

CB900D Digital Call Box

General

What is the CB900D Digital Call Box?

The CB900D is a new digital call box designed to work seamlessly with 900 MHz devices. It is intended to boost productivity, safety, and response times across an entire facility.

What existing radio systems can the CB900D integrate with?

The CB900D is designed to seamlessly integrate with existing Curve, DTR, and DLR radio fleets.

What communication types or operational modes are available with the CB900D?

The CB900D Digital Call Box can be configured with three different communication types to suit specific workflow needs:

- **One-way call box** (send request).
- **Two-way call box** (send and receive)
- **Desktop base station** (send and receive)

What previous model does the CB900D replace?

The CB900D is a refresh of the CB300 Call Box.

Key features

Is the CB900D suitable for outdoor use?

Yes, the CB900D has a compact, rugged design that withstands dust and humidity. It has an IP54 rating and is suitable for outdoor use in a covered area.

What measures are in place to secure the CB900D device?

The device features tamper-proof front plate locks and a secure battery compartment.

How loud is the audio output of the CB900D Call Box?

The device provides loud and clear audio at 97dB SPL @ 30 cm audio quality.

What colors are used for the visual status indicator (LED)?

The color LED Indicator provides visual status updates using red, green, and blue.

Can custom voice messages be used with the CB900D?

Yes, the device allows for the creation and upload of unique voice messages via PC for tailored notifications.

How does the physical size and weight of the CB900D compare to the CB300?

The CB900D is significantly smaller than the CB300. The CB300 measures 192mm×125mm×54mm and weighs 2.2lb. The CB900D is smaller at 110mm×110mm×57.5mm with the battery module and weighs ~1.12lb*.



What are the regulatory and frequency specifications of the CB900D?

The CB900D is an FCC and ISSED License Free Solution. It operates license-free in the 900 MHz ISM Band (902-928MHz), which eliminates the need for regulatory paperwork and saves on radio licensing fees. The device uses Frequency Hopping Spread Spectrum (FHSS) for more reliable and private communication compared to standard analog radios.

What display capabilities does the desktop base station have?

The CB900D desktop base station features a display that shows the Channel Number and Channel Alias. The display is monochrome (3-lines).

How can a user change the channel or volume settings on the desktop base station?

The user can change the selected channel by pressing the up (Λ) or down (V) navigation key. Volume can be increased or decreased by pressing the left (<) or right (>) navigation key.

What are the programming options for the top programmable button when using the device in base station mode?

In base station (PTT) mode, the top programmable button can be set to three options: Page All available, Private Reply, or Call All available.



Power, installation, and accessories

What are the power options for the CB900D?

The device can be battery operated or powered via a compatible power supply.

What type of batteries are used in the battery-operated configuration?

The battery module uses 6 x AA Lithium cells.

Which operational modes require a direct power supply?

The two-way communication mode and the base station mode should utilize a direct power supply.

How long is the expected battery life?

The expected battery life is 1 year, based on an average of 12 button presses per day.

Are the power supply adapter and USB-C Cable included with the standard call box or base station?

No, the power supply adapter and USB-C cable are generally offered as optional items. When using the device with direct power, the customer needs to buy a power adapter and USB-C cable.

What components are necessary to convert a standard call box into a desktop base station?

To use a call box as a base station, the user must:

- Remove the battery module.
- Connect the USB-C power cable to the main body.
- Replace the front plate cover with the Base Station front plate cover (which is an accessory SKU).
- The Desktop Mount (Cradle) is also recommended or required for proper desk placement.



Can the banner mount accessory be used with the base station configuration?

No, the graphics banner accessory is only intended to be used when the device is wall-mounted and is used for the call box only.

What mounting accessories are available for the CB900D?

Optional accessories include the Desktop Mount (Cradle), and Banner Mount Clip. The Wall Mount is included as an inbox item.

Operations and call behavior

How does a user initiate a request using the One-way call box?

The user short-presses the box. The LED will illuminate solid green for the duration of the press, triggering the help request.

How does the user know their help request was received by the one-way call box?

The user hears an assurance message and the LED will illuminate in a continuous double-blink green as a waiting indicator.

What action is required to initiate two-way communication on the two-way call box?

The user follows the same steps for the one-way call box, except a long-press is required for two-way communication.

How does a radio user reply to a two-way call box request?

A radio user can reply in two ways: using the top button for a private reply, or using the PTT button to reply on the channel.

How does a user transmit a message using the desktop base station?

To transmit a call, the user must press-and-hold the PTT button on the desktop base station. A solid green LED indicates transmission, and the user should begin speaking after the 'talk permit tone'.



To learn more, visit: www.motorolasolutions.com/cb900d