# 4000SERIES FREQUENCY-AGILE TRUE DIVERSITY UHF WIRELESS SYSTEMS



# SYSTEM FEATURES

- 200 selectable UHF channels per band and True Diversity reception for interference-resistant operation
- Dual Compander circuitry processes high and low frequencies separately for unmatched audio quality
- Advanced digital Tone Lock<sup>™</sup> squelch effectively blocks stray RF; the digitally encoded tone also communicates transmitter data for receiver display
- IntelliScan<sup>™</sup> feature automatically finds and sets best available frequencies on all linked receivers

· Link and coordinate multiple AEW receivers via

included data cables; also link to 5000 Series

- All transmitters offer rugged, ergonomic metal bodies, programmable features, soft-touch controls
- All components may also be used with AEW-R5200 receivers

and 10 mW/35 mW switchable RF power

receiver





# SPECIFICATIONS<sup>†</sup>

UHF Operating Frequency	Band C: 541.500 to 566.375 MHz Band D: 655.500 to 680.375 MHz
Number of Channels	200 total per band
Frequency Stability	± 0.005%, Phase Lock Loop frequency control
Modulation Mode	FM
Normal Deviation	±5 kHz
Operating Range	300' typical
Operating Temperature Range	41° F (5° C) to 113° F (45° C)
Frequency Response	70 Hz to 15 kHz

AEW-R4100 Receiver	
Receiving System	Dual independent RF sections,
	automatic-switching diversity
Image Rejection	60 dB typical
Signal-to-noise Ratio	115 dB at 40 kHz deviation (IEC-weighted,
	75 kHz maximum modulation)
Total Harmonic Distortion	≤1% (10 kHz deviation at 1 kHz)
Sensitivity	20 dBµV (S/N 70 dB at 5 kHz deviation, IEC-weighted)
Intermediate Frequency	65.75 MHz, 10.7 MHz
Audio Output (ATTN switch at "0")	
Microphone:	25 mV (at 1 kHz, ±5 kHz deviation, 10k ohm load)
Instrument:	50 mV (at 1 kHz, ±5 kHz deviation, 10k ohm load)
Audio Output Attenuator (ATTN)	Three-position switch: 0/-6/-12 dB
Output Connectors	
Microphone:	XLRM-type
Instrument:	1/4" (6.3 mm) TS unbalanced phone jack
Headphone Output	
Connector:	1/4" (6.3 mm) TRS ("stereo") phone jack
Power Output:	10 mW + 10 mW at 1 kHz, $\pm$ 5 kHz
	deviation into 32 ohms; maximum output:
	220 mW + 220 mW into 32 ohms
Antenna Terminal Voltage	DC 10V-12V, 20 mA (BNC-type jack)
Power Supply	100-240V AC 50/60 Hz; 8W
Dimensions	8.31" (211.0 mm) W x 1.74" (44.0 mm) H
	x 9.26" (235.0 mm) D
Net Weight (without accessories)	3.8 lbs (1.7 kg)
Accessories Included	Detachable IEC-type AC power cable; two flexible UHF half-wave antennas; link cable; rack-mount adapters

# **SYSTEM CONFIGURATIONS**

AEW-4110 UHF Wireless UniPak™ Transmitter System Includes: AEW-R4100 receiver and AEW-T1000 UniPak™ transmitter

AEW-4230 UHF Wireless Handheld Condenser Microphone System Includes: AEW-R4100 receiver and AEW-T3300 cardioid condenser microphone/transmitter

AEW-4240 UHF Wireless Handheld Dynamic Microphone System Includes: AEW-R4100 receiver and AEW-T4100 cardioid dynamic microphone/transmitter

AEW-4250 UHF Wireless Handheld Condenser Microphone System Includes: AEW-R4100 receiver and AEW-T5400 cardioid condenser microphone/transmitter



Audio-Technica U.S., Inc. 1221 Commerce Drive, Stow, Ohio 44224 (330) 686-2600 Fax: (330) 686-0719 E-mail: pro@atus.com www.audio-technica.com

∖EW-T1000 UniPak™ Tra	nemitter

RF Power Output	High: 35 mW; Low: 10 mW, nominal
Spurious Emissions	Under federal regulations
Dynamic Range	
Microphone:	≥110 dB, A-weighted
Instrument:	≥100 dB, A-weighted
Input Connections	High impedance, low impedance, bias
Batteries (not included)	Two 1.5V AA alkaline
Current Consumption	High: 185 mA; Low:165 mA, typical
Battery Life	Approximately 8 hours (High); 10 hours (Low), depending on battery type and use pattern
Dimensions	2.60" (66.0 mm) W x 3.43" (87.0 mm) H x 0.94" (24.0 mm) D; not including antenna
Net Weight (without batteries)	4.4 oz (125 g)

# AEW-T3300, AEW-T4100, AEW-T5400, AEW-T6100 Handheld Transmitters

RF Power Output	High: 35 mW; Low: 10 mW, nominal
Spurious Emissions	Under federal regulations
Dynamic Range	≥110 dB, A-weighted
Microphone Element	
AEW-T3300	Cardioid Condenser
AEW-T4100	Cardioid Dynamic
AEW-T5400	Cardioid Condenser
AEW-T6100	Hypercardioid Dynamic
Batteries (not included)	Two 1.5V AA alkaline
Current Consumption	High: 185 mA; Low: 165 mA, typical
Battery Life	Approximately 6 hours (High); 8 hours (Low),
	depending on battery type and use pattern
Dimensions	
AEW-T3300, AEW-T5400	9.41" (239.0 mm) long, 1.97" (50.0 mm)
	maximum diameter
AEW-T4100, AEW-T6100	9.33" (237.0 mm) long, 1.89" (48.0 mm)
	maximum diameter
Net Weight (without batteries)	
AEW-T3300	9.5 oz (270 g)
AEW-T4100	9.7 oz (276 g)
AEW-T5400	10.0 oz (285 g)
AEW-T6100	9.7 oz (275 g)

AT8456a Quiet-Flex™ stand clamp

† In the interest of standards development, A.T.U.S. offers full details on its test methods to other industry professionals on request. Specifications are subject to change without notice.

Accessory Included

AEW-4260 UHF Wireless Handheld Dynamic Microphone System Includes: AEW-R4100 receiver and AEW-T6100 hypercardioid dynamic microphone/transmitter

AEW-4313 UHF Wireless Dual Transmitter System Includes: AEW-R4100 receiver, AEW-T1000 UniPak™ transmitter, and AEW-T3300 cardioid condenser microphone/transmitter

AEW-4314 UHF Wireless Dual Transmitter System Includes: AEW-R4100 receiver, AEW-T1000 UniPak™ transmitter, and AEW-T4100 cardioid dynamic microphone/transmitter

AEW-4315 UHF Wireless Dual Transmitter System Includes: AEW-R4100 receiver, AEW-T1000 UniPak™ transmitter, and AEW-T5400 cardioid condenser microphone/transmitter

AEW-4316 UHF Wireless Dual Transmitter System Includes: AEW-R4100 receiver, AEW-T1000 UniPak™ transmitter, and AEW-T6100 hypercardioid dynamic microphone/transmitter

Form No. 0480-2201-02 ©2004 Audio-Technica U.S., Inc. Printed in U.S.A.