

AR-ONE

Communications Receiver

The AR-ONE gives you total command of frequencies, modes, tuning steps and more. It is possible to tune in increments of **one** Hz.



Monitor Any Frequency from 10 KHz to 3.3 GHz

*Ultra-stable reference
frequency oscillator (0.1ppm)*

***The AR-ONE is a
new beginning for
wide-range monitors.***

*The AR-ONE is designed to
support computer controlled
operation. Link up to 99 receivers
for control by a single PC. The
AR-ONE can be used for mobile
or fixed monitoring operations.*

Surveillance operations are enhanced. Monitoring multiple frequencies is easier and faster. Computer control gives you maximum flexibility and unleashes the many features found in this advanced technology receiver.

The AR-ONE is the right choice for the new world we now monitor.

- Super wide coverage: 10 KHz ~ 3.3 GHz
- 1000 memory channels
- 10 VFOs
- Monitor AM, NFM, WFM, USB, LSB, CW, Data
- Ultra-stable reference frequency oscillator
- Two RS-232C ports plus control head port
- Control up to 99 AR-ONE Units with one PC
- Triple conversion superheterodyne front end
- Antenna input level readout
- Adjustable BFO
- High intercept
- Multi IF signal output (10.7 MHz or 455 KHz)
- Excellent sensitivity

The AR-ONE is designed for use by the monitoring professional. The AR-ONE is so advanced, you'll be thinking of new applications for its powerful capabilities.



Authority on Radio
Communications

**The Serious Choice in Advanced
Technology Receivers™**

AR-ONE Advanced Technology Communications Receiver



AR-ONE Rear Panel

SPECIFICATIONS

Model:	AR-ONE
Configuration:	Triple conversion super heterodyne
Frequency coverage:	10KHz ~ 3.3 GHz (no gap)
Receive mode:	AM, NFM, WFM, USB, LSB, CW, DATA
Sensitivity:	(AM mode - 10 dB S/N, NFM mode - 12 dB SINAD, CW/SSB mode - 10 dB S/N)
10 ~ 40 KHz:	CW 22.3 uV,
40 ~ 100 KHz:	AM - 4.5 uV, CW - 1.5 uV,
100 KHz ~ 40 MHz:	AM 2.5 uV, 2 ~ 40 MHz: AM - 1.5 uV, SSB/CW - 0.7 uV, NFM - 0.89 uV
40 MHz ~ 1 GHz:	AM - 0.89 uV, SSB/CW - 0.4 uV, NFM - 0.5 uV, WFM - 1.5 uV,
1 GHz ~ 2.5 GHz:	AM - 0.7 uV, SSB/CW - 0.32 uV, NFM - 0.4 uV, WFM - 1.5 uV,
2.5 GHz ~ 3.3 GHz:	AM - 0.9 uV, SSB/CW - 0.35 uV, NFM - 0.5 uV, WFM - 1.5 uV
IF frequencies:	1st IF : 754 MHz /265 MHz, 2nd IF : 10.7 MHz, 3rd IF : 455 KHz
Frequency steps:	Standard steps: 1, 10, 50, 100, 500 Hz, 1, 5, 6.25, 9, 10, 12.5, 20, 25, 30, 50, 100, 500 KHz
Non standard steps:	Less than 1 MHz (1 Hz incremental)
Selectivity:	B/W - 6 dB - 60 dB
	0.5 KHz 0.5 KHz > < 2 KHz
	3 KHz 3 KHz > < 6 KHz
	6 KHz 6 KHz > < 20 KHz
	9 KHz 9 KHz > < 30 KHz
	15 KHz 15 KHz > < 40 KHz
	30 KHz 30 KHz > < 70 KHz
	110 KHz 110 KHz > < 450 KHz
	220 KHz 220 KHz > < 600 KHz
	300 KHz 300 KHz > < 900 KHz
Spurious Sensitivity:	60 dB >
Adjacent Selectivity:	55 dB >
Dynamic Range:	90 dB >
Unwanted Spurious emission:	< -57 dBm
3rd IP:	+2 dBm > (-1 dBm > above 2.5 GHz)
Frequency stability:	+/- 0.1 ppm (-10 ~ 50 C)
THD:	20 dB > (< 10 %)
Audio Output:	1.5 w (at 8 ohms, THD < 10 %)
Power requirement:	13.5 V DC, < 2 amp. (@ 1 w audio output)
Antenna impedance:	50 ohm
Antenna Connector:	N type
IF output level:	-20 dBm (10.7 MHz or 455 KHz)
External frequency standard input:	10 MHz (0 dBm +/- 3 dB)
Control interface:	RS-232C
Operating temperature:	-10 ~ 50 degrees (C) , -18 ~ 144 degrees (F)
Dimensions:	157 (w) x 58 (h) x 270 (d) (mm), 6.2 (w) x 2.3 (h) x 10.8 (d) (inch)
Weight:	Approximately 2.2 Kg (4.9 lbs)

Amazing Stability

Accuracy of 0.1 ppm from -10° ~ 50° C (14° ~ 122°)

Unparalleled Range

Continuous tuning from 10 KHz to 3.3 GHz.

Connectivity

Control up to 99 AR-ONE units from just one PC. Provisions for external speaker, IF outputs (10.7 MHz or 455 KHz), local oscillator input/output (for coherent).

High Intercept

Greater than +2 dBm (-1 dBm above 2.5 GHz).

Applications

Surveillance, military, intelligence gathering, media monitoring, transmitter location, technical troubleshooting and more.

Accessories

120 VAC adapter and instruction manual included (US model)
230 VAC adapter and instruction manual included (European model)



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AR ONE is only available to authorized users in the USA, documentation required.

Specifications subject to change without notice or obligation.
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