# KENWOOD

# NEXEDGE®

**KENWOOD** 

# NX-240/340

NEXEDGE® VHF/UHF Digital & FM Portable Radios

**NXDN**<sup>®</sup> FleetSync<sup>®</sup>

Your business will have to adopt digital radios sooner or later, you know that, but you probably wonder when to make the extra investment. A leap into the unknown? Not with the new NEXEDGE® NX-240/340. It operates in both analog FM and NXDN® digital modes, offering a cost-effective way to migrate smoothly from legacy systems while discovering the benefits of advanced digital technology – including increased effective coverage area, low noise for superior clarity, and inherent secured voice. All this comes in a tough, compact radio that is easy to operate, delivers high-powered audio, and ensures round-the-clock reliability. Don't delay the opportunity to expand the potential of your business.

#### NXDN<sup>®</sup> DIGITAL AIR INTERFACE

NEXEDGE<sup>®</sup> radios employ NXDN<sup>®</sup>, an FDMA digital air interface with AMBE+2<sup>™</sup> voice coding technology, unique filtering and a 4-level FSK modulation technique with low bit error rate (BER) even at weak RF signal strengths.

#### ENHANCED AUDIO QUALITY

AMBE+2<sup>™</sup> VOCODER technology accurately replicates natural human speech nuances for superior voice quality, even at highway speeds. Additionally, the powerful 36mm-diameter speaker delivers up to 1 watt audio output, providing undeniably clearer and crisper audio.

#### ULTIMATE PERFORMANCE

RF output power is 5W for both VHF (NX-240) and UHF (NX-340). Additionally, the UHF frequency coverage on the NX-340 is 70MHz.

#### ERGONOMIC DESIGN

The slim contours and ergonomic design of the NX-240/340 make it comfortable to hold, while the dimples on both sides ensure a firm grip.

#### 32 CHANNELS / 2 ZONES

The NX-240/340 can be used with two conventional zones, offering up to 16 channels per zone.

#### SWITCHABLE DIGITAL AND ANALOG DUAL MODES

The NX-240/340 is effectively two radios in one – analog and digital – operating on 12.5kHz in analog zones, and on 6.25kHz NXDN<sup>®</sup> in digital zones. For convenience, a PF key can be used to switch between zones.

#### 6.25kHz NXDN<sup>®</sup> DIGITAL CHANNEL

Digital communications are more spectrum-efficient and offer wider area coverage than analog.

#### NXDN<sup>®</sup> CONVENTIONAL

Compatible with NEXEDGE<sup>®</sup> Digital Conventional Mode, this radio offers 64 RAN (Radio Access Numbers) and individual & conference group calling to ensure expeditious communications.

#### HIGH SECURITY

Confidentiality in radio communications is a KENWOOD priority, and helping to maintain a high level of security in analog mode is a 16-code voice inversion scrambler, while robust NXDN<sup>®</sup> encryption is available in digital mode.

#### GPS CONNECTIVITY

The optional KMC-48GPS Speaker Microphone will enable GPS tracking applications to work with the NX-240/340. GPS data can be transmitted at programmed timing, or upon receiving a request.

#### OTHER FEATURES

DIGITAL: • Over-The-Air Alias (TX only) • Paging Call

- Individual Call & Conference Group Call 
  Status Messaging
  Remote Monitor
  Site Roaming
  Late Entry
  NXDN® ESN
- ANALOG: FleetSync<sup>®</sup>, MDC-1200, DTMF QT/DQT/2-tone
  Compander Squelch Level

GENERAL: • Multiple Scan • 4-Color LED (Blue / Red / Green / Orange) • 2 PF Keys • 16-Position Mechanical Selector

- Zone / Channel Number Voice Announcement VOX Ready • Emergency Call • Remote Stun/Kill • Lone Worker Alert (per channel) • Time Out Timer • Busy Channel Lockout
- Low Battery Warning 
  Battery Saver
  KPG-169D Windows<sup>®</sup>
  FPU
  Wireless Cloning
  Password Protection
  PTT Release
  Tone
  Minimum Volume
  Mic Sense
  MIL-STD-810 C/D/E/F/G
  IP54/55 Water
  & Dust Intrusion

### Options



## Main Specifications

		NX-240	NX-340		
GENERAL					
Frequency Range		136-174 MHz	400-470 MHz [M2] / 450-520 MHz		
Number of Channe	Number of Channels		32		
Zones		2			
Max. Channels per Zone		16			
Channel Spacing	Analog	12.5 kHz			
	Digital	6.25 kHz			
Operating Voltage		7.5V DC ± 20%			
Battery Life					
	ower battery saver:				
OFF/ON with KNB-45L		Approx. 10/12 hours			
OFF/ON with KNB-69L		Approx. 14/17 hours			
OFF/ON with KNB-53N		Approx. 8/9 hours			
OFF/ON with KNB-	29N	Approx. 8/9 hours			
Operating Tempera	ature Range	-30°C ~ +60°C (-22°F ~ +140F°)			
Frequency Stability	y	±2.0ppm ±1.0ppm			
Antenna Impedano	ce	50 Ω			
Dimensions	with KNB-45L, KNB-53N, or KNB-29N	54 x 122 x 35.3 mm 54 x 122 x 39.4 mm			
(W x H x D)	with KNB-69L				
Weight (net)	Radio only	165 g			
	with KNB-45L	281 g			
	with KNB-69L	296 g			
	with KNB-53N	351 g			
	with KNB-29N	361 g			

		NX-240	NX-340	
RECEIVER				
Sensitivity	Digital	0.25 μV 0.25 μV		
	Analog (12 dB SINAD)			
Selectivity	Analog	60 dB		
Intermodulation Distortion	Analog	60 dB		
Spurious Response	Analog	70 dB		
Audio Distortion		Less than 10%		
Audio Output		1 W / 12 Ω (Internal Speaker)		
		500mW / 8 Ω (External Output)		
TRANSMITTER				
RF Power Output	High / Low	5 W / 1 W		
Spurious Response	purious Response 70 dB		ЯВ	
FM Hum & Noise	Analog	40 dB		
Audio Distortion		Less than 10%		
Modulation		11K0F3E, 4K00F1E, 4K00F1D,		
		4K00F7W,	4K00F2D	

Specifications are subject to change without notice, due to advancements in technology. Measurements made per TIA/EIA-603 and Specification are typical

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Windows® is a registered trademark of Microsoft Corporation in the United States and other countries. AMBE+2™ is a trademark of Digital Voice Systems Inc.

NXDN® is a registered trademark of JVCKENWOOD Corporation and Icom Inc.

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## Applicable MIL-STD & IP

MIL Standard	MIL 810C Methods/Procedures	MIL 810D Methods/Procedures	MIL 810E Methods/Procedures	MIL 810F Methods/Procedures	MIL 810G Methods/Procedures
Low Pressure	500.1/Procedure I	500.2/Procedure I, II	500.3/Procedure I, II	500.4/Procedure I, II	500.5/Procedure I, II
High Temperature	501.1/Procedure I, II	501.2/Procedure I, II	501.3/Procedure I, II	501.4/Procedure I, II	501.5/Procedure I, II
Low Temperature	502.1/Procedure I	502.2/Procedure I, II	502.3/Procedure I, II	502.4/Procedure I, II	502.5/Procedure I, II
Temperature Shock	503.1/Procedure I	503.2/Procedure I	503.3/Procedure I	503.4/Procedure I, II	503.5/Procedure I
Solar Radiation	505.1/Procedure I	505.2/Procedure I	505.3/Procedure I	505.4/Procedure I	505.5/Procedure I
Rain	506.1/Procedure I, II	506.2/Procedure I, II	506.3/Procedure I, II	506.4/Procedure I, III	506.5/Procedure I, III
Humidity	507.1/Procedure I, II	507.2/Procedure II, III	507.3/Procedure II, III	507.4	507.5/Procedure II
Salt Fog	509.1/Procedure I	509.2/Procedure I	509.3/Procedure I	509.4	509.5
Dust	510.1/Procedure I	510.2/Procedure I	510.3/Procedure I	510.4/Procedure I, III	510.5/Procedure I
Vibration	514.2/Procedure VIII, X	514.3/Procedure I	514.4/Procedure I	514.5/Procedure I	514.6/Procedure I
Shock	516.2/Procedure I, II, V	516.3/Procedure I, IV	516.4/Procedure I, IV	516.5/Procedure I, IV	516.6/Procedure I, IV
International Protection					
Standard					
Dust & Water Protection	IP54/55*				

\*To meet MIL-810 and IP grade, the 2-pin connector has to be connected.

# JVC KENWOOD Corporation

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### ACCESSORIES INCLUDED

- KBH-10 Belt Clip
- Channel Stopper
- KNB-53N Ni-MH Battery Pack\*

KSC-43 Rapid Charger\*

\*NX-240M2/NX-340M3 only

