

XTBA SMART MERGE 2:1 DIN

ISSUE A 23/03/15

XTBA

Unit 2 The Old Curatage
The Street Caston NR17 1DD
☎ 44 (0) 208 882 0100
email dmx@xtba.co.uk www.xtba.co.uk

Smart merge 2:1 D - Page 1 of 3

Introduction: Smart merge 2:1 DIN

This is the same as our rack mounted Smart Merge, just packaged in a DIN rail case.

OPERATION

XTBA Smart Merge will combine two DMX512 input signals to a single DMX512 output signal. Each dimmer channel from the two input signals is compared and the higher channel level will be outputted. The second DMX input's start address may be altered by setting the offset address on the three front panel code switches. In addition the unit can be set for either or both inputs to hold the last frame received in the event of data loss.

The two DMX512 signals to be merged are connected to inputs one and two. Both inputs are terminated. The output is connected to DMX512 out and to the equipment to be controlled. Input one will pass the DMX data straight through the unit. Input two allows for the input start address to be moved relative to input one.

When power is applied to the unit the red SYSTEM OK LED will be lit. The DMX data leds will blink on/off if hold last frame is set (see Hold Last Frame settings). When valid DMX512 data is being received the input channel green LED will light.

By use of the three code switches on the front panel it is possible to move the start address of input two. This will prove to be most useful when two control systems need to be joined together e.g. a lighting control and a moving light control. If the lighting control for example has 250 channels, by setting the address on the front panel to 251 channel one/input two will appear at 251 on the merged DMX output. Any overlapping channels will be treated as highest takes precedent e.g. the highest value will be outputted.

SETTING/CLEARING HOLD LAST FRAME

The unit can be set to hold the last valid data frame received on either or both inputs as follows:

With the unit turned off set the three offset switches as follows and then power up the unit.

- 999 Enable hold last frame on both inputs
- 907 Enable hold last frame on input one only
- 908 Enable hold last frame on input two only
- 000 Clear hold last frame – unit default**

Following the power up the setting will be stored in non volatile memory. The offset error led will flash as the unit now has an invalid setting, so change the offset switches to the desired number.

On normal power up inputs with hold last frame set will blink on/off just to let you know.

OFFSET ERROR LED

The offset error led will be lit if the unit detects any levels that are being lost. For example if the offset switches are set to 100 and the unit sees a level on channel 500 on input two the led will light as that channel is beyond the merged range.

The offset error led will flash if the address switches are set to any number above 512.

POWER SUPPLY

The mains input to the transformer is via a PCB mounted 2A a/s fuse. An Earth terminal is provided as a loop through. The unit does not need its own earth.

Technical Specifications

Protocol	DMX512 1990 / DMX512 1986
Maximum Update Rate:	44 updates per second
DMX Out	Break 100us, MAB 10us.

General Information

This product may only be used for controlling dimmers and moving lights. It must not be used in DMX512 applications for stage machinery or pyrotechnics. Using the product out of these specifications will remove all responsibility from the supplier.

CE Declaration of conformity

XTBA declares that the following equipment meets the requirements of the EMC Directive 89/366/EEC. WEE/FC2753ZS

CE



XTBA

Unit 2 The Old Curatage

The Street Caston NR17 1DD

☎ 44 (0) 208 882 0100

email dmx@xtba.co.uk www.xtba.co.uk