



# IC-7610 Firmware Update for I/Q Output

With the IC-7610 firmware update, your IC-7610 can output I/Q signals to a connected PC. Using the I/Q signals on the HSDR software, you can listen to received signals, or observe the spectrum scope on the PC. Used in combination with the CW Skimmer and CTESTWIN or N1MM Logger+ software, you can virtually decode all Morse signals in the operating band. This function is very useful for contesting and DX hunting, such as monitoring the activity in the band, and effective callback in split operation.

## What you can do with the I/Q output

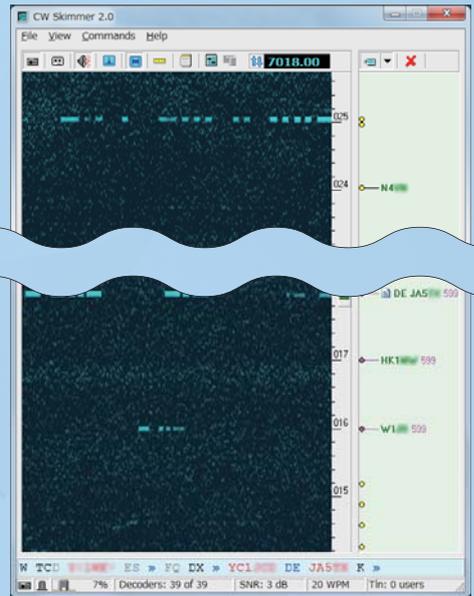
### Used in combination with the CW Skimmer and HSDR software

Decode Morse signals around the received signal.

When calling a CW station in a pile up using the split operation, monitor the calling and other stations activities.

While operating the MAIN band in the SSB mode, you can watch the SUB band in the CW mode, and decode Morse signals.

Using a wide sampling rate, all Morse signals in the band can be decoded. The CTESTWIN or N1MM Logger+ contest software can display a list of Call signs and frequencies.



CW skimmer screen shot

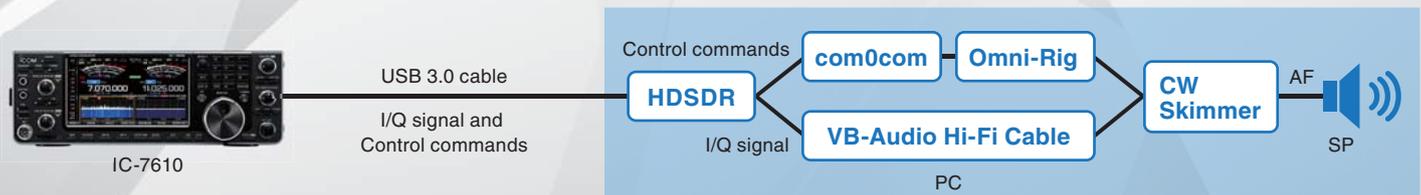
(When you change the radio's operating frequency from the contest software, a separate USB 2.0 A/B cable is required.)

### Using the HSDR software

Use the HSDR software as a third receiver, while using the IC-7610 MAIN and SUB bands.

Use the IC-7610 as a black box SDR receiver

### Setting example using a combination of the CW Skimmer and HSDR Software



• Download "IC-7610 USB I/Q package for HSDR" from the Icom Web site. (USB device driver and DLL files are included.) • Update your IC-7610's firmware to the latest firmware version.  
• HSDR is the property of Mr. Mario Täeubel (DG0JBJ). • CW skimmer is the property of Afreet Software Inc.. • CTESTWIN is the property of Mr. Horiuchi (J11AQY) • Null-modern emulator (com0com) is an open source software based on the GPLv2 license. • VB-Audio Hi-Fi Cable is the property of Mr. Vincent Burel. • N1MM Logger+ is the property of Mr. Thomas F Wagner (N1MM).  
• Icom has made limited checks these software applications with the IC-7610, but does not guarantee proper operation due to differences in OS, configurations, other installed software, and so on.