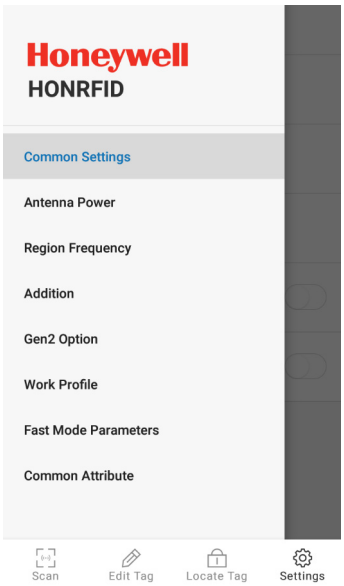


Common Settings

- Single inventory duration (Only Valid in normal mode)-Touch to set the duration.
- Single inventory vacancy (Only Valid in normal mode)-Touch to set the vacancy.
- Scan mode - Touch to set normal mode or fast mode.
- Trigger mode enable - Turn trigger mode on or off.
- Trigger mode - Select 1D/2D or RFID mode. 1D/2D uses the scan engine on the mobile computer to scan barcodes.

- RFID scanning sound(PDA) - Touch to turn on/off.
- RFID scanning sound(RFID) - Touch to turn on/off.

Touch ☰ at the top left to go to the other settings.



Setting	Description
Antenna Power	Antenna power
Region Frequency	Set Region: China/Europe/NA/Japan/Brazil/Thailand/Malaysia
Addition	Addition data type: None/Reserved Bank/Epc Bank/Tid Bank/User Bank/Config Word Setting will take effect in fast mode after you check data in Return items in Fast Mode Parameters.
Gen2 Option	Session mode • S0: For a small number of Tags • S1: For large number of Tags • S2/S3: For special marked Tags
Fast Mode Parameters	Return items: count/rssi/ant/frequency/time/pro/data
Common Attribute	• RFID module temperature • RFID module version • Battery level • Battery temperature • Bluetooth module version • USB module version

About

Touch **About** on the Home screen to check the software version.

Update Firmware

This section provides information on how to use the HonRFID app to upgrade BLE, RFID, and USB firmware on the IH45 RFID Reader.

About Software Updates

Cyber security best practices include keeping your device apps and OS up to date. To help, Honeywell offers maintenance patches, security updates and operating system upgrades through our Honeywell Edge services.

Availability and cost depend on the following:

- Date of purchase of the device or software app.
- Warranty status.
- Service agreement status (devices) or Maintenance plan status (apps).

To learn more about Honeywell Edge Services, go to https://sps.honeywell.com/us/en/services/productivity/support-services.

Support for Honeywell Safety and Productivity Solutions products is available online through the Technical Support Portal.

1. Go to the *Technical Support Downloads Portal* at honeywell.com/PSSsoftware-downloads.
2. Create an account if you have not already created one. You must login to download the software.
3. Install the *Honeywell Download Manager* tool on your workstation (e.g., laptop or desktop computer) prior to trying to download any files.
4. To navigate to the firmware, click on **Software** > **RFID** > **RFID Handheld Readers** > **IH45** > **Firmware**.
5. Select **Download** next to the software zip file.

Update BLE Firmware

Follow these steps to upgrade the BLE firmware on the RFID Reader.

1. Download the Bluetooth firmware upgrade file to your computer.
2. Copy the file to the Downloads folder of the mobile computer. Refer to the user guide for the mobile computer for information on transferring files.
3. Attach the mobile computer to the RFID reader and open the HonRFID app on the mobile computer.
4. Connect the RFID Reader to the mobile device via Bluetooth.
5. Tap ⋮ on the right top corner of the screen and select **Bluetooth Fota Update**.

6. Tap the device name in the list.
7. In the Device section, tap **Connect**.
8. Tap **Select File**.
9. Tap the Bluetooth firmware upgrade file in the Downloads folder file list.
10. Tap **UPDATE**.
    The app indicates that the update is finished.

Update RFID Firmware

Follow these steps to upgrade the RFID firmware on the RFID Reader.

1. Download the RFID firmware upgrade file to your computer.
2. Copy the file to the Downloads folder of the mobile computer. Refer to the user guide for the mobile computer for information on transferring files.
3. Attach the mobile computer to the RFID reader and open the HonRFID app on the mobile computer.
4. On the home screen, tap About.
5. Tap ⋮ on the right top corner of the screen then tap **Enable RFID fw update**.
6. Connect the RFID Reader to the mobile device via Bluetooth.
7. Tap **CREATE READER**.
8. Tap ⋮ on the right top corner of the screen and select **RFID firmware Update**.
9. Tap **SELECT FILE**.
10. Tap the RFID firmware upgrade file in the Downloads folder file list.
11. Tap **UPDATE**.
    The app indicates that the update is finished.

Update USB Firmware

Follow these steps to upgrade the USB firmware on the RFID Reader.

Note: *The mobile computer must be connected to the IH45 RFID Reader to update the USB firmware. The "USB Firmware Update" menu option does not display when the mobile computer is not connected to an RFID Reader.*

1. Download the USB firmware upgrade file to your computer.
2. Copy the file to the Downloads folder of the mobile computer. Refer to the user guide for the mobile computer for information on transferring files.
3. Attach the mobile computer to the RFID reader and open the HonRFID app on the mobile computer.

4. On the home screen, tap **Settings**.
5. Tap **USB Firmware Update**.
6. Tap **SELECT FILE**.
7. Tap the USB firmware upgrade file in the Downloads folder file list.
8. Tap **UPDATE**.
   The app indicates that the update is finished.

CHAPTER

3 RFID DISCOVERY APP

About the RFID Discovery App

The RFID Discovery app can be used to pair a Honeywell mobile device with a Honeywell RFID reader. The RFID wedge feature allows an RFID reader to communicate with an app on the mobile device without the user being required to develop a new app using the RFID Reader SDK.

The paired device will use the RFID Collection Service settings to process RFID tags. RFID settings are configured on the mobile device. For information on configuring RFID settings and creating RFID profiles, refer to the mobile device user guide available at sps.honeywell.com.

The RFID app provides three methods to pair a mobile device with an RFID reader:

- Scan a barcode or QR code on the RFID reader.
- Detect the Bluetooth signal of the RFID reader.
- Manually enter the MAC address of the RFID reader.

Note: *The RFID Discovery app is included on Honeywell mobile computers running Android 10 or higher but may be dependent on the OS maintenance release version. If the RFID app is not installed on your Honeywell mobile computer, Honeywell recommends updating your computer to the latest Android maintenance release.*

Prerequisites

A reader's availability is determined by whether the reader is on and within Bluetooth range. Before pairing an RFID reader with a mobile device:

- Turn on power to the RFID reader.
- Turn on Bluetooth on the mobile computer. You can turn Bluetooth on in the RFID app by tapping the slider or in **Settings > Connected Devices > Connection Preferences > Bluetooth**.
- Verify that the Wedge setting is enabled in the profile for the RFID reader in **Settings > Honeywell Settings > RFID**.

Pair a Device

Use one of the following methods to pair a mobile computer with an RFID reader.

Barcode Pairing

Depending on the RFID reader model, the unit will have either a barcode or QR code. You can pair a mobile computer with the RFID reader by scanning the code.

Follow these steps to pair the mobile computer with an RFID reader by scanning a barcode or QR code.

1. On the mobile computer, swipe up to display all apps then tap the RFID icon .
2. Locate the barcode or QR code on the RFID reader.
3. Press and hold the scan button.
4. Center the aiming beam over the bar code. When the scanner successfully reads the bar code, the mobile computer beeps.
5. Release the scan button.
6. The software pairs the device with the RFID reader. If no other readers are activated, the reader will automatically be activated.
   If another reader is already active when the scanned reader is being activated, a warning is displayed. The scanned reader appears in the Discovered readers section but is not activated.

Bluetooth Pairing

Follow these steps to pair the mobile computer with an RFID reader by detecting the Bluetooth signal from readers within range of the mobile computer.

1. On the mobile computer, swipe up to display all apps then tap the RFID icon .
2. Tap **Add new reader - Bluetooth**.
3. The app discovers RFID readers within Bluetooth range. The progress messages will indicating that the app is discovering readers that have not previously been paired then readers that have previously been paired with the mobile computer. When the scan is complete, the RFID readers are displayed in the Discovered readers section of the app.

   To view information on an RFID reader, tap an item in the list.

4. To activate a reader, tap the gear icon next to the reader you want to pair with.

5. Tap **ACTIVATE**.

Manual Pairing

Follow these steps to pair the mobile computer with an RFID reader manually by entering the reader's MAC address.

1. On the mobile computer, swipe up to display all apps then tap the RFID icon .
2. Tap **Add new reader - manual**.
3. Enter the reader MAC address then tap **OK**.
   You must enter a 12-digit MAC address before the **OK** button becomes active. The text box accepts the numbers 1 to 9 or letters A through E. The colons in the MAC address are automatically populated.
4. When the device is discovered, it is displayed in the Discovered readers section of the app.
5. To activate the reader, tap the gear icon next to the reader you want to pair with.
6. Tap **ACTIVATE**.

Deactivate a Reader

The RFID app supports using multiple RFID readers; however, only one reader can be active at a time.

Follow these steps to deactivate a reader:

1. On the mobile computer, swipe up to display all apps then tap the RFID icon .
2. Tap the gear icon next to the reader identified as the active reader.
3. Tap **DEACTIVATE**.

When you deactivate a reader, it is moved to the Discovered readers list.

Remove a Reader

Follow these steps to deactivate a reader so that is no longer included in the RFID app's cache:

1. On the mobile computer, swipe up to display all apps then tap the RFID icon .
2. Tap the gear icon  next to a reader.
3. Tap **REMOVE**.
4. Tap **REMOVE READER**.

The reader is longer displayed in the Discovered readers list.

View Reader Information

After a reader has been discovered, its attributes can be viewed in the app. To view reader information, tap the RFID reader name in the Discovered readers list.

To save the reader information to a file on the mobile computer, tap the **EXPORT** button. Reader attributes are exported to a text file located at /Internal shared storage/Android/data/com.honeywell.datacollection.rfid/files/Documents/ReaderInfo.txt.

CHAPTER

4 MAINTENANCE AND TROUBLESHOOTING

Maintenance

For trouble-free service, please observe the following tip when using the IH45 Reader:

Protect the IH45 Reader from temperature extremes. Do not leave it on the dashboard of a car on a hot day, and keep it away from heat sources.

Troubleshooting

Symptom	Possible Cause	Action
Mobile computer is attached to the RFID reader, but it cannot establish a USB connection.	The bracket is not securely engaged with the socket.	Remove the mobile computer and bracket. Reattach the bracket and ensure that it is firmly in the socket before reinstalling the screws.
Nothing happens when the button is pressed	If the LEDs are not on, then the battery may need to be charged.	Charge the reader.
	The reader may have button actions disabled.	Contact technical support.
Red flash/ Green and amber flash alternately	There is a battery fault.	Replace the battery pack.
	The battery pack temperature is outside recommended limits.	Ensure charging only occurs between 0°C - 45°C.
The host Bluetooth discovery does not find the reader.	The reader has powered off.	Press the button and ensure the blue LED is flashing.
	The reader is out of range.	Move the reader closer to the host.
Opening the Bluetooth virtual com port does not connect to the reader.	The host has paired to a different Bluetooth device.	Pair to the required reader.
	The host Bluetooth function has an error.	Warm boot the host. If this does not help, delete the reader from the favorites list and re-pair.
Other symptoms	Other fault	Run ASCII Remote Diagnostic and contact Support.

Honeywell
855 S. Mint St.
Charlotte, NC 28202

sps.honeywell.com

IH45-RFID-EN-UG-01 Rev C
9/24