



[invelco@invelco.com](mailto:invelco@invelco.com)



## MF/HF DIGITAL RECEIVER MOD. RX-630-A



- Frequency range 100KHz to 30MHz. (Resolution 1Hz).
- Total remote control via RS-232-C or Ethernet.
- Automatic or manual AGC.
- Programmable user scanner.
- Reception modes: USB, LSB, A3E, H3E, J2A, A1A, F1B, ISB.
- Fully digital.
- Touch screen 7".
- Control (touch or mouse).
- USB available (2).
- Frontal RF level indicator (analogic and digital).
- Drop-down menus on the screen.



1. Adaptive digital noise suppressor
2. Manual AGC to place reception threshold according to band noise
3. Squell for communication signal recognition on the channel  
Immune to any noise without threshold adjustment  
Robust and precise as VHF equipment  
Optimal for working in ROIP networks



# MF/HF DIGITAL RECEIVER MOD. RX-630-A

## TECHNICAL CHARACTERISTICS

### GENERAL SPECIFICATIONS

Frequency range	100KHz to 30MHz
Frequency resolution	1Hz
Frequency stability	0.1ppm. from 0° to 50°C
Antenna input impedance	50 Ω (BNC)
Sensitivity:	
Without Amplifier	0.7μV. for 10dB S/N
With Amplifier	0.35μV for 10dB S/N
Automatic gain control	From 3μV to 0dBm
Unwanted sideband suppression	80dB
Image frequency attenuation	100dB

### RF INPUT (RF GAIN)

Attenuator	-20dB
Attenuator	0dB
Amplifier	+10dB

### INPUT FILTERS (RF FILT)

All-pass	100KHz - 30MHz
Bandpass	2MHz - 30MHz
Bandpass pre-selector	1.5MHz - 30MHz

### Features Filters

Bandpass	
Attenuator in FRE <1.5MHz y >34MHz.....	40dB
Attenuator in band.....	0.3dB
Pre-selector	
Automatic tuning in the working frequency	
Selectivity -20dB ±20KHz of working frequency	
Attenuation in band 2.5dB	

### AUTOMATIC AGC FALL TIMES (AGC T)

8 levels	5ms to 10s
----------	------------

### MANUAL AGC THRESHOLD (AGC TH)

From 0 to 50% in eight steps, level	0 - 500μV
-------------------------------------	-----------

### WORK MODES (MODE)

USB, LSB, H3E, A1A,F1B, A3E, J2A, ISB	
---------------------------------------	--

### SELECTIVITY (FI FILT)

3KHz..... 130Hz .....3150Hz	AT=-96dB outside band
2,4KHz..... 300Hz.....2700Hz	AT=-100dB
1,8KHz..... 500Hz.....2300Hz	AT=-100dB
600Hz ..... 700Hz..... 1300Hz	AT=-100dB

\* Digital filters FIR 444 Tap, 24 bit, FS=12,5KHz

### MUTE

Silences the Rx completely

### WORKING FREQUENCY DIALING

Keyboard that appears on the screen by selecting the digits

### TUNING THE FREQUENCY MANUALLY (FREC)

Variation of any digits of the display

### NOISE SUPPRESSOR (DNR)

Minimal distortion of audio signals  
Up to 20dB of noise cancellation

### SQUELL (SQUELCH)

Digitally produced (DSP)  
Recognition of communication signals  
Independent of AGC levels and channel intensity  
Virtually immune to noise  
No threshold adjustment according to signal level  
Operation similar to VHF equipment  
Optimal for integration into ROIP networks

### MAIN

Main screen

### CHANNELS MEMORIZATION (CH Channel)

Number of channels	255
Memorization of all Rx parameters	

# MF/HF DIGITAL RECEIVER MOD. RX-630-A

## TECHNICAL CHARACTERISTICS

### Menu

#### New Channel

Allow you to assign channel numbers, name, SCAN type, time spent in the channel when scanning and in addition all Rx parameters

#### Channel Selection

Channel marking and press Channel Selection

#### Channel Delete

Select channel and press Channel Delete

#### Menu exit

Press Close X

### CHANNEL SCANNING (Scan)

Automatic

Manual

Channel selection to be scanned

Time spent in the channel (in memorization menu)

Stop scan with squelch or with external signal

### CONFIGURATION (Config)

Configures all control port parameters by RS232  
(For Ethernet consult factory)

### AUDIO OUTPUTS

Balanced lines	600Ω
Adjustable output level	
Maximum level	+3dBm
Number of lines	2 (líne A, líne B (ISB))
Speaker output	8Ω from 0 to 4W maximum
Headphone output	Z ≥ 8Ω
VOIP	Consult factory

### CONTROL

Bus RS232-C	
Speeds	19200/115200
Control parameters	All
Control by VOIP	Consult factory
Ethernet	Consult factory

### POWER SUPPLY

Power Supply	110/220Vac ±10% 50/60Hz
Consumption	40W

### ENVIRONMENTAL SPECIFICATIONS

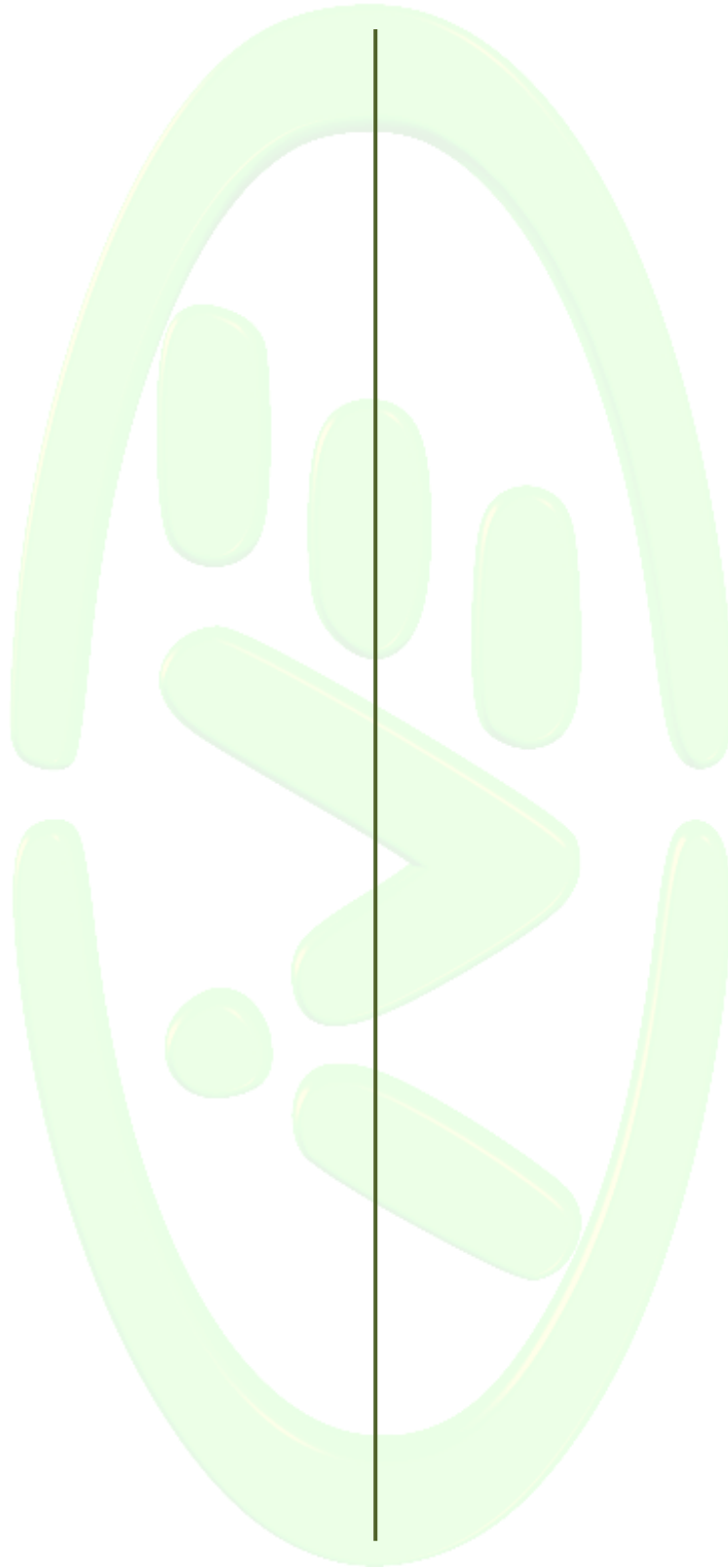
Operating temperature	-20°C to +50°C
Humidity	95%

### MECHANICAL SPECIFICATIONS

Height	19" Rack
Width	130mm (3u)
Depth	355mm
Weight	8,4Kg

**MF/HF DIGITAL RECEIVER MOD. RX-630-A**

**TECHNICAL CHARACTERISTICS**



**INVELCO S.A.**

Ronda de Poniente 15, 28760 Tres Cantos (Madrid) – España  
Tel: (+34) 918 032 444 Fax: (+34) 918 033 228  
www.invelco.com invelco@invelco.com

Page 4

