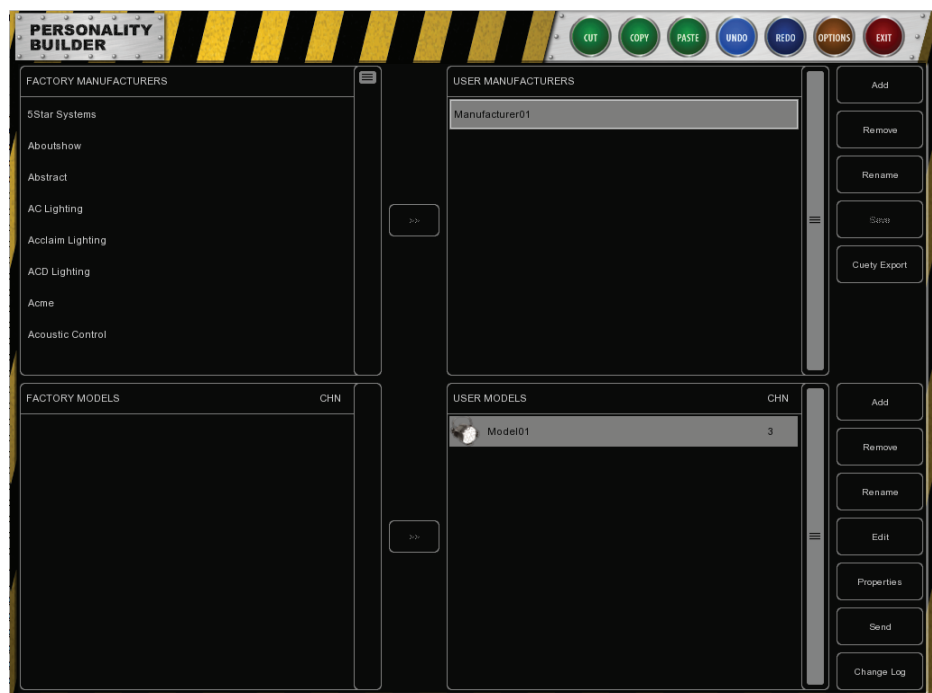


# vBUILDER MANUAL



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# Chapter 1

## Introduction

The Personality Builder is a software program that you can use to create or modify the personality fles used by Cuelux. It is available on Mac and Windows and you can download it free of charge from <http://www.visualproductions.nl/downloads>.

This chapter will describe the Personality Builder software by guiding you through the software. This text is written for Builder version 1.3.91.

### 1.1 Overview

The software is built in two sections, the Factory section and the User section.

Within the factory section nothing can be changed, these are the default personality fles as supplied by Visual Productions. The user section contains all the User Manufacturers which can be modified with the Personality Builder.

### 1.2 Further Help

If, after reading this manual, you have further questions then please consult the online forum at <http://forum.visualproductions.nl> for more technical support.

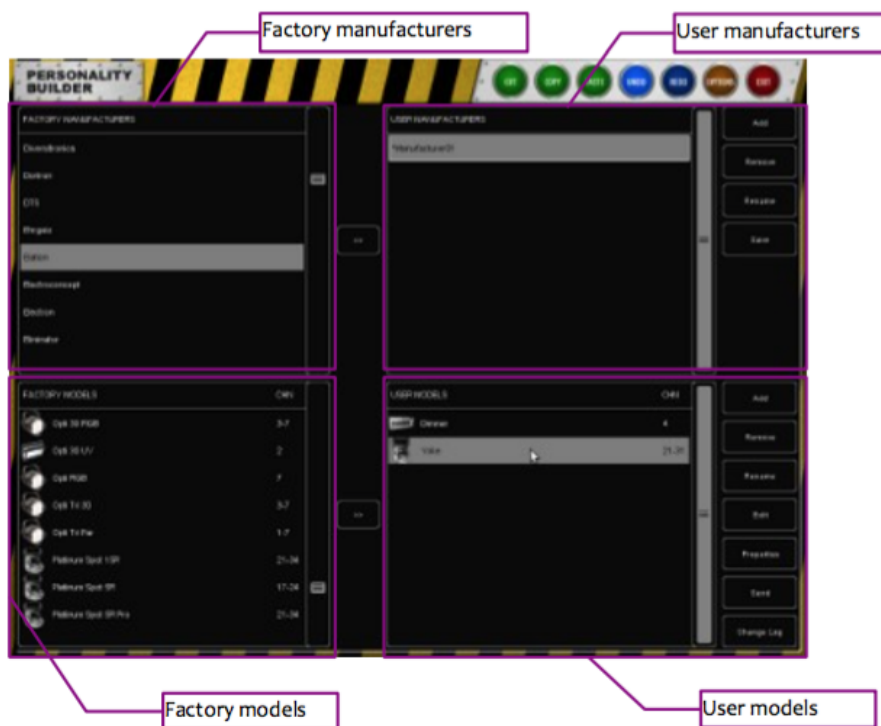


Figure 1.1: vBuilder

## Chapter 2

# Diagram

In the DMX diagram you can see what channels are being used and which are not.

You are also able to see if there is any DMX overlap; some fixtures require a DMX overlap, whilst other times this overlap would mean that there is an error.

### 2.1 Legend

**Green** represents empty spaces in a DMX channel

**Blue** represents used space in a DMX channel

**Red** represents an overlap

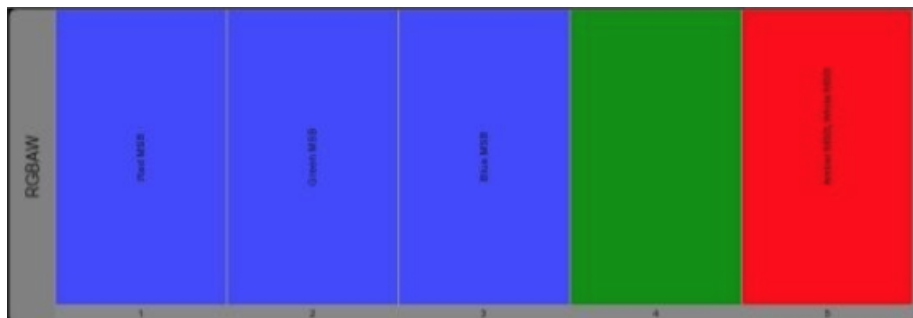


Figure 2.1: DMX Diagram

## Chapter 3

# Personalities

Although you cannot edit Factory Manufacturers directly, you can copy them to your User Manufacturers and then change them from here.

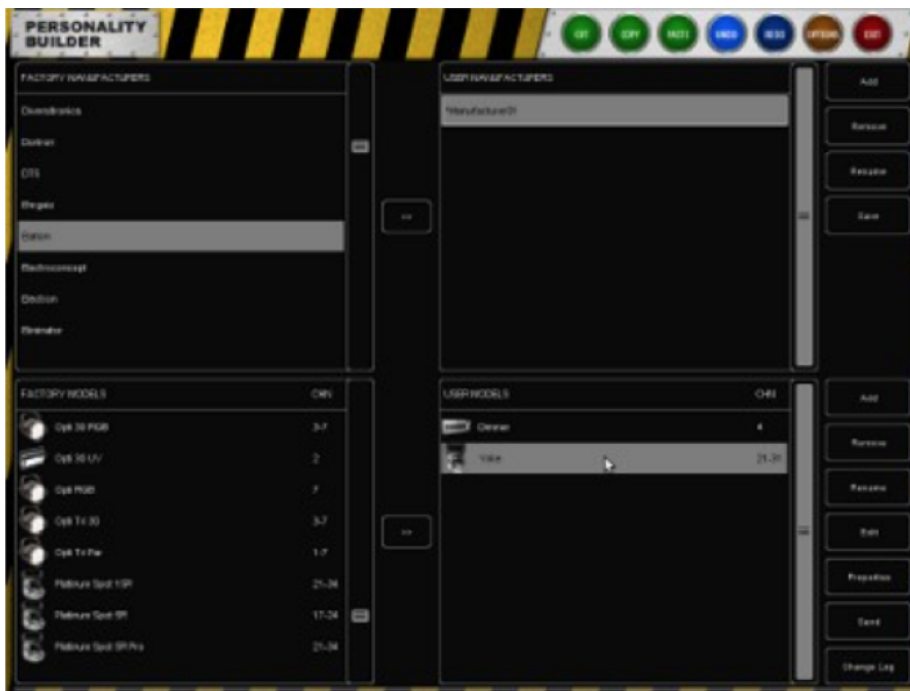


Figure 3.1: User personalities

### 3.1 Duplicate Factory Manufacturers

If you would like to add a new model to a Factory Manufacturer you have to copy the manufacturer to the User Manufacturers.

To do so, select the Factory Manufacturer and click on the >>.

Since the manufacturer is now in the User Manufacturers you are able to change and add models.

## **3.2 Duplicate Factory Models**

It is also possible to add a Factory Model to your User Manufacturers.

Select the User Manufacturer that you would like to use, and then select the Factory Model that you would like to copy.

Press the >>next to the models section to copy the Factory Model to the User Models.

Now you are able to change the existing model without having to create a new one from scratch.

## **3.3 Creating a new manufacturer**

To add a new manufacturer to your personality library, click on the ADD button next to the User Manufacturer section.

This will add a manufacturer named Manufacturer01. To rename select this and click the RENAME button.

## **3.4 Creating a new model**

Select a User Manufacturer and click on the ADD button next to the User Models section to add a new model.

To rename the model, click RENAME and enter the new name of this fixture.

## **3.5 Saving the personality file**

When you have finished editing a personality you can press the save button next to the User Manufacturers section, this will save the manufacturer to your disc.

When a manufacturers name has a \* in front of it, it means that it has been modified and that it needs to be saved.



## Chapter 4

# Model Properties

In the main overview, select the model that you want to edit and click PROPERTIES.

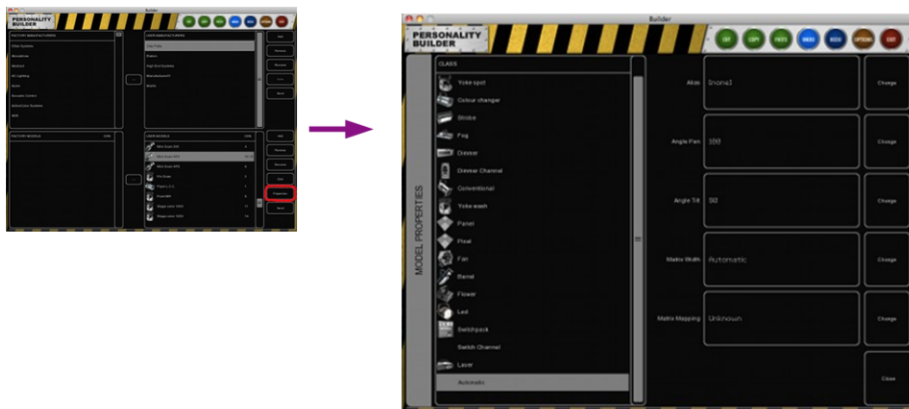


Figure 4.1: Model Properties

This dialog allows you to enter the following properties:

Alias	The Alias field defines a default name when patching this model in Cuelux. If you leave this field blank it will use the name of the model instead.
Angle Pan	Maximum pan movement, when the light is not a moving light you do not need to change this.
Angle Tilt	Maximum tilt movement, when the light is not a moving light you do not need to change this.
Matrix Width	Width of a matrix; by setting the width Cuelux will calculate the height of the matrix according to the number of sub-fixtures.
Matrix Mapping	If the model has multiple subs and is used for matrix control, then here you can fill in the order in which the subs are layed out.
Class	The Class of a model is set to Automatic by default; Cuelux determines what type of fixture it is and shows the relating icon. You can override this by manually selecting a class.

# Chapter 5

## Edit

In the main overview, select the model that you want to edit and click Edit.

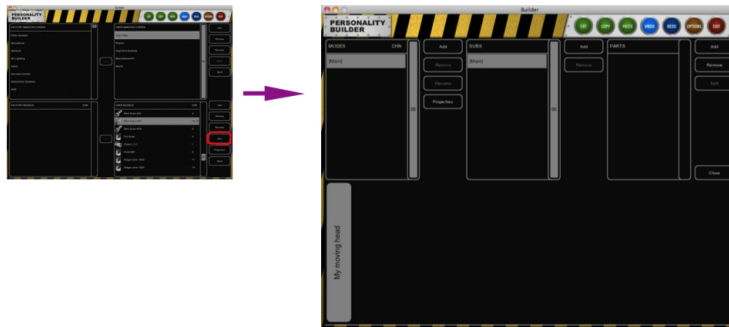


Figure 5.1: Editing models

### 5.1 Modes

Please create modes if the fixture has multiple modes in which it can operate. When you need to add multiple modes you can define the parts that all modes have in common in the [Main] mode.

For example the Clay Paky Mini Scan HP3, this model has two modes, an 8-bit mode and a 16-bit mode. Please take a look at the picture below.

### 5.2 Subs

Some fixtures use subs to control a part of the whole fixture, a dimmer for example has multiple Subs. Each Sub can have its own part and can be individually selected and programmed in Cuelux.

For example the Elation Cyber Pak: this fixture has 4 different subs which all have their own dimmer.



Figure 5.2: Modes

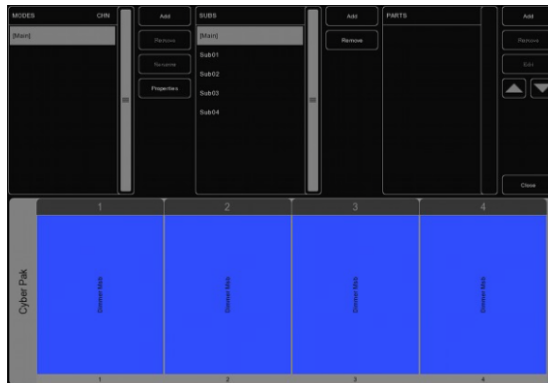


Figure 5.3: Subs

## 5.3 Parts

To start adding Parts to your model click ADD on the parts section. A list with all the available parts will come up, select the part that you would like to add and click Ok.

### 5.3.1 Position

Add a position part if a fixture features pan & tilt movement. Select the element from the AVAILABLE list and click on the  $\lambda$  button. Once included in the list on the right, you can change the CHANNEL

Once the element is added to the personality file you can change the CHANNEL and the RANGE values of the element.

### MSB/LSB

The acronyms MSB (Most Significant Byte) and LSB (Least Significant Byte) are frequently used when creating new personality files.



Figure 5.4: Parts

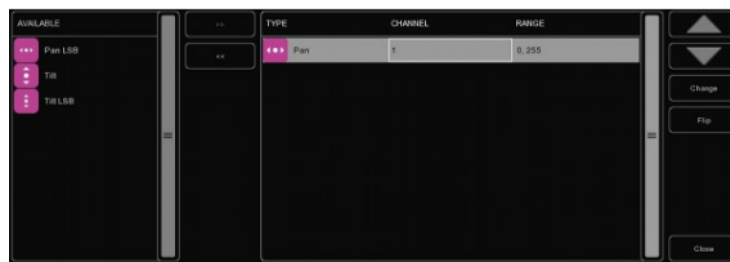


Figure 5.5: Position

- MSB Controls the 8-bit operations of the fixture (sometimes referred to as Coarse).
- LSB Controls the 16-bit operations of the fixture, 16-bit is used for the fine adjustments. It can only be used if the fixture supports 16-bit (sometimes referred to as Fine). When a fixture supports 16-bit controls, you have to define both MSB and LSB!

### 5.3.2 Shutter

In the shutter part you can add a shutter closed and three different strobe functions. If no function is set by Cuelux, so no Closed shutter, Strobe Linear, etc, then the channel is set to its idle value. You do not need to define an idle value in the Builder; Cuelux will automatically choose a value that is not used for anything else. Please note that you can use the RESERVED range to prevent Cuelux from using certain values as idle.

Several other parts use idle values as well when not activated, like Reset, Lamp, Display, etc. Therefore these parts will also feature the reserved ranges.

### 5.3.3 Dimmer, Iris, Focus & Zoom

The Dimmer, Iris, Focus and Zoom have Control and Control LSB ranges that can be added. When setting the Control range for the Iris part, please make sure that the minimal value represents an open aperture and the maximum value represents iris closed.

Frost has two modes of operation, some fixtures use the Control (LSB) ranges while others only have an on/of option for the frost function.

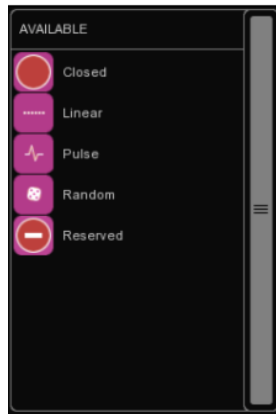


Figure 5.6: Shutter

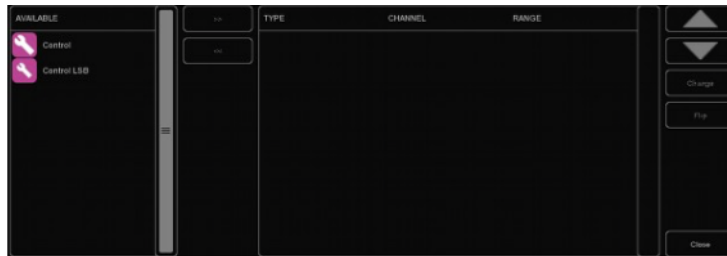


Figure 5.7: Dimmer

### 5.3.4 ColourMix

The ColourMix part can hold the RGB, CMY, White and Amber ranges. To quickly add RGB to the fixture you can use the ADD RGB button.



Figure 5.8: ColourFix

### 5.3.5 ColourFix

When a fixture has a wheel with fixed colours, you can use the ColourFix to define the slots in the colour wheel. You would need to add slots for each colour position. Up to three ColourFix parts are supported by the Builder. Select a slot and click CHANGE. Now you can pick the appropriate colour from the list

of colour libraries. Quite a few fixtures feature 'split colours'; a position on the wheel where two halves of a colour are visible (e.g. Elation Power Spot 575). The Builder supports up to 4 different colours per slot. Next to adding slots you can also add ranges for scroll, random and several function ranges. These function ranges are explained on page 41.



Figure 5.9: ColourFix

To change the range of a colour, select the range and click change. You can either set the range by typing or by using the up/down controls. The fastest way, however, is to type the minimum value, press enter, and type the maximum value, press enter again to close the dialog. When you change the channel number of a colour slot, all colour slots will automatically get the same channel.

### 5.3.6 Gobo

Please add a Gobo part for each gobo wheel in the fixture, up to three gobo parts are supported. Then add a slot for each gobo on the wheel, including open-gobo, and set its range. You can pick an image for each gobo, if you don't know the actual gobo patterns then it is best to stick with the numbered images.

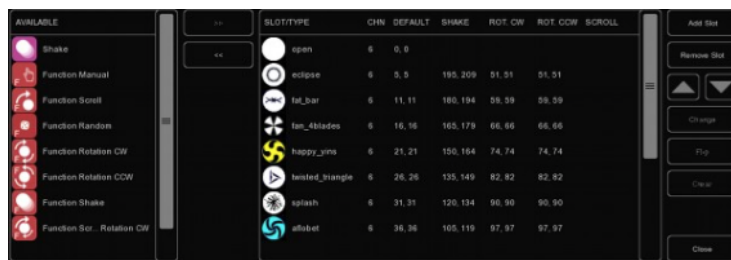


Figure 5.10: Gobo

Functions like shake, rotation and index are sometimes controlled by another DMX channel; in this case add a range (e.g. shake) to the part as well. Other times, shake and rotation are set on the same DMX channel as the gobo selection; in this case set an extra range per slot.

### 5.3.7 Prism

Add a prism part if your fixture has a wheel with prisms. Prisms are identified by their number of facets. The most typical prism has three facets, select a

one-facet prism for open or no-prism.



Figure 5.11: Prism

### 5.3.8 Lamp

To strike the lamp via DMX you can use the Lamp control. You can define an On and an Of range for the lamp. Some fixtures require the lamp on/of control to hold for a specific amount of time. This can be set in the Time section of the Lamp part. If the fixtures manual indicates the value has to be set for at least 3 seconds then you can just enter a time of 3; Cuelux automatically adds an extra second.

### 5.3.9 Reset

The fixture reset can be defined in the Reset part. This part only has an On property that you can set. Most fixtures require the reset to be pressed for an amount of time. If the fixtures manual indicates the value has to be set for at least 3 seconds then you can just enter a time of 3; Cuelux automatically adds an extra second.

### 5.3.10 Fog

When you are creating a personality file for a fog machine or hazer you can use the fog attribute. When using the Fog attribute, the global Fog button will be activated within Cuelux. If the fog generator also has a control channel for operating the fan then we recommend using a custom part for this feature. Customs are described further in this chapter.

### 5.3.11 LAD

The LAD (Laser Aiming Device) control can be switched On by defining an On value. The High End Systems Technobeam has a LAD.

### 5.3.12 Stand Alone

This can be used if a fixture has a stand-alone or sound activated mode. This attribute functions as a switch; you can set an On value.



### 5.3.13 Display

This is used to switch of the display of your fixture during a show.

### 5.3.14 Barrel

The barrel can have two controls defined, Rotate CW and Rotate CCW.

Two examples of fixtures with a barrel: Martin Destroyer or a Martin Wizard extreme.

### 5.3.15 Macro

Use the Macro part for controlling internal programs or macros. You can add On for each Macro.

Cuelux Manual Some fixtures have DMX controlled shutter blades (sometimes also called framing); use the Frame part to control this function. For example the Martin MAC 2000 Performance features framing.

### 5.3.16 Custom

When a function is not defined in one of the above parts, you can use a Custom. When defining a Custom, you can choose a name for the Custom which will be displayed under the fader in Cuelux. Tip: Please keep in mind that the space is limited when choosing a name for a Custom, we recommend 4 characters. For example ANIM for Animation Wheel You can add up to 8 custom parts.

### 5.3.17 Parked

Parked can be used to permanently keep a channel in a specific value. For example: some fixtures have a control by DMX setting that needs to be a value in order to control the fixture over DMX. You can set this by creating a Parked with a fixed value.

A fixed value can be created by setting the same value for the minimum and the maximum.

### 5.3.18 Functions

When you are making a model that requires a channel to be at a specific value for a specific function, you can use the Function ... attribute.

For example, if you need to define a gobo-scroll with channel 6 and you need channel 5 to be at a specific value to be able to use this scroll, you can create a new Function Scroll and give it the settings that are needed on channel 5.

All you need to do now is create the scroll as usual.

When you are using the scroll, Cuelux makes sure that channel 5 is set correctly before applying the scroll to your fixture.

For example the gobo wheel of a High End Systems Studio Spot 575 CMY (see figure 5.13).

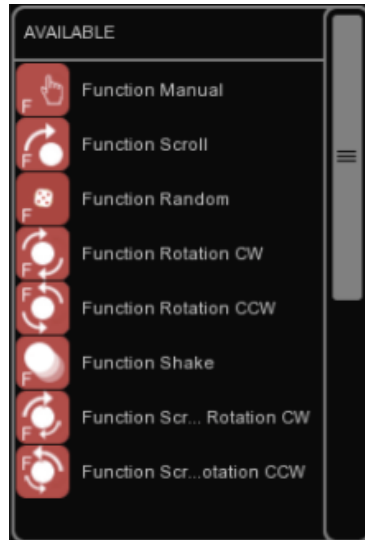


Figure 5.12: Available Functions

SLOT/TYPE	CHN	DEFAULT	SHAKE	ROT. CW	ROT. CCW	SCROLL
Function Manual	9	0, 0				
Function...ion CW	9	16, 16				
Functi...on CCW	9	16, 16				
Function Scroll	9	48, 48				
Funct...andom	9	80, 80				
Scroll	11	4, 255				
Random	11	4, 255				
Rotate CW	11	4, 255				

Figure 5.13: Applied Functions

# Chapter 6

## Export

Once created you can start using your new personality file yourself or share it with others.

### 6.1 Uploading to Visual Productions

Please consider sending us your work after you have tested your personality file. This way we can include your personality in the factory library for the next release. We appreciate your help making this personality library the largest and most reliable in our industry.

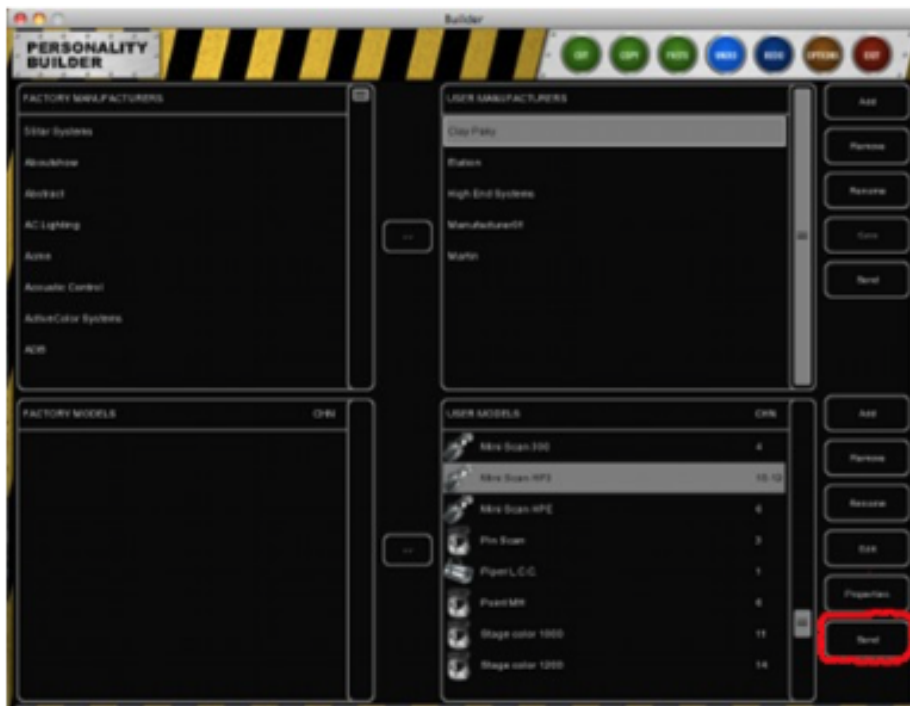


Figure 6.1: Send

You can send your models to us using the Send button in the main overview (figure 6.1).

## 6.2 Sending per e-mail

If you would like to send a personality file to a customer or other user you can add the personality file as an attachment to an e-mail. All personality files that you have created can be found in:

Microsoft Windows		\Users\[username]\Documents\Visual Productions\Common\Personalities\User
macOS		/Users/[username]/Visual Productions/Common/Personalities/User
Ubuntu Linux		/home/[username]/Visual Productions/Common/Personalities/User

## 6.3 Selecting in Cuelux(Pro)

When you have made your own personality file and saved it to disk, you can restart Cuelux to find your new file at the very bottom of the Manufacturers list in Patch menu's ADD dialog. All User Manufacturers will begin with the prefix [User] (see figure 6.2).

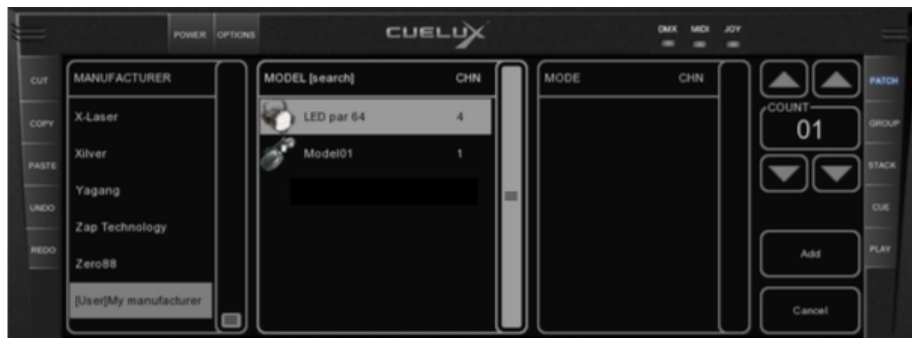


Figure 6.2: Cuelux

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