

## 3820

### Wireless Linear-Imaging Scanner

The 3820 combines exclusive Adaptus® Imaging Technology 5.0 with Bluetooth® wireless connectivity to provide class-leading performance and durability for retail and commercial cordless bar code reading.

In applications where operators must move about to read bar codes, cables become a limiting factor. They cause inefficiencies or safety and ergonomic concerns. Cable length often limits working range, resulting in an object being moved to the reader because the reader can't be taken to the object. With wireless bar code reading, operators have freedom of movement required to quickly, safely, and ergonomically read bar code data. With a 33 foot (10m) working range and 24 inch (61cm) read-range, the 3820 has the right combination of performance and features.

Having the right performance is only part of the solution; staying in service is just as important. The 3820 also has class-leading durability. It was designed to survive in real world mobile applications. Honeywell is committed to creating some of the most rugged products available, and the 3820 is another example of that commitment. With no moving parts and a robust housing design, the 3820 will easily provide years of service in retail and commercial environments, creating a favorable total cost of ownership.



### Features

- **Superior Read Range:** Imaging technology now extends the read range out to 24" (610 mm) on the bar codes used in retail applications
- **Fast and Aggressive Decode:** Even on poorly printed or damaged codes, the 270 scans per second scan rate and software digitizer quickly processes the data and transmits it to your application
- **Wireless Connectivity:** Bluetooth v2.0 radio enables movement up to 33 feet (10 m) from the base, and reduces interference with other wireless systems—up to 7 imagers can communicate to 1 base, reducing the total cost of ownership
- **Battery:** A long lasting, field-replaceable, high capacity lithium ion battery provides up to 57,000 scans per full charge with no conditioning required
- **Optional FIPS 140-2 Certified Encryption:** Federal Information Processing Standards (FIPS) certified for wireless data transmission, meeting advanced US Government security requirements, and providing enhanced security in any application involving sensitive data
- **Durable:** Honeywell's solid state, no-moving-parts imager design withstands more than fifty 6 foot (1.8m) drops to concrete
- **Unique Base Design offers the following features:**
  - A minimal footprint that is smaller than major competitors', simplifying installation and leaving more counter space for customer service or other application needs
  - Presentation scanning with a docked imager for efficient, hands-free bar code reading
  - Host-powered interface and RF link; an exclusive Honeywell feature that extends the mobile capabilities of the 3820 by drawing power from a portable device for radio and host communications

# 3820 Technical Specifications

## Operational

|                        |  |
|------------------------|--|
| Light Source           | Visible Red LED 630 nm   |
| Visual Indicators      | Green = good read  |
| Host System Interfaces | USB, TTL level RS232, Keyboard Wedge, IBM 46xx (RS485), Light Pen (Wand) Emulation |

## Wireless

|                                |   |
|--------------------------------|---|
| Radio/Range                    | 2.4 to 2.5 GHz (ISM Band) Frequency - Hopping Bluetooth v2.0; Class 2: 10 m (33') line of sight |
| Data Range (Transmission Rate) | 3 Mbit/s (2.1 Mbit/s)   |
| Battery                        | 1800 mAh Li-ion   |
| Number of Scans                | up to 57,000 scans per charge   |
| Expected Hours of Operation    | 16 hours  |
| Expected Charge Time           | 4 hours   |

## Mechanical/Electrical

|                    | Scanner                                      | Cradle                                       |
|--------------------|--|--|
| Dimensions (LxWxH) | 165 mm x 81 mm x 157 mm (6.5" x 3.2" x 6.2") | 140 mm x 110 mm x 81 mm (5.5" x 4.3" x 3.2") |
| Weight             | 261 g (9.2 oz)                               | 250 g (8.8 oz)                               |
| Charging Power     |  | 9.9 W (825 mA @ 12 V)                        |
| Non-Charging Power |  | 625 mW (125 mA @ 5 V); 1.2 W (100 mA @ 12 V) |
| DC Transformers    | 3.7 V Internal Battery                       | 4.5 - 12 VDC                                 |
| LED Class          | Class 1: IEC60825-1, EN60825-1               |  |
| EMC                | FCC Part 15, ICES-003, EN55022 Class B       |  |

## Environmental

|                       |   |  |
|-----------------------|---|--|
| Operating Temperature | 0°C to 50°C (32°F to 122°F)                 | 0°C to 50°C (32°F to 122°F)                        |
| Storage Temperature   | -40°C to 60°C (-40°F to 140°F)              | -40°C to 60°C (-40°F to 140°F)                     |
| Humidity              | 0% to 95% relative humidity, non-condensing | 0% to 95% relative humidity, non-condensing        |
| Drop                  | Designed to withstand 1.8 m (6') drops      | Designed to withstand 1.0 m (3.3') drops           |
| Environmental Sealing | IP41  | Sealed to resist airborne particulate contaminants |
| Light Levels          | 70,000 Lux                                  |  |

## Scan Performance

|                     |  |
|---------------------|--|
| Scan Pattern        | Linear Image (3648 pixels)   |
| Scan Speed          | 270 scans per second   |
| Motion Tolerance    | 5 cm/s (2 in/s) with 13 mil UPC at optimal focus   |
| Scan Angle          | Horizontal: 47°  |
| Print Contrast      | 20% minimum reflectance difference   |
| Pitch, Skew         | 65°, 65°   |
| Decode Capabilities | Reads standard 1D and GS1 Databar symbologies. Visit <a href="http://www.honeywell.com/aidc/symbologies">www.honeywell.com/aidc/symbologies</a> for details. |
| Warranty            | 3 year factory warranty (Note: battery warranty is 1 year)   |



### For more information:

[www.honeywell.com/aidc](http://www.honeywell.com/aidc)

### Honeywell Security & Data Collection

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| Typical Performance*  |                              |
|---|------------------------------|
| Narrow Width  | Depth of Field               |
| 7.5 mil   | 102 mm - 356 mm (4.0" - 14") |
| 10 mil  | 51 mm - 457 mm (2.0" - 18")  |
| 13 mil  | 25 mm - 610 mm (1.0" - 24")  |
| 20 mil  | 25 mm - 914 mm (1.0" - 36")  |
| *Resolution: 5 mil (0.127 mm)   |                              |
| *Performance may be impacted by bar code quality and environmental conditions |                              |

# Honeywell