

# DM62-5

6 Channels Digital

Dimmer Pack

# **User's Manual**

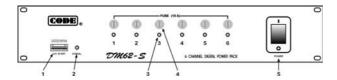
CODE ELECTRONIC CO., LTD. http://www.codelight.com

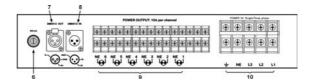
Welcome to use *CODE DM62-S* Digital Dimmer Pack. *CODE DM62-S* meets DMX-512/1990 standard digital control signal. It is suited for using with a console that generates DMX-512/1990 control signal, thereby them constitute a digital light dimming control system. DM62-S's EMI is very low. So greatly, it is used for light dimming in TV studios, theatres, troupes, danceries, etc.

# 1. Specifications

Dimming Channel:	6 Channels				
Load Power:	2kW max. Per. channel (phase voltage 220Vrms)				
Control Signal:	DMX-512/1990 standard digital signal				
EMI Restraining:	High efficiency EMI Choke				
Cooling:	Fan				
Fuses:	Fuse Tube, 10 Amps				
Power Supply:	Three-phase/single-phase, 220V~ 50-60Hz)				
Standby Wasting:	27 Watts approx				
Volume:	482mm (W) x 88mm(H) x 290mm(D) (19"standard, 2U)				
Weight:	8.9kg				

#### 2. Front Panel And Rear Panel Devices





- 1. DIP encoder (setup DMX-512 inception address number/select data memory mode)
- 2. DMX-512 signal input pilot light
- 3. Channel output state pilot light
- 4. Fuses for output channels
- 5. Switch for operation power supply
- 6. Fuse for operation power supply
- 7. Connector for DMX-512 digital signal thru output, XLR-D3F
- 8. Connector for DMX-512 digital signal input, XLR-D3M
- 9. Terminals for 6-channel loads
- 10. Terminals for power supply net input (3-phase 4-wire and earth)

# **CONNECTION & OPERATION**

### 3. Contents Checking

One CODE DM62-S set and one User's Manual in the package.

# 4. Power Supply Connecting

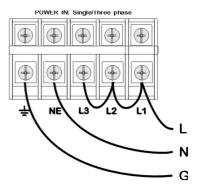
This set is suitable to three-phase or single-phase Power supply.

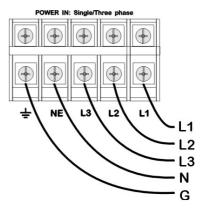
#### 4.1 Single-Phase Power Supply Connecting

Connect the "live wire" of single-phase power supply to "L1", "L2" and "L3" all together; connect the "neutral wire" to "NE"; and connect the "safe earth" to "GND".

#### 4.2 Three-Phase Power Supply Connecting

Connect the "A/B/C live wires" of three-phase power supply to "L1", "L2" and "L3" respectively; connect the "neutral wire" to "NE"; and connect the "safe earth" to "GND".

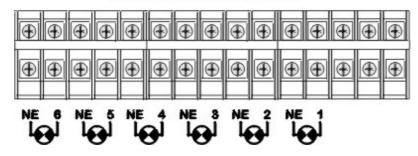




#### 5. Loads Connecting

Connect the "live wire" of every circuit to the output terminal of *CODE DM62-S* respectively; connect the "neutral wires" of the circuits to "NE" terminals of this set. The connection mode is showed as follow sketch map.

#### POWER OUTPUT: 10A per channel

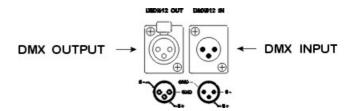


# 6. Connecting With A Console

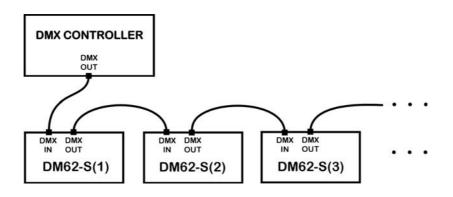
CODE DM62-S Digital Dimmer Pack can be controlled by a console that generates DMX-512 digital signal. The control signal connection mode is showed as follow sketch maps:

#### 6.1 DMX signal connectors

Pin No.	Connection		
1	GND		
2	Signal -		
3	Signal +		



### 6.2 Connecting With A Console



# 7. Confirming DMX-512 Local Inception Address Number

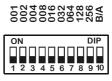
DIP switch's position function: "ON", obtains its bit value; "OFF", its bit value is "0".

The relation between bit value of DIP encoder and DMX channel code keeps to the formula below:

[ The sum value of 1~9bit switches of DIP encoder ] + 1 = DMX inception address number

#### Bit value of DIP switches

DIP bit	1	2	3	4	5	6	7	8	9
Value	1	2	4	8	16	32	64	128	256



CH START

#### For example:

A console connects with four DM62-S dimmer sets. Every set ties up number of 6 channels. Thus, we must confirm DMX inception address number of every set by DIP switches, as follow table:

Dimmer	1	2	3	4	
Channel Start	1	7	13	19	
	001 002 004 008 016 032 032 064 128 256 A/B	001 002 008 016 032 064 128 7/B	001 002 008 016 032 032 064 128 256 A/B	001 002 008 016 016 032 064 128 256 A/B	
DIP Switch	ON DIP	ON DIP 1 2 3 4 5 6 7 8 9 10	ON DIP 1 2 3 4 5 6 7 8 9 10	ON DIP 1 2 3 4 5 6 7 8 9 10	
	CH START	CH START	CH START	CH START	

#### 8. Confirming Output State Memory Mode

Confirming the output state memory mode of *CODE DM62-S* by No.10bit switch of DIP encoder. When the position of No.10bit switch is "B"(moved at downside), this set is in data memory state. It means of DMX-512 control signal broken off abruptly, the current output state of every channel is not changed. Whereas, the position of No.10bit switch is "A"(moved at upside), the data memory function is closured. It means of DMX-512 control signal broken off abruptly, then every channel outputs zero.

### Operation power Supply Switch ( "POWER" )

This switch turns on or turns off the operation power supply which powers for MPU unit of *CODE DM62-S* Digital dimmer pack. (I: turn on, O: turn off)

When the switch is turned off, the inner thyristor circuits are lived all the same. In this time, do not open the casing of the set for preventing electric shock!

#### 10. DMX-512 Signal Input Pilot Light ("SIGNAL")

The pilot light is twinkling while receiving normal DMX-512 signal. Otherwise, it is blank.

While it is blank, please check the console, the cable, the connectors, the polarity of DMX512 signal.

#### 11. Channel Output State Pilot Light

The brightness of every pilot light denotes its channel output intensity.

## 12. Output Circuit Protecting

A fuse is in every output circuit of *CODE DM62-S*. Every fuse is 10Amps. While the output over-current or the output terminals be short-circuit, the fuse will be melted down immediately for protecting this channel.

After cutting off power supply, replacing the fuse that is the same specification.

#### 13. The Set Running

Connecting and setting up DM62-S dimmer correctly, turning on the operation power supply of the console and this set, then system starts running. We may change the local inception address number and/or output state memory mode by DIP switches at any moment.

# M E M O