INVOLIGHT

LEDMH**90**S

USER MANUAL

TABLE OF CONTENTS

Maintenance---------- 1
Statement---------- 1
Attention Item ---------- 2
Product introduction ---------- 2
15 Control Channel ---------- 3
10 Control Channel ---------- 7
That Control Display----------10
Fault conditions----------14

Maintenance

1. Please keep the light in dryness and avoiding use in wet place.
2. Using intermittently can be extended the life.
3. Attention to clean the fan and lens usually in order to get the ventilating effects and lighting effects better.
4. Please do not wipe the crust using organic menstruum for avoid to damage the product.

Statement

The product has well capability and intact packing when leave factory. All of the user should comply with above warning item and manual, any misuse cause of the damages are not included in our guarantee, and also can not be responsible for any malfunction & problem owing to ignore the manual.

Please forgive that we will not be notice for technical change.

Attention Item

1. For guarantee the life of product, please don't put it on the wet place and also not use it in the place over 40 degree.
2. Please don't lay the product on the unfixable or shakable place.
3. Ask for the professional to maintain the product in order to avoid the danger of get an electric shock.
4. Power supply should not be changed over ±10% while the light is using, it will be decreased the life of lamp if the power is too high, but it will be influenced the luminosity if the power is too low.
5. Please look round the manual for ensure the product can be used normally.

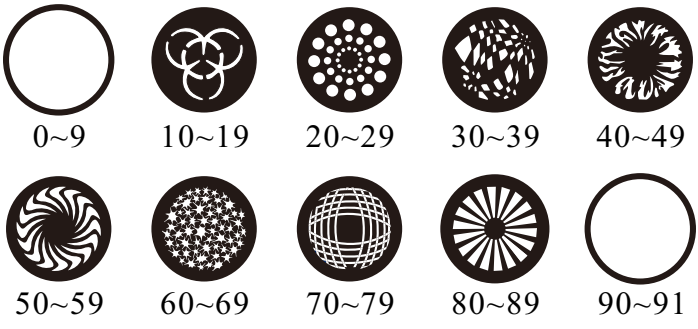
Product introduction

Power supply: AC100-240V, 60/50Hz
Power consumption: 200W
Fiting lamp: 120W
DMX-control-channels: 15 or 10
Colour-wheel 1: 7 single filter + White + Rainbow-effect
Gobo-wheel 1: 8 staic gobo (with gobo shake) + open + Rainbow-effect
Gobo-wheel 2: 7 rotating gobo + open + Rainbow-effect
Shuttle: Flash rate: 0-20Hz
Effect wheel: 3-face prism (controllable rotating speed, adjustable positive & negative)
Focus: motorized focus
Dimmer: 0~100% mechanic dimmer
Iris： 0~100% mechanic adjustable
Maximum PAN-movement: 540° , self-correcting
Maximum TILT-movement: 270° , self-correcting
8bit / 16bit PAN/TILT movement resolution
Master/Slave ativated by sound at pre-programmed function.

15 Control Channel

Accept DMX512 control channel, detail as follow:

Channel	DMX-value	Feature
1 PAN	0~255	540°
2 TILT	0~255	270°
3 PAN 16bit	0~255	PAN spinner
4 TILT 16bit	0~255	TILT spinner
5 X/Y Speed	0~255	PAN / TILT controllable speed with decreasing
6 Color Wheel	0~7	White
	8~15	Blue
	16~23	Yellow
	24~31	Pink
	32~39	Green
	40~47	Red
	48~55	Light Blue
	56~63	Orange red
	64~66	White
	67~78	From White To Blue
	79~92	From Blue To Yellow
	93~107	From Yellow To Pink
	108~120	From Pink To Green
	121~136	From Green To Red
	137~152	From Red To Light Blue
	153~170	From Light Blue To Orange red
	171~212	Positive rainbow effect with increasing speed
	213~255	Negative rainbow effect with increasing speed
7 GOBO Wheel	0~9	10~19	20~29	30~39
	40~49	50~59	60~69	70~79

Channel	DMX-value	Feature
7 GOBO Wheel	80~99	Gobo 1 Shake with increasing speed
	100~119	Gobo 2 Shake with increasing speed
	120~139	Gobo 3 Shake with increasing speed
	140~159	Gobo 4 Shake with increasing speed
	160~179	Gobo 5 Shake with increasing speed
	180~199	Gobo 6 Shake with increasing speed
	200~219	Gobo 7 Shake with increasing speed
	220~237	Positive rainbow effect with increasing speed
	238~255	Negative rainbow effect with increasing speed
8 GOBO Rotation	0~10	Stop
	11~127	Gobo rotate index
	128~191	Positive rainbow effect with increasing speed
	192~255	Negative rainbow effect with increasing speed
9 Static GOBO Wheel		
	92~107	Static Gobo 1 Shake with increasing speed
	108~123	Static Gobo 2 Shake with increasing speed
	124~139	Static Gobo 3 Shake with increasing speed
	140~155	Static Gobo 4 Shake with increasing speed
	156~171	Static Gobo 5 Shake with increasing speed
	172~187	Static Gobo 6 Shake with increasing speed
	188~203	Static Gobo 7 Shake with increasing speed
	204~219	Static Gobo 8 Shake with increasing speed
	220~237	Positive rainbow effect with increasing speed
	238~255	Negative rainbow effect with increasing speed

Channel	DMX-value	Feature
10 Shutter	0~7	Close
	8~22	Open
	23~85	Strobe effect with increasing speed
	86~100	Open
	101~165	Pulse strobe
	166~180	Open
	181~245	Random Shutter
	246~255	Open
11 Dimmer	0~255	0~100% mechanic dimmer
12 Focus	0~255	Motorized focus, zoom out to zoom in
13 Prism	0~7	White
	8~15	Stop, static prism effect
	16~127	Rotation prism effect Positive rainbow
	128~239	Rotation prism effect Negative rainbow
	240~255	Stop, static prism effect
14 Channel function	0~9	Reserved
	10~14	Blackout while pan/tilt moving
	15~19	Blackout while color wheel moving
	20~24	Disabled blackout while pan/tilt/color wheel moving
	25~29	Blackout while gobo wheel moving
	30~34	Disabled blackout while pan/tilt/gobo wheel moving
	35~39	Disabled blackout while color wheel/gobo wheel moving
	40~44	Disabled blackout while pan/tilt/color wheel/gobo wheel moving
	45~49	Reset pan
	50~54	Reset tilt
	55~59	Color Wheel 1 disk reset
	60~64	Reserved
	65~69	Gobo disk reset
	70~74	Reset Gobo rotation
	75~79	Reset Gobo 2
	80~84	Reset Focus
	85~89	Reset Prism

Channel	DMX-value	Feature
14 Channel function	90~99	All channel reset
	100~129	Reserved
	130~192	Run random pnogramme
	193~255	Sound control
15 Effect	0~9	Reserved
	10~19	Effect 1
	20~29	Effect 2
	30~39	Effect 3
	40~49	Effect 4
	50~59	Effect 5
	60~69	Effect 6
	70~79	Effect 7
	80~89	Effect 8
	90~99	Effect 9
	100~109	Effect 10
	110~119	Effect 11
	120~129	Effect 12
	130~139	Effect 13
	140~149	Effect 14
	150~159	Effect 15
	160~169	Effect 16
	170~179	Effect 17
	180~189	Effect 18
	190~199	Effect 19
	200~209	Effect 20
	210~219	Effect 21
	220~229	Effect 22
	230~239	Effect 23
	240~249	Effect 24
	250~255	Effect 25

10 Control Channel

Accept DMX512 control channel, detail as follow:

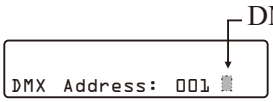
Channel	DMX-value	Feature
1 PAN	0~255	540°
2 TILT	0~255	270°
3 Color Wheel	0~7	White
	8~15	Blue
	16~23	Yellow
	24~31	Pink
	32~39	Green
	40~47	Red
	48~55	Light Blue
	56~63	orange red
	64~66	White
	67~78	From White To Blue
	79~92	From Blue To Yellow
	93~107	From Yellow To Pink
	108~120	From Pink To Green
	121~136	From Green To Red
	137~152	From Red To Light Blue
	153~170	From Light Blue To orange red
	171~212	Positive rainbow effect with increasing speed
	213~255	Negative rainbow effect with increasing speed
4 GOBO Wheel	0~9 10~19 20~29 30~39 40~49 50~59 60~69 70~79	
	80~99	Gobo 1 Shake with increasing speed
	100~119	Gobo 2 Shake with increasing speed
	120~139	Gobo 3 Shake with increasing speed

Channel	DMX-value	Feature
4 GOBO Wheel	140~159	Gobo 4 Shake with increasing speed
	160~179	Gobo 5 Shake with increasing speed
	180~199	Gobo 6 Shake with increasing speed
	200~219	Gobo 7 Shake with increasing speed
	220~237	Positive rainbow effect with increasing speed
	238~255	Negative rainbow effect with increasing speed
5 GOBO Rotation	0~10	Gobo rotate index
	11~127	Positive and Negative Rotation with increasing speed
	128~191	Positive Rotation with increasing speed
	192~255	Negative Rotation with increasing speed
6 Static GOBO Wheel	0~9 10~19 20~29 30~39 40~49 50~59 60~69 70~79 80~89 90~91	
	92~107	Static Gobo 1 Shake with increasing speed
	108~123	Static Gobo 2 Shake with increasing speed
	124~139	Static Gobo 3 Shake with increasing speed
	140~155	Static Gobo 4 Shake with increasing speed
	156~171	Static Gobo 5 Shake with increasing speed
	172~187	Static Gobo 6 Shake with increasing speed
	188~203	Static Gobo 7 Shake with increasing speed
	204~219	Static Gobo 8 Shake with increasing speed
	220~237	Positive rainbow effect with increasing speed
	238~255	Negative rainbow effect with increasing speed
7 Shutter	0~7	Close
	8~22	Open
	23~85	Strobe effect with increasing speed
	86~100	Open
	101~165	Pulse strobe
	166~180	Open

Channel	DMX-value	Feature
7 Shutter	181~245	Random Shutter
	246~255	Open
8 Dimmer	0~255	0~100% mechanic dimmer
9 Focus	0~255	Motorized focus, zoom out to zoom in
10 Prism	0~7	White
	8~15	Stop, static prism effect
	16~127	Rotation prism effect Positive rainbow
	128~239	Rotation prism effect Negative rainbow
	240~255	Stop, static prism effect

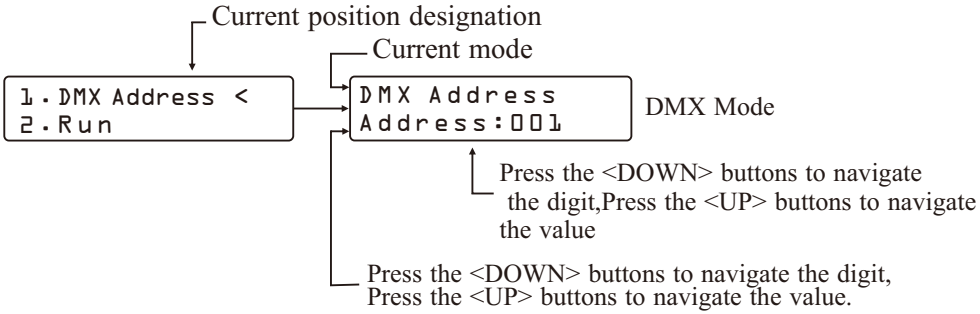
That Control Display

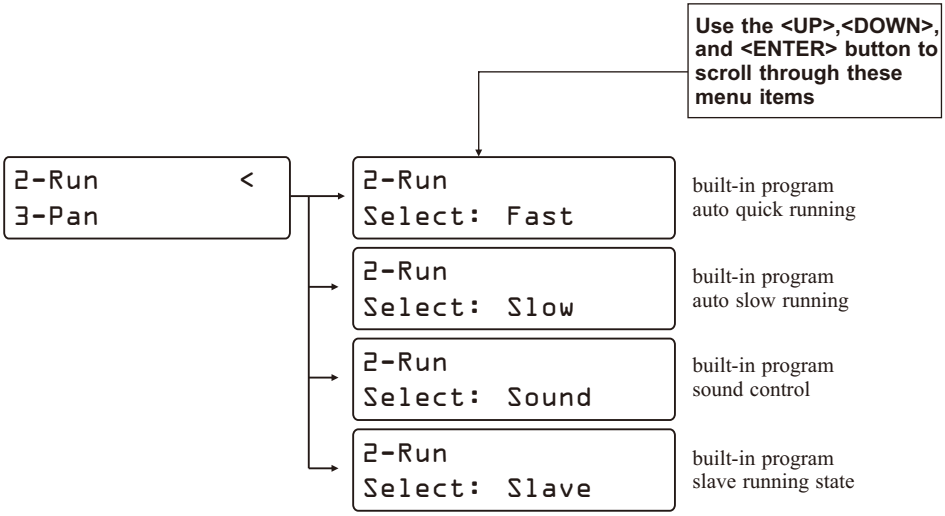
1、Top menu, present the current operation:

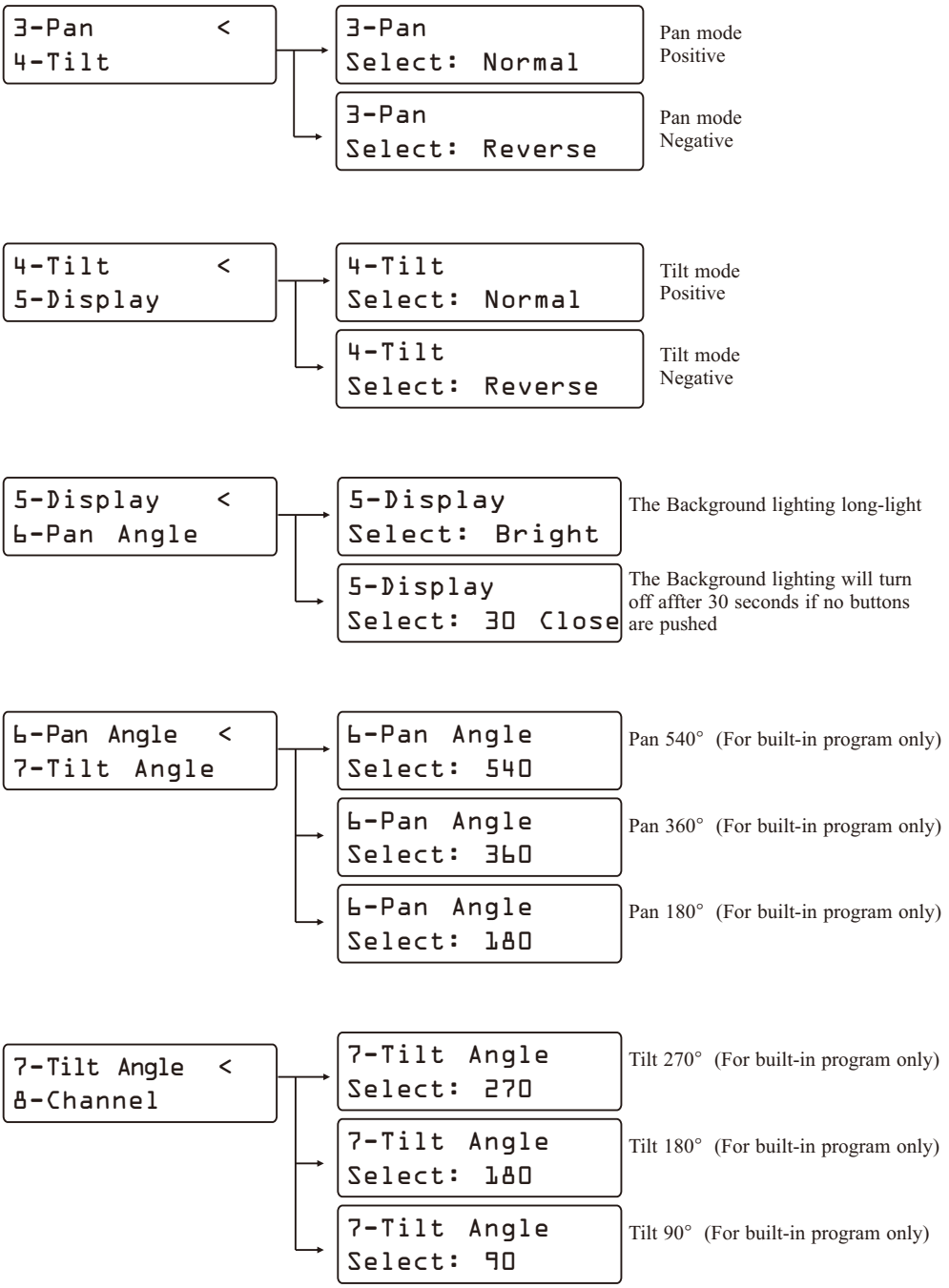


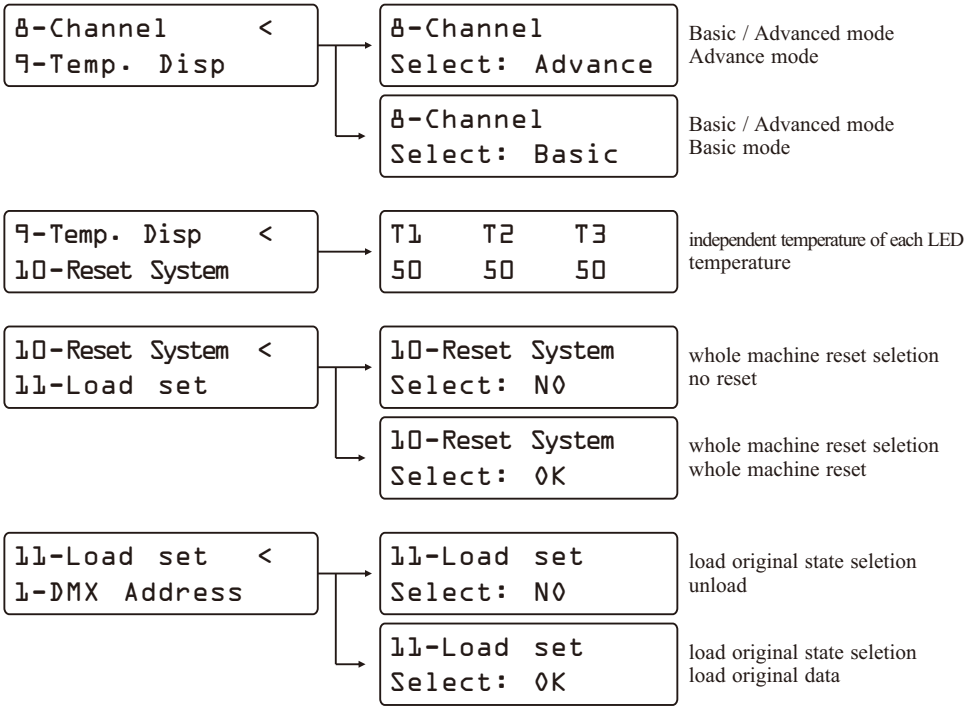
DMX mode: select channel 1 - channel 512

2. Press the <MODE/ESC> button repeatedly until you reach the desired menu function.Press the <ENTER> button to select the menu function currently displayed, or to enable menu option. To return to the previous op tion or menu without changing the value.Press the <MODE/ESC> button.

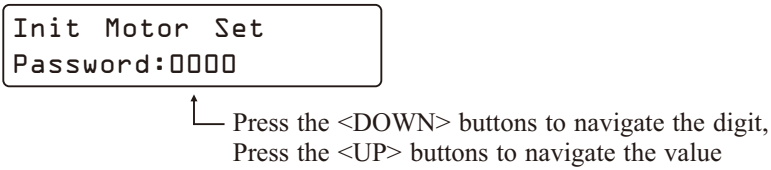




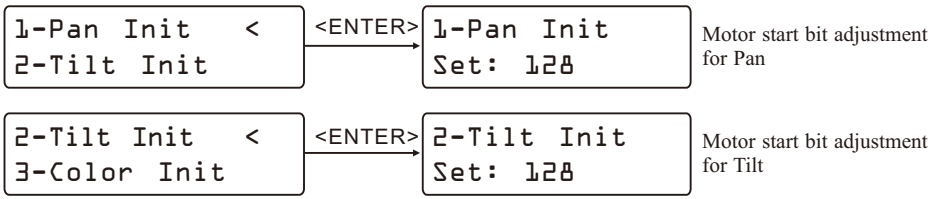

3-Pan <
4-Tilt
3-Pan
Select: Normal
Pan mode
Positive
3-Pan
Select: Reverse
Pan mode
Negative
4-Tilt <
5-Display
4-Tilt
Select: Normal
Tilt mode
Positive
4-Tilt
Select: Reverse
Tilt mode
Negative
5-Display <
6-Pan Angle
5-Display
Select: Bright
The Background lighting long-light
5-Display
Select: 30 Close
The Background lighting will turn off affter 30 seconds if no buttons are pushed
6-Pan Angle <
7-Tilt Angle
6-Pan Angle
Select: 540
Pan 540° (For built-in program only)
6-Pan Angle
Select: 360
Pan 360° (For built-in program only)
6-Pan Angle
Select: 180
Pan 180° (For built-in program only)
7-Tilt Angle <
8-Channel
7-Tilt Angle
Select: 270
Tilt 270° (For built-in program only)
7-Tilt Angle
Select: 180
Tilt 180° (For built-in program only)
7-Tilt Angle
Select: 90
Tilt 90° (For built-in program only)

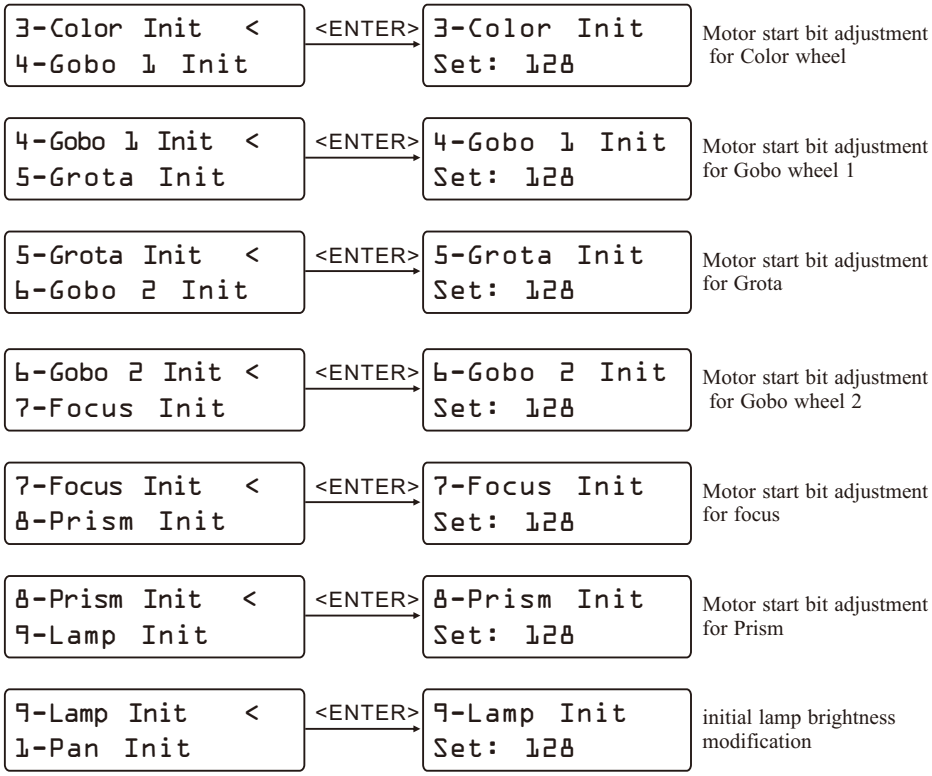


3、Service Functions. Press <MODE/ESC> at least 10 second, goes into motor start bit adjustment.

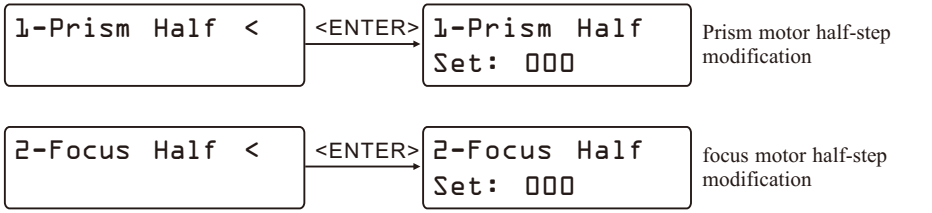


1、moto vernier regulation manual. Manufacturing code:2323. enter code and press "enter" enter the follow operation interface:





2、Password is 2322, enter the password and press <ENTER>, goes into the item:



After entering into the interface above, pressing the <MODE/ESC> button can be back to the present running state or if no operating within 60s, it will exit automatically.

Fault conditions

Lamp Hot：When the LED reach 90℃, it is protected by the system and turn off automatically, and display will show "Lamp Hot".

Open：Under the condition that the temperature resistance of the LED is not connected or already damaged, the display will be "open".

Short：Under the condition that the temperature resistance of the LED is short circuited, the display will be "Short".

INVOLIGHT

LEDMH**90**S