Liberate Your Mobile Radio™

X10DR®

LIBERATE YOUR MOBILE RADIO

Secure Wireless Microphone
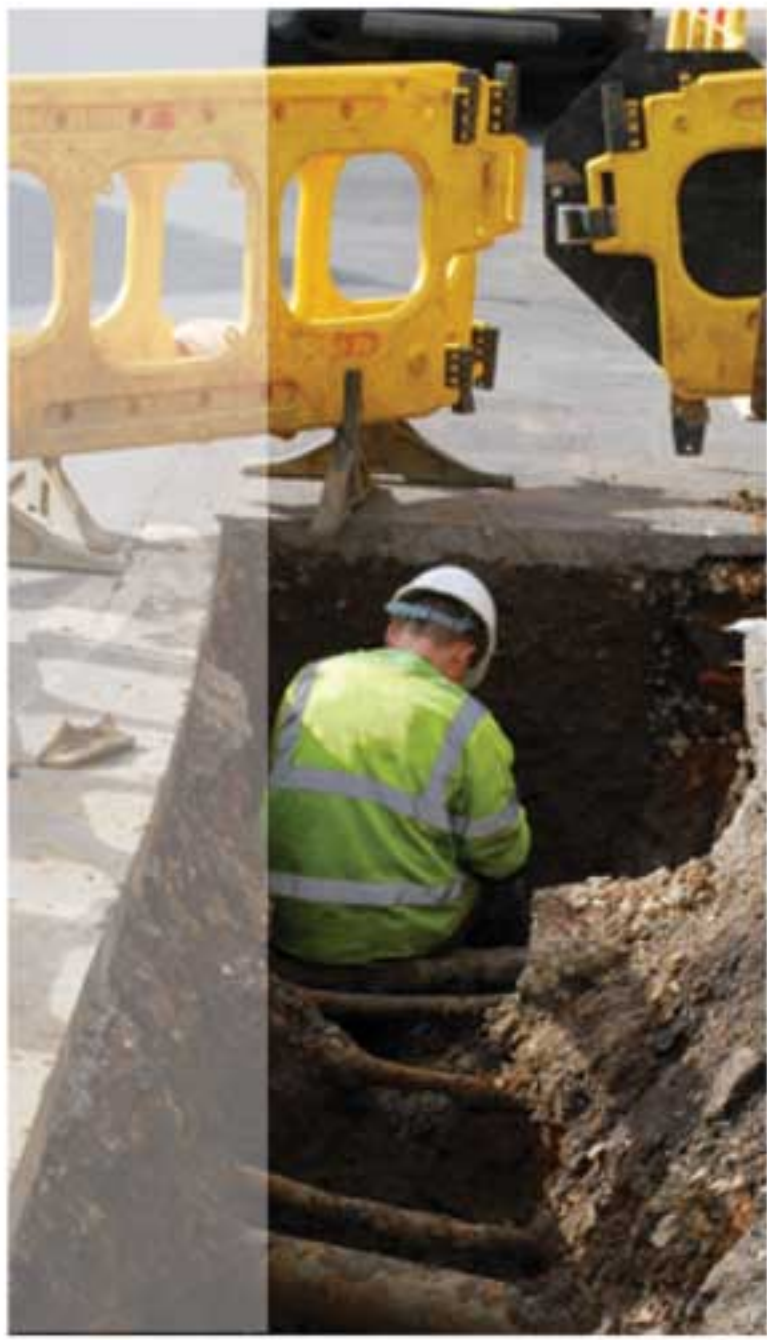
X10DR

**SINGLE/MULTIPLE
SEAMLESS INTEGRATION
WIRELESS TO 300+ METERS
MISSION CRITICAL DURABILITY
FH SPREAD SPECTRUM**

safem bile

WIRELESS PACIFIC™

A COSTLY HISTORY...

Since the creation of the first mobile two way radio, system designers and radio manufacturers have grappled with solutions to enhance user mobility when away from the vehicle. These solutions typically involved additional portable hand-held radios and significant additions of base station infrastructure; radio sites and complex remote receiver voting systems to back fill marginal coverage areas. Alternatively, some manufacturers developed cumbersome vehicle based mobile repeater systems where simplex portable transmissions are repeated through a mobile repeater back into the base station network. These systems required careful engineering, additional frequencies and critically complex contention management protocols to eliminate clashing from multiple vehicle repeaters at scene. Vehicle repeaters usually added system delays and required user intervention for managing which channels, mode or status to use in order to make them work. Both solutions came at a cost... a big cost!

TIME TO GET LIBERATED!

- **- TALK IN OR OUT OF THE VEHICLE**
- **- NEW ENHANCED EVR™ AUDIO**
- **- SIMPLE INTUITIVE DESIGN**
- **- MINIMAL USER TRAINING**
- **- LIGHTWEIGHT & RUGGED**
- **- SEAMLESS INTEGRATION**
- **- PATENTED INNOVATION**
- **- INTELLIGENTLY PRICED**
- **- SMART ACCESSORIES**
- **- SECURE ENCRYPTION**
- **- ALL DAY OPERATION**

Accessory ports
Hirose 6 pin connector
3.5mm mono jack

X10DR Secure Mic
(with XCFC)

**X10DR standard
shoulder mount**

Side profile

**X10DR in X-Ponder
charger cradle**

X10DR®

LIBERATE YOUR MOBILE RADIO

YOUR MOBILE

...up to 300 Meters.

SECURE WIRELESS COMMUNICATION
via your vehicle's mobile radio

Team Up

X10DR secure wireless microphones can be teamed up, when required, to provide dual, triple or more user operation from a single mobile radio. The smart node interface passes both transmit and receive audio to each X10DR ensuring each user hears both active parts of the communications sent over the host two way radio channel. Accessories are available to allow off-net talkaround capability.

Teams Remain Productive In Remote Work Environments

The vehicle mounted mobile radio is often the field worker's sole communication link to central command and other emergency units. However, when one team member needs to go back and wait at the vehicle, to provide or receive an update, operations slow or at worst, come to a stand still, losing time, productivity and placing lives at risk. X10DR is revolutionary technology, which allows remote teams to stay in communication with each other onsite or back to base, via their vehicle mounted mobile radio, up to hundreds of meters from the vehicle.

Duress Alarm

The X10DR secure wireless microphone naturally provide a duress button that can be used to activate the emergency mode within the host mobile radio. Field personnel can now call for assistance even while hundreds of meters from their vehicle.

Headset Operation

Models are available which include a 6 pin Hirose audio connector on the base that allows use of industry standard audio accessories. Additionally, a mono 3.5mm headphone jack on every X10DR provides for quiet secured communications when silence is golden.

Long Battery Life

The X10DR's 1200mA internal battery means you will typically achieve well in access of 24 hours operation between re-charges. Docking the microphone into its cradle allows 100% re-charge from completely flat in less than 4 hours or for a top up during a rest break.

WIRELESS PACIFIC™
...WHEN IT MATTERS

WORKING SMARTER...

At Wireless Pacific we understand that what a product does to improve your work practices and employee safety, is what really counts. This brochure provides an overview of the current available accessory range. The range of X10DR accessories continues to grow, as we support creative implementation seeking to streamline their operational effectiveness. You can be assured we will continue to ensure X10DR is the optimum solution for every out of vehicle mobile radio application.

Multiple Units

1 x XIB-TA
1 x XMC-***
2 x XIB-CK

XIB-TA Interface Box

The XIB-TA allows up to nine X10DR's to be connected to the one mobile radio. All units can hear each others communications as well as the conversations over the network. The interface unit connects to the host radio via the XMC series interface cable. The XIB-TA can be configured via an internal dip switch so that the secure mic's orange button allows "off net" talkaround capability OR the ability to trigger emergency, (but not both).

Each X10DR with EVR™ connects to the XIB-TA by way of short 50cm (20") XIB-CK connecting cables. Note: Antenna placement is critical and should be ideally placed >50cm (20") from each other to minimize inter-unit interference.

Talkaround

1 x XFB-TA
1 x XMC-***
2 x XIB-CK

XFB-TA Talk-Around Function Box

The XFB-TA allows up to nine X10DRs to connected to the one mobile radio and have local (talkaround) operation where users can talk "off net" AND the ability to trigger emergency.
To talk over the radio channel, the normal PTT button is used.
The XFB-TA can be configured via an internal dip switch so that:
A/ Pressing the secure mic's orange button for >1 second triggers emergency and you transmit in talkaround by pressing the PTT and the orange button together.
B/ Alternatively, the secure mic's orange button allows you to transmit in talkaround and you trigger emergency by pressing the PTT & orange button together for >1 second.
The XFB-TA also now features "find me" which allows an external switch (not supplied) to be fitted in the vehicle that causes an alert tone to sound in the X10DR's speaker should it get lost or should a user lose consciousness and need to be located.

The XFB connects to the host radio via a XMC series interface cable. Each X10DR with EVR™ connects to the XFB-TA via a XIB-CK cable. Note: Antenna placement is critical and should be ideally placed >50cm (20") from each other to minimize inter-unit interference.

Multiple Radios
Public Address

1 x XFB-MR
2 x XMC-***
1 x XIB-CK

XFB-MR Multi-Radio / Public Address Function Box

The XFB-MR can be used to allow 2 mobile radios to be connected to the one X10DR unit. An adjustable *unique marker tone** is attached to the tail of each secondary radio reception to inform users which radio's audio they just heard. Alternatively, the XFB-MR second port can be attached to the vehicle's **Public Address** system to allow the user to talk over the vehicle's public address system.
The XFB-MR unit can be configured by way of a dip switch so that:
A/ Pressing the secure mic's orange button for >1 second triggers emergency and you transmit over the 2nd radio by pressing the PTT and the orange button together.
B/ The secure mic's orange button allows you to transmit over the 2nd radio and you trigger emergency by pressing the PTT & orange button together for >1 second.

The X10DR connects to the XFB-MR by a XIB-CK connecting cable. The unit connects to the host radio/s/PA via two XMC series interface cables. * Not compatible with radios that cannot provide a COR/TOR/speaker unmute, etc output.

Lone Worker

1 x XFB-LW
1 x XMC-***
1 x XIB-CK

XFB-LW Lone Worker Function Box

The XFB-LW provides "lone worker" functionality to the X10DR. Dip switches allow custom parameter setting for activity time interval (time interval in which a user must momentary press their PTT or emergency button), as well as the user pre-alert tone interval (period where the X10DR user hears a warning tone that an emergency condition is imminent). Momentarily pressing the emergency button will reset the imminent emergency condition. Additionally, a 10 Second *"Live Mic"* feature can also be selected.

The XFB-LW connects to the host radio via an XMC series interface cable. The X10DR connects to the XFB-LW by a XIB-CK connecting cable.

XFB-DP Function Box

1 x XFB-DP
1 x XMC-***
1 x XIB-CK

The XFB-DP allows dual functionality of the orange side button. A short momentary press (<0.5Sec) can provide a unique switched ground to a connected mobile I/O port, while a full 3 second press can be used to drive the radio's emergency input or other desired function. Use of the XFB-DP requires custom wiring of XMC interface cables. Other functions include:
- A DB15 port with local on/off & emergency input/outputs.

If multiple XFB functions are required, contact your supplier for compatibility details.

Antennas

The **XMAK/XMPA** antennas has been specifically designed for use with X10DR and provides a unique omni-directional 360 degree pattern. These **ground independent multi-polarity** designs take advantage of 2.4GHz multi-path propagation characteristics by picking up signals in both vertical, horizontal and every other reflected plane. Both come with 5.2m (17') of low-loss LMR-200 (or equivalent) cable for optimum performance and a right angle mounting bracket. The XMAK has a N-Type base and is terminated with RP SMA male connector that can be easily mounted on roof racks, gutter mounts or any surface equipped to take the supplied N-male stainless steel bulk head connector. The XMPA multi-polarity antenna includes a NMO base for mounting on a vehicle roof and includes an unterminated RP-SMA male connector.

The **XMMA** is a unity gain magnetic mount 1/4 wave **ground independent** antenna and comes with 3.5m (12') of low loss LMR200 (or equivalent) coax cable terminated with a RP SMA male connector.

The **XBDA** is a 1 watt Tx / 9dB Rx gain bidirectional amplifier with 15cm (6") RG174 coax tail and a 50cm (20") lightweight DC power cable. It connects between the X-Ponder RF output and the roof mounted external antenna. (Use only where approved).

XMAK

XMAK comes complete with LMR-200 /equiv. coax 5.2m/17' terminated with a RP-SMA-M and 90° mount and N type-F bulk head (loose)

XMPA

XMPA comes complete with LMR-200 /equiv. coax 5.2m/17' terminated with an industry standard NMO roof mount antenna base, a 90° mount and a RP-SMA-M connector(loose)

XBDA

Complete with 15cm / 6" coax tail & 50cm / 20" DC power cable not shown

Use of the 1 watt XBDA is only approved in Canada, Australia, New Zealand, FCC regulated and other limited markets.

XMMA

Complete with LMR-200 / equivalent coax 3.5m/12' terminated with a RP-SMA-M connector

Audio Accessories

Wireless Pacific earpieces are designed for operational comfort day in - day out. We use soft resilient polymers to ensure fatigue free, reliability and hard wearing performance. Every X10DR includes a 3.5mm audio jack so communications privacy can be discretely maintained at all times.

Both the advanced and basic X10DR (with the XHC option) provide an *industry standard* compatible* Hirose® HR10-7R-6S type accessory port to allow connection to motorcycle helmets, lightweight / heavy duty headsets, lapel ear microphones, covert accessories and other radio application specific audio accessories. X10DR provides a user selectable mic gain function by the user pressing the volume Up button while powering up the secure mic, or pressing the volume down button when powering up to revert to standard sensitivity. * most types - pre-test before ordering if unsure.

A variety of headset interface cables are available, in addition to custom special order cable kits for large fleet implementations such as police motor cycle fleets. The WPSHC-HIR allows for simple connection to a X10DR from a range of industrial headsets like the WPSHD heavy duty headset that utilize the 5 pin mini-xlr connector. The WPSHC-NEX connects a WPSHD to a WPWLP-HIR wireless PTT adaptor.

The WPWLP-HIR** also allows use with 3M-Peltor™ hearing protection devices, the WPSHD and other headsets that use their 4 pole Nexus connector. It features a large PTT pad and a wireless PTT finger ring for ease of use in any situation. **Contact your Distributor before ordering this item.

Earpiece port
3.5mm mono jack

WPEH   WPEB   WPTEP

XHC - Audio Access. Port
Hirose® 6 pin connector

WPiTRQ-X10 WPTEP-TL WPEB-TL WPEH-TL   WPLWH-X10

WPSHC-HIR

or

WPSHD   WPSHC-NEX   WPWLP-HIR

ACCESSORIES

XMC-* version shown
XMC-XTL version shown

XMC-* Series

XMC-3M

XDB-25T(15T)

XIB-CK

XFB

XIB

XMDM

AMPS MOUNT

X10DR shown in desktop charger

XSMA

XSMC-RK

XVMC-RK

XRMC-RK

XRBC

XMCA

X10DRDC

X10DRSM-XU1/XX1

X10DRMD-XU1/XX1

Interface Cables

XMC-* X10DR Interface cable, 1.5m (5') length
*Order with suffix as follows:

XMC-GEN generic interface cable - unterminated	
XMC-C26 interface cable	- Suits Cassidian TMR DB26HD
XMC-G25 interface cable	- Suits GME P25 DB25
XMC-H26 interface cable	- Suits Hytera MD6/78X DB26HD
XMC-HXG interface cable	- Suits Harris HXG/M7300
XMC-i15 interface cable	- Suits Icom DB15HD
XMC-i25 interface cable	- Suits Icom DB25
XMC-K15 interface cable	- Suits Kenwood **K19** cable (15pin)
XMC-K15D interface cable	- Suits Kenwood NX720 DB15HD
XMC-K25 interface cable	- Suits Kenwood NX700/TK7180/5710
XMC-K25A interface cable	- Suits Kenwood DB25 TK690
XMC-XTL interface cable	- Suits Motorola XTL/APX (pins-no connector)
XMC-XTL-M interface cable	- Suits Motorola XTL/APX (includes connector)
XMC-M26 interface cable	- Suits Motorola 26 pin(Trbo)
XMC-M26T interface cable	- Suits Motorola 26 pin MTM5400
XMC-M16 interface cable	- Suits Motorola 16 pin
XMC-R15 interface cable	- Suits Relm BK DB15
XMC-R25 interface cable	- Suits Relm BK DB25
XMC-SRG interface cable	- Suits Sepura SRG3900
XMC-SRM interface cable	- Suits Simoco SRM9000 DB15
XMC-T15 interface cable	- Suits Tait TM70/80/9000 DB15
XMC-V15 interface cable	- Suits Vertex DB15HD
XMC-V25 interface cable	- Suits Vertex DB25
XMC-CUS interface cable	- Custom type/length - MOQ 200 (Contact your Distributor before ordering this item.)
XDB-15T adaptor cable	- DB15M to twin DB15F 20cm (8") tail
XDB-25T adaptor cable	- DB25M to twin DB25F 20cm (8") tail
XMC-3M extension cable	- 3m (10') interface extension cable

XIB	2/3 way interface box also order XIB-CK for each X10DR.
XIB-TA	Multi interface box for talkaround OR emergency (dipswitch) Requires XIB-CK for each X10DR.
XFB-TA	Talkaround & emergency function box with "find me" alert. Requires XIB-CK cable for each X10DR.
XFB-MR	Dual radio function box Requires XMC-* for each radio & one XIB-CK.
XFB-LW	Lone worker function box also order one XIB-CK cable.
XFB-DP	Dual press function box also order one XIB-CK cable.
XIB-CK	X10DR to XIB/FB cable, 50cm (20") length.

Vehicle Mounts

XMDM is a multi-position mounting bracket which allows the X10DR to be more easily mounted in today's "space scarce" vehicles. The versatile mount easily attaches to the mobile charger's rear mounting plate.

The X10DR's supplied rear mounting plate can be removed to reveal an "AMPS" standard 4 post mounting facility. Any of the *industry standard* mounting arms can then be utilized to mount the X10DR into the vehicle.

Desktop Chargers & Spares

X10DRDC-*	- Desktop charger includes AC/DC plug pack. * specify AC plug style: US(2P), UK, EU(2P), AU (2P)
XSMA	- Replacement secure microphone antenna.
XMCA	- Replacement mobile charger antenna.
X10DRSM-XU1	- Replacement basic secure mic. * order with XHC option if Hirose connector required
X10DRMD-XU1	- Replacement basic mobile charger.
X10DRSM-XX1	- Replacement advanced secure mic.
X10DRMD-XX1	- Replacement advanced mobile charger.
XSMC-RF	- Spring clip backcover retrofit kit.
XVMC-RF	- Velcro mount backcover retrofit kit.
XRMC-RF	- Removeable clip backcover retrofit kit.
XRBC	- Spare removeable belt clip for XRMC.

SERVICE AIDS

Test Box

Test speaker

XPS sensor

XSTB

XIB-CK cable

XTIC test cable

X10DRDC desktop charger
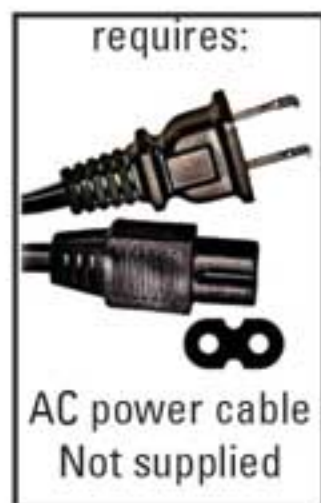
The XSTB service test box allows the functionality of a X10DR unit to be tested on a work bench.

The XSTB service kit includes:
- *a control interface unit*
- *a test speaker*
- *a XIB-CK cable*
- *a XTIC test interface cable*
- *a XPS power sensor*
- *X10DRDC desktop charger*

requires:

AC power cable
Not supplied

Control interface unit features:
A - LED that lights when PTT is pressed.
B - LED that lights when emergency is pressed.
C - Toggle switch to activate remote PTT.
D - Toggle switch to simulate radio COR operation.
E - Toggle switch to verify X10DR remote on/off operation
F - Toggle switch to activate an internal preset 1kHz tone
    generator to checkthe X10DR's Rx audio input.

XPK Programmer

requires:

AC power cable
Not supplied

The XPK programmer allows you to adjust a number of parameters on both the X10DR secure mic and X-ponder.

Parameters adustable include:
Talk permit tone, Emergency tone, PTT mute speaker, Fixed alert tone volume, Internal mic volume, External mic standard volume , External mic high volume, Remote monitor volume & Vox sensitivity.

The XPK programming kit includes:
- *XPK programming software.*
- *USB-SPI interface adaptor with USB cable.*
- *Secure mic programming cable.*
- *X-ponder programming cable with power supply.*

XTK Tracker

The XTK tracking software allows you to keep inventory and maintenance records of X10DRs fitted with NFC tags. Fields accessible include manufacture date, serial number, warranty, firmware version, service history and dealer details.
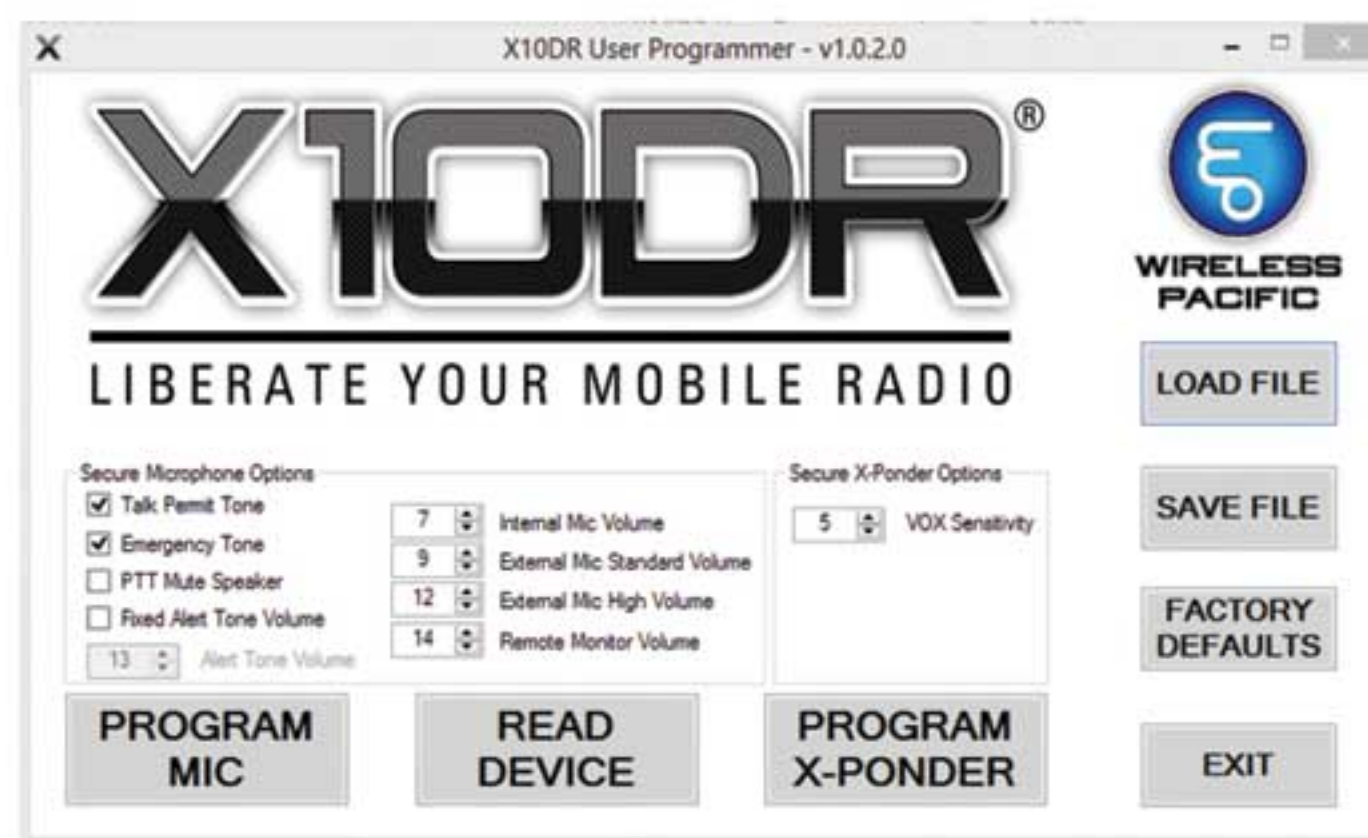The XTK service kit includes:
- *XTK tracking software and a USB NFC reader/writer.*

The tracking software allows you to enter last service date and battery replacement and also provides 6 free form fields in which you can enter whatever details you wish, e.g. installation date, vehicle registration, personnel assigned to, purchase details, operating division, etc. All information is stored and can be exported as a csv file which can be imported by MS excel, spreadsheets, etc.

WIRELESS PACIFIC™
...WHEN IT MATTERS

SPECIFICATIONS

X10DR®

Subject to change or improvement without notice

The equipment has been designed to meet the following global specifications:

Models:	X10DR-XU1 Standard / X10DR-XX1 Advanced
Dimensions:	88 x 28 x 63mm (spk mic) 80 x 80 x 60 (chgr)
	3.46 x 1.1 x 2.48" (spk mic) 3.15 x 3.15 x 2.36" (chgr)
Weight:	149 grams (spk mic) 125 grams (chgr)
	5.25 oz (spk mic) 4.4oz (chgr)
Frequency:	2.40-2.48GHz FH Spread Spectrum
Protocol:	802.15.4 based derivative
RF Power:	<100mW / X-Ponder <1W with XBDA
Battery Type:	3.7V @1200mA Lithium Ion
Battery Life:	>12 Hours @ 30% receive time/typical 24 hours plus
Encryption:	SAFER 64Bit std / 128Bit Advanced model
RF Connectors:	RP SMA Female
Rated Audio/Distortion:	>250mW @5% THD
Operating Voltage:	3.7VDC
Operating Temperature:	-20°C to +50°C / -4°F to +122°F
Shock & Vibration:	Mil Std 810 C/D/E/F
Humidity/Rain/Dust:	IEC529, IP55 (spk mic only)
Hirose Audio Port:	Standard XX1 model / option XU1 model
Type Acceptance:	CE, FCC, IC, Aust/NZ

FCC ID: I7OBT-24H / I7OBT-24D
IC:11443A-X10DRSM
IC:11443A-X10DRMD CE 0681 ① N13187

AT WIRELESS PACIFIC WE NEVER LOSE SIGHT THAT THE RIGHT RADIO COMMUNICATIONS SOLUTION IS ABSOLUTELY VITAL IN SECURING YOUR ORGANIZATIONAL OBJECTIVES. WE CONSTANTLY FOCUS ON HOW TO DELIVER A BETTER SOLUTION. ONE THAT PROVIDES CLEAN, EFFECTIVE OPERATIONAL RESPONSIVENESS WITH UNCOMPROMISING SAFETY.

X10DR in desktop charger

X10DR®
LIBERATE YOUR MOBILE RADIO

Works with:

ANALOG   TETRA
P25   DMR
dPMR digital NXDN™
MOTOTRBO™

WIRELESS PACIFIC™
...WHEN IT MATTERS

Master Distributor.

safemobile

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