

Using a Sena Helmet Headset with a Yaesu FTM-400XDR

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I wanted to use my Sena Bluetooth helmet headset with my Yaesu FTM-400DXR. To do that I needed to use the [Sena SR10](#) Bluetooth adapter to connect via Bluetooth to the Sena headset. A couple of other members have used the SR10 successfully as well. And, while the FTM-400 has Bluetooth built-in – It's not reliable in connecting to the Sena headsets.

In order to do this I needed to build a cable to go from the FTM-400 to the SR10. I started with the Sena 2-way radio cable ([Sena SC-A0116](#)) and used the Sena Open Ended Cable diagram as a reference.

I purchased an MH-48 Microphone replacement cable and fitted it with a Hirose connector. This gives me the RJ12 on one end for the radio and the Hirose connector on the other end for the SR10. The Wiring Map Table shows the connections from the RJ12 ("PIN OUT") at one end of the MH-48 cable to the Hirose 6 pin Male connector which connects to the SR10. I used the MH-48 replacement cable as the starting point because it comes with the RJ12 connector already crimped and it was easier for me to solder a Hirose connector to its open end.

I have also included the wiring map to show how the Sena Open Ended cable would connect to an RJ12 connector on the open end.

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Yaesu FTM400XDR RJ11 to Sena SR10 Hirose 6 pin Male

Audio is connected by a male-to-male 3.5mm Audio Cable from the Yaesu Audio-Out to the Sena SR10 AUX Audio-In. This document describes the cable that connects Microphone & Push-To-Talk functions to the Sena SR10 via the Hirose 6 pin connector.

Parts

- 1) Replacement Microphone Cable Cord for Yaesu MH-48 (\$9.99)
https://smile.amazon.com/gp/product/B018FNQ58E/ref=ppx_yo_dt_b_asin_title_o03_s01?ie=UTF8&psc=1
- 2) Hirose 6 pin Male Connector (\$11.99)
https://smile.amazon.com/gp/product/B07FJQ8PZB/ref=ppx_yo_dt_b_asin_title_o00_s00?ie=UTF8&psc=1

Wiring Map

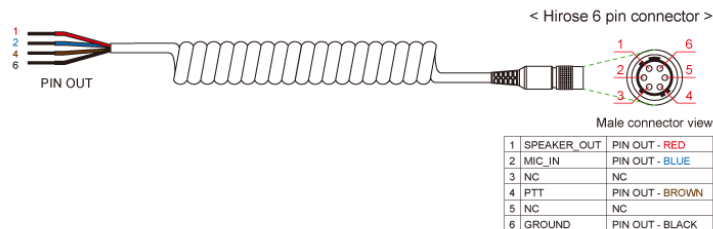
RJ11 Pins	MH-48 Replacement Cable	Map to Hirose Pins
Pin 1 : SW2	Green	NC
Pin 2 : SW1	Brown	NC
Pin 3 : +8 volts	Black	NC
Pin 4 : Ground	Grey	Pin 6 : Ground
Pin 5 : MIC	Red	Pin 2 : MIC In
Pin 6 : PTT	Yellow	Pin 4 : PTT

Note: Applying solder to the wire tips and the Hirose Connector 'cups' prior to assembly made the process of soldering much easier.

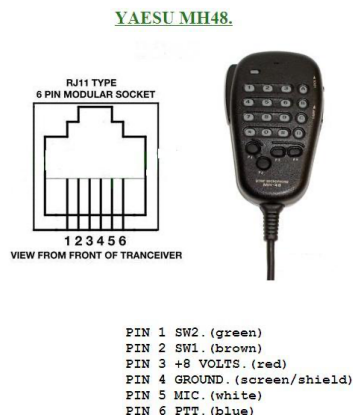
Reference Materials

Wiring diagram for Sena SC-A0116 2-Way Radio Cable with Open-Ended Wiring

https://smile.amazon.com/gp/product/B0087NB3S0/ref=ppx_yo_dt_b_asin_title_o03_s00?ie=UTF8&psc=1



Wiring diagram for Yaesu MH-48 Microphone

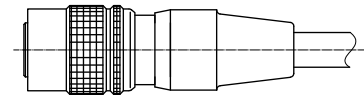




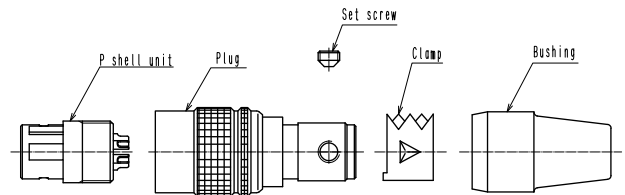
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◆ Plug Assembly Instructions Illustration (Operation)

■ Assembly product illustration



■ Name of each part



△	COUNT	DESCRIPTION OF REVISIONS	DESIGNED	CHECKED	DATE	
TITLE			<div style="text-align: right;"> </div>			
HR10A Connector Assembly Procedure						
APPROVED		YH. YAMADA				16.11.22
CHECKED		EJ. KUNII				16.11.22
CHARGED		KN. IKEHARA				16.11.22
WRITTEN		KN. IKEHARA	16.11.22			
TECHNICAL SPECIFICATION			ETAD-C0354-00	△	1 / 7	