

## Bin Tag



### RFID TAGS THAT WITHSTAND THE HARSH ENVIRONMENTS OF WASTE MANAGEMENT

- **Easily integrated** – standard sizing for easy installation or retrofit
- **Tamper resistant** – custom spanner screw drive to deter fraudulent removal
- **Broad compatibility** – a choice of frequencies and memory capacities address common global installations and protocols
- **Reliable, consistent performance** – no line-of-sight required, supports all major RFID frequencies and standards

#### TECHNOLOGY HIGHLIGHTS:

- DIN 30745 tag dimensions fit most plastic bins
- Available configurations for optimized performance on metal bins
- Highly resistant to physical impact, chemical exposure and temperature variation
- Low-, high- and ultrahigh-frequency (LF, HF, RAIN UHF)
- Available in Unique, HDX, FDX-b, HF or EPC Global Class1 Gen2 compliant formats to suit all common waste management implementations
- Warranty: 7 years

HID Global Bin Tag passive contactless transponders empower cost-effective waste management, enabling pay-as-you-throw and recycling incentive programs, while eliminating error-prone and expensive manual data collection.

Bin Tag devices communicate with readers via radio frequency identification (RFID) technology. Each durable Bin Tag transponder offers superior resistance to water, salt mist, mineral oil and petroleum, as well as high tolerance to shock and temperature variations. Each tag installs easily into standard nests, manufactured into most waste bins, including metal bins and DIN 30745 plastic bins. The unique four-cavity spanner screw drive helps prevent fraudulent removal of tags in the field. Depending on reader configuration or standards requirements, organizations employing DIN 30745 form factor transponders can choose LF, HF or RAIN® UHF tags. Each low-frequency Bin Tag transponder is equipped with 64-bit or 128-bit read-only memory; it may

be pre-programmed with a unique number, or supplied in a programmable format according to BDE standards.

For read-write capability, the high-frequency Bin Tag HF version includes 1024-bit EEPROM, and the RAIN UHF version provides a 512-bit user memory plus 96-bit EPC.

All HID Bin Tag transponders perform superbly when mounted on plastic containers. For metal bins, HID offers specialized RFID Tags designed for consistent performance, where metallic composition might otherwise negatively affect the reading due to signal reflection. (For tracking large, industrial metal containers with RAIN UHF, consider the HID InLine Tag™ family of RFID tags.)

HID Bin Tag transponders perform exceptionally well, withstand abuse and help waste management organizations achieve optimal data integrity easily and efficiently.

## APPLICATION AREAS:

### ■ Waste Management

- Residential, commercial and industrial bin tracking
- Recycling compliance monitoring
- Improved invoicing and service accuracy
- Route optimization systems
- Institution of incentive-based waste and recycling programs



HID can create a custom tag solution to fit your application requirements for chip type, dimensions, programming and materials.



[hidglobal.com](http://hidglobal.com)

North America: +1 512 776 9000  
Toll Free: 1 800 237 7769  
Europe, Middle East, Africa: +44 1440 714 850  
Asia Pacific: +852 3160 9800  
Latin America: +52 55 5081 1650

© 2017 HID Global Corporation/ASSA ABLOY AB. All rights reserved. HID, HID Global, the HID Blue Brick logo, the Chain Design and HID InLine Tag are trademarks or registered trademarks of HID Global or its licensor(s)/supplier(s) in the US and other countries and may not be used without permission. All other trademarks, service marks, and product or service names are trademarks or registered trademarks of their respective owners.

2017-02-23-hid-rfid-il-bin-tag-family-ds-en PLT-00270

An ASSA ABLOY Group brand

## SPECIFICATIONS

|                                    | BIN TAG   |                                  |             |                                  |                                  |
|------------------------------------|---|----------------------------------|-------------|----------------------------------|----------------------------------|
|                                    | Unique  | FDX-b BDE                        | HDX BDE     | HF                               | UHF                              |
| Base Model Number                  | 701133-102  | 784104-102Y                      | 6B7104-102R | 729103-102B                      | 698103-102G                      |
| ELECTRONIC                         |   |                                  |             |                                  |                                  |
| Operating Frequency                | 125 kHz   | 134.2 kHz                        |             | 13.56 MHz                        | 860-960 MHz (EU, US, JP)         |
| Chip Type                          | Unique  | FDX-b BDE                        | HDX BDE     | ICODE SLIX                       | Higgs 3                          |
| Memory                             | 64 bit, read only   | 128 bit, read only               |             | 1024 bit EEPROM                  | 96 bit EPC, 512 bit EEPROM       |
| Anti-Collision                     |   |                                  |             | Yes                              |                                  |
| Reading Distance                   | Dependent upon reader, environment and application  |                                  |             |                                  | Up to 6.5 ft (2 m), 2W ERP       |
| PHYSICAL                           |   |                                  |             |                                  |                                  |
| Dimensions                         | 1.18 x 0.59 in, thread 1.12 in (Ø 30 x 15 mm, thread Ø 28.5 mm)   |                                  |             |                                  |                                  |
| Mounting Method                    | Screw-in  |                                  |             |                                  |                                  |
| Fixation Hole Size                 | Ø 0.22 in (5.5 mm)  |                                  |             |                                  |                                  |
| Affixes To                         | Plastic   |                                  |             |                                  |                                  |
| Housing Material                   | PA6, potting PUR  |                                  |             |                                  |                                  |
| Color                              | Black   | Yellow                           | Red         | Blue                             | Grey                             |
| Weight                             | 0.22 oz (6.4g)  |                                  |             |                                  | 0.34 oz (9.6 g)                  |
| CHEMICAL AND MECHANICAL RESISTANCE |   |                                  |             |                                  |                                  |
| Water IP67                         | IP67, 68° F (20° C), 3.3 ft (1 m) x 1 h   |                                  |             |                                  |                                  |
| Withstands Exposure to             | Fuel B, mineral oil, petroleum, salt mist, vegetable oil  |                                  |             |                                  |                                  |
| Environmental Test Conditions      | 68° F (20° C), 100 h  |                                  |             |                                  |                                  |
| Axial / Radial Force               | 1000 N, 10 sec  |                                  |             |                                  |                                  |
| Vibration                          | IEC 68.2.6 [10 g, 10 to 2000 Hz, 3 axis, 2.5 h]   |                                  |             |                                  |                                  |
| Shock                              | IEC 68.2.29 [40 g, 18 ms, 6 axis, 2000 times]   |                                  |             |                                  |                                  |
| THERMAL                            |   |                                  |             |                                  |                                  |
| Storage                            | -40° to +194° F (-40° to +90° C)  | -40° to +185° F (-40° to +85° C) |             | -40° to +194° F (-40° to +90° C) | -40° to +158° F (-40° to +70° C) |
| Operating                          | -40° to +185° F (-40° to +85° C)  | 13° to +158° F (-25° to +70° C)  |             | -13° to +185° F (-25° to +85° C) | -40° to +158° F (-40° to +70° C) |
| Shock/Fatigue                      | -40° to +194° F (-40° to +90° C), 100 x 10 min with 30 sec transition   |                                  |             |                                  |                                  |
| OTHER                              |   |                                  |             |                                  |                                  |
| Standards                          | Unique: DIN 30745; FDX-b BDE: EN 14803, DIN 30745; HDX: EN 14803, DIN 30745; HF: ISO 15693, ISO 18000-3, DIN 30745; RAIN UHF: UHF EPC C1G2, ISO 18000-6C, DIN 30745 |                                  |             |                                  |                                  |
| Box Size                           | 200 pcs   |                                  |             |                                  |                                  |
| Options                            | Custom embossed logo  |                                  |             |                                  |                                  |
| Warranty                           | 7 Years   |                                  |             |                                  |                                  |