

RFID KEYPAD READER BT853



Product Overview

The BT853 is a two-factor wall mount MIFARE® smart card reader with a keypad and LCD display to provide direct feedback. It can be purchased pre-configured or customised to suit any requirement and is able to integrate seamlessly with existing systems and facilitate migrating to higher security technology. The BT853 is available in a range of secure options right up to military grade technology and encryption and provides a flexible solution through customisation to suit all access control requirements.

Why BQT Solutions

BQT Solutions is a specialist in the development, manufacture and supply of high quality, high security card and biometric readers, electromechanical locks and related electronic security products. Providing high security solutions to verticals such as Airports, Hospitals, Prisons and Government for over 35 years.

Innovating today for a more secure tomorrow

Product Benefits

Benefit One

Dual factor authentication for a higher level of access control security - using a keypad for PIN access in addition to the MIFARE® Classic or DESFire® 13.56MHz smart cards.

Benefit Two

The LCD display provides instant feedback to user which can be programmed to display any access control information.

Benefit Three

Offering pre-configured and customised operations, the BT853 can be set up to accept your custom key and data formats and are designed to work with your pre-existing security configurations.

Benefit Four

The BT853 offers installation flexibility and integration with many existing access panels and can be customised to suit a proprietary system. When you receive your reader, all you will have to do is connect them in to secure your site with your existing access control system.

PRODUCT FEATURES

Compatibility

Available with MIFARE Classic and DESFire proximity cards for contactless smart card technology. The BQT Solution's suite of MIFARE Classic & DESFire® readers and smart cards, opens the gateway to multiple security applications, including access control, biometric authentication, IT security, e-purse, e-vending, time, and attendance to ensure your security needs are being met.

Robust Design

The BT853 has a robust exterior designed to withstand tampering and maintain integrity during a security threat or incident. Built to withstand common reader threats, the BT853 will continue to operate and secure access even after being damaged.

Keypad

Bringing in the 'what you know' aspect to dual-factor authentication, the keypad is designed to add an additional layer of security for your access control. With the BT853 the keypad or an ID card can be used to gain access is desired but utilising them both ensures secure access is only given to those who have a card and access pin.

Tamper Monitor

Security threats aren't always captured on camera and pose a real risk to unauthorised access. We know the peace of mind many organisations need when it comes to alerting them to security threats and the BT853 offers a tamper monitor that will alert the security team if there has been a breach attempt at one of the readers.

Secure Encryption

Working with your current system, the BT853 offers flexible access control, with the option to use Wiegand, OSDP or Encrypted RS485 access data output. The BT853 additional benefits of being cost-effective and easy to wire and deploy across your sites where different levels of encryption are needed for secure access control.

LCD Display

Allowing for instant feedback to the user, the LCD Display can be used to display any access control information, including user ID, Time of unlocking or any message notifications.

PRODUCT APPLICATIONS

Applications where a higher level of security and immediate feedback is desired, or sites where cards are not preferred. Offering dual authentication and switchable to 'Card Only', 'PIN Only', 'Card or PIN', 'Card and PIN' and 'PIN on Card', the flexibility of the BT853 has seen it used across all market sectors.

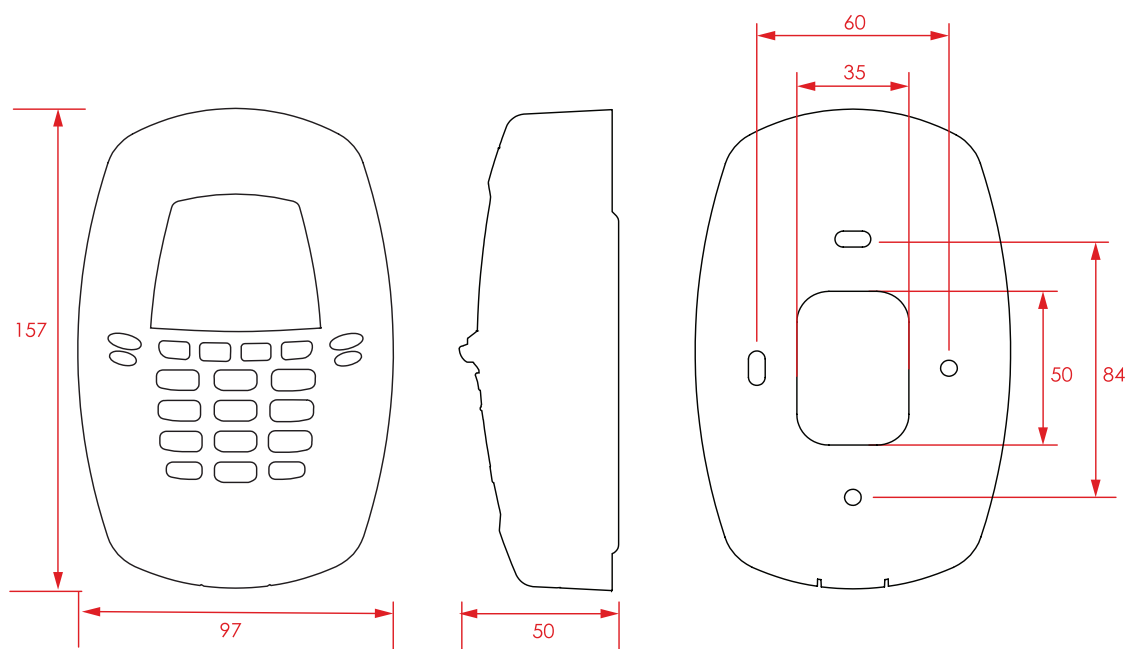


SPECIFICATIONS

- **Voltage at Reader**
8VDC to 16VDC
- **Current Usage**
Average: 180mA
Peak: 240mA
- **Card Read Range**
20mm to 40mm (0.8" to 1.6")
- **Operating Temperature**
-25°C to +65°C (-13°F to +149°F)
- **Relative Humidity (% max)**
90%, operating non condensing
- **Reader Dimensions**
157mm (6.18") X 97mm (3.82")
X 50mm (1.97")
- **Materials**
Reader Body: ABS Plastic
Colour Finish: Charcoal
Mounting Bracket: Stainless Steel
- **Feedback**
Green/Red LED, with external control
Buzzer, with external control
Tamper detection, optional output
- **Keypad**
16 button illuminated, PIN on Card (PoC), 8-bit COTAG or custom
- **LCD Display**
8x20 characters, monochromatic, read/access messaging or custom in RS485 mode
- **Credential Options**
ISO14443A, MIFARE Classic® 1K/4K, MIFARE Plus® X 2K/4K, MIFARE® DESFire® EV1 4K/8K, MIFARE® DESFire® EV2 4K/8K, MIFARE® DESFire® EV3 4K/8K
- **Compliance and Certification**
FCC, CE, UKCA, RCM, RoHS, IP65
- **Reader Variants**
BT853-1 – CSN Reader
BT853-2 – miPASS2 Reader
BT853-3 – Custom MIFARE Classic Reader
BT853-4 – miPASS3 Reader
BT853-5 – miPASS4 Reader
BT853-6 – Custom MIFARE DESFire Reader

DIAGRAM - BT853

Diagrams are not to scale. Measurements are in millimeters (mm).



MODEL COMPARISON

NAME	APPLICATION	OUTPUT PROTOCOLS	OPERATING TEMPERATURE	READER DIMENSIONS	POWER USAGE
BM680	Sites that are cost sensitive yet still require high security	Wiegand, OSDP, RS485	-25°C to +65°C (-13°F to +149°F)	85mm X 43mm X 22mm (3.35" X 1.69" X 0.87")	8VDC to 16VDC, 60mA (Average), 160mA (Peak)
BT930	Existing sites looking to upgrade the technology within the same architrave footprint	Wiegand, OSDP, RS485	-25°C to +65°C (-13°F to +149°F)	140mm X 47mm X 24mm (5.51" X 1.85" X 0.94")	8VDC to 16VDC, 60mA (Average), 160mA (Peak)
BT950	Installations that require a robust standard form architrave reader	Wiegand, OSDP, RS485	-25°C to +65°C (-13°F to +149°F)	119mm X 43mm X 23mm (4.69" X 1.69" X 0.91")	8VDC to 16VDC, 80mA (Average), 160mA (Peak)
BT951	Any site wanting to migrate from 125KHz (FSK) to MIFARE security	Wiegand, OSDP, RS485	-25°C to +65°C (-13°F to +149°F)	119mm X 43mm X 23mm (4.69" X 1.69" X 0.91")	8VDC to 16VDC, 120mA (Average), 300mA (Peak)
BT953	Any site wanting to migrate from 125KHz (PSK) to MIFARE security	Wiegand, OSDP, RS485	-25°C to +65°C (-13°F to +149°F)	119mm X 43mm X 23mm (0.91" X 4.69" X 1.69")	8VDC to 16VDC, 120mA (Average), 300mA (Peak)
BT815	Sites needing a standard form gang box reader	Wiegand, OSDP, RS485	-25°C to +65°C (-13°F to +149°F)	90mm X 90mm X 20mm (3.54" X 3.54" X 0.79")	8VDC to 16VDC, 60mA (Average), 160mA (Peak)
BT817	Sites requiring dual factor authentication or cardless access	Wiegand, OSDP, RS486	-25°C to +65°C (-13°F to +149°F)	90mm X 90mm X 28mm (3.54" X 3.54" X 1.10")	8VDC to 16VDC, 90mA (Average), 190mA (Peak)
BT853	Sites requiring dual factor authentication or cardless access and on device feedback	Wiegand, OSDP, RS487	-25°C to +65°C (-13°F to +149°F)	157mm X 97mm X 50mm (6.18" X 3.82" X 1.97")	8VDC to 16VDC, 90mA (Average), 190mA (Peak)
BT51X	Installations requiring a discrete yet secure device, ideal for Hospitals and Prisons	Wiegand, OSDP, RS488	-25°C to +65°C (-13°F to +149°F)	Variable, to suit	8VDC to 16VDC, 180mA (Average), 240mA (Peak)

WARRANTY

Unless specified otherwise, the Company warrants to the Customer that 'BQT Solutions Branded Products' (excluding third party products and software) are covered by a return to base warranty on defects in materials and workmanship affecting normal use for a period of the Warranty offered under the Standard Terms and Conditions of Sale from BQT invoice date ('Standard Warranty')

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