

Disclaimer in respect of statements and information. Nothing contained in this publication shall constitute any warranty, guarantee or liability for Oxytronic, its subsidiaries and affiliates but is for information purposes only. Accordingly, Oxytronic, its subsidiaries and affiliates neither expressly nor conclusively accept responsibility or liability for the actuality, accuracy and completeness of the statements and information contained in this publication.

06 / 2013

**OXY***Tronic*

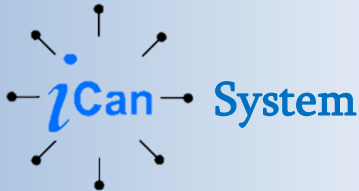
Oxytronic  
Z.I Les Paluds II  
520, Avenue de Jouques  
13400 AUBAGNE  
France

Phone : +33 4 42 82 42 27  
default@oxytronic.fr  
www.oxytronic.fr



Site Internet

# OXYTronic



## In-Flight Entertainment

iCan is a modular system. Your needs is at the heart of the iCan architecture.



## iCan Touch

The Touch Screen (4.3" or 5.7") allows users to easily control the functions.

The equipment supports supply voltages ranging from 12VDC to 36VDC for maximum compatibility with the aircraft electrical network.

The integrated Data Bus provides the ability to interact with modules located in the iCan UC, but also with other iCan Touch or iCan Screen 7".

Up to 124 iCan peripherals can be wired to the iCan system.

## Graphical User Interface full customizable

Oxytronic can design a wide range of interfaces in accordance with customer needs.

**1** - This example GUI enables centralized control of an iPod, video, lights, audio and other customizable functions according to customers needs.

**2** - The portrait and landscape modes are possible depending on the orientation of the equipment in the aircraft.

**3 & 4** - Other interfaces can be created as needed.



1

Examples  
of GUI



2

# Marks



# Road Map

Q4 - 13

S



iCan Monitoring



iCan Multimedia

Q3 - 13



iCan Touch V2

Q2 - 13



iCan UC V2

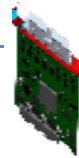
Q1 - 13



iCan Headset



iCan Phone



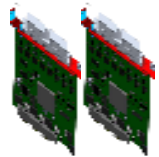
iCan Communication

Q3 - 12

Q2 - 12



iCan Moving Map 3D



iCan Mix V2



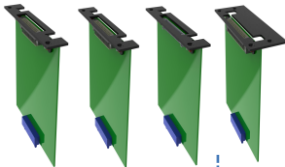
Q1 - 12

iCan Control V2

iCan Screen 7" Motorized V2

Q4 - 11

Q3 - 11



iCan PWM

iCan I/O

iCan Mix V1.5

iCan Control V1.5

Q2 - 11

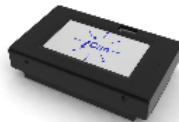
Q1 - 11

Q4 - 10

Q3 - 10



iCan Splitter



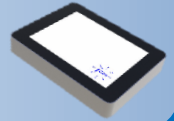
iCan Touch V1 USB

Q2 - 10

Q1 - 10



iCan Screen 7"



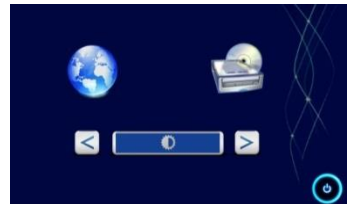
Technical Specification	iCan Touch V1	iCan Touch V2
Size	152mm x 95.5mm x 35.95mm	131mm x 102mm x 25mm
Weight	420g	500g
Rear Connector	CMM 220 26 PTS	- Nano Sub-d - ND2A 2 25 S SMVPG1
Power Supply	12VDSC to 36VDC	12VDC to 36VDC
Power Consumption	6.5W MA	6.5W MAX
Operational Temp. Range	-10°C to +70°C	-10°C to +70°C
Operating System	Windows CE 5.0	Windows 7 / Linux
Audio Interfaces	- 1 stereo output - 1 stereo input - 1 mic input	- 1 stereo output - 1 stereo input - 1 mic input
Communication Interface	- 1 Ethernet 10/100 Base T - 1 Can Bus - 1 USB 2.0	- 1 Ethernet 10/100 Base T - 1 Can Bus - 1 USB 2.0 - Wi-Fi 2.4 GHz / Bluetooth 4.0 - Projected Captive Touch
Processor	PXA320IT 520MHz	TEGRA 3 NVIDIA
RAM	128MB DDR RAM	1GB DDR RAM
Mass Storage	1GB NAND Flash	2GB NAND Flash
Data Loading	Via USB	Via USB
Qualification / Specification	RTCA DO-160E	RTCA DO-160E

### Coming Soon

- Operating system Linux and Android
- Multimedia processor for state of the art Graphic Animation



Examples  
of GUI

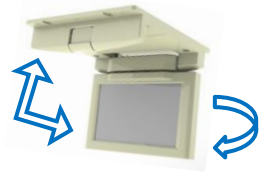


## iCan Screen 7"

The 7" Touch Screen allows users to display video contents and easily switch between different sources. Up to 124 iCan Screen 7" can be wired to the iCan IFE, the iCan Screen 7" is fixed on ceiling and accepts different video sources (3 digital video inputs and 3 analog video inputs). The iCan Screen 7" is a dual axis swivelling screen and can be folded into its slot as shown in pictures.

The iCan Screen 7 can also be furnished with manual or motorized opening.

It can be replaced by an iCan Touch.



## Graphical User Interface fully customizable

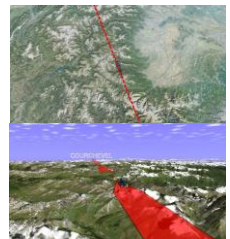
Oxytronic can design a wide range of interfaces in accordance with customer needs.

1 - This example HMI enables centralized control of videos, moving map and other customizable function according to specifications set by the customer.

2 - Visualisation of Oxytronic's 3D moving map.



Examples of GUI





Technical Specification	iCan Move
Size	140 x 150 x 150mm
Weight	5Kg
Connector	- 851 series - SubD
Power Supply	28V
Power Consumption	3 Amp MAX
Operational Temp. Range	-20°C to +70°C
Video Output	VGA
Communication Interface	- CAN Bus - ARNIC
Data Storage	250Go
Qualification / Specification	DO160E – MIL STD 810F

## Coming Soon

- Hdmi Video Output





## iCan Move

It's a geo-localization 3-D system completely customizable. You can see a 3-D scenery view of the ground movement in high resolution. Communication with the ARINC BUS of the aircraft. Complete interfacing with the iCan system (Views piloting, flying parameter...). VGA output compatible with the iCan Screen7'.



- 3-D System

- Compatible  
with iCan  
Screen 7"





Technical Specification	iCan Screen 7"
Size	280mm x 195.6mm x 45.25mm
Weight	1.750Kg
Rear Connector	- 3 LVDS (digital) - 1 VGA (analog) - 1S-Video (analog) - 1 composit (analog)
Power Supply	12VDC to 36VDC
Power Consumption	6.5W MAX
Operational Temp. Range	-10°C to +70°C
Communication Interface	- 1 Ethernet 10/100 Base T - 1 Can Bus - 2 USB 1 SD CARD Port
Processor	PXA320
Data Loading	Via USB
Qualification / Specification	RTCA DO-160E

## Coming Soon

- Operating system Linux and Android
- Capacitive Multi-touch
- Wi-Fi



Examples of GUI

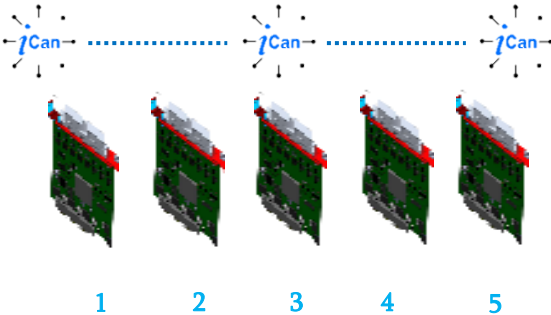
## iCan UC

This is the central unit of the iCan. It contains the modules mounted on a backplane. Basis, up to 7 different/same modules can be racked in the iCan UC.

### Modules

Oxytronic can design different modules in accordance with customer needs. Here order is a description of the off the shelves cards available. All modules are connected together by the CAN bus.

- 1 - iCan Mix.
- 2 - iCan Control.
- 3 - iCan Communication.
- 4 - iCan Monitoring.
- 5 - iCan Multimedia.



Different cards that can hold the iCan UC



Technical Specification	iCan Splitter
Size	188.60mm x 43.3mm x 105.3mm
Weight	460g
Connector	- SUB-D9 - SUB-D15HD - SUB-D15 - MDR 14
Power Supply	12VDC to 36VDC
Power Consumption	22W MAX
Operational Temp. Range	-10°C to +70°C
Video Input	- 1 VGA - 1 S-Video - 1 Composite
Video Output	10 digital LVDS
Communication Interface	1 Can Bus
Data Loading	Bootloader on Touch
Qualification / Specification	RTCA DO-160E

## Coming Soon

- Hdmi Video Output



## iCan Splitter

iCan Splitter has the function to convert and distribute an analogue input to 10 digital outputs to LVDS size. It consists of 3 analog VGA input, S-Video and Composite. Selecting the input source is made either via the iCan Touch or iCan Screen7" or using a switch.

The inputs are equipped with an automatic detection of the resolution and format of the video stream.

### iCan Splitter

- 3 analogs  
media inputs  
sources

- Data bus

-Power supply  
12VDC to  
36VDC

- 10 digitals  
media outputs  
sources





Technical Specification	iCan UC
Size	175mm x 158mm x 145mm
Weight	1,5Kg
Power Supply	28VDC, 100mA MAX
Power Consumption	80W MAX
Operational Temp. Range	-10°C to +70°C
Communication Interfaces	- 1 Can Bus I2C - 1 Ethernet 10/100 - Base T
Slots / Cards	7
Qualification / Specification	RTCA DO-160F

Technical Specification	iCan Mix	iCan Control
Power Consumption	28VDC, 500mA MAX	28VDC, 500mA MAX
Connector	SIM Série III	SIM Série III
Updating the firmware	Bootloader	Bootloader
Qualification / Specification	RTCA DO-160F	RTCA DO-160F

Technical Specification	iCan Multimedia	iCan Monitoring	iCan Com
Power Consumption	28VDC, 500mA MAX	28VDC, 500mA MAX	28VDC, 500mA MAX
Connector	SIM Série III	SIM Série III	SIM Série III
Updating the firmware	Bootloader	Bootloader	Bootloader
Qualification / Specification	RTCA DO-160F	RTCA DO-160F	RTCA DO-160F

# iCan Wireless Headset

## iCan Wireless Headset

### Main features

This product based on Sennheiser S1 digital headset model provides the possibility to suppress the physical link with the board without any performance loss.

The use of the ISM band at 2.4 GHz gives the ability to keep a high fidelity audio transmission in the helicopter cabin's harsh environment.

The use of a new differential microphone gives an improved rejection of the ambient noise during the intercom speech.

A bluetooth link is embedded into the base station, allowing an easy connection with any mobil device.

### iCan Wireless Headset

- 2.4 GHz ISM Band Frequency hopping carrier

- Sennheiser ANR System

- LIPO battery 6 hours autonomy

- High Fidelity Sound capability





Technical Specification	iCan Phone
Size	215 x 73 x 80mm
Weight	0.36Kg
Connector	Sub D 25 pts
Power Supply	28V
Power Consumption	0.25Amp MAX
Operational Temp. Range	-20°C to +70°C
Sound Input	150mV to 7V
Sound Output	250mV / 100ohms
Communication Interface	- CAN Bus - Bluetooth
Frequency range	ISM Band 2.4GHz
Qualification / Specification	RTCA DO-160E





## iCan Phone

This product is defined by the combination of a base connected to the transmission network of the helicopter and a cordless handset for HF connection of the telephone conversation with the base.

The basic features are those of a telephone with a number of features allowing fine tuning with the helicopter environment.

The main features of the database are:

- The connection to the audio board.
- The connection to the power supply board.
- Managing the mobile associated with the base.
- Compatibility with existing phones of the electrical and mechanical interface.

The mobile features are:

- The HF connection with a single specific basis.
- The management of a battery supplying sufficient autonomy.
- Volume management by two buttons.
- Management of the hook: hook.
- The management of PTT.

The iCan interface will enable the following features

- Information Management battery.
- Management intercom with other handsets.



## iCan Phone

- Led information

- Volume management by two buttons

- Managing won

- The management of PTT

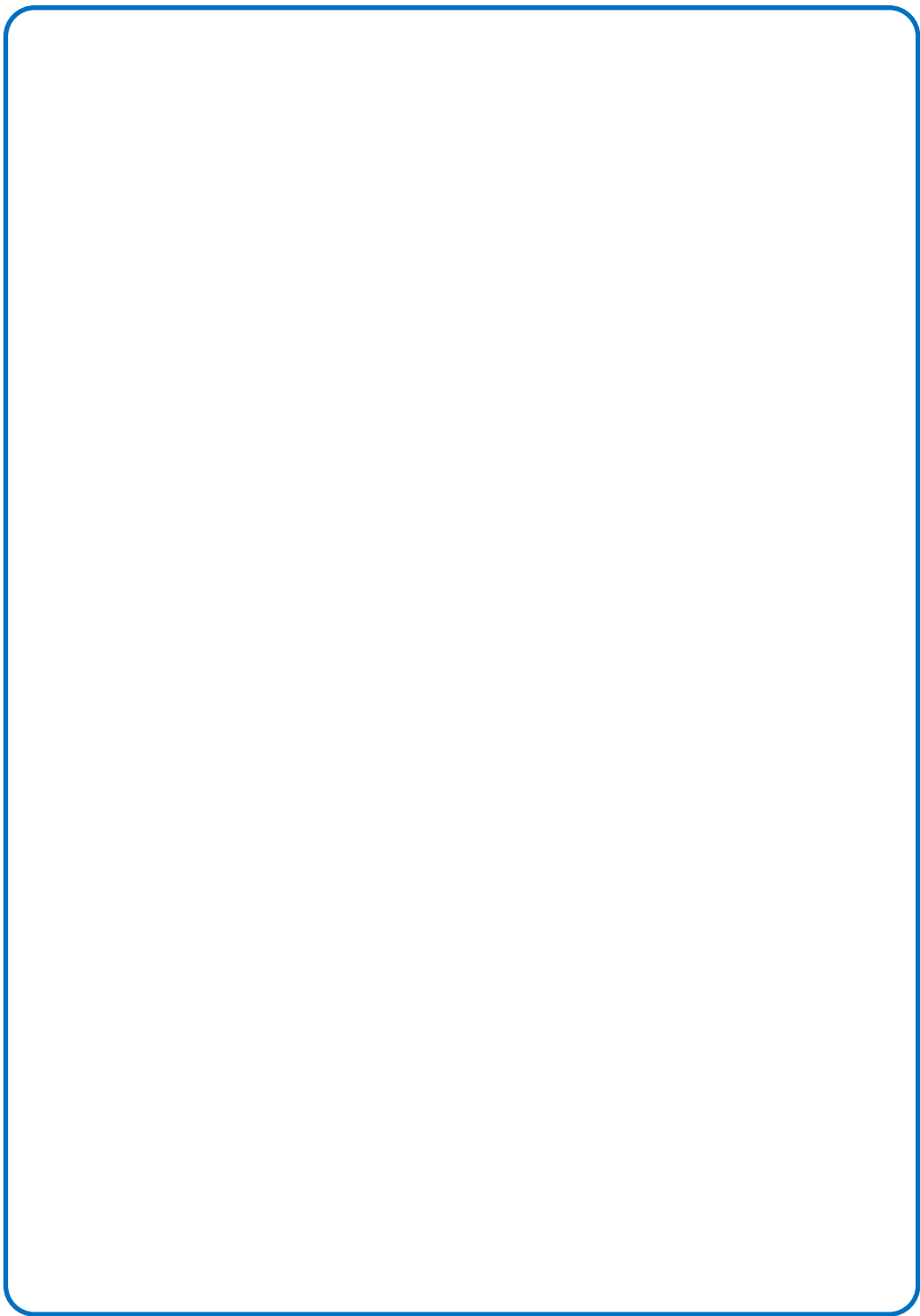
- Compatible edge Login

- Galvanic isolation sound channels

- HP Ringtone

- Management intercom with other headsets or handsets







Technical Specification	iCan Wireless Headset
Size	Headset 480g Base Station 210g
Connector base station	- Lemo 6 pins - Sub D 25 pins
Power Supply	12VDC to 36VDC
Power Consumption	2.5W MAX
Operational Temp. Range	-10°C to +70°C
Sound Input	HN HZ
High fidelity capability	20Hz – 16KHz
Microphone Output	HN HZ or BN VZ
Rf communication range	20 meters
Communication Interface	1 Can Bus for control  Bluetooth 4.0
Qualification / Specification	RTCA DO-160E

