# qSCAN

### Outdoor 2-D Barcode Scanner



Qscan is the perfect outdoor reader to read print-at-home event tickets, driver's licenses, and even gr codes from smartphone displays.

Qscan reads over 30 barcode sybologies, including Code39, Interleaved 2 of 5, PDF417, Datamatrix, Aztec, and QR.

#### Features & Options

- Fast Decoding
- Programmable formatting options allow you to choose which data to read from the barcode and how to transmit it
- Available with a 2x16 lcd display, readable in direct sunlight
- 12Vdc operation
- Reads CAC and NCAC barcodes
- Optional Relay
- Optional digital inputs for door sensing or an arming loop
- Optional RF (prox, Iclass, PIV-II)

- Rs232
- TCP / IP
- Wiegand
- ABA
- HID 5352
- F2F
- Wand Emulation



5 . 5 . 5		
Barcode Read Range	3"-18" depending on size of barcode	
Symbologies (1D):	Code 39, I 2 of 5, 2 of 5, 5, Code 128, Codabar, Ean8, Ean13, Jan8, Jan13, Upce, Upca,	
	M2of5, K3of5, Postnet, Postbar, Kix, Planet, Msi, Code11, Code93	
Symbologies (2D):	Pdf417, QR, Aztec, Datamatrix	
Interfaces:	Wiegand, up to 250 bits, aba, f2f, wand, Rs232, TCP / IP, Hid 5352	
RF (optional):	125khz prox (hid,awid,farpointe), Iclass, Iclass SE, Iclass SR, Iclass SEOS, Piv-II, Mifare	
Relay (optional):	Form C, 500ma max	
Display (optional):	LCD, 2 lines by 16 characters, viewable in direct sunlight	
Digital Inputs (optional):	2, one may be programmed for an arming loop	
Tcp/ip	10/100 autodetect	
Power Consumption:	500ma typical, 12vdc	
Material:	Black polycarbonate	
Dimensions:	6.4" L x 4.4" W x 2" H , Flange 8" L x 4.7" W	
Weight	1 lb.	
Outdoor Rating:	IP65	
Mounting:	Front Side Flange	
Indicators	2 programmable LEDs	
Temperature	-40°C to +85°C	
Standard Wiring (Fixed):	3ft (91.5cm) cable with DB9 female (RS232), flying leads (wiegand, aba, wand, f2f) or RJ45 (TCP / IP)	

## Wiring

Wiring Connections for various Interfaces.

**TCP** 

RJ45 Plug

Rs232 Interface

+VDC Red GND Blue

Green Reader Transmit Reader Receive

Yellow

Wiegand / ABA / Wand Interface/F2F

Red +VDC Blue GND

White Data 1 / Mag Data / Wand / F2F

Data 0 / Mag Clock Green

Orange Green LED Yellow Bi-color LED Relay Wiring (All Readers)

Yellow Normally Closed Green Normally Open Red Common

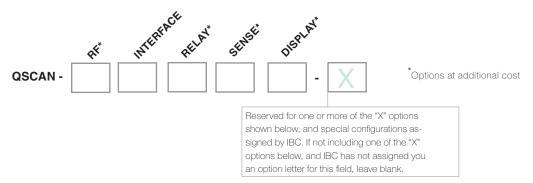
Sense Input Wiring

Yellow Sense Input 1 Orange Sense Input 2

Sense Input Wiring

Yellow Sense Input 1 or Arming Loop

Orange Sense Input 2



RF

No RF - 0 Hid, Farpointe Prox – H Iclass,Mifare- I<sup>3</sup> Iclass<sup>3</sup> & Hid/Awid Prox - B PIV-II - P

#### INTERFACE<sup>1</sup>

Rs232 - S TCP / IP - C Wiegand/aba/f2f/wand - G **RELAY**<sup>4</sup>

No Relay – 0 Relay - R

SENSE INPUTS<sup>2</sup>

No Sense Inputs - 0 Sense Inputs - S DISPLAY

No Display - 0 Display - D

X

POE - P

<sup>1</sup>For Hid 5352 emulation order RS232

<sup>2</sup>For Armed Loop use, order Sense Inputs

Sense inputs available only with RS232 or TCP interfaces

<sup>3</sup>HID Application Area PACS data from Iclass, Iclass SE, Iclass SR, Iclass SEOS, Mifare S/N

Reads the Physical Access Data number from the card. For Iclass or Mifare sector reading contact IBC

<sup>4</sup>Relay available only with RS232 or TCP interfaces

## **Examples**

#### Examples of ordering codes for Qscan.

### Hid 5352 with Arming Loop

QSCAN-0S0S0

Qscan with:

No RF - 0

RS232 Interface - S

No Relay - 0

Sense Inputs - S

No Display - 0

#### TCP / IP w/Iclass

QSCAN-IC000

**Qscan with:** 

Iclass - I

TCP Interface - C

No Relay - 0

No Sense Inputs - 0

No Display - 0

#### Wiegand

QSCAN-0G000

**Qscan with:** 

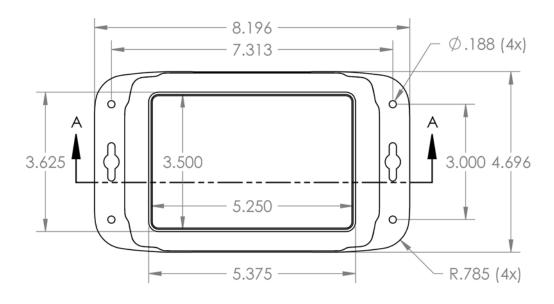
No Rf - 0

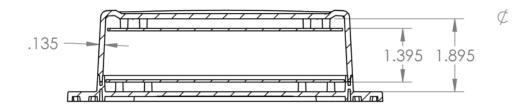
Wiegand Interface - G

No Relay - 0

No Sense Inputs - 0

No Display - 0





## **Notes for Ordering Qscan**

#### **POWER**

Qscan readers are powered by 12Vdc. You can use your own power source or request an AC adapter from IBC when ordering.

#### **WIRING**

Standard wiring for Qscan readers with wiegand, aba, wand, or f2f is a 3' cable containing all data wires and power wires.

Standard wiring for RS232 readers is a 3' cable with a DB9 female connector. The pinout is a direct connect to a pc. Connected to the DB9 connector is a short power pigtail for applying power or connecting an ac adapter.

Standard wiring for Qscan readers with tcp/ip is a 3' cable with an rj45 plug.

#### RF

Qscan can be ordered with embedded proximity to read Hid, Awid, and Farpointe cards.

Qscan can also be ordered with embedded

13mhz support to read either Hid Iclass cards or cards which support PIV-II applications (Cac, Twic, etc..)

#### **SENSE INPUTS**

2 digital inputs may optionally be ordered. The digital inputs can be used for a door sense or gate sense, or for an arming loop to enable/ disable reading.

#### **RELAY**

The optional relay is a form C relay and has a separate wire exiting the rear of the reader containing the isolated relay lines.

#### **DISPLAY**

The optional 2 line x 16 character display is an IBC proprietary FSTN LCD display, and is able to be read in direct sunlight and at wide angles.

For custom wiring or firmware contact IBC.

# qSCANI

#### Indoor 2-D Barcode Scanner





Qscan is the perfect reader to read employee id's, visitors badges, print-at-home event tickets, driver's licenses, and even qr codes from smartphone displays.

Qscan reads over 30 barcode sybologies, including Code39, Interleaved 2 of 5, PDF417, Datamatrix, Aztec, and QR.

Proximity, iClass©, and PIV-II reading also available.

#### Features & Options

- Fast Decoding
- Programmable formatting options allow you to choose which data to read from the barcode and how to transmit it
- 12Vdc operation
- Reads CAC and NCAC barcodes
- Optional Relay
- Optional digital inputs for door sensing or an arming loop
- Optional RF (Prox, Iclass, PIV-II)
- Single Gang Mounting

- Rs232
- TCP / IP
- Wiegand
- ABA
- HID 5352
- F2F
- Wand Emulation
- USB Serial
- Usb Keyboard



Barcode Read Range	3"-18" depending on size of barcode	
Symbologies (1D):	Code 39, I 2 of 5, 2 of 5, Code 128, Codabar, Ean8, Ean13, Jan8, Jan13, Upce, Upca,	
	M2of5, K3of5, Postnet, Postbar, Kix, Planet, Msi, Code11, Code93	
Symbologies (2D):	Pdf417, Micropdf, QR, Aztec, Datamatrix	
Interfaces:	Wiegand, up to 250 bits, aba, f2f, wand, Rs232, TCP / IP, Hid 5352, USB serial, USB keyboard	
RF (optional):	125khz prox (hid,awid,farpointe), Iclass, Iclass SE, Iclass SR, Iclass SEOS, Piv-II,Mifare	
Relay (optional):	Form C, 500ma max	
Digital Inputs (optional):	2, one may be programmed for an arming loop	
Power Consumption:	500ma typical, 12vdc	
Material:	Beige or Charcoal ABS	
Dimensions:	5.5" H x 4.25" W x 1.4" D	
Weight	1 lb.	
Mounting:	Concealed Front, Single Gang	
Indicators	2 programmable LEDs	
Temperature	-40°C to +85°C	
Standard Wiring (Fixed):	3ft (91.5cm) cable with DB9 female (RS232), flying leads (wiegand, aba, wand, f2f), RJ45 (TCP / IP), 5ft USB Type A (USB serial or keyboard)	

## Wiring

Red

Yellow

Wiring Connections for various Interfaces.

### Rs232 Interface

+VDC Red GND Blue Green Reader Transmit Reader Receive Yellow

#### Wiegand / ABA / Wand Interface +VDC

Blue GND White Data 1 / Mag Data / Wand Data 0 / Mag Clock Green Orange Green LED

Bi-color LED

#### F2F

+VDC Red GND Blue White Reserved Reserved Green Orange Green LED Bi-color LED Yellow Brown F2F

#### Relay Wiring (All Readers)

Normally Closed Yellow Green Normally Open Red Common

#### Sense Input Wiring

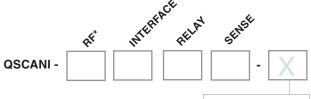
Yellow Sense Input 1 or Arming Loop Orange Sense Input 2

#### **TCP**

RJ45 Plug

#### USB

Type A USB (connection to PC)



Reserved for special configurations or wiring. Keep blank if no special configuration.

#### RF

No RF - 0 Hid, Farpointe Prox – H Iclass,Mifare- I<sup>3</sup> Iclass<sup>3</sup> & Hid/Awid Prox - B PIV-II - P

#### INTERFACE<sup>1</sup>

Rs232 - S TCP / IP - C Wiegand/aba/wand - G F2F - F USB Serial - U<sup>5</sup> USB Keyboard - K<sup>5</sup>

#### **RELAY**<sup>4</sup>

No Relay – 0 Relay - R

#### SENSE INPUTS<sup>2</sup>

No Sense Inputs - 0 Sense Inputs - S

#### SPECIAL (X)

Charcoal Color - C

- <sup>1</sup>For Hid 5352 emulation order RS232
- <sup>2</sup>For Armed Loop use, order Sense Inputs

Sense inputs available only with RS232 or TCP interfaces

<sup>3</sup>HID Application Area PACS data from Iclass, Iclass SE, Iclass SR, Iclass SEOS, Mifare S/N

Reads the Physical Access Data number from the card. For Iclass and Mifare sector reading contact IBC

- <sup>4</sup>Relay available only with RS232 or TCP interfaces
- <sup>5</sup>USB Serial and Keyboard interfaces require a power supply. Qscani cannot be powered from the USB nort

## **Examples**

Examples of ordering codes for Qscani.

#### **RS232 with Digital Inputs**

QSCANI-0S0S

**Qscan indoor with:** 

No RF - 0

RS232 Interface - S

No Relay - 0

Sense Inputs - S

#### TCP / IP w/Iclass

QSCANI-IC00

**Qscan indoor with:** 

Iclass - I

TCP Interface - C

No Relay - 0

No Sense Inputs - 0

#### Wiegand w/Iclass & Prox

QSCANI-BG00

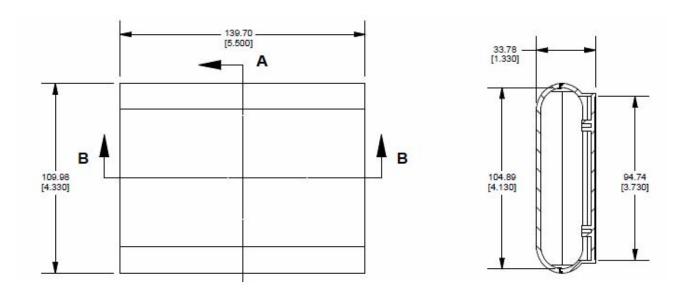
**Qscan Indoor with:** 

Iclass & Prox - B

Wiegand Interface - G

No Relay - 0

No Sense Inputs - 0



### **Notes for Ordering Qscani**

#### **POWER**

Qscan readers are powered by 12Vdc. You can use your own power source or request an AC adapter from IBC when ordering. If connecting to an access panel verify that the panel can supply the required power to operate the Qscan.

#### **WIRING**

Standard wiring for Qscan readers with wiegand, aba, wand, or f2f is a 3' cable containing all data, led, and power wires.

Standard wiring for RS232 readers is a 3' cable with a DB9 female connector. The pinout is a direct connect to a pc. Connected to the DB9 connector is a short power pigtail for applying power or connecting an ac adapter.

Standard wiring for Qscan readers with tcp/ip is a 3' cable with an rj45 plug.

Standard wiring for Qscan readers with a USB interface is a 5' cable with a USB type A connector.

#### RF

Qscan can be ordered with embedded proximity to read Hid, Awid, and Farpointe cards.

Qscan can also be ordered with embedded

13mhz support to read either Hid Iclass cards

(HID Application Area PACS data), or cards

which support PIV-II applications (Cac, Twic, etc..). Qscan can also be ordered to read both Hid prox and Iclass.

#### SENSE INPUTS

2 digital inputs may optionally be ordered. The digital inputs can be used for a door sense, gate sense, arming loop, or request to exit. Sense inputs are available with RS232 and TCP interfaces..

#### **RELAY**

The optional relay is a form C relay and has a separate wire exiting the rear of the reader containing the isolated relay lines. A Relay is available with RS232 and TCP interfaces.

For custom wiring or firmware contact IBC.

# **qSCAN MINI**

## Compact 2-D Barcode Scanner



Measuring only 2 3/8 x 2 5/8, Qscan Mini is perfect for inclusion in Turnstiles and Kiosks. With an automatic sensing mechanism, Qscan Mini reads Visitor Badges, QR Codes, Driver's Licenses, and Event Tickets with ease. Over 30 barcode symbologies are supported, and best of all - the wiegand/aba/f2f interface makes connection to panels effortless.

#### Features & Options

- Fast Decoding
- Programmable formatting options allow you to choose which data to read from the barcode and how to transmit it
- 8-30Vdc operation
- Reads CAC and NCAC barcodes
- Arming Loop support

- Wiegand
- ABA
- F2F
- Wand Emulation



Barcode Read Range	3"-18" depending on size of barcode	
Symbologies (1D):	Code 39, I 2 of 5, 2 of 5, Code 128, Codabar, Ean8, Ean13, Jan8, Jan13, Upce, Upca,	
	M2of5, K3of5, Postnet, Postbar, Kix, Planet, Msi, Code11, Code93	
Symbologies (2D):	Pdf417, Micropdf, QR, Aztec, Datamatrix	
Interfaces:	Wiegand, up to 250 bits, aba, f2f, wand emulation	
Digital Input:	Arming Loop/Activation control	
Power Consumption:	110ma typical @ 12vdc	
Material:	Black ABS	
Dimensions:	1.25" H x 2.38" W x 2.65" D	
Weight	3 oz.	
Mounting:	2 screw bosses, #4	
Indicators	Good Read beep	
Temperature	-40°C to +85°C	
Wiring:	Terminal block	

## **How to Order**

Ordering codes for Qscanmini

QSCANMINI-G0 Wiegand/ABA/F2F/Wand Interface (programmable)

# qSCAN-t

Embedded Reader for Turnstiles, Kiosks, and Walls



Integration of multiple technologies was never this easy. With Qscan-t you can read 1D and 2D barcodes, proximity cards, and 13.5mhz smart cards including Iclass SE and Mifare.

Over 30 barcode symbologies are supported, and best of all - the wiegand/aba/ f2f interface makes connection to panels effortless and the TCP/IP interface allows for easy network integration.

#### Features & Options

- Fast Barcode Decoding
- Programmable formatting options
- 8-30Vdc operation
- Reads CAC, USIC and NCAC barcodes
- Reads QR codes and Driver's Licenses
- Prox support for Hid, Indala, and Awid
- 13.56mhz support for Iclass, Iclass SR, Iclass SE, Mifare, PIV, Felica.
- Iclass reading Programmed ID number, CSN, or sector.
- Mifare reading CSN or sector on Classic, Desfire, Plus, and Ultralight
- Optional Faceplates
- Custom screw boss lengths available for oem mounting

- Wiegand
- ABA
- F2F
- Wand Emulation
- TCP/IP



Barcode Read Range	3"-18" depending on size of barcode	
Symbologies (1D):	Code 39, I 2 of 5, 2 of 5, Code 128, Codabar, Ean8, Ean13, Jan8, Jan13, Upce, Upca,	
	M2of5, K3of5, Postnet, Postbar, Kix, Planet, Msi, Code11, Code93	
Symbologies (2D):	QR, Pdf417, Micropdf, Aztec, Datamatrix	
Interfaces:	Wiegand, up to 250 bits, aba, f2f (ttl level), wand emulation, Tcp/ip	
RF (optional):	125khz prox (hid,awid,Indala), Iclass, Iclass SE, Iclass SR, Iclass SEOS, Piv-II, Mifare, Felica	
Power Consumption:	500ma @ 12vdc peak, 200ma typical	
Material:	Black ABS	
Dimensions:	5" x 3.5" x 3.25" H (without faceplate) approx.	
Weight	10 oz.	
Mounting:	4 screw bosses, #6	
Indicators	Good Read beep, Internal Led indicator	
Temperature	-40°C to +85°C	
Wiring:	Terminal block (wiegand,aba) or RJ45 jack (Tcp/ip)	

How to Order
Ordering codes for Qscan-t

QSCANT-0G0	Barcode Only	Wiegand/ABA/F2F/Wand Interface (programmable)
QSCANT-0C0	Barcode Only	Tcp/ip Interface
QSCANT-BG0	Barcode + Prox + 13.56mhz	Wiegand/ABA/F2F/Wand Interface (programmable)
QSCANT-BC0	Barcode + Prox + 13.56mhz	Tcp/ip Interface
QSCANT-IG0	Barcode + 13.56mhz	Wiegand/ABA/F2F/Wand Interface (programmable)
QSCANT-IC0	Barcode + 13.56mhz	Tcp/ip Interface