

New Version 2020

To work from 25-50Km

Range max. 200Km



Radio Control
 Data Link
 Mavlink Telemetry
 AES 128 Encryption



Vehicles

DRONES, UAV, MULTIROTORS, RPAS, VANT, UAV,
 AIRCRAFT, HELICOPTERS, UUV, UGV, ROV, USV, ASV,
 CARS, BOATS, ROBOTS...



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**Remote controller XPAD3V2
and RXLRS Receiver**

**ISM band 863-950Mhz
or 433Mhz**

**Battery with duration of
approximately 10-13 hours**

**RC and Data Link data
with AES128 encryption**

Professional system prepared for all types of FPV applications with 1000mW RF Power and -116dBm sensitivity to work between 25-50Km (LOS) and with a maximum range of 200km.

NEW**Version 2**

**Improve the box structure of XPAD3V2.
Accessory to place a 7" FPV monitor or smart phone.
2 Side sliders with new hardware more precise.
Suicase IP67 to transport the entire system.**

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Ready to Place FPV Monitor or Smart Phone

Now you can place an 7" FPV monitor to visualize the video,
smart phone or tablet for Mission Planner software.



You can store the FPV monitor in the transport suitcase.
* FPV monitor isn't included, sold separately.



Is very easy to assemble
and disassemble
since it has two screws
and it can be
removed quickly with
your fingers without tools.

24 Programmable Buttons Switches Side Sliders



Customize

- 12 Buttons.
- 3 Encoders with push button.
- 2 MicroJoysticks of 4 positions + Enter.
- 2 Switches of 2 positions.
- 2 Switches of 3 positions.
- 2 Side Sliders (New Hardware).

You can make various configurations to your liking.

Hot / Fast Buttons & Leds



XPAD2V3 remote controller has configured hot / fast buttons that make it easier and faster to activate or deactivate the most common functions.

Trims, Dual Rate, TX Mode...

Several LED indicators of different colors so that the user can see the status of some functions: Bluetooth, Wifi, Radio Control, Link TX & RX, EXPO, DUAL...



Professional Desing

The XPAD3V2 has a robust and professional design, with a variety of buttons and controls to implement all the necessary functions.

Thought to work every day of the year.

In case of bumps, breaks or breakdowns it is easy to replace the parts.

Has a strong personality, the box has an ergonomic design that adapts correctly to the hands and has a robust 3 mm aluminum cover painted with black epoxy.

Radio Encrypted



The system uses AES 128 encryption, The Radio Control information and the data of the radiomodem (Data Link Transparent) or Mavlink Telemetry are encrypted.

Compatibility with autopilots and route software



The XLRS system is compatible with any autopilot that works with the Mavlink protocol: Pixhawk, Pixhawk Cube, APM, Mini Pix, etc.

Is also with any route software with mavlink protocol: Mission Planner, QGround Control, etc.



XPAD3V2 - Route Software

The XPAD3V2 remote controller can be connected directly to the PC via USB or via Bluetooth, from the bluetooth you can connect to any android device and control the mission from a mobile, tablet...

RXLRS - Autopilot or other devices

The RXLRS receiver connects directly to the autopilot through the MODEM port and can also connect the SPPM (Serial PPM) output to send up to 16 servos to control them from the autopilot.



Protective Transport Suitcase

New suitcase with IP67 certificate, waterproof and strong made of ABS, it offers high resistance and durability against shocks and impacts to transported devices.

Thanks to the adaptable foam of EPP, that is a high resilience material that helps absorb pressure and vibrations, the products is fully protected and motionless.

It has an extendable handle for facilitate transport.



The inside of the suitcase is carefully designed for your XLRS, with foam fillings with which your system will fit perfectly and be protected from impacts.

Its large capacity can store the XPAD3V2 remote controller, RXLRS receiver, FPV 7" monitor, antennas, charger, lanyard and other small components.

New Version 2020

CE 869Mhz
FCC 902Mhz
Custom...



TECHNICAL SPECIFICATIONS XLRS RADIO

Range of Work:	25-50Km.
Maximum Range:	200Km.
Frequency	CE: 869,4-869,65Mhz. FCC: 902-927,5Mhz. CUSTOM: 433Mhz, others...
Multi Band	XPAD3V2-89: 863, 866, 868, 902, 915, 950Mhz. XPAD2V3-43: 433Mhz.
Max RF power	CE: 500mW (+27dBm). FCC: 1000mW (+30dBm). CUSTOM: 1000mW (+30dBm).
Sensitivity max	-116dBm @50kb.
Modulation	50 or 100Kb. FHSS. 2-GFSK.
Stability	TXCO +-1ppm.
Encryption	AES 128 bits.
Connectivity	RC, Telemetry, USB, BLUETOOTH, WIFI, RCBus, SPPM, COM5.
Internal Battery	3.7V, 5000mAh.
Duration	10-13h.
Battery Charge	1A, USB (Micro-B).
Upgradable and Configurable:	DMDStudio Soft.

FEATURES

Nº models: No limits, no memory models needed.
LCD screen easy-to-read, high contrast Blue/White.
2 OLED screen Black/White for viewing data.
Adjustable stick lengths.
Possibility to change mode type (1, 2, 3 or 4).
Button ON and button OFF.
12 Configurable buttons.
3 Encoders with push button.
2 Micro Joysticks for trims and functions.
2 Switches with 2 positions.
2 Switches with 3 positions.
2 Side Sliders (New Hardware).
Alarms, low battery, fail safe, etc.
Ergonomic rubber grips.
Connector antenna: SMA-F.

Dimensions: 269 x 131 x 83mm.
Weight: 853g.

MAVLINK protocol, compatible with software:
Mission Planner, QGroundcontrol, etc.

It can be used in different RC models:
UAV, DRONES, VANT, RPAS, UUV, UGV, ROV,
MULTIROTORS, CARS, HELICOPTERS, BOATS, etc.

**Some product features
are optional.*

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Manufactured by DMD. Digital Micro Devices. ©2020

Radio Control & Transparent Data Link Receiver

CE 869Mhz
FCC 902Mhz
Custom...



Radio Control & Telemetry

Powerful and Safe with control

New Concept

Configuration of the mixes, button activation and assignment of encoders are performed in the RX and not in the TX XLRs as is usual in amateur RC systems.

TECHNICAL SPECIFICATIONS

Range of Work	25-50Km
Maximum Range	200Km
Frequency	CE: 869,4-869,65Mhz. FCC: 902-927,5Mhz. CUSTOM: 433Mhz, others...
Multi Band	RXLRS-89-200: 863, 866, 868, 902, 915, 950Mhz. RXLRS-43-200: 433Mhz.
Max RF power	CE: 500mW (+27dBm). FCC: 1000mW (+30dBm). CUSTOM: 1000mW (+30dBm).
Sensitivity max	-116dBm @50kb.
Modulation	50 or 100Kb. FHSS. 2-GFSK.
Stability	TXCO +-1ppm.
Encryption	AES 128 bits.
Voltage	5V. Min 4.5V. Max 6Vcc.
Consumption	Standby 70mA. Max. TX(500mW) 540mA@12mS.
Connectivity:	RC, Telemetry, USB, RCBus, SPPM, COM5, MODEM.
Dimension:	70,78 x 35,75 x 14,78mm.
Weight:	30g (Without ant.) 47g (With ant. 5dBi).

FEATURES

- Control max up to 16 CH RC.** Using the 7CH physical and the autopilot CH through SPPM in CH7.
- 8 Multifunction outputs** for RC servos.
- 1 SPPM / CPPM:** 8-16 (Config.) RC channels in CH7.
- 1 Micro USB:** Update and configuration.
- 1 RCBUS:** Connect XOSD for serial communication.
- 1 MODEM port:** MAVLINK Telemetry and transparent radio modem.
- 1 Red Led:** TX RF or Transmit packets.
- 1 Blue Led:** Link RF or Received packets.
- 1 Connector antenna RC:** SMA-Female.

Compatible with XLRs devices:
TX: BTSD1, XPAD2 V3, XPAD3 V3, GCSD4V2...
OSD: XOSDV2, XOSD3, XOSD3-2G4...

Hardware improvements:
 Microcontroller with double memory FLASH, RAM and Eeprom.
 Improved PCB, more protection in general.
 Improved box, more robust, screws on inserts.
 Internal protection against reverse polarity on + 5V servo connectors.
 EDS protection and RF Filters in USB.
 ESD protection (static) for all pins including servos.
 Pins servos protection against short circuits and overloads.

MAVLINK protocol, compatible with autopilots:
 APM, Pixhawk, PX4, etc.
No additional radiomodem is required.

Compatible with autopilots with S-BUS?
 Yes, depending on the autopilot you can connect directly to CH7 (SPPM) or you can use a PPM to S-BUS converter.

**Some product features are optional.*

KITXLRSD2V3-89 Remote Controller RC

Professional Radio Control System FPV & UAV

CONTENT

- 1- XPAD3V2-89, Remote Controller RC and Telemetry.
- 1- RXLRS-89-200, Professional receiver RC and Telemetry.
- 1- DCDC38/5VRC. DCDC adjustable step down module, INP 4-38V, OUT 1.25-32V(Adjustable), Out current 5A.
- 2- ANTGSM900, Omnidirectional antenna 868-928Mhz 5dBi.



ACCESSORIES

- 1- LAT54_SMAH/SMAM. Cable SMA-Female to SMA-Male, 540mm.
- 1- CABLE_SERVO_HH. Cable Servo RC Female to Female, 200mm.
- 1- CABLE_EXT_SERVO_MH. Extensor Cable Servo RC Male to Female, 300mm.
- 1- CARXP217. Charger for Remote Controller XPAD.
- 1- CABLE_PX4_RX. Adapted Cable for Pixhawk-RX, 300mm.
- 1- CABLE_USB/MICROUSB. Cable USB-A Male to Micro USB-B Male, 2m.
- 1- XLRS Neck Lanyard for remote controller.

KITXLRS D3V2-43 Remote Controller RC

Professional Radio Control System FPV & UAV

CONTENT

- 1- XPAD3V2-43, Remote Controller RC and Telemetry.
- 1- RXLRS-43-200, Professional receiver RC and Telemetry.
- 1- DCDC38/5VRC. DCDC adjustable step down module, INP 4-38V, OUT 1.25-32V(Adjustable), Out current 5A.
- 2- ANTGSM43, Omnidirectional antenna 433Mhz 5dBi.



ACCESSORIES

- 1- LAT54_SMAH/SMAM. Cable SMA-Female to SMA-Male, 540mm.
- 1- CABLE_SERVO_HH. Cable Servo RC Female to Female, 200mm.
- 1- CABLE_EXT_SERVO_MH. Extensor Cable Servo RC Male to Female, 300mm.
- 1- CARXP217. Charger for Remote Controller XPAD.
- 1- CABLE_PX4_RX. Adapted Cable for Pixhawk-RX, 300mm.
- 1- CABLE_USB/MICROUSB. Cable USB-A Male to Micro USB-B Male, 2m.
- 1- XLRS Neck Lanyard for remote controller.

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XLRS D3 V2 Manual:

Manual XPAD3V2.

Manual RXLRS.

Default configuration D2 System.

First steps (Quick guide).

XLRS connection diagrams.

DMDStudio Manual:



Learn more about:

Servos XLRS.

XLRS objects.

XLRS Radio Links and Radio Control. Basics notions.

Range, RSSI, Noise in environments UAV – Drones.

Range Test XLRS.

RF Band ISM-ICM.

* The information and images shown in this datasheet, are only referential and may differ from the final product.

* The ranges shown are estimates and in optimal conditions.