

#### FT-891 HF+50 MHz ALL MODE MOBILE TRANSCEIVER

The FT-891 HF All Mode Mobile Transceiver once again continues Yaesu's legacy for legendary receiver design in a compact package, providing uncompromised performance for both the mobile and stationary Amateur operator. High end 32-Bit floating point DSP enhances the operating experience providing a cleaner, clearer signal and reducing overall operator fatigue creating a more enjoyable environment for any Amateur operator.

**FEATURES** Uncompromising Receiver Circuit Design Ensures Excellent Performance

- Triple conversion with a 1st IF frequency of 69.450 MHz (SSB/CW/AM
- 3 kHz roofing filter equipped as standard feature
- TCXO provides  $\pm 0.5$  ppm High frequency stability (-10°C to +50°C)

### Stable 100 Watts Output (Adjustable 5-100 Watts)

The FT-891 provides stable 100 Watts (Adjustable 5-100 Watts) & (25 Watts AM Adjustable 5-25 Watts) of high power output. High reliability is assured by the transmitters careful circuit design with efficient thermostatically-controlled Dual internal fans and the die cast heat transferring chassis.

### 32-Bit IF DSP Provides effective and optimized QRM rejection

The 32 bit high speed floating Point DSP (max 3000 MIPS) provides effective cancellation/reduction (DNR) of the random noise that is frequently frustrating while on the HF bands. The highly optimized AUTO NOTCH (DNF) automatically eliminates dominant beat tones, and the CONTOUR, and the APF, are very effective receiver noise reduction tools during HF band operations.

### **USB Connection**

A native USB connection supports PC connectivity with a single cable, allowing for full rig control via a virtual serial port connection (VCP).

### **Features for Ease of Operation**

- Large diameter Main Tuning Dial (1.6" / 41mm) with Torque adjustment
- Pop-up Menu for quick and easy navigation
- Multi-function Knob
- Large Transmit/Receive indicator
- Three programmable Front Panel Function Keys

### Support for ATAS (Active Tuning Antenna System)

The FT-891 fully supports the ATAS-25 and ATAS-120A Active Tuning Antenna System (optional) allowing for plug and play field and mobile operation.

### Ultra compact design

Measuring 6.1" x 2.0" x 8.6" (155 x 52 x 218 mm), The FT-891 is an innovative Multi-band, Multi-mode Mobile/Portable transceiver with an Ultra Compact and rugged case design.

# **Optional FC-50 Antenna Tuner Unit**

The FC-50 is a microprocessor-controlled antenna tuner that is designed specifically for the FT-891. The FC-50 can be easily coupled with the FT-891 and includes all necessary interconnect cables for operation right out of the box.

## **Specifications**

- Frequency Range: Tx: 1.8 54 MHz (Amateur Bands Only) Rx: 30 KHz 56 MHz
- Channel Step: 2/5/10 Hz (SSB, CW), 10/100 Hz (AM,FM)
- Frequency Stability: +/- 0.5 ppm 14 °F to + 122 °F (-10 °C to +50 °C)
- Modes of Emission: A1A (CW), A3E (AM), J3E (LSB, USB), F3E (FM)
- Impedance: 50 Ohms, unbalanced
- Supply Voltage: 13.8 VDC +/- 15%, negative ground
- Current Consumption: Rx: 2.0 A (Signal Present) Tx: 23 A
- **Operating Tempature Range:** 14 °F to ° +122 °F (-10 °C to +50 °C)
- Case Size (WxHxD): 6.1" x 2.0" x 8.6" (155 x 52 x 218 mm) w/o Knobs
- Weight (Approx.): 4.18 lb (1.9 kg)
- Output Power: 100W (Adjustable 5-100 Watts) SSB/CW/FM (AM: 25W Adjustable 5-25 Watts)
- Circuit Type: SSB/CW/AM: Triple-conversion Super-heterodyne FM: Double Conversion Superheterodyne
- Intermediate Frequencies: 1st: 69.450 MHz / 2nd: 450 KHz
- Maximum AF Output: 2.5 W 4 ohmz with 10% THD
- Audio output Impedance: 4 to 16 Ohms (8 Ohms nominal)
- Sensitivity: SSB/CW (S/N 10dB) 0.158 uV (1.8 30 MHz), 0.125 uV (50 54 MHz) AM (S/N 10 dB) 4 uV (0.5 - 1.8 MHz), 1.6 uV (1.8 - 30 MHz), 1.2 uV (50 - 54 MHz) FM (12 dB SINAD) 0.35uV (29, 50 - 54 MHz

## **Included Accessories:**

- Microphone MH-31A8J
- Mobile Mounting Bracket
- DC Power Cable

HRO Website