



Description

VoiceComDX (VCDX) is an intercom system intended for two way voice communication in industrial environments. System consists of central unit and intercom units, but there are some optional devices such as backup power supplies or external loudspeakers.

Thanks to the robust, water and dust resistant metal construction, it is suitable for most harsh environment operating conditions.

Basic system consisted of 8 intercom units, can be extended up to 64 intercom units by connecting several central units.

Voice processing and possibility of volume adjusting guarantees for audibility even in extreme surrounding noise situations. Intercom unit has metal bar for switching between speak and listen.

Features

- Microprocessor central unit with up to 64 galvanic isolated lines
- Intercom units in several versions
- Capability of individual, group or conference call
- Dispatcher configuration available
- Integrated 20W loudspeaker
- Intended for use in industrial temperature range
- Water and dust resistant metal construction case
- Vandal-proof keypad

Connections

Intercom system VCDX has all standard phone line functions, such as dialing, establishing and disconnecting call, with DTMF signalisation. Beside that, it has capability of forming group call, conference call and priority call.

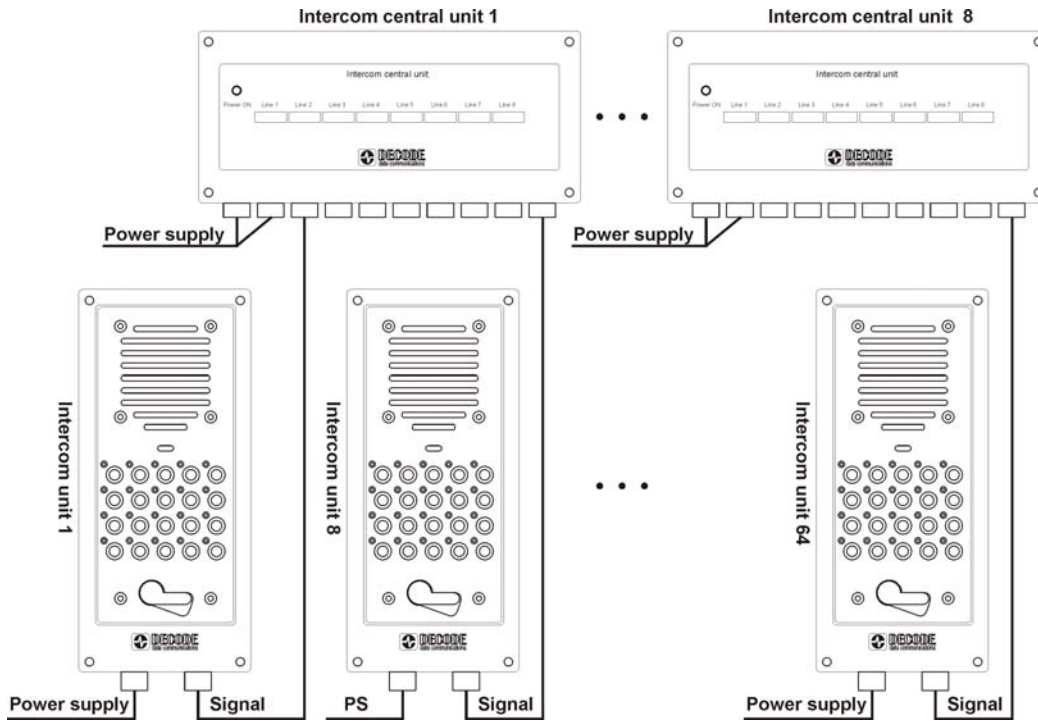
Special configuration is dispatcher system where one of intercoms is dispatcher unit. In this configuration intercom units can make a call only with dispatcher. Intercom units which are not invited in to conversation can not listen the call between dispatcher and other intercom unit.

Dispatcher unit has LED indication of intercom units status. It can establish and disconnect call with intercom units, and to invite them to conference call.

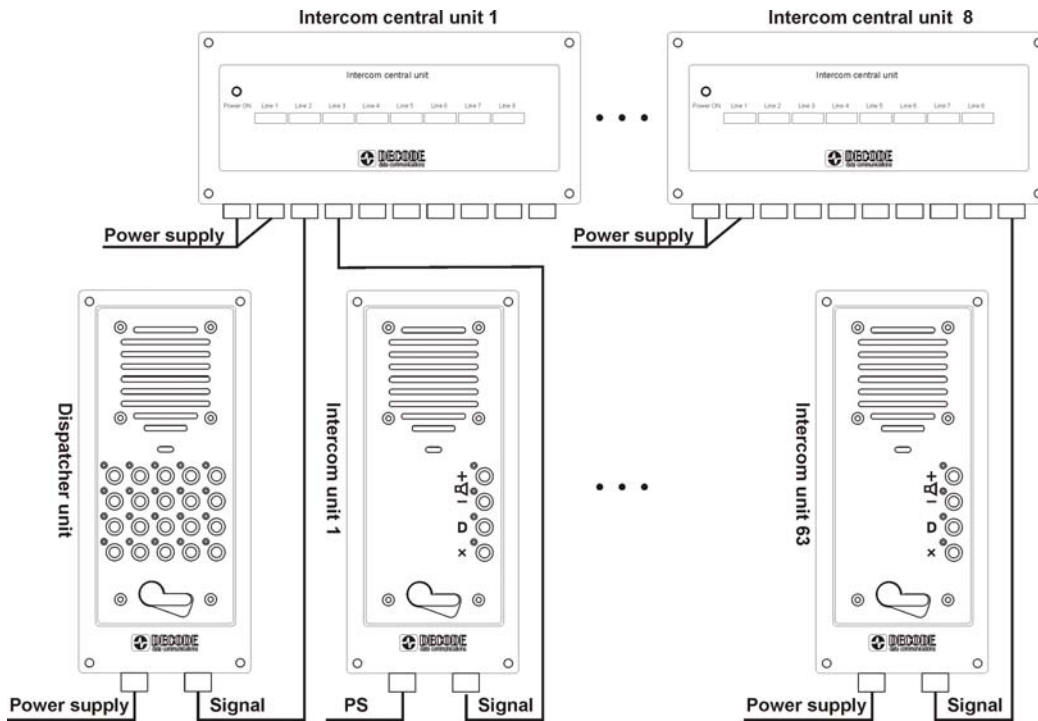


Central unit – basic platform

■ Wiring diagrams



Standard configuration of Intercom system VoiceComDX



Dispatcher configuration of intercom system VoiceComDX

■ Technical specifications

Central unit	
Number of intercom units	up to 64, with 8 connected central units
Line type	Analog phone line, 600 Ω, one twisted pair
Galvanic isolation	NF transformer, 600 Ω per line
Overvoltage line protection	Gas arrester and fuse T250mA, simetrical
Intercom line distance	up to 5000m
Ringing	Galvanic isolated per each line, 120Vpp
Remote intercom powering	Switching line polarity (in conference call)
Intercom power supply from central unit	Additional twisted pair 24Vdc/0.8A, with additional external power supply 24Vdc/150W
Protection	PTC fuse, 0.8A, per unit
Signalisation	Tone, DTMF
Link type	- Direct call between two units - Conference call
Frequency range	Standard phone channel 0.3-3.4kHz
Transmit and receive level	up to 0dBm at 600Ω
BUSY and DIAL tone signalisation level	-18dBm
Outer LED indication	Power ON, on closure
Inner LED indication	RUN, SIG, Tx, Rx, +24V, +5V, -5V; OffHook, Ring, Polarity / per channel
Power supply	Powerline 220V AC or 24V DC
Power consumption	Max 15W, all intercoms connected
Mounting	Wall or special platform mounting
Cable connecting	Through cable glands PG-11, on pluggable screw clamp
Connectors	Pluggable, 2.5mm ² , within case
Dimension	360 x 162 x 100 mm
Protection	IP65

Dispatcher unit	
Galvanic isolation	NF transformer, 600 Ω per line
Overvoltage line protection	Gas arrester
Dialling	Speed dialling, DTMF, one pushbutton per unit
Switching speak/listen	Pushbutton with metal bar
Amplifier power output	20W max
Volume adjustment	With two pushbuttons within set level inside case with potentiometer
Speech level adjustment	AGC (automatic gain control), noise suppression
LED indication	Status of 16 units, OffHook, Conference call, volume (MIN, MAX)
Power supply	Powerline 220V AC or 24V DC
Power consumption	Max 15W
Working temperature	-20° to +70 °C
Cable connecting	Through cable glands PG-11, on pluggable screw clamp
Connectors	Pluggable, 2.5mm ² , within case
Mounting	Wall or special platform mounting
Dimension	162 x 360 x 100 mm
Protection	IP65

Intercom unit	
Galvanic isolation	NF transformer, 600 Ω per line
Overvoltage line protection	Gas arrester
Dialling	Speed dialling, DTMF, one pushbutton for calling dispatcher
Switching speak/listen	Pushbutton with metal bar
Amplifier power output	20W max
Volume adjustment	With two pushbuttons within set level inside case with potentiometer
Speech level adjustment	AGC (automatic gain control), noise suppression
LED indication	Dispatcher status, OffHook, volume (MIN, MAX)
Power supply	Powerline 220V AC or 24V DC
Power consumption	Max 15W
Working temperature	-20° to +70 °C
Cable connecting	Through cable glands PG-11, on pluggable screw clamp
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