

Dimmer-Switch & Dim-Edit



ARTISTIC LICENCE

Artistic Licence Engineering Ltd

Manual Revision V2-1

ARTISTIC LICENCE
PRODUCT
REGISTRATION FORM

Product: Dimmer-Switch

Version No.

Serial No.

Date Purchased:

Supplier:

Name:

Company Name:

Address:

Email:

Post/Zip Code:

Phone No.

Comments:

Please return to: Artistic Licence Engineering Ltd.

Studio 1, Spectrum House, 32-34 Gordon House Road, London, NW5 1LP, UK.

Tel: +44 (0) 20 88 63 45 15

Fax: +44 (0) 20 84 26 05 51

C O N T E N T S

ARTISTIC LICENCE PRODUCT REGISTRATION FORM	3
CONTENTS	5
INTRODUCTION	7
QUICK START	7
DIMMER-SWITCH FEATURES	8
DIM-EDIT	8
FEATURES	8
THE CONTROL SURFACE	9
OVERVIEW	9
GRAND-MASTER	9
PLAYBACK FADERS	9
STATIC MEMORIES	10
SEQUENCE CONTROL	10
SEQUENCE LINKING	10
LIVE DMX	10
FLASH MEMORY	10
EXTERNAL CONNECTIONS	11
REAR PANEL	11
POWER SUPPLY	11
POWER IN	11
DMX512 CONNECTION INPUT	12
DMX512 CONNECTION OUTPUT	12
DMX512 CONNECTION WIRING	12
PROGRAMMING PORT	12
WIRING TOPOLOGY	12
WIRING RULES	12
PROGRAMMING	13
OVERVIEW	13
PANEL SETUP - DIP sw	13
SNAP-SHOT	14
EXAMPLE APPLICATIONS	15
OVERVIEW	15
STANDALONE MODE	15
WIRING	15
DIM-EDIT	16
LIVE DMX	17
WIRING	17
DIM-EDIT	17
DIM-EDIT	18
OVERVIEW	18
INSTALL	18
HARDWARE	18
COMMS	19
MAIN SCREEN	19
SETTING THE PATCH	20

<i>PATCH COLUMNS</i>	21
<i>DELETING A LAMP</i>	21
EDITING MEMORIES	22
<i>EDITING MEMORIES BY SPREADSHEET</i>	22
<i>MEMORY COLUMNS</i>	22
<i>EDITING MEMORIES BY FADER</i>	23
<i>FADER ROWS</i>	23
<i>SETTING LEVELS</i>	24
<i>EDITING LEVELS</i>	24
USING PALETTES	26
<i>EDITING MEMORY LEGENDS</i>	27
SEQUENCE	27
<i>SEQUENCE COLUMNS</i>	28
<i>SEQUENCE EDITING</i>	28
<i>TIME EDITING</i>	28
<i>EDITING SEQUENCE LEGENDS</i>	28
EDITING FIXTURES	29
<i>SPREAD SHEET</i>	29
<i>HEADER</i>	31
<i>FOOTER</i>	32
<i>FINISHING EDITING</i>	32
MENU	33
<i>EXPORT</i>	33
<i>LIVE EDITING</i>	34
<i>USITT ASCII IMPORT</i>	34
INDEX	35

I N T R O D U C T I O N

QUICK START

Welcome to the Dimmer-Switch user guide. Dimmer-Switch is a wall panel controller for DMX512 that is programmed by Dim-Edit.

Dimmer-Switch controls all 512 channels of the DMX512 universe. It provides static playback scenes with crossfade along with a selection of fully programmable sequences.

It is available in both UK and US panel formats. The UK version mounts into a standard 2-gang back box in portrait format. The US version uses a 3 gang US style panel.

Dimmer-Switch is available with or without the programming tools, Dim-Edit (order separately).

Programming of Dimmer-Switch is achieved by two methods; Using the front panel faders to snap-shot DMX into the memories. Using a Windows software package called Dim-Edit and an RS232 serial cable. If your PC does not have a serial port, a USB to Serial adapter can be used.

The software fully supports both generic single channel lights as well as moving lamps. The moving lamp personality library is fully user editable and is also compatible with the sister products Micro-Scope 3a and Show-Control.

Please remember to return your product registration card, so that we can keep you informed of new developments.

DIMMER- SWITCH FEATURES

Dimmer-Switch provides the following features:

- Controls 512 DMX512 channels
- 100 memories
- 6 fader operated memories or sequences
- Live DMX feed
- 100 sequence steps per sequence
- Programmable sequence step or fade times
- Remote PC programming
- Live programming
- Moving lamp library
- Numerous 'Run' modes
- Individual channel selection for G-M
- Snapshot recording

DIM-EDIT FEATURES

Dim-Edit provides the following features:

- Fader based visual user interface
- Hard disc storage of multiple shows
- Moving lamp personality library
- Lamp personality editor
- Edit all memories, sequences and times
- Enter alphanumeric channel names
- Live programming via Dimmer-Switch
- Grand-Master selection for individual channels
- User fader assignment (memory or sequence)

T H E C O N T R O L S U R F A C E

OVERVIEW

The product is operated via 7 illuminated faders:

Grand-Master Fader
Playback Faders (six)

GRAND- MASTER

The Grand-Master is controlled by the fader on the right of the panel.

The Grand-Master is used to dim the overall output of Dimmer-Switch. Dim-Edit allows any channels to be excluded from Grand-Master control. This is useful when controlling moving lamps and other devices that contain non-intensity channels.

The Grand-Master Fader level is represented by the LED within the fader.

PLAYBACK FADERS

The six Playback Faders can be assigned either a Static Memory or Sequence.

Each Playback Fader has an internal LED that represents its level with respect of the Grand-Master Fader level.

If Dimmer-Switch is programmed with snap-shot then these Playback Faders will fade in the recorded values.

When Dimmer-Switch is programmed with Dim-Edit a Playback Fader can be assigned to fade in either a static memory or a sequence. When controlling a sequence and the fader goes above 0 the sequence will start and the level will be controlled via the fader.

The LED within the playback fader represents its position with reference to the Grand-Master position.

When in slave mode the playback faders only correspond to the static memories.

STATIC MEMORIES

When a Playback fader is assigned a static memory it will transmit the memory values in proportion to the position of the fader.

If Dimmer-Switch is being programmed with the Snap-Shot function the Playback Faders can only be used with Static Memories.

SEQUENCE CONTROL

Each Playback Fader can be assigned to playback a sequence.

To use this function Dimmer-Switch must be programmed with Dim-Edit.

When a Playback Fader is assigned a Sequence the fader is used to control the overall level control of the running sequence and not the speed. The sequence will start running when the fader is above 0.

All six Playback Faders can be assigned to run a separate sequence and each sequence can run simultaneously.

SEQUENCE LINKING

Sequences contain up to 100 steps, each with individual fade or wait times. The steps are made up from the library of 100 memories.

There are many more sequence steps than available memories. This is useful because each sequence step has its own fade or wait time. It is therefore possible to reuse memories in a sequence with different times.

Sequences can be linked together if more than 100 steps are required.

LIVE DMX

Dimmer-Switch has the function of a live DMX fade in addition to the memories or sequences being controlled by the Playback Faders.

Playback Fader 6 controls the live DMX feed, to enable this function switch DIP-SW 6 to the 'ON' position and connect the DMX source.

The overall level of the live DMX is controlled by Playback Fader 6 and the Grand-Master.

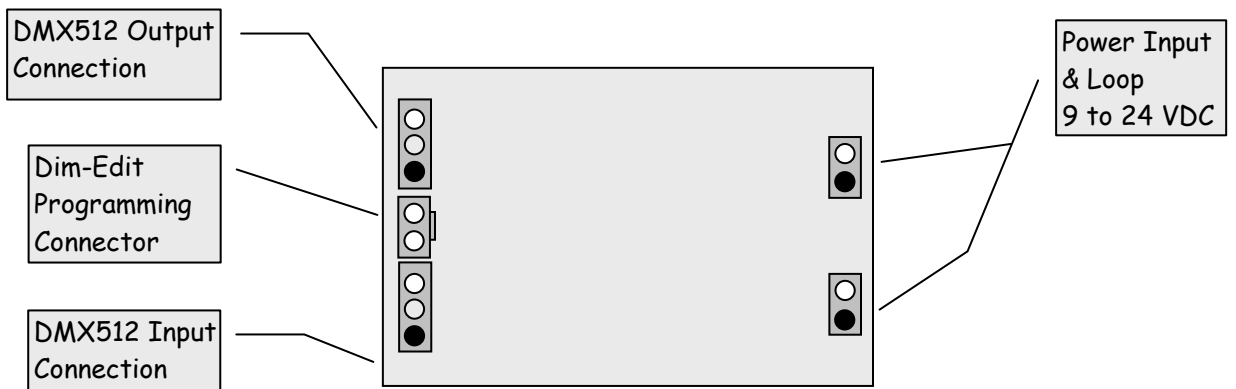
FLASH MEMORY

All programming is stored in flash memory. This means that the product will not lose its setting when power is removed.

EXTERNAL CONNECTIONS

REAR PANEL

All connections are made to the rear panel as shown in the following diagram:



The connector pins marked in black indicate pin 1 and the black wire connection.

POWER

Dimmer-Switch is powered by an external 9 to 24 VDC source. The power connection is via Ferrules. A suitable power supply is PSU-9-1.5-FER.

The low voltage power lead can be extended up to 5m. Take care to ensure that any power lead extension is wired with the correct polarity.

A Power loop through connection is also provided so multiple panels can be powered off one PSU.

POWER IN	PIN	FUNCTION
	+VDC -	+9 to 24 VDC @ 110 mA
	GND - Black	GROUND

DMX512 CONNECTION INPUT The DMX512 input (snapshot and live DMX) is available at the 3 pin screw terminal connector (J3) on the bottom left of the panel.

To enable live DMX on fader 6; set DIP-SW 6 to the 'ON' position.

DMX512 CONNECTION OUTPUT The DMX512 output is available at the 3 pin screw terminal connector (J2) on the top left of the panel.

DMX512 CONNECTION WIRING Pin 1 is marked in black on the rear panel diagram. Wiring is as follows:

PIN	FUNCTION	DMX Connector	Colour
1	Screen Ground	1	Black / Screen
2	Data -	2	Blue
3	Data +	3	Red
-	N/C	4	-
-	N/C	5	-

PROGRAMMING PORT To programme Dimmer-Switch, connect the supplied cable to the programming connector on the middle left of the product.

The cable is polarised and can only be connected in one orientation.

WIRING TOPOLOGY Please refer to the Example Application section of this user guide for wiring recommendations.

Terminology (used in DMX wiring):

DMX controller: There can only be one Controller in a DMX system and it must be at the start of the DMX cable. Dimmer-Switch is a DMX controller.

WIRING RULES Only one Controller on a DMX line, positioned at the start

Maximum of 32 DMX fixtures. You can increase this number by using an RDM splitter such as DMX-Split RDM, Rack-Split RDM or Rail-Split RDM

The DMX line **must** be terminated, specified by DMX512 protocol

The Live DMX input must not be 'looped out' as it is terminated.

PROGRAMMING

OVERVIEW

Before using a Dimmer-Switch panel it must be configured correctly. The DIP switches must be set correctly for normal operation.

There are two methods of programming memories and sequences;

- Using the Snap Shot feature
- Using Dim-Edit

PANEL SETUP

Located on the back of a Dimmer-Switch is a bank of six DIP switches that are used to record / configure a Dimmer-Switch.

Dip-Switch	Function	Set to:
1	Terminating	ON
2	Internal Use	ON
3	Internal Use	ON
4	Internal Use	OFF
5	Snapshot	OFF (<i>ON when using the Snapshot feature</i>)
6	Live DMX	OFF (<i>ON when using Live DMX</i>)

DIP-SW 1

This switch is used to connect the DMX512 terminating resistor. In all cases this should be set to ON.

DIP-SW 2-4

Internal Use Only. Should be set to the above.

DIP-SW 5

Used for configuration and recording.

DIP-SW 6

Used to allow Fader 6 to fade Live DMX to the output.

SNAP-SHOT

Memories (only): To program a memory follow the procedure below:

Connect the Dimmer-Switch to a DMX source via J3

Set all faders to the 'OFF' position

Set Dip-Switch 5 to ON position

Power on the Dimmer-Switch (*GM LED will flash*)

If a memory is full the LED will be lit

To Snap-Shot a memory move corresponding fader above 75% then back below 25%. LED will now be lit

Once finished Set Dip-Switch 5 to the 'OFF' position

If a memory has been recorded it cannot be reprogrammed.

To erase all memories set the *GM* fader to FULL -> OFF -> FULL -> OFF

To program sequences Dim-Edit is used to define the sequence structure and assign sequences to the faders.

MERGE MODE

Dimmer-Switch works in HTP mode on all fader playbacks.

EXAMPLE APPLICATIONS

OVERVIEW Dimmer-Switch can be used as a simple controller or part of a system using its Live DMX Input.

Here are two examples to illustrate the different systems achievable.

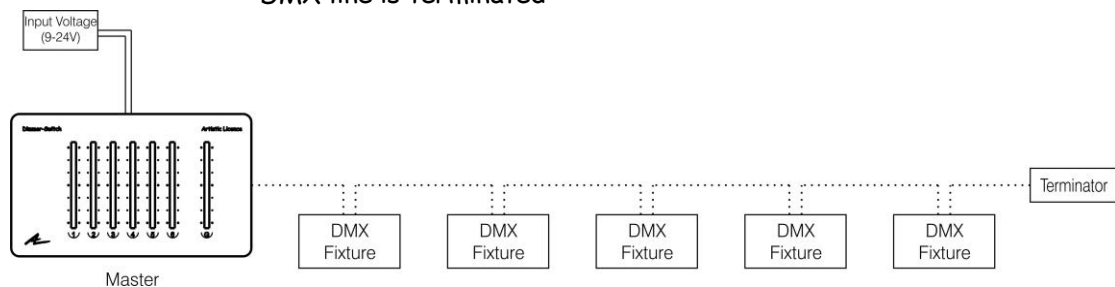
STAND-ALONE MODE

This is the simplest system that can be achieved. It contains a Dimmer-Switch panel that can control all 512 channels and working independently. All DMX is generated from its internal memories and sequences .

WIRING

The wiring of this system is as follows.

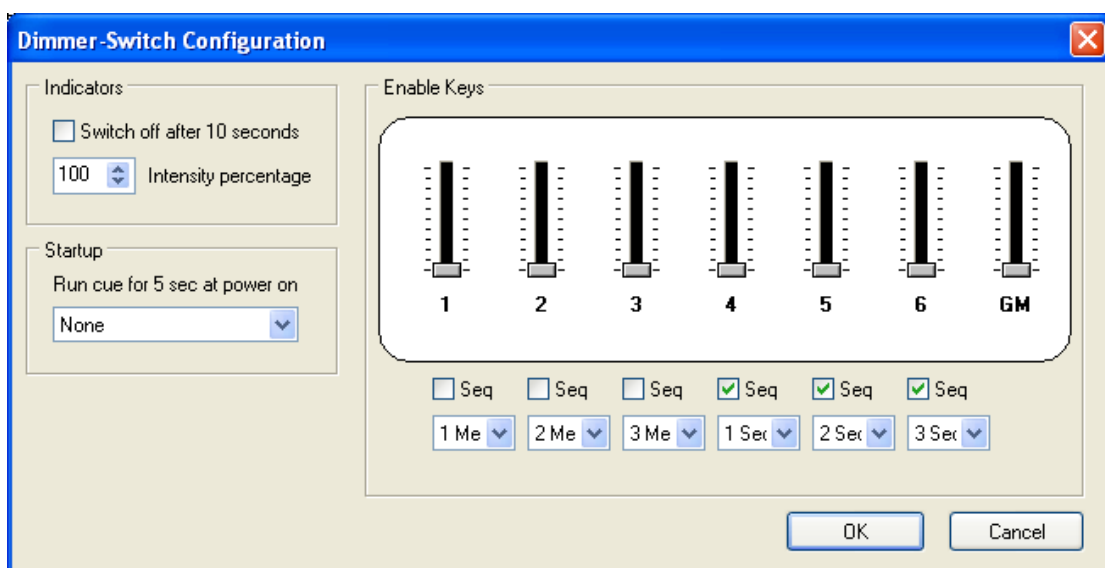
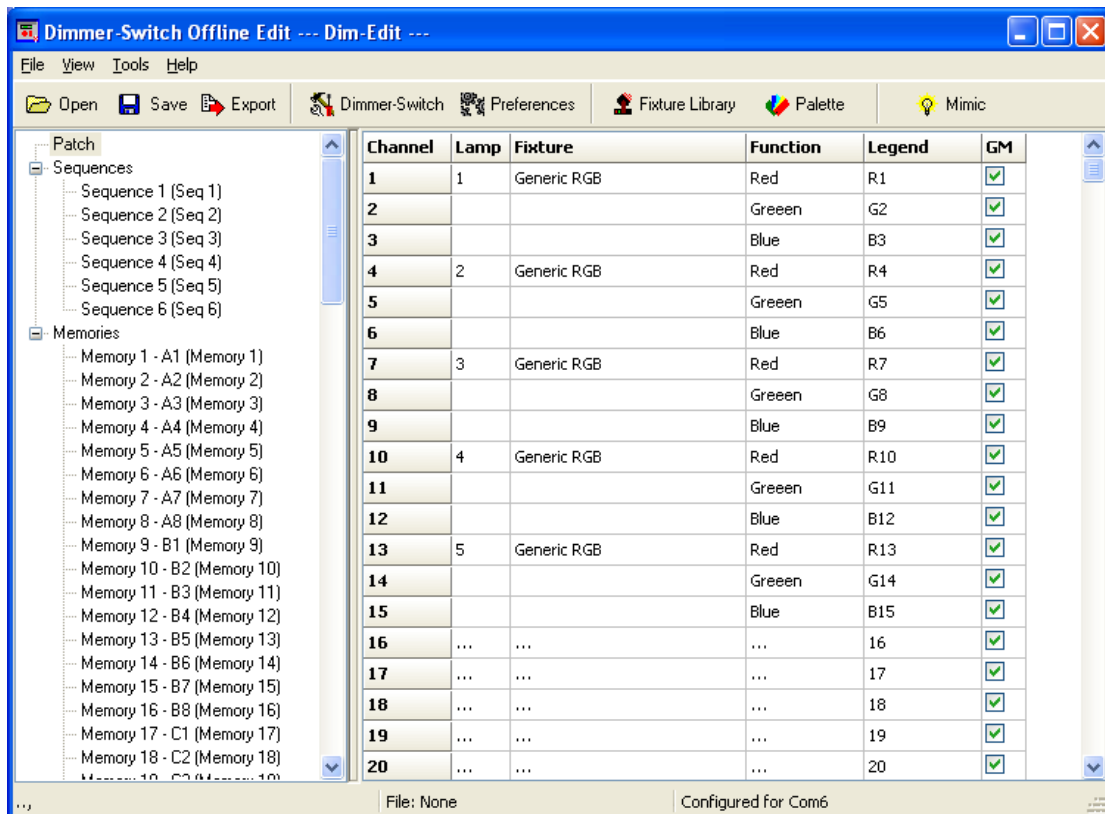
A Dimmer-Switch at the start of the DMX cable
DMX512 fixtures located anywhere on the DMX cable
DMX line is terminated



DIM-EDIT

Below is an example of Dim-Edit programming.

3 channel fixtures have been used
 Each channel is controlled by the Grand-Master
 Fader 1 - 3 have been assigned to memory playbacks
 Fader 4 - 6 have been assigned to sequence playbacks



LIVE DMX

This system is similar to the previous example, however Fader 6 is used to merge in DMX from an external source.

An example of using this system would be a permanent installation where simple control is needed for the lighting equipment on a day to day basis; but they also have external controllers brought in for special events. E.g. A Night-Club

WIRING

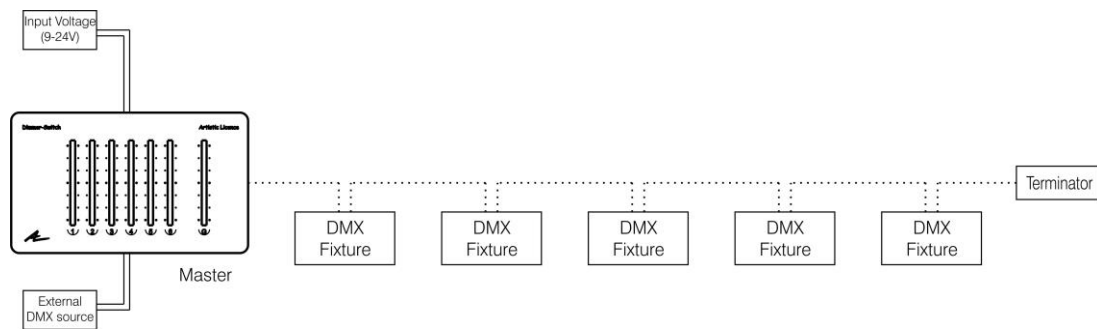
The wiring of this system is as follows.

A Dimmer-Switch panel at the start of the DMX cable configured with Dip-SW 6 set to the 'ON' position

The external DMX source to be connected to J3

DMX512 fixtures located any where on the DMX cable

DMX line is terminated



DIM-EDIT

This Dimmer-Switch can be programmed in the same way as the previous example.

D I M - E D I T

OVERVIEW Dim-Edit is a Windows application that provides the following functionality:

An on-line editor that allows live programming of moving lamps.
An off-line editor allowing all Dimmer-Switch Memories, Sequences and configuration data to be programmed in a console style format.
A Moving Lamp personality editor.
File compatibility with other Artistic Licence products.

Dim-Edit is compatible with Windows 95, 98, ME, NT5, 2000 & XP.

INSTALL

Dim-Edit is installed as follows:

Insert the CD and select the 'Enter CD' option.
Click the 'Software' button, followed by the 'Dim-Edit' button.
Select the 'Run this program from it's current location' option and press 'OK'.
Dependent upon your computer setup, you may see a security warning. Click on the 'Yes' button to continue.
The Install Shield program will start and guide you through the remaining steps of the installation procedure.

HARDWARE

Dim-Edit requires the following minimum specification to run:

Pentium at 133mhz or higher PC Compatible.
Windows operating system.
Mouse.
VGA 640 x 480 or better.
10 MByte Hard disc space.
32 MByte ram.
Serial (RS232) port with 9 pin connection.

COMMS

Dim-Edit communicates with the Dimmer-Switch via the RS232 interface of the PC. Dim-Edit can access any COM port from 1 to 8. If you are using a USB to RS232 adapter, please note that this often installs as COM5.

A programming cable is provided with Dim-Edit. The cable contains the RS232 to RS485 conversion electronics required for communications between the PC and Dimmer-Switch. Please ensure Dimmer-Switch has been set to Master.

This cable can also be used with the following products: Common-Sense, Micro-Scope 3a and Show-Control.

If an RS232 port is not available a USB to RS232 adaptor can be used. They are available from most Computer retailers. Please contact Artistic Licence for more details

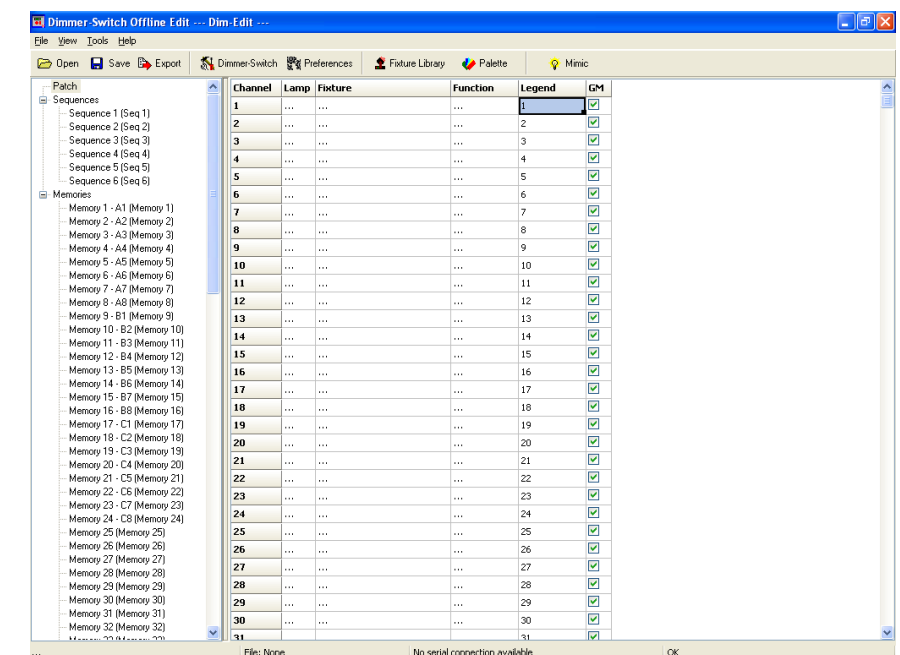
Note: Not all USB to RS232 adaptors are compatible with this system.

MAIN SCREEN

Dim-Edit displays the following screen when started.

The left panel of the screen displays the information store. This lists all the data that will be downloaded to Dimmer-Switch. This is referred to as the Show Panel.

The right panel is used to display the spreadsheet or fader style information for editing presets and lamp personalities. This is referred to as the Edit Panel.

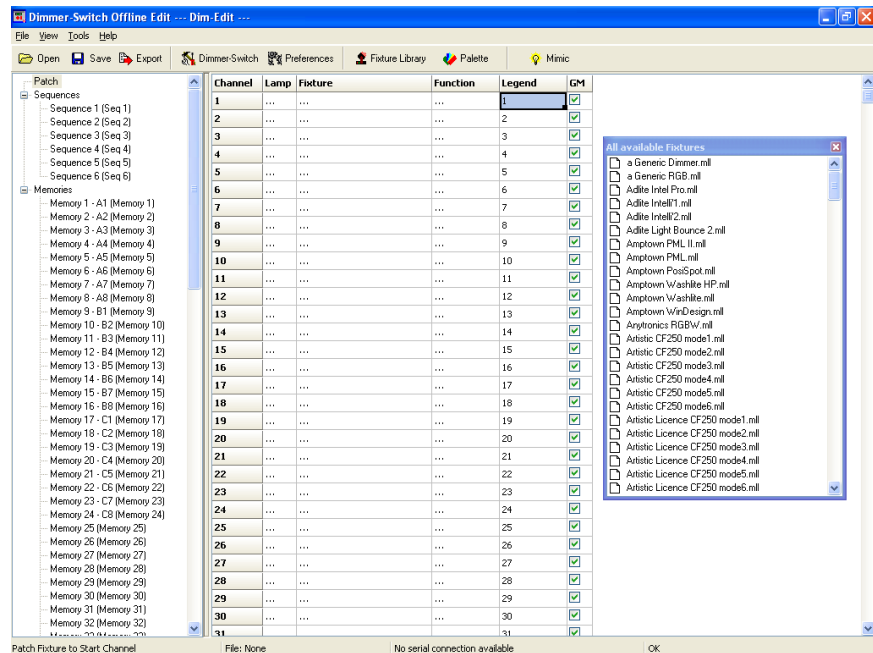


SETTING THE PATCH

The patch is used to select the DMX512 channel allocation for all lamps to be controlled. Lamps can be multi-channel moving lamps or single channel dimmers. The patch is also used to set the Grand-Master assignment for each channel.

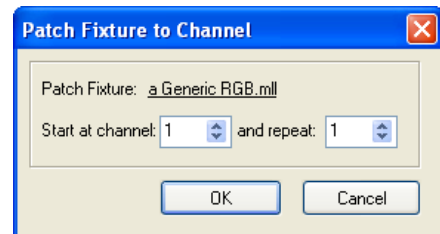
Select Patch in the Show Panel. The patch spreadsheet is then displayed in the Edit Panel.

Click the Fixture Library button at the top of the screen. The palette of available fixtures is then displayed:

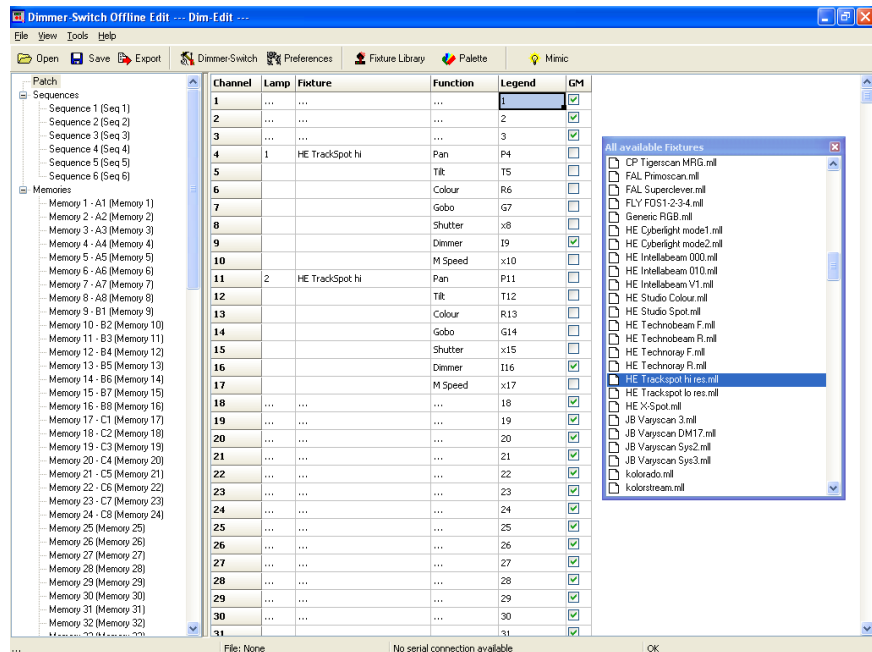


Select the required lamp from the palette and drag it onto the required start channel of the patch.

A dialogue is displayed which confirms the start channel and the number of lamps to be patched.



The example shown will patch two High End Trackspots starting at channel 4. The resulting patch is shown on the next page:



PATCH COLUMNS

The columns of the Patch display provide the following information:

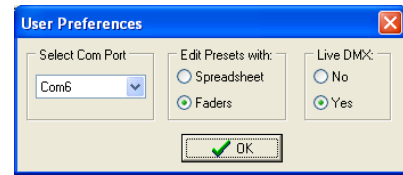
Column	Name	Purpose
1	Channel	Lists the DMX512 channel number from 1 to 512
2	Lamp	The number of the moving lamp. Dim-Edit generates this automatically, numbering lamp 1 as the lowest DMX channel value.
3	Fixture	The text name of the moving lamp. This corresponds to the name in the Fixture Library Palette.
4	Function	Describes the lamp function controlled by this channel.
5	Legend	Shows a three-character mnemonic that represents the channel function and channel number.
6	GM	Indicates if a channel is controlled by the Grand-Master function.

DELETING A LAMP

To delete a lamp from the patch, simply right click on the lamp. A popup menu is displayed offering this option.

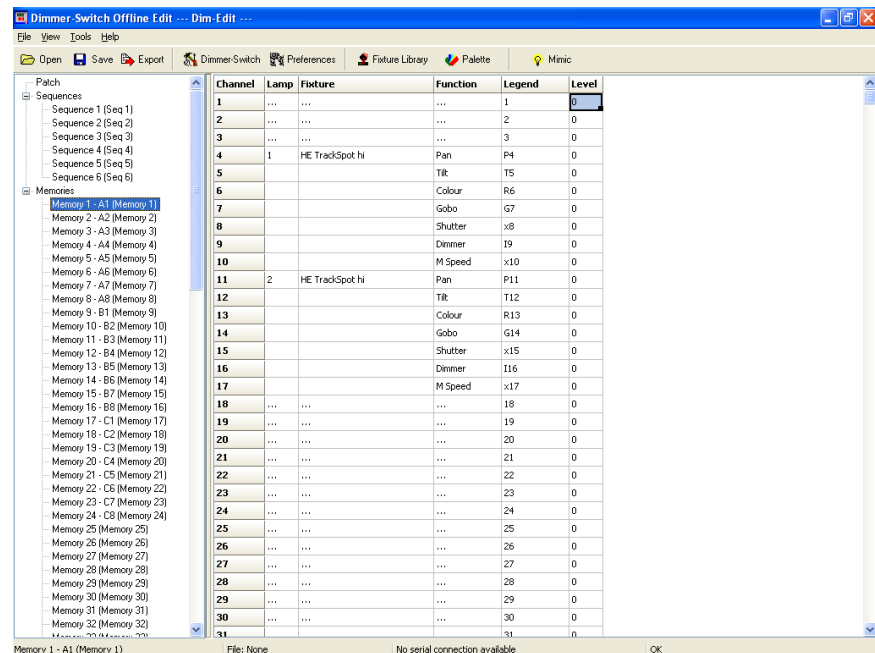
EDITING MEMORIES

To edit a memory, select the required memory in the Show Panel. Depending upon the setting in the Preferences menu, the Edit Panel will display either a spreadsheet or an array of faders.



EDITING MEMORIES BY SPREADSHEET

When editing memories in spreadsheet mode, the Edit Panel displays as shown below:



MEMORY COLUMNS

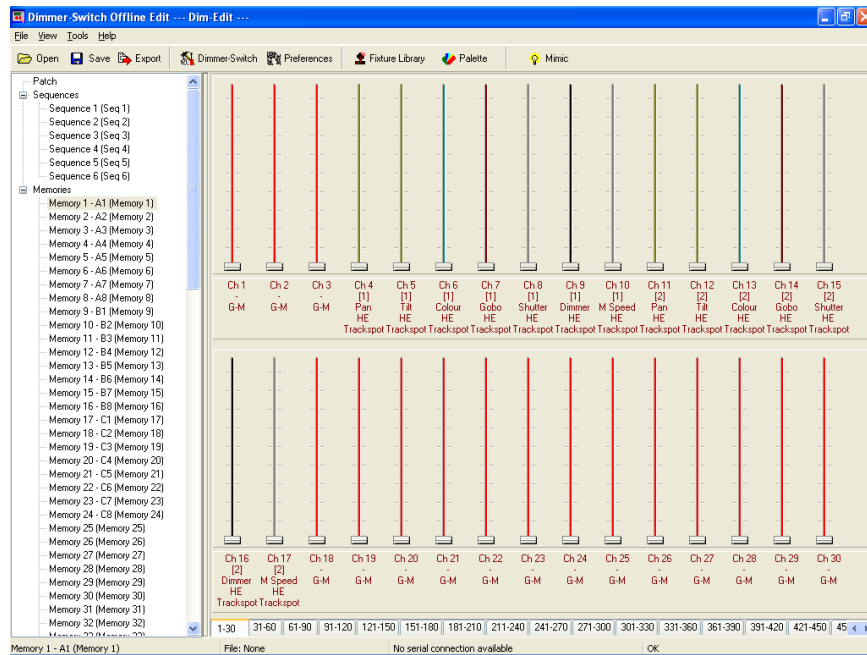
The columns of the Memory spreadsheet are similar to those displayed in Patch mode. Configuration of Grand-Master and zones is not available through the memory screen.

Column	Name	Purpose
1	Channel	Lists the DMX512 channel number from 1 to 60
2	Lamp	The number of the moving lamp. Dim-Edit generates this automatically, numbering lamp 1 as the lowest DMX channel value.
3	Fixture	The text name of the moving lamp. This corresponds to the name in the Fixture Library Palette.
4	Function	Describes the lamp function controlled by this channel.

5	Legend	Shows a three character mnemonic that represents the channel function and channel number.
6	Level	The level of this channel in this memory. The level can range from 0 to 255.

EDITING MEMORIES BY FADER

When editing memories in fader mode, the Edit Panel displays as shown below:



FADER ROWS

Each channel of each moving lamp or dimmer is displayed as a fader. Below each fader, a 5 line text display describes the function:

Row	Name	Purpose
1	Channel	The Channel number ranging from 1 to 512.
2	Lamp	The Lamp Number ranging from 1 to 512. Channels that are not patched do not have a lamp number but can still be programmed.
3	Function	A text description of the lamp attribute controlled by this fader. If the channel is not patched, 'G-M' is displayed indicating that the channel is controlled by the Dimmer-Switch Grand-Master fader.
4/5	Name	The name of the moving lamp.

**SETTING
LEVELS**

Dragging the fader knob with the mouse sets fader levels.

**EDITING
LEVELS**

Right clicking on any fader produces a popup menu. The popup menu provides numerous memory editing functions as detailed in the table below.

The fader that is right clicked is described as the selected channel in the table below:

Entry	Name	Purpose
1	Blackout Channel	Sets channel to 0.
2	Blackout Fixture	All channels in the lamp are set to 0 in this memory.
3	Blackout Memory	Sets all channels to 0 in this memory.
4	Blackout INTENSITY channels of this fixture	If the selected channel is part of a moving lamp and it is an intensity (dimmer) channel, all intensity channels of the lamp are set to 0 in this memory.
5	Blackout POSITION channels of this fixture	If the selected channel is part of a moving lamp and it is a position (pan or tilt) channel, all position channels of the lamp are set to 0 in this memory.
6	Blackout COLOUR channels of this fixture	If the selected channel is part of a moving lamp and it is a colour channel, all colour channels of the lamp are set to 0 in this memory.
7	Blackout BEAM channels of this fixture	If the selected channel is part of a moving lamp and it is a beam (iris, gobo, prism) channel, all beam channels of the lamp are set to 0 in this memory.

Entry	Name	Purpose
8	Blackout CONTROL channels of this fixture	If the selected channel is part of a moving lamp and it is a control (lamp strike etc.) channel, all control channels of the lamp are set to 0 in this memory.
9	Blackout all INTENSITY channels from memory	If the selected channel is part of a moving lamp and it is an intensity channel, all intensity channels in this memory are set to 0.
10	Blackout all POSITION channels from memory	If the selected channel is part of a moving lamp and it is a position channel, all position channels in this memory are set to 0.
11	Blackout all COLOUR channels from memory	If the selected channel is part of a moving lamp and it is a colour channel, all colour channels in this memory are set to 0.
12	Blackout all BEAM channels from memory	If the selected channel is part of a moving lamp and it is a beam channel, all beam channels in this memory are set to 0.
13	Blackout all CONTROL channels from memory	If the selected channel is part of a moving lamp and it is a control channel, all control channels in this memory are set to 0.
14	Remove fixture from patch	Removes this fixture from the patch.

USING PALETTES

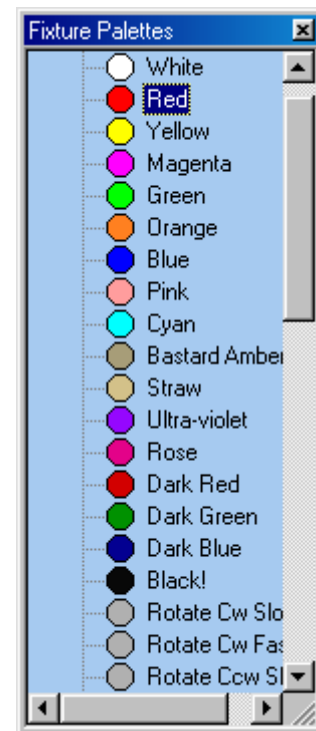
To display the palette, click on the Palette button at the top of the screen. The Palette contains 50 entries that contain settings for every attribute of every fixture.

These values are defined in the Fixture Editor.

For ease of use, the palette entries are coded by colour, but they are equally valid for use with position and beam attributes.

The palette can be used in both spreadsheet and fader view of a memory. Simply drag the required palette entry and drop it on the required fixture. The cursor changes to a hand icon with a small moving lamp icon.

The entire fixture changes to represent the levels contained in the palette. This drag and drop function can be further modified by combination of the Shift, Ctrl and Alt keys as detailed in the table below.

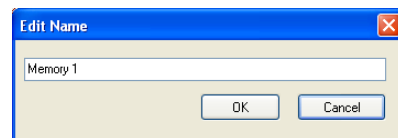


Hold Key	Cursor	Dropping on Channel Type	Result
None	Moving Lamp Icon	All	Entire fixture is set to the level contained in the palette.
Shift	Fader Icon	All	Only the channel that is dropped upon will change to the palette value.
Ctrl	Light Bulb	Intensity	All intensity channels within the fixture change to the levels contained within the palette.
	Arrows	Position	All intensity channels within the fixture change to the levels contained within the palette.
	Colour Wheel	Colour	All intensity channels within the fixture change to the levels contained within the palette.

Hold Key	Cursor	Dropping on Channel Type	Result
Ctrl cont	Diamond Gobo	Beam	All intensity channels within the fixture change to the levels contained within the palette.
	Hammer	Control	All intensity channels within the fixture change to the levels contained within the palette.
Alt	Multiple Lamps	All	Sets all patched fixtures to the levels contained in the palette.

EDITING MEMORY LEGENDS

The name or legend of each memory can be changed by right clicking on the required memory in the Show Panel.



SEQUENCE

To edit a Sequence, select the required Sequence in the Show Panel.

A spreadsheet is displayed as shown below:

Step	Memory	Time
1	1 Memory 1	Fade 02.0s
2	2 Memory 2	Fade 02.0s
3	3 Memory 3	Fade 02.0s
4	4 Memory 4	Fade 02.0s
5	5 Memory 5	Fade 02.0s
6	6 Memory 6	Fade 02.0s
7	7 Memory 7	Fade 02.0s
8	8 Memory 8	Fade 02.0s
9	9 Memory 9	Fade 02.0s
10	10 Memory 10	Fade 02.0s
11	...	Loop to Seq 1
12	...	Loop to Seq 1
13	...	Loop to Seq 1
14	...	Loop to Seq 1
15	...	Loop to Seq 1
16	...	Loop to Seq 1
17	...	Loop to Seq 1
18	...	Loop to Seq 1
19	...	Loop to Seq 1
20	...	Loop to Seq 1
21	...	Loop to Seq 1
22	...	Loop to Seq 1
23	...	Loop to Seq 1
24	...	Loop to Seq 1
25	...	Loop to Seq 1
26	...	Loop to Seq 1
27	...	Loop to Seq 1
28	...	Loop to Seq 1
29	...	Loop to Seq 1
30	...	Loop to Seq 1
31	...	Loop to Seq 1

**SEQUENCE
COLUMNS**

The columns in the Sequence spreadsheet function as shown in the table below:

Column	Name	Purpose
1	Step	Sequences contain 100 steps that can each contain a Memory.
2	Memory	The number of the Memory assigned to this step.
3	Time	The fade or wait time of this step.
4	Legend	The name or legend of the Memory assigned to this step.

**SEQUENCE
EDITING**

By default, each sequence is set up as a 10 step sequence with consecutive memory numbers.

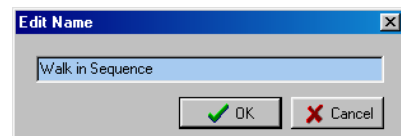
To edit the memory assigned to a step, simply type a new number in the Memory column. The legend will update to confirm the change.

TIME EDITING

The time field provides a pull down list that contains all the available time and control options.

**EDITING
SEQUENCE
LEGENDS**

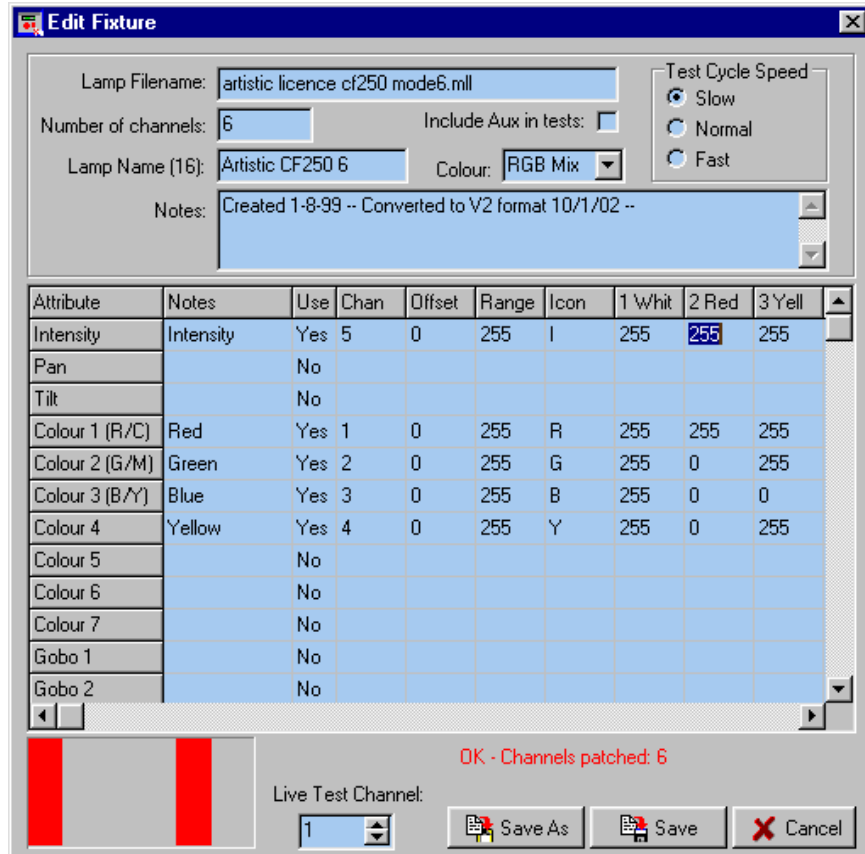
The name or legend of each Sequence can be changed by right clicking on the required Sequence in the Show Panel.



EDITING FIXTURES

To edit a fixture personality, double click on a fixture entry in the Fixture Palette.

The following dialogue is displayed (this example is the Artistic Licence Colour-Fill CF250 mode 6).



SPREAD SHEET

The spreadsheet displayed allows each of the possible fixture attributes to be controlled. Each attribute (pan, tilt etc.) contains the settings detailed below:

Column	Name	Function Result
1	Attribute	Defines the fixture channel type.
2	Notes	This field is simply for your information; it is not downloaded to the Dimmer-Switch.
3	Use	Set to Yes if this channel function is active.

Column	Name	Function Result																						
4	Chan	This is the channel address for this lamp attribute. Numbering is in the range 1 to 38.																						
5	Offset	This is the minimum value of data that is valid for this attribute. Normally this is zero, however some fixtures (the MadScan for example) mix attributes on a single channel. If intensity is controlled over the range 128 to 255, you must enter a value of 128 in this field.																						
6	Range	This is the range of values of data that are valid for this attribute. Normally this is 255, however some lamps (the MadScan for example) mix attributes on a single channel. If intensity is controlled over the range 128 to 255, you must enter a value of 127 in this field.																						
7	Icon	This is a single letter used as an abbreviation to describe the channel attribute. The following are the default abbreviations:																						
		<table border="1"> <thead> <tr> <th>Abbreviation</th> <th>Attribute</th> </tr> </thead> <tbody> <tr> <td>P</td> <td>Pan</td> </tr> <tr> <td>T</td> <td>Tilt</td> </tr> <tr> <td>R</td> <td>Red</td> </tr> <tr> <td>G</td> <td>Green</td> </tr> <tr> <td>B</td> <td>Blue</td> </tr> <tr> <td>C</td> <td>Colour</td> </tr> <tr> <td>g</td> <td>Gobo</td> </tr> <tr> <td>I</td> <td>Intensity</td> </tr> <tr> <td>i</td> <td>Iris</td> </tr> <tr> <td>p</td> <td>Prism</td> </tr> </tbody> </table>	Abbreviation	Attribute	P	Pan	T	Tilt	R	Red	G	Green	B	Blue	C	Colour	g	Gobo	I	Intensity	i	Iris	p	Prism
		Abbreviation	Attribute																					
		P	Pan																					
		T	Tilt																					
		R	Red																					
		G	Green																					
		B	Blue																					
		C	Colour																					
		g	Gobo																					
I	Intensity																							
i	Iris																							
p	Prism																							
8-58	Palette	This is the default data value for each attribute of each palette.																						

HEADER

The header to the spreadsheet allows overall configuration of the fixture:

Field	Function
Lamp Filename	The name of the file that contains this fixture personality.
Number of Channels	Used to enter the total number of channels required by this fixture.
Lamp Name	This is the 16 character name of the fixture.
Colour	Defines whether the fixture uses red, green, blue or cyan, magenta, yellow colour mixing.
Include Aux In Test	This field is for file compatibility with Micro-Scope 3a.
Test Cycle Speed	This field is for file compatibility with Micro-Scope 3a.
Notes	This field is provided to document revisions to the personality.

FOOTER

The footer to the spreadsheet provides two additional controls:

Field	Function
Graph	The graph shows the level of each consecutive fixture channel for the selected palette. It also changes colour to reflect the colour assigned to the palette.
Live Test Channel	This defines the DMX512 channel to use for live testing the fixture data. If a fixture is available, this greatly simplifies the task of data entry.
Warning Display	<p>The Warning Display provides help with entry of complex lamps. Dim-Edit analyses the data as you enter it, and checks for any possible problems. The display options are:</p> <p>Error: Channel x is duplicated: This means that you have entered identical channel numbers for two or more lamp functions.</p> <p>Error: There are x channels over patched: This means that you have entered a channel number that exceeds the number in 'Number of Channels'.</p> <p>Error: There are x functions over patched: This means that you have entered more lamp functions than the number in 'Number of Channels'.</p> <p>Warning: There are x functions unpatched: This means that you have entered less lamp functions than the number in 'Number of Channels'.</p> <p>Unpatched functions transmit with a zero channel level. This is therefore a warning not an error. On complex lamps, you will regularly see this message.</p> <p>OK: X channels patched: This message simply confirms that all is well.</p>

FINISHING EDITING

To finish the editing there are three options:

Save As: Allows the edited personality to be saved as a new personality. This is useful when entering a new mode for a fixture as only the differences need be entered.

Save: Simply saves the edited personality.

Cancel: Drops any changes made during the editing session.

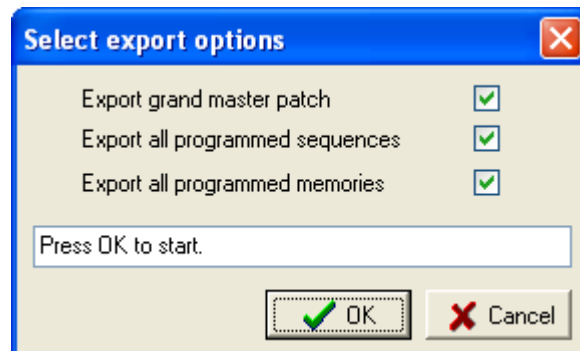
MENU

The main menu functions can also be accessed from the button panel at the top of the screen. The main functions are:

Open:	Used to load a file from disc into Dim-Edit.
Save:	Used to save a file from Dim-Edit to disc.
Import:	Used to read an USITT ASCII text format file.
Export:	Used to send data from Dim-Edit to Dimmer-Switch.

EXPORT

Export sends data from Dim-Edit to the Dimmer-Switch. Lamp Personality and Text Notes are not sent to the Dimmer-Switch, so you should save your show to disc as well as exporting. Ensure that Dimmer-Switch is switched on and connected to the PC Com port. Once the Export key is pressed, the following is displayed:



When ready to export click the OK key. Dim-Edit will then export the data. The export process may take up to three minutes. Only the memories that are used are exported. When the Export process finishes, Dimmer-Switch will automatically return to normal operation.

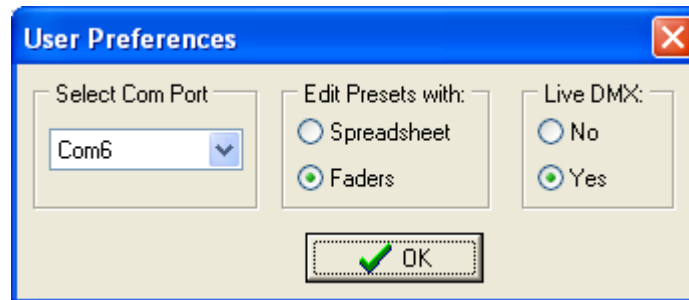
During the download process, the Grand-Master fader will flash to show that data is being received. If an error occurs, all fader LED's will flash. If this occurs, cancel the Export and start the process again.

LIVE EDITING

Dim-Edit is able to send live DMX512 data via Dimmer-Switch when editing.

This allows the show to be programmed visually with the aid of the actual lighting rig.

The Setting dialogue allows this feature to be enabled and also the PC Com port to be selected:



USITT ASCII IMPORT

Dim-Edit allows the import of USITT ASCII text files. This is an international standard designed to allow lighting data to be transferred between differing manufacturers.

Dim-Edit implements the following subset of commands:

CLEAR ALL: All memories will be cleared to zero channel levels. If this command is removed, the import will effectively merge data into the existing show.

CUE: Cue numbers are not used, the data is simply loaded to the next consecutive memory number. The cue is automatically assigned to the next available sequence step.

TEXT: The text field is loaded into the memory's legend.

UP: The up fade is assigned to the sequences step fade time. If the fade time is larger than Dimmer-Switch's limit, additional wait steps are inserted to match the time.

FOLLOW ON: The follow on time is used to insert additional wait steps in the sequence.

LINK: The link cue number is used to define the step of sequences to which the end of the last sequence will link. This allows the import of shows that have an initialisation section followed by a continuous loop.

I N D E X

A

Attribute · 42, 43

C

Channel · 10
COMMS · 30
Connections · 13
Cue · 33, 34, 35, 36

D

Dim-Edit · 10, 14, 17, 21, 23, 29, 30, 46
Dimmer-Switch · 9, 10, 19, 24, 29, 30
DIP-Switches · 16, 17
Discovered · 18
DMX In · 14
DMX Out · 14
DMX512 · 10, 14, 19, 22, 27

E

Example Applications · 19, 22, 24, 26, 27
Export · 46

F

Flash Memory · 12

G

Gobos · 43
Grand · 35
Grand-Master · 11, 18, 21, 33, 34, 35, 40

H

Hardware · 29
HTP · 18

I

Install · 29

L

Lamp · 30, 42, 43, 44, 45
Live DMX · 10, 12
Live Programming · 10

M

Memories · 10, 17, 34
Menu · 46
Moving Lamps · 29

O

On-Line · 29
Overview · 11

P

Palettes · 38
Patch · 32
PC · 46
Personalities · 30
Playback Faders · 11, 18, 21
Power · 13
Programming · 14

Q

Quick Start · 9

S

Save · 45, 46
Sequence · 33, 34, 35, 36
Sequence Control · 12
Sequence Linking · 12
Sequences · 10, 40, 41
Snap-Shot · 10, 17
Spreadsheet · 30, 34, 42, 44, 45
Static Memories · 12

T

Termination · 15, 19, 22, 24, 26, 27

U

USB · 9, 30

W

Windows · 29
Wiring · 14

Artistic Licence

Studio 1 Spectrum House
32-34 Gordon House Road
London
NW5 1LP
Tel: +44 (0)20 88 63 45 15
Fax: +44 (0)20 84 26 05 51
Email: Sales@ArtisticLicence.com



The information contained in this document is subject to change without notice. Artistic Licence Engineering Ltd. makes no warranty of any kind with regard to this material, including, but not limited to, the implied warranties of fitness for a particular purpose.

Artistic Licence Engineering Ltd. shall not be liable for errors contained herein or for incidental or consequential damages in connection with the furnishing, performance or use of this material.

All trademarks are acknowledged.