

PX125

Opera
RedLine

INSTRUCTION
MANUAL



CONTENTS

1. General description.....	1
2. Safety conditions.....	1
3. Front panel view.....	2
4. Controller and dimmers connection.....	3
5. Console activation.....	3
5.1. <i>Operation mode selection</i>	4
6. Controller programming.....	4
6.1. <i>Scenes creation and edition</i>	4
6.1.1. <i>Scenes copying</i>	6
6.2. <i>Chasers creation and edition</i>	6
6.3. <i>Sequences creation and edition</i>	9
7. Scenes and chasers rendering.....	10
8. Sequences rendering.....	12
9. PRESET operation mode.....	13
10. Monitor.....	14
11. <i>FLASH</i> card: saving and reading.....	15
12. PC communication.....	16
13. Connections couplings.....	17
14. Technical specification.....	17
15. Declaration of conformity.....	18

Manufacturer reserves the right to make modifications in order to improve device operation.

<i>PXM s.c.</i>	<i>tel.: (+48 12) 626 46 92</i>
<i>ul. Przemysłowa 12</i>	<i>fax: (+48 12) 626 46 94</i>
<i>30-701 Kraków</i>	<i>E-mail: info@pxm.pl</i>
<i>POLAND</i>	<i>Internet: www.pxm.pl</i>

1. GENERAL DESCRIPTION

PX125 Opera *Redline* is a professional console for theatre and stage lighting control. It has a block of 100 programmable channels of adjustable brightness, divided into 10 ranges, consisting of 10 channels each. Opera can store in the memory 100 scenes, 100 chasers (24 steps each) and 10 sequences, 100 steps each. It also has an additional, independent channel for, for instance, auditorium lighting control. All the saved configurations can be modified freely by the operator, including changes introducing during rendering. The chasers rendering speed and step-to-step fader is adjusted with the potentiometers or synchronized with the music. The controller has no limitation of number of concurrently rendered scenes and chasers.

The Compact Flash card socket allows to store the sequences, chasers and scenes.

By dint of possibility of colour monitor connection, the operator has a permanent visualization of all controlled channels.

RS-232 coupling allows to connect the console to the computer, for settings storage or software updates.

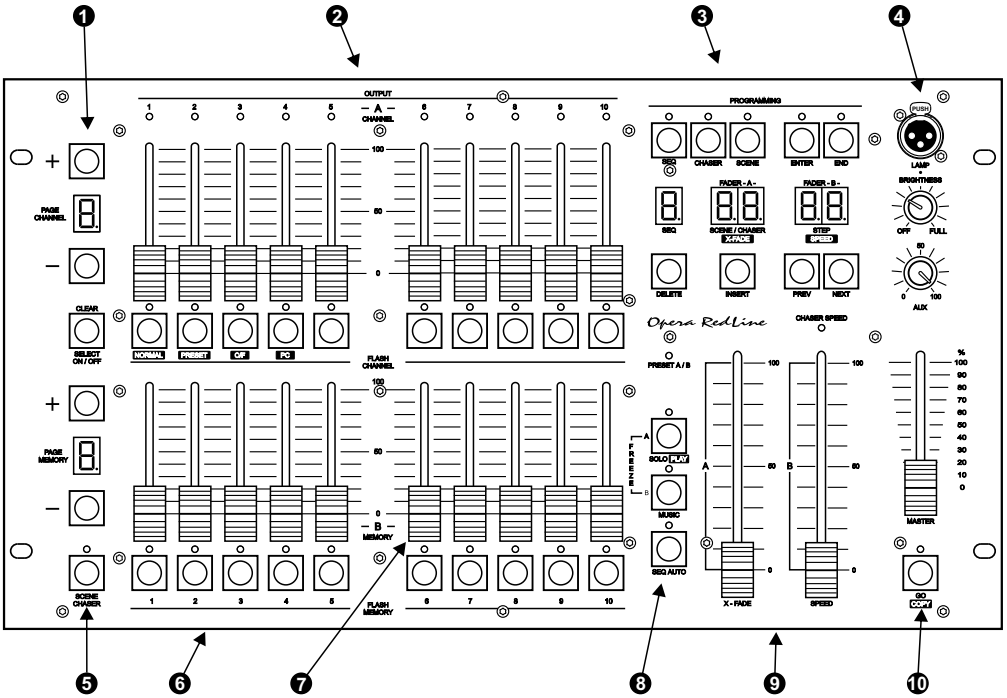
Opera is also equipped with the DMX-512 output.

2. SAFETY CONDITIONS

PX125 Opera RedLine controller is powered directly from standard 230 V grid, what can cause electric shock when safety rules are not observed. Therefore it is necessary to observe the following:

1. The device can be connected to the mains through the enclosed power cable only.
2. Controller can be connected to socket which has protecting installation in working order (3 - wire grid) only.
3. Power cable should be protected against mechanical and thermal damage.
4. In the event of damaging the power cable, it should be replaced with a cable of the same technical data and attestations.
5. All repairs demanding casing opening should be made with cut off power supply.
6. Controller should be strictly protected against contact with water and other liquids.
7. All sudden shocks, particularly dropping, should be avoided.
8. Device with damaged (cracked) casing should not be connected to the mains.
9. The device cannot be turned on in places with humidity exceeding 90%.
10. The device cannot be used in places with temperature lower than 2°C or higher than 40°C.
11. Cleaning with damp duster only - PX125 has to be cut off the power supply.

3. FRONT PANEL VIEW



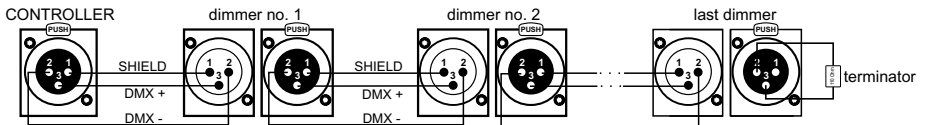
- 1 CHANNELS BANK SELECTION** 100 channels are divided into 10 banks, 10 channels each. The digit, visible on the display, represents the successive ten channels. The digit displayed under the key represents the channel number within one bank.
- 2 CHANNELS CONTROL SLIDERS** Control sliders for 10 channels of one bank. The slider operates when the LED below it is lit.
- 3 PROGRAMMING BLOCK** Keys for scenes, chasers and sequences programming and edition.
- 4 LAMP SOCKET** 12 V lamp connection socket. The knob below allows to adjust the brightness.
- 5 SCENES / CHASERS BANK SELECTION** 100 scenes and chasers are divided into 10 banks, 10 scenes or chasers each. The digit, visible on the display, represents the ten successive scenes or chasers. The digit displayed under the key represents the successive number within one bank.
- 6 SCENES / CHASERS SELECTION KEYS** These keys serve for selection of scene or chaser for programming or edition. In the rendering mode these keys launch a scene or chaser with maximal brightness.
- 7 SCENES / CHASERS ADJUSTMENT SLIDERS** These keys launch the ascribed to them scene or chaser.
- 8 SEQUENCES LAUNCH** Launches the sequences rendering.
- 9 SUBMASTERS** These sliders are for scenes changing during sequences rendering or controlling the rendering speed and X-fade during chasers rendering.
- 10 AUTOMATIC RENDERING** Automatic sequences rendering start. During programming allows to replicate the scenes.

4. CONTROLLER AND DIMMERS CONNECTION

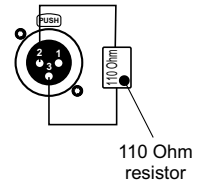
The Opera RL controller sends out the signals compatible with the DMX-512 standard. The proper operation of the whole set of devices requires the correct DMX address settings in the controlled devices and a correct devices' connection with a signal cable.

Below are some practical tips:

1. To connect the devices use of a 2-strand shielded microphone cable is recommended.
2. All the XLR couplings should be connected according to the following pattern:
pin 1 = shield pin 2 = DMX- pin 3 = DMX+



3. The controller and the effects must be connected in series, that is:
 - the output of the controller to the input of the first effect,
 - the output of the first effect to the input of the second effect,
 - the output of the second effect to the input of the third effect, etc.

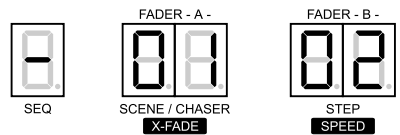


4. In the DMX OUT socket of the last effect the terminator must be installed (XLR plug with the 110 Ohm resistor between 2 and 3 pins).

5. CONSOLE ACTIVATION

After switching the controller on (in NORMAL operation mode) the controller's software version number is displayed. In the example shown the software version number is 1.02.

As the Opera RedLine software is permanently improved, you can find the latest software version on the producer's website. If its number is greater than displayed, we recommend you to update your software. The update process description and the software are available on the www.pxm.pl website.



NOTICE:

By pressing any key you can enter the standard operation mode.

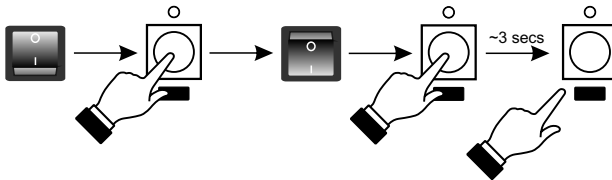
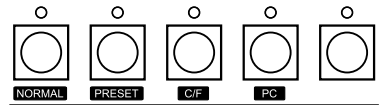
5.1. OPERATION MODE SELECTION

Opera RL controller can operate in one of the following modes:

1. NORMAL - basic operation mode,
2. PRESET - the "manual field" mode - the saving and rendering of the previously saved scenes, chasers and sequences is off,
3. C/F - memory card communication mode - settings storage,
4. PC - computer communication mode - software updating, settings storage and edition.

The operation mode selection is being made during controller switching on. To select an operation mode:

1. Switch the controller off.
2. Press and hold one of the keys shown - appropriate for the selected mode.
3. While holding the key switch the controller on.
4. After 3 seconds approximately release the key.



Switching to the selected mode is confirmed by:

- for the NORMAL mode - the software number is displayed,
- for the PRESET mode - the PRESET LED is lit,
- for the C/F mode - the "C" and "F" letters are displayed on the banks' displays,
- for the PC mode - the GO LED is lit.

ATTENTION:

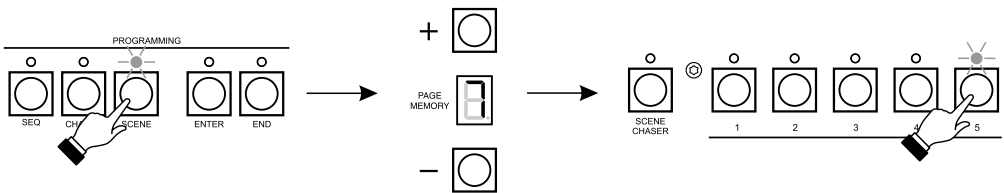
The NORMAL and PRESET modes settings are saved in the controller's memory and the controller will be automatically switched to one of this modes after turning on.

The C/F and PC modes are not saved. For that reason after turning the controller off and on again, Opera RL will be automatically switched to the operation mode it run according to before the C/F or PC modes were selected.

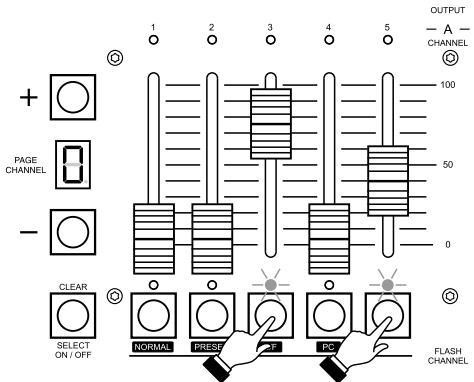
6. CONTROLLER PROGRAMMING

6.1. SCENES CREATION AND EDITION

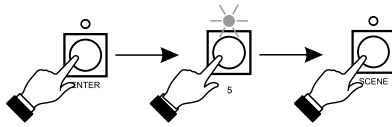
1. In the PROGRAMMING block press the SCENE key - the LED above will light up, what confirms the scenes programming has begun.
2. Select a number for the programmed scene. To do so, with the PAGE MEMORY "+" or "-" key select a range, where you want this scene to be placed and, with one of the MEMORY keys, choose the precise number for this scene. The digit, visible on the PAGE MEMORY display, represents the successive ten of scenes. If you want to, for instance, select 75 as the number of your scene, with the "+" or "-" keys set 7, and then press the 5 key. Above this key the LED will light up, and the number of the selected scene will be shown on the SCENE/CHASER display.



3. In the CHANNEL block press the keys corresponding to these channels, where you want to make changes. If these channels are in a different range, with the "+" or "-" PAGE CHANNEL keys select the appropriate range and press the CHANNEL block keys. The channel selection is indicated by the shining LED. The blinking LED stands for the channel from a different range.
4. With the sliders adjust the brightness for the selected channels. The channels from the current range only can be modified.



5. You can deselect the channels by pressing the corresponding key again - the LED will go out. This will also discard all the brightness settings for this channel. If you want to discard all the changes made, press the SELECT ON/OFF key.
6. You may also select all the 100 channels for edition. To do so, when no LEDs are lit above the CHANNEL keys, press the SELECT ON/OFF key and adjust the brightness for all channels, paying attention to range selection where needed.
7. After all the adjustments are made for the particular scene, press the ENTER key in the PROGRAMMING block - the scene will be saved, what will be confirmed by going out of the LED above the ENTER key.
8. In the MEMORY block press the key of the scene you have edited.
9. To program other scenes, repeat the procedure from points 2 - 8.
10. You can change the settings of a saved scene. To do so, select a scene you want to edit by pressing the appropriate key in the MEMORY block. The scene will be launched. Proceed as you have during scenes creation, adjust the brightness for the required channels and press the ENTER key. Leave this scene edition by pressing its corresponding key in the MEMORY block.
11. The scenes programming is finished by pressing the SCENE key - the LED above will go out.



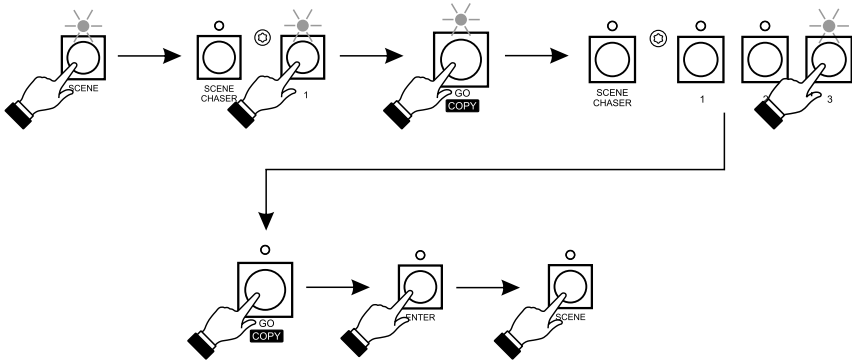
6.1.1. Scenes copying

You can copy the selected scene, when needed:

1. Press the SCENE key in the PROGRAMMING block.
2. In the MEMORY block press a key, corresponding with the scene you want to copy. You can switch between PAGE MEMORY ranges with the "+" and "-" keys, to reach the appropriate one, where your scene is saved.
3. Press the COPY key, the LED above will light up.
4. In the MEMORY block press the key of the scene, where you want to copy the previously selected one.

ATTENTION! The previous settings of the scene where you copy will be deleted.

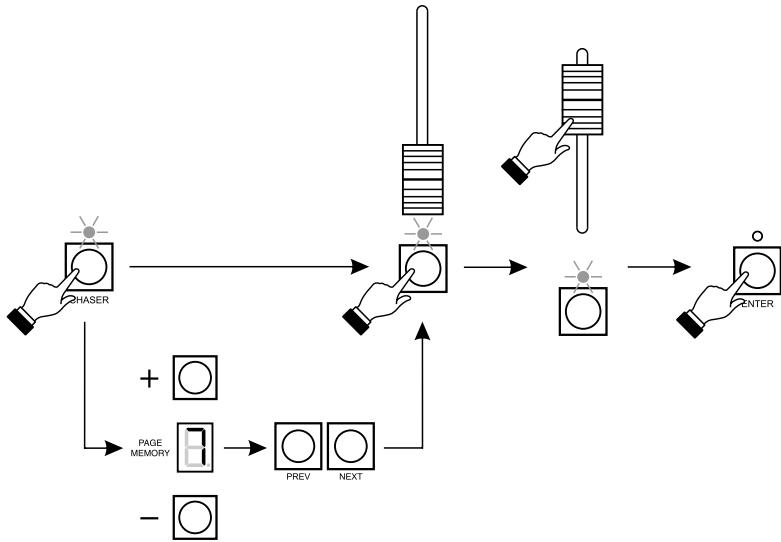
5. Press the COPY key, the LED above will go out.
6. Press the ENTER key in the PROGRAMMING block.
7. To copy other scenes, repeat the procedure described in points 2 - 6.
8. To exit scenes copying press the SCENE key.



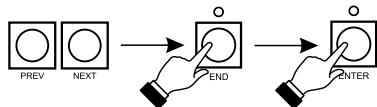
6.2. CHASERS CREATION AND EDITION

1. Press the CHASER key in the PROGRAMMING block. The LED above will light up, what confirms the chasers programming has begun.
2. Select a number for the programmed chaser. To do so, with the PAGE MEMORY "+" or "-" keys select a range, where you want to put your chaser, and, with one of the MEMORY keys, choose a precise chaser number. It might be a number, which already corresponds with a scene, both configurations can be rendered independently. The selected chaser number will be shown on the SCENE/CHASER display and the number of currently edited step on the STEP display.

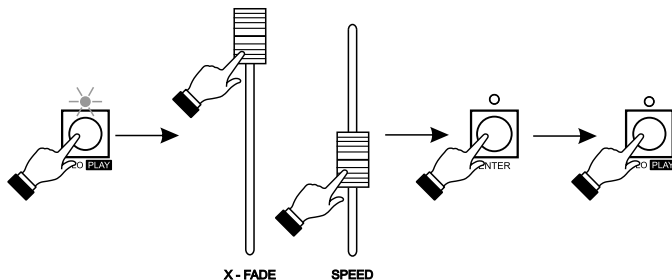
3. With the NEXT or PREV keys select different step number (24 maximum) or adjust the channels brightness for the first step. To do so, by pressing the appropriate CHANNEL keys select the channels, where you want to set the brightness. If the channels are in a different range, you can select the proper one with the PAGE CHANNEL "+" or "-" keys and press the appropriate channel keys. Your selection will be confirmed by shining LEDs. The blinking LED represents the channel selected in a different range.
4. Adjust the brightness of the selected channels with the sliders. The sliders affect the brightness of channels in the currently selected range only.
5. You can deselect the channels by pressing the appropriate key again - the LED above will go out. It also discards all the brightness changes made within this channel. If you want to discard settings for all selected channels, press the SELECT ON/OFF key.
6. You can also select all 100 channels for programming. To do so, when no LEDs are lit above the CHANNEL keys, press the SELECT ON/OFF key and adjust the brightness for all the channels needed with the sliders, paying attention to range selection.
7. After all the settings are made within the edited step, press the ENTER key in the PROGRAMMING block.
8. To set the other chaser's steps, repeat the procedure from points 3 - 7.



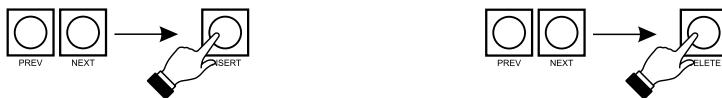
9. Every chaser consists of 24 steps by default, but you can reduce this value. To do so, with the NEXT or PREV keys set the step number on the STEP display, you want to be the last one. Press the END key, and then ENTER in the PROGRAMMING block.



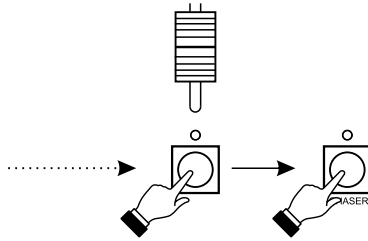
10. To program the speed and change smoothnes for the chaser's steps, press the PLAY key. With the X-FADE slider adjust the step-to-step fading smoothness. On the X-FADE display the 0 value stands for the instant change, 99 - for an entirely smooth change. With the SPEED slider adjust the steps duration time, equal for all steps. The 0 value on the SPEED display is for an endless duration time (chaser stands still), 3 value is for 25.2 seconds and the 98 value is for 0.1 seconds. To save your settings press the ENTER key.
11. Press the PLAY key to exit the smoothness and speed adjustment.



12. You can insert a new step between the existing ones, if you need to. To do so, with the PREV or NEXT keys set the step, after which you want to insert a new one (its number is displayed on the STEP display) and press INSERT. The inserted step will have the same settings as the preceding one. At the same time the 24th step will be deleted. ATTENTION! The new step is inserted automatically, when the INSERT key is pressed. This action cannot be cancelled.
13. You can also delete an unwanted step. With the PREV or NEXT keys, on the STEP display set the step you want to remove and press the DELETE key. All the subsequent steps, that were placed after the deleted one, will be moved backwards and the 24th step will become empty. ATTENTION! The step is removed instantly, when the DELETE key is pressed. This action cannot be cancelled.

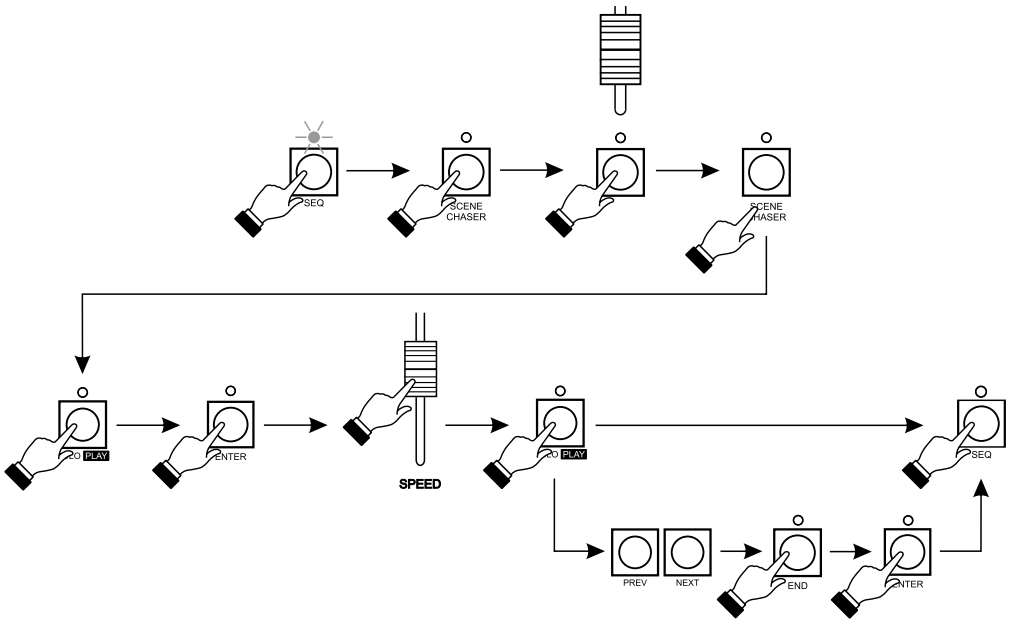


14. To finish chaser programming, press the key corresponding to your edited chaser in the MEMORY block.
15. To define other chasers, repeat the procedure from points 2 - 14.
16. You can change settings of the previously defined chaser. To do so, select a chaser you want to edit by pressing the appropriate key in the MEMORY block. The chaser will be launched. Proceed as you have during chaser creation, adjust the brightness for the required channels and the step duration time and fader. Press the ENTER key to save changes. Leave this chaser edition by pressing its corresponding key in the MEMORY block.
17. Press the CHASER key to exit chasers programming.



6.3. SEQUENCES CREATION AND EDITION

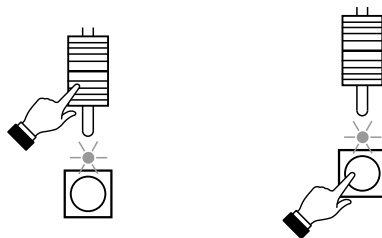
1. Press the SEQ key in the PROGRAMMING block, the LED above will light up, what shows the sequences programming has begun.
2. Select a number for your sequence. To do so, press and hold the SCENE/CHASER key and press one of the MEMORY keys. On the SEQ display the number of a sequence will show, on the STEP display the step number will show and on the SCENE/CHASER display the scene number ascribed to this step will appear.
3. With the NEXT or PREV keys select another step number (100 maximum) or ascribe a required scene to the first step by pressing the appropriate MEMORY keys. You can switch the range with the PAGE MEMORY "+" or "-" keys when needed.
4. Press the PLAY key to set the scene lighting up time during automatic sequence rendering. With the SPEED slider select a value from 1 to 250 seconds. Press the ENTER key to confirm and the PLAY key to exit time settings.
5. For all the other steps repeat the procedure from points 3 and 4.
6. The sequence can be composed of up to 100 steps. If you want it to be shorter, with the PREV or NEXT keys set the number of step on the STEP display you want to be last one in the sequence. Press the END and then the ENTER key in the PROGRAMMING block.
7. You can insert a new step between the existing ones, when needed. To do so, with the PREV or NEXT keys set the step number on the STEP display, after which you want to insert a new step and press the INSERT key. The new step will have ascribed the same scene as the preceding one and all the subsequent steps will be moved forward and the 100th step will be irreversibly deleted.
8. You can also delete a needless step. On the STEP display select with the NEXT or PREVIOUS keys the step you want to remove and press the DELETE key. All the subsequent steps will be moved backwards, and the 100th step would become empty, in case it had a scene ascribed.
9. To create more sequences repeat the procedure from points 2 - 8.
10. You can change the settings of a previously defined sequence. To do so, select a sequence you want to edit by pressing the SCENE/CHASER and the appropriate key from the MEMORY block concurrently. The sequence will be launched. Proceed as you have during sequence creation, ascribe new scenes to the steps or adjust the steps' lighting up time.
11. Press SEQ to exit the sequences programming mode.



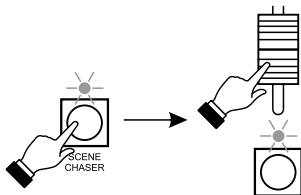
7. SCENES AND CHASERS RENDERING

The Opera RedLine controller allows to render 100 scenes and chasers concurrently. To render a scene or chaser, the controller must operate in a basic mode (on the SEQ, SCENE/CHASER and STEP displays the horizontal dashes are shown, on the channels range and memory displays any numbers are shown and the LED above the SCENE/CHASER key is lit up - when red, the controller is ready to render the chasers, when green - scenes). The LEDs above the CHANNEL keys may be also lit, that indicates the manual control over channels, regardless of the rendered scenes or chasers.

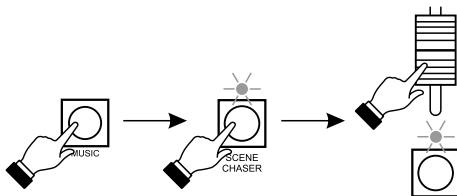
To render a previously defined scene, the LED above the SCENE/CHASER key must light green. When this LED lights red, press the SCENE/CHASER key. Move the slider in the MEMORY block corresponding with the scene you want to launch. If the scene is placed in a different range, switch to the required one with the PAGE MEMORY "+" or "-" keys and move the appropriate slider then. Under this slider the LED will light up green and the scene brightness will be proportional to the slider position. The scene can be lit also by pressing the appropriate MEMORY key, the scene will be launched with 100% brightness and will be lit as long, as the key is pressed. The blinking LED indicates, that the launched scene is placed in a different range.



To launch a chaser, simply press the SCENE/CHASER key (the LED above will light up red) and move the appropriate slider. It will not affect any of the previously launched scenes. The chaser will be rendered with the previously defined speed and smoothness and its brightness will be proportional to the slider's position. The LED under the moved slider will light up red. When this LED lights up orange, that means, that the scene corresponding to this slider is launched as well. The speed and smoothness of the rendered chasers can be adjusted with the SPEED and X-FADE sliders, but these settings will be common for all the currently rendered chasers.

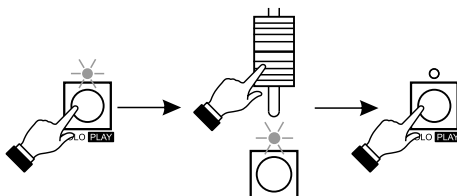


You can also synchronize the chasers' rendering with the music rhythm. Press the MUSIC key, all chasers will synchronize to the music. To revise the launched scenes settings, simply press the SCENE/CHASER key (the LED above will turn green) and adjust the brightness for required scenes or launch the new ones.



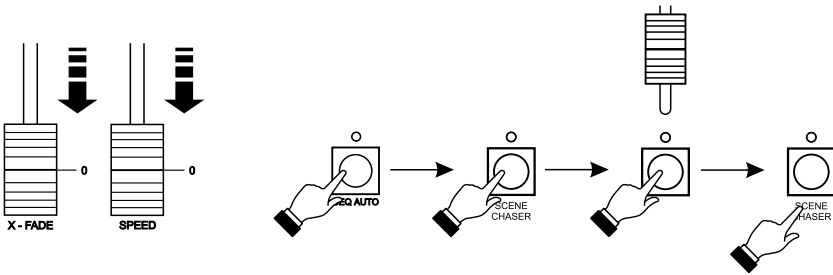
During scenes and chasers rendering you can control any channels manually, regardless of rendered configurations. To do so, in the CHANNEL block select the channels by pressing the appropriate CHANNEL keys and adjust their brightness. This brightness will be permanent. The rendered scenes and chasers will not affect these channels. To quit the manual control over channels, press the same CHANNEL keys, taking into consideration a possible ranges change with the PAGE CHANNEL "+" or "-" keys.

You can launch one scene or chaser only, dimming all the rest of currently rendered light configurations. Press the SOLO key (the LED above will light up) and move the slider corresponding with the required scene or chaser. As long, as the LED over SOLO key is lit, every new scene or chaser launched will dimm the previous ones. Press the SOLO key again to quit.

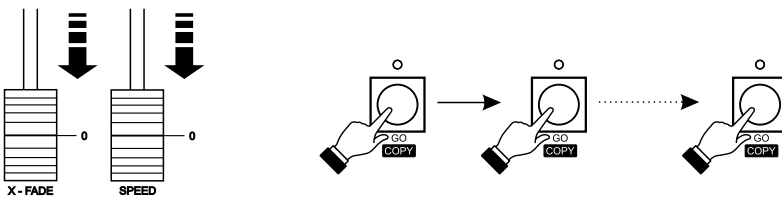


8. SEQUENCES RENDERING

Set the X-FADE and SPEED sliders to zero. Press the SEQ AUTO key and select the sequence you want to render. To do so, hold the SCENE/CHASER key and press one of the MEMORY keys. On the SEQ display the number of a selected sequence will appear, on the SCENE/CHASER display the number of scene ascribed to the first step of the rendered sequence and on the STEP display the number of scene ascribed to the second step. The X-FADE slider is responsible for lighting up of the scene from SCENE/CHASER display and the SPEED slider for lighting up the scene from the STEP display. When the scene is lit up and dimmed, a new scene is launched, according to the previously defined order. The scenes will be launched until the last scene from the sequence is reached. You can freeze one slider, when needed, by pressing FREEZE A for the X-FADE slider or FREEZE B for the speed slider. The scene, that is currently launched under the frozen slider can be lit up and dimmed as many times, as you want to, until the "freeze" feature is turned off, by pressing the FREEZE A or FREEZE B key again. The unfrozen slider launches the next scenes.

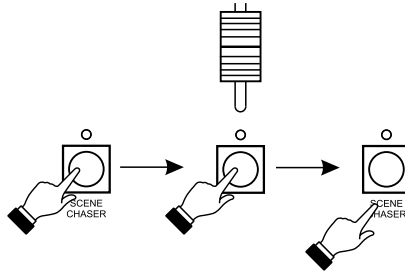


You can also render a previously defined sequence automatically. Set the X-FADE and SPEED sliders to zero and select a required sequence. Press the GO key to launch the first scene (it will lit up with the defined time). Press the GO key again to launch the next scene, the previous one will be dimmed when the new one lights up. Press the GO key until the sequence reaches the end.



Same as during the scenes and chasers rendering, you can take control over any channel and adjust it manually, regardless of the rendered sequence. You can find the precise description in chapter 7 of the present manual.

To render the sequence from the beginning or to launch another one, press and hold the SCENE/CHASER key and press the appropriate MEMORY key.



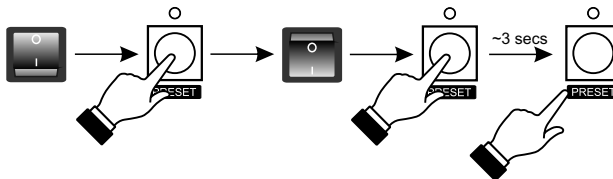
ATTENTION! You must remember, that the MASTER slider has the superior control over all channels.

9. PRESET OPERATION MODE

Switch the controller on in the PRESET mode. To do so, switch the controller off, press and hold the PRESET key, switch the controller on and release the PRESET key after a while. This operation mode is confirmed by the lit PRESET A/B LED. In this mode you can control the channels manually only, the access to all saved scenes, chasers and sequences is blocked off.

The scenes settings are realized with the set of A field sliders (upper sliders' set) and B field sliders (lower set of sliders). The channels' brightness can be set with the appropriate sliders, you can also change the range with "+" or "-" keys, when needed. The scenes lighting up and dimming is performed with the A (for the A field) and B (for the B field) sliders. You can also light the channel up by pressing the key under the slider.

Moreover, the output level is also controlled by the MASTER slider.



10. MONITOR

A colour monitor can be connected to the Opera RedLine controller, where all the informations about controller's current operation status can be displayed. Below the exemplary screen of scenes and chasers rendering is shown. In the other operation modes these screens differ from each other in a small extent.

output circuits image
controller operation mode

ODTWARZANIE

scena chase

slider

MASTER - 08

circuit 101 - 08

10 87

100%

50%

0%

XF SP

slider

MASTER - circuit 101

sliders

SPEED and X-FADE

98 99 100

39 30 kanal

73 scena

52 44 chase

M M stan

- output circuit number
- output circuit brightness
- scene rendering level
- chaser rendering level
- M - manual control over circuit
- F - FLASH key pressed

11. FLASH CARD: SAVING AND READING

Use the CompactFlash memory cards only, formatted in the FAT16 file system. The sector size must equal 512 bytes (currently standard). The partition size can be up to 10 GB. If a few primary partitions exist, only the first one with FAT16 file system will be used. The extended partitions are not maintained.

In the root directory the subdirectory named OperaRL (case sensitive) must be created. In this directory 10 subdirectories with the set of files, of format identical to used by the communication application, can exist. These directories should be named "1", "2", etc., up to "10". If the directories do not exist, they will be created during the saving data to card operation (it does not concern to the \OperaRL folder). In these subdirectories the files, named same as the directories and with the O3S, O3C and O3Q filename extensions, will be used, for instance, the \OperaRL\1 folder, after the file saving operation, will contain 1.o3s, 1.o3c and 1.o3q files. The directory and the 3 files inside will be named "a set" in a further part of a description. This set does not have to be complete, it can be composed of a directory or some files only. The presence of any other files in the directories is ignored. The file transfer from CF to PX125 will be restricted to rewriting the existing files. The transfer of files from the controller to CF always generates a full set.

- Operations:

After the card has been inserted into the slot, restart the controller holding F3 key pressed. The controller and card co-operation mode is indicated by the letters **C** and **F** on the left displays (banks). The SCENE/CHASER LED indicates the card activity (the red colour stands for the action, the green stands for the idleness). After the card is initiated the letter **P** and the four-digits card memory capacity (in MB) will appear on the right display, as the confirmation of communication correctness. The existing sets on the memory card will be indicated by the blinking of the appropriate Fn LEDs. By pressing any of the Fn keys you can select a set, its number will appear on the DIS_SEQ display and the chosen set will be checked if complete, what will be confirmed by LEDs: if n.o3c exists, the red SCn LED will light up, if n.o3s exists, green SCn will light up and if the n.o3q file exists, the Fn LED will light permanently.

On the DIS_S and DIS_ST the **SAR UE** (save to card) inscription will appear.

If a non-existent set is selected, the appropriate folder will be created and FnLED will start to twinkle.

After the set is selected with the NEXT or PREV keys, you can switch the modes between **SAR UE** and **RE ED** (reload, reconstruction of controller's content from the card). It is possible when at least one file of a particular set exists. The reconstruction will be limited to the existing files.

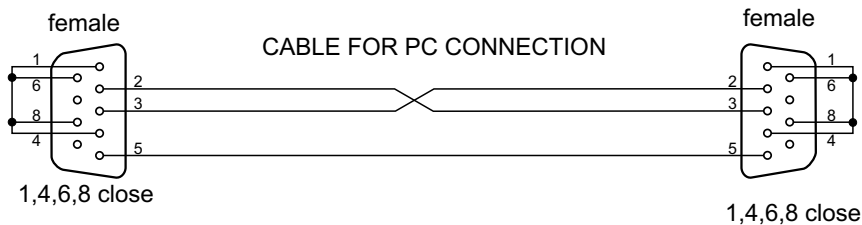
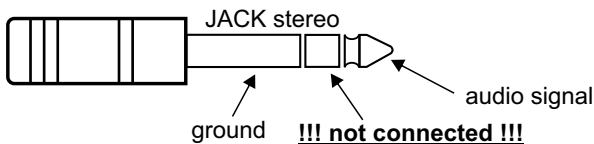
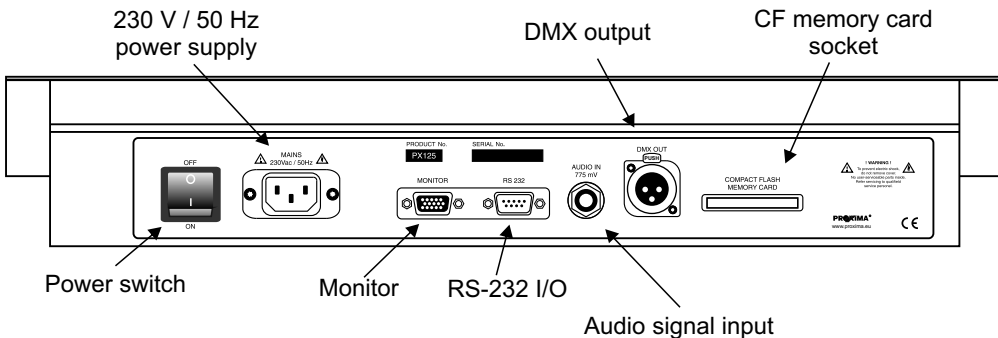
After the set is selected, you can initiate the feature with the ENTER key.

- Errors maintenance

When the errors appear during memory card maintenance, the **E nn nn** (Err nn) inscription will appear on a 5-digits display (where "nn" stands for the decimal error number) and the application will stop. The follow-up will be possible when the error cause is eliminated and the controller is restarted.

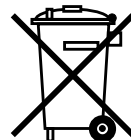
The defined error codes are as following:

13. CONNECTION COUPLINGS



14. TECHNICAL SPECIFICATION

- DMX channels	100 + 1
- scenes	100
- programs	100
- sequences	10
- inputs:	
- audio 0 dB	JACK STEREO socket
- RS 232	9-pin D-SUB socket
- outputs:	
- DMX-512	3-pin XLR socket
- RS-232	9-pin D-SUB socket
- monitor	15-pin D-SUB plug
- power supply	230 V / 50 Hz
- power consumption	6 VA
- weight	4 kg
- dimensions:	
- width	490 mm
- height	270 mm
- depth	90 mm





ul. Przemysłowa 12
30-701 Kraków, Poland

tel: +48 12 626 46 92
fax: +48 12 626 46 94

e-mail: info@pxm.pl
http://www.pxm.pl

DECLARATION OF CONFORMITY

according to guide lines 73/23/EWG and 89/336/EWG

Name of producer: PXM s.c.
Address of producer: ul. Przemysłowa 12
30-701 Kraków

declares that the product:

Name of product: **Opera RedLine**
Type: **PX125**

answers the following product specifications:

LVD: **PN-EN 60065**

EMC: **PN-EN 55103-1**
PN-EN 55103-2

Additional informations:

1. All DMX512 inputs and outputs must be shielded and the shielding must be connected to pin 1 XLR plug.
2. A ground wire of the controller power cable must be connected to efficient ground installation.

PXM S.C.
Danuta i Marek Żupnik
30-701 Kraków, ul. Przemysłowa 12
NIP 677-002-54-53

Kraków, 01.06.2006

Marek Żupnik M.Sc.