RELEASE NOTES

Version History

Version	Release Date	Details
11.0	14/5/18	New features, improvements and fixes.

Version 11.0

Upgrade Procedure

1. **Upgrading from: All Consoles:**

   Please note that version 10 and above will not work on original Tiger Touch and Pearl Expert consoles without the 'Pro' upgrade including the UPS board. Additionally all consoles require 4GB of RAM and a 40GB SSD. Please contact Avolites for further information.

2. **Upgrading from: Consoles 6.0 to 9.1:**

   For consoles the software must be upgraded by running a version 11.0 recovery stick. You can download the 11.0 recovery stick from here. Please follow the instructions given when downloading the recovery stick to install version 11.0. When running the recovery stick, selecting Standard Recovery will retain any shows saved on the console and preserve your previous licence. If you are running a Full Erase recovery then you can reuse the licence which was emailed to you previously.

3. **Upgrading from: Consoles 10.0 and above:**

   Please ensure you save and backup your shows before attempting to upgrade any software. An automated upgrade path from Titan 10.0 and 10.1 is provided. You can download the latest Titan software by clicking on the relevant console here. Full instructions for upgrading both with an installer and a recovery stick are supplied with the download and can be found in the console manual. The installer upgrade procedure is reproduced briefly below: Please save the software to the root directory of a USB stick or other media and follow these instructions: Insert the USB stick in the console and select Control Panel > Titan Installers > Titan 11.0 Setup on the tools menu. Follow the instructions presented by the installer, taking care to read each step carefully. Once the setup completes you need to restart the console. When the console restarts it should be updated to the new software, please check this by reading the version number in system mode.

4. **Upgrading from: PC any version:**

   Supported versions of Windows are Windows 7, Windows 8, Windows 8.1 and Windows 10. This affects Titan One, Titan Mobile, Titan Simulator and Personality Builder. Please ensure you save and backup your shows before attempting to upgrade any software. You can download the latest Titan PC Suite software here. When it has finished downloading find the setup file and double click to run it. Follow the instructions presented by the installer, taking care to read each step carefully. Once the setup completes you need to restart the computer.

5. **Upgrading from: Titan Remote Apps:**

   Users wishing to use Titan Remote with version 11.0 should download the new Titan Remote V11 app from the relevant app store. The existing apps will continue to work with previous Titan software versions.

New Features

1. **Run Effect n Times:**

   Effects can now be set to run a finite number of cycles and then stop.

   When creating normal shapes, softkey D has been changed to [Adjust Beats and Cycles] and selecting this will connect the wheels to set the number of beats and cycles.

   By default 'Cycles' is set to infinity. Wheeling up will change this to an increasing finite number of whole cycles and wheeling down past 1 will return to infinity. Pressing the @ key or touching in the middle of the wheel display provides a way to input a numeric value for cycles

along with a [Set Cycles Infinity] softkey option. Similarly, pressing the @ key or selecting the middle of the wheel display for the 'Beats' parameter provides a way to input a numeric value for beats along with a [Match to Spread] softkey option (note that the latter replaces the previous sub-menu accessed after pressing softkey D in the Shape Generator menu). When inputting cycles numerically it is possible to set part cycles (for example 1.5 = one and a half cycles).

Shapes with finite cycles will run for the set number of cycles and then stop (unless they are stopped manually before reaching the set number of cycles).

When creating Key Frame Shapes a new 'Cycles' parameter has been added to the shape and layer properties. This can be set either across the whole effect or per layer. By default this is set to 0 (infinite) and dragging the slider will change this to a finite number of cycles. Touching the value property to the right of the cycle slider will connect the cycles control allowing this value to be adjusted by wheel or input numerically as required. Changing this parameter while the whole effect is selected will adjust the cycles of all the layers within that effect and changing the parameter while a layer is selected will set the cycles for the selected layer only. This means it is possible to have individual layers run for different numbers of cycles within a given effect, including combinations of finite and infinite. Setting the parameter to zero will cause the effect or layer to run infinitely.

When creating Pixel Map effects there are new parameters for the whole effect and for each animation.

When a whole effect is selected 'Run For' sets the number of beats the entire will run for, after which the effect can stop spawning, be frozen or be killed depending on the 'And Then' setting. If 'Run For' is set to zero it will run forever (default).

When an animation is selected the 'Spawn For' parameter sets the number of elements that are created each time the effect is triggered where zero means forever (default). 'Run For' determines the number of cycles each spawned element runs for where zero means forever (default). If the effect has no end the number of cycles is based on the master clock and animation speed. Where the effect has an end the number of cycles is the number of times it goes between its start and end point. 'And Then' determines what happens when an animation has finished the finite number of cycles set. 'Kill' will make the element disappear whereas 'Freeze' will hold it at the end of the cycle.

The 'Run For' and 'Spawn For' parameters (where relevant) can be adjusted by dragging the slider or by touching the value which will connect the control so that it can be adjusted by wheel along with providing a way to input values numerically if required. When connected the [Reset to default value] softkey will change the selected parameter back to zero (forever). Touching on the current 'And Then' setting will reveal a pop-up where you can select alternative options.

Note that while creating the effect in the programmer it will run according to the cycle settings. When using finite cycles it can be useful to use the Effect Editor transport controls (for Key Frame Shapes and Pixel Map effects) and the [Restart Shapes] option in the Edit Shape menu (for normal shapes) to restart the effect in order to see how it will look.

2. **Shapes on SubFixtures:**

It is now possible to run Key Frame Shape effects across sub fixtures (cells) in multi-celled fixtures.

A new 'Run On Sub Fixtures' toggle has been added to the Effect Editor Key Frame Shape properties which determines how spread (phase) and overlap are applied to relevant controls in the cells of multi-celled fixtures:

- 'Off' will run the shape across the master controls.
- 'On (Group)' will run the shape across the cells (where relevant) according to the group layout (this is particularly useful in conjunction with the direction).
- 'On (Linear)' will run the shape across the cells (where relevant) in a linear (flat) fixture order.

Additionally, the 'Run On Sub Fixtures' options for normal shapes have been improved with the same options:

- [Run On Sub Fixtures (Group)] will run the shape across the cells (where relevant) according to the group layout (this is particularly useful in conjunction with the direction).
- [Run On Sub Fixtures (Linear)] will run the shape across the cells (where relevant) in a linear (flat) fixture order.

3. **Crossfade Dimmer:**

A new 'Cross Fade HTP' toggle switch has been added to playback options for cues, chases and

cue lists. This effectively provides a way to make HTP channels behave as LTP and obeys the playback priority level.

When enabled the output of any existing HTP controls (ie. dimmer channels) will be lowered to match this playback, including zero.

4. **Cue List Loop Action:**

A new 'Loop Action' playback option for cue lists has been added. This provides a way to determine whether a cue list will return to the start after the final cue.

When set to [Stop On Final Cue] the cue list will stop advancing once it reaches the final cue and if Move in Dark is enabled it will not look beyond this point. When set to [Loop] the cue list will loop back to the first cue after the final cue and if Move in Dark is enabled it will preload values for the first cue as soon as possible after the final cue has been executed.

The default for new cue lists is to stop on final cue.

5. **Group Master Key Profiles:**

Five new group master key profiles have been added:

- [Flash Fixtures]
- [Timed Flash]
- [Flash Master]
- [Timed Flash Master]
- [Swop Fixtures]

Holding [Flash Fixtures] will immediately raise the dimmer level of all fixtures in the group according to the maximum level set by the combination of the group master fader and flash master (where relevant) that are currently lower than this level and on release will immediately return any associated dimmers to their previous levels.

Holding [Timed Flash] will fade up the dimmer level of all fixtures in the group according to the maximum level set by the group master fader that are currently lower than this level over the group master Fade In time and on release will return any associated dimmers to their previous levels over the group master Fade Out time.*

Holding [Flash Master] will immediately set the group master to its maximum level according to type and on release will return it to its current level. For example if a group master is set to 'Scale'/'100%' and the fader is currently at zero, holding a [Flash Master] button will result in the dimmers of any active fixtures in the group outputting at their current level.

Holding [Timed Flash Master] is the same as [Flash Master] but will fade in/out the master level according to the master fade/in out times.*

Holding [Swop Fixtures] will immediately raise the dimmer level of all fixtures in the group according to the maximum level set by the combination of group master fader and swop master (where relevant) and immediately set the output of any other active fixtures from playbacks with the same or lower priority to zero. On release any associated dimmers will immediately return to their previous levels.

*group master Fade In and Fade Out times for the [Timed Flash] and [Timed Flash Master] actions can be set via [Edit Times].

6. **Flash and Go Key Profile:**

Two new cue list key profiles called [Flash and Go] and [Timed Flash and Go] have been added. These provide a way to advance through a cue list with flash without needing to press go and is particularly useful for applications where the cue list is on a playback window or macro/executor handle.

Where a cue list cue contains dimmers holding an associated [Flash and Go] key will cause the dimmers to immediately output at the recorded level (proportional to the level of the flash master if relevant) and on release they will return to their previous level and the cue list will automatically advance to the next cue. [Timed Flash and Go] will do the same but will follow the fade times.

This function works in conjunction with Move in Dark. Enabling Move in Dark will cause any non-dimmer controls in the next cue to preload as soon as the flash is released and, where relevant, the fade out is complete. This is useful if you want everything ready to go in the next cue when you press flash.

7. **Connect Master Key Profile:**

A new [Connect] key profile for masters has been added. This provides an alternative to pressing CUE/CONNECT followed by a speed master.

When assigned to a rate or BPM master button pressing this will connect the wheels to speed control.

8. **Multiple Timecode Sources:**

   Up to four different timecode sources are now available and you can choose which one a playback will listen to when firing cues by timecode.

   In Cue List Playback Options there is a new 'Timecode Source' toggle where you can select which of the four sources a particular cue list playback will listen to (by default this is set to source 1).

   Accompanying this there are now four Timecode windows representing the four timecode sources where you can select the source, enable/disable* and, where appropriate, start, pause and reset for each one separately.

   In the Timecode softkey menu there is a new Timecode toggle on softkey A where you can cycle through the sources. You can then toggle the timecode input on softkey B and enable/disable*, record and, where appropriate, start, stop and reset the selected source. When toggling the input in the softkey menu there is also a 'No Timecode' option. By default Timecode 1 is set to internal timecode and Timecode 2, 3 and 4 are set to no timecode source.

   *note that enable/disable is a global setting and is not independent to each source.

9. **Set List Auto Scroll:**

   The Set List window will now automatically scroll to ensure the current track is always in view when changing tracks in set list page mode and when adding new tracks.

10. **Global Zoom Palettes:**

    It is now possible to create global zoom palettes!

11. **Gobo and Product Images:**

    Where available and included in a personality file images of attribute functions such as gobos are now shown in the Attribute Editor and are used as palette legends when auto palettes is enabled. This makes it easier to visualise what a particular function or palette such as a gobo will look like.

    Additionally, where available and included in a personality file an image of the product will now appear in the prompt area after choosing a model or mode to patch. This provides a visual confirmation that you are patching the correct fixture.

12. **Colour Picker Improvements:**

    The Attribute Editor colour picker visited the workshop and has been given a makeover with new functions that make it easier to find the right colour.

    Where a selected fixture contains colour mixing controls such as RGB, CMY and HSI they will be grouped together under the 'Colour Mix' page and selecting this will reveal the colour picker.

    Selecting a tab at the top of the colour picker will toggle to one of the four views:

    - 'HSI/RGB/CMY' contains a circular colour picker model and sliders for Hue, Saturation, Intensity, Red, Green, Blue, Cyan, Magenta and Yellow. These are interlinked and can all be used regardless of the actual controls. For example you can use the CMY sliders to mix colours on an RGB or HSI fixture or the HSI sliders to mix colours on an RGB or CMY fixture. Similarly the colour picker and sliders in this view will try to achieve the best match using all the available colour mixing components such as RGBAW, RGBAL and RGBWAUV etc. The backgrounds of the sliders represent the respective colours where Saturation and Intensity will change dynamically. 'HSI/RGB/CMY' is the default view.
    - 'Picker' contains a square colour picker model and intensity slider. As above these will try to achieve the best match using all the available components of colour mixing systems such as CMY, HSI, RGB, RGBAW, RGBAL and RGBWAUV etc.
    - 'Channel' contains a circular colour picker model along with individual sliders representing the actual controls. This provides a way to take control of individual colour mixing controls independently of the colour picker within the Attribute Editor. The control name is shown at the bottom of the slider and the current level at the top.
    - 'Filters' provides a way to select colours by gel number. You can choose from a list of various gel manufacturers on the left-hand side with a representation of each colour shown as a square containing the gel number and ordered numerically. Selecting one of the gels will calculate a best match using the colour mixing controls of the current fixtures.

13. **Position Editor:**

A new 'Position Editor' has been added to the Attribute Editor to make it easier to position moving lights.

Where selected fixtures have pan and tilt controls they will now appear together in the Attribute Editor in a 'Position' page and selecting this will show the 'Position Editor'.

In the main part of the Position Editor the current positions of selected fixtures are represented as circles in a two-dimensional rectangular space where the x-axis (horizontal) is the pan level and the y-axis (vertical) is tilt. This provides a way to visually see the relative positions of a number of selected fixtures such as whether they are evenly spaced or aligned accurately and selecting and dragging the crosshair will move the selected fixtures within this space adjusting the pan and tilt values together.

On the right-hand side of this are some additional controls:

- Lock Pan/Tilt are toggle switches. When an axis is locked it will not change when dragging the position within the Position Editor. This is particularly useful where you only want to change one axis (for example tilting a group of fixtures where the pan values are fanned).
- Fan Pan/Tilt are also toggle switches. Dragging the position within the Position Editor will fan the selected control. This is particularly useful when you want to apply fan to just one axis while adjusting the position of both together (for example tilting a group of fixtures together while adjusting fan on the pan). If required, the fan switches can be used in combination with lock for even greater control.
- Fine is a toggle switch. Enabling this changes the response speed of the Position Editor so that you can adjust the position more accurately and this can also be used in combination with the lock and fan switches. Locate sets the pan and tilt values of selected fixtures to their locate value without entering the programmer (note this will override the lock settings).
- Flip is an alternative route to accessing the ML Menu [Flip Pan and Tilt] function and will change the selected moving heads to their alternative pan and tilt values that point to the same stage position (according to the maximum pan/tilt ranges set in the fixture personality).
- Align will set the pan/tilt values of all selected fixtures to match those in the last selected fixture that are currently in the programmer. For example if fixture A has just the tilt value in the programmer and you wanted to make sure all the other fixtures were set to the same tilt value without affecting pan you can select all the fixtures where fixture A is the last one and then press Align.

14. **Intensity Editor:**

A new 'Intensity Editor' has been added to the Attribute Editor. This makes it easier to make adjustments to the dimmer level.

When using the Attribute Editor with suitable fixtures, dimmer controls now have a dedicated vertical slider and buttons to shortcut to 0%, full, nudge up or down in 5% increments and locate. Note that the locate button next to the dimmer only sets the locate value for the dimmer control but otherwise behaves like the main locate function where it will not place the control in the programmer. Moving the slider or pressing 'At 0%', '-5%', '+5%' or 'Full' will add the control to the programmer.

15. **Capture Show Sync and Patch:**

It is now possible to synchronise fixture patch, selection and other related properties between Titan and the full stand-alone version of Capture Nexum and above. This provides a way to automatically patch fixtures in Titan using an external Capture theatre and to select fixtures via the external Capture and vice-versa.

At the bottom of the 'Universes' tab in Capture there is a 'Project console link' drop-down menu. The console names of any compatible instances of Titan detected on the same network will appear here and selecting one will link it to Capture.

While linked, adding a supported fixture in Capture will automatically patch in Titan. If fixtures have already been added (for example when loading a theatre) or are added while the link is disabled you can patch them in Titan with the link enabled by going to PATCH/[Active Fixtures]/[Capture @ <machine name> (<machine IP address>)]. At this point you can either select a handle to start patching or select [Patch Capture @ <machine name> (<machine IP address>)] to start with the next available handle. If there is a problem with a particular fixture then it will leave an empty handle and skip to the next fixture. At the end a softkey will then appear informing you there were some problems and selecting this will open a verbose list in the Event Log window. Most commonly the errors will either be a duplicate user number or that the fixture is currently unsupported. To fix duplicate user number errors edit the value in the 'Channel' property field in Capture such that each fixture has a unique value. For unsupported fixtures firstly ensure your Titan personality library is up-to-date. If the

problem persits then you can submit requests via the new personality request form on the website and select 'Capture Visualiser (.c2o)' from the Desk Type options.

Loading a new show or patching a supported fixture in Titan will automatically open the 'Console Patch' dialog in Capture and dragging any fixtures from here to a viewport will automatically add them with the associated address.

The position and orientation of any linked fixtures are synchronised meaning fixtures automatically patched in Titan will appear in the same positions and orientation in the integrated Capture Visualiser window. Selecting a linked fixture in Capture will select it in Titan and vice-versa and any changes position, orientation, legend and user number in Titan or Capture will automatically sync between the two.

Note that the fixture legend is set using the 'Unit' property field and the fixture user number uses the 'Channel' property field. If they are not set Titan will use the default rules.

16. **Selection Pattern Direction:**

A new 'Direction' option has been added to selection patterns. This provides a quick way to set fixture orders using the current layout to achieve various directions including mirrored (symmetrical) which are used with the Next (Fix+1) and Prev (Fix-1) keys and, when recorded to playbacks, when creating effects with fixture overlap.

Pressing the ALL key (labelled 'Odd/Even' on some consoles) will open the 'Selection Pattern' menu with two new softkeys:

- [1 In X] takes you to a sub-menu where you can select some pre-built patterns ([1 In 3], [1 In 4], [1 In 5] and [1 In 6]).
- [Direction] takes you to a sub-menu where you can select a direction which will set the fixture order according to the current layout. The chosen direction will apply to the pattern selection (ie. Next (Fix+1)/ Prev (Fix -1)) and the fixture order will store in any cues that are recorded. This makes it possible to easily select symmetrical pairs of fixtures to edit and to quickly create timed cue effects with overlap.

By default pressing clear will reset the direction to a flat linear order. If preferred you can change this so that the last selected direction is remembered for new selections by turning off the 'Clear Direction' option in User Settings/Clear or by holding CLEAR, [Clear Options], toggle softkey E to [Maintain Direction]. Turning this back on or changing back to [Clear Direction] will reset the direction on clear.

17. **Mask Selection with Group:**

Groups can now be used to mask the current selection. This is particularly useful in multi-cell fixtures where you have a group that selects cells in all fixtures (for example all of the pixels around the outside of a 5x5 matrix) and then want to apply it to specific fixtures (for example odd/even).

Pressing Select If and then a group will deselect any fixtures or subfixtures currently selected that are not in the group.

18. **Break Shape Group Link:**

Where shapes have been created using groups it is now possible to break the group link. This is particularly useful if you want to adjust the fixture order of one shape without having to change the group order which, in-turn, might then affect other shapes.

A new [Break Group References] button has been added to the 'Shape Fixtures Order' menu. Where a shape is currently referencing a group pressing this will break the reference and make it possible to change the fixture order locally.

19. **Multi-Select Playback Options:**

It is now possible to change the playback options of more than one playback at the same time improving workflow and a dedicated Playback Options window has been added providing a way to set these via the touchscreen.

Pressing the [Playback Options] softkey and then selecting a playback will now automatically open a 'Playback Options' window (in addition to the Playback Options softkey menu) where you can easily view and adjust all the available parameters for the currently selected playback type. Selecting other playbacks while the menu and window are open will update the window and menu with the options and current settings for the last playback selected while maintaining the playback option page selection. The last selected playback type and legend are shown in the Playback Options window title bar and prompt.

Holding one playback swop key and then pressing another or marquee selecting in the playbacks window will change the legend to read 'Multiple Selection' and provides a way to set parameters for all the playbacks in the range selection. Where more than one type of playback

is included in the selection, options that are not relevant to all types will appear greyed-out.

Pressing exit will automatically close the Playback Options window and menu.

20. **Master Playback Options:**

It is now possible to access the playback options for masters by touching the associated playback view area and they now have their own dedicated playback options window providing a way to set these via the touchscreen.

Touching the playback view area of a master or pressing the [Playback Options] softkey and then selecting a master playback will now automatically open a 'Master Options' window (in addition to the Master Options softkey menu) where you can easily view and adjust all the available parameters for the currently selected master type. The currently select master legend is shown in the Master Options window title bar and prompt.

Additionally, the scale options for BPM masters are now shown in BPM and the 'Reset Multiplier On TapTempo' option can now be set individually per speed master (previously it was a global user setting).

21. **Non-Contiguous Selection:**

It is now possible to move, copy, delete, repatch and set legend on multiple non-adjacent handles improving workflow.

After pressing MOVE, COPY, DELETE, PATCH/[Repatch Fixtures] or [Set Legend] and selecting a single fixture or range of fixtures you can add more fixtures if required by pressing the THRO or AND keys.

Pressing THRO and selecting a fixture will add all fixtures from the last fixture in the previous selection to the chosen fixture inclusive in the handle order. This is particularly useful where a marquee selection would otherwise include unwanted fixtures. Pressing AND and selecting a single fixture or range of fixtures will add the new selection. It is also possible to hold the AND key to quickly add a number of non-contiguous fixtures or ranges of fixtures. The THRO and AND syntax can be used in combination and as many times as required. For example <fixture handle 1> AND <fixture handle 5> THRO <fixture handle 10> AND <fixture handle 20> etc.

22. **Fan Curves:**

Three new curves have been added to Fan to help achieve various looks quickly:

- [Mirror] divides each part of the selection into two halves where all the fixtures in one half are the opposite of the other.
- [Wings] divides each part of the selection into three sections where all the fixtures in the left-most section are the opposite of all the fixtures in the right-most section and the fixtures in the middle section do not change.
- [Pull End] is similar to [Pull Ends] except it just pulls from one end. Obviously.

23. **Layout Editor Wheel Nudge/ @ Keys:**

When using the Layout Editor touching up or down in the wheel display will nudge the relevant value up or down respectively. For position this will snap to whole pixels. For angle it will snap to absolute 45 degree intervals. These are true irrespective of whether the wheel mode is set to full or sub pixel. If the wheel mode is set to full pixel adjusting the angle by wheel will now snap to absolute 45 degree intervals. Additionally, pressing the @ key will open an 'Adjust Layout Values' menu where you can input the selected value numerically.

24. **Capture Patch Indicator:**

A Capture icon is now shown on the softkeys of currently supported modes to help identify which will automatically appear in the integrated Capture with auto-update enabled when patching via the menus.

25. **Recover Show:**

If Titan is shutdown improperly (for example sudden loss of power or crash) there is now an option to try and recover the showfile. If the last show cannot be found when starting the software a [Recover Show] option will appear on softkey A (along with options to load a previous or start a new show). Selecting [Recover Show] will attempt to load a version from the temporary directory.

26. **Clear Selection Only:**

Holding the CLEAR button and pressing the ALL key will clear the selection without affecting the programmer.

27. **DMX Merge Priority:**

A merge priority has been added to physical DMX so that you can control how it merges through an ACN gateway when networked in a backup session. This is set in System/DMX Settings/ ExpertDmx properties with a value between 0 and 200 where higher numbers have priority. By default this is set to 100.

Improvements

1. **Improved Swop Speed:**

The response of swop has been improved (particularly when swopping large numbers of fixtures in big shows).

2. **Fixture Exchange and Update Personality Speed:**

Fixture exchange and update personality is now much faster.

3. **Load and Save Speed:**

Load and save operations are now much faster.

4. **Cue View Speed:**

Cue View now opens much faster.

5. **DMX View Speed:**

The DMX window now opens significantly faster.

6. **Workspace Change Speed:**

Workspace handles now draw faster.

7. **Warn if Save on TNP fails:**

If a show does not save correctly on a TNP (for example if there is not enough space) it will now prompt with a warning.

8. **Freeze Key Profile for Masters:**

The 'Zero Multiplier' master key profile has been renamed 'Freeze' and is now a momentary action. This provides a way to temporarily pause target shapes and chases when used with speed masters, to temporarily stop shapes when used with size masters and functions as a dead black out (D.B.O.) when used with intensity masters.

9. **Fire CueList on GoBack:**

Pressing GoBack on a Cue List that is not currently active will now fire the Cue List.

10. **Update Personality:**

Where there are newer versions of personalities available but with mode names that are different to those currently patched in a show, update personality will display a warning prompt explaining this along including the existing mode name along with a menu containing a list of the available modes. Choosing a mode from this list will automatically perform an exchange for all the fixtures of that type and mode. When using the update all option it will update any available fixtures with matching modes after which it will display an error any with mode names that did not match if relevant. Pressing [Ok] will return to the Update Fixture Personality menu from where you can select the remaining fixtures and choose from the available modes if required. The prompt now shows the current fixture model name that is being updated along with a working icon.

11. **TitanOne Mouse over Wheel Relative:**

When hovering over the wheel view area and using mouse wheel values will now adjust values relatively rather than absolutely ensuring things like fanned positions are maintained.

12. **Master LED Flash at Zero:**

The LED's of all masters will now flash when at zero.

13. **Merge Palette Record Mode:**

A record mode softkey has now been added to the merge palette menu where you can toggle between 'Mixed', 'Channel in Programmer', 'Group in Programmer' and 'Group in Mask'. This is to provide additional control when merging palettes.

14. **Group Selection in Edit Palette Menu:**

It is now possible to select groups while in the Edit Palette menu.

15. **BPM Display Resolution:**

Where relevant, speed in BPM will now be displayed to a resolution of 2 decimal points on wheels connected to shape speed and to 1 decimal point on wheels connected to chases and BPM masters, chase legend and playback options.

16. **Negative Values in Numeric Entry:**

An extra [+/-] toggle softkey has been added to the numeric entry menu to provide a way to input negative values where functions have negative display ranges.

17. **Motorised BPM Faders Follow Tap Tempo:**

BPM masters assigned to motorised faders will now move to their physical level when using tap tempo.

18. **Fixture Modes Natural Sort:**

When patching fixtures the available modes are now ordered naturally (for example 1 DMX, 2 DMX, 10 DMX, 11 DMX). Previously they were sorted alphabetically which would result in 1 DMX, 10 DMX, 11 DMX, 2 DMX using the same example.

19. **Left-Justify Personality History:**

Comments in the Personality tab of the Fixture View window are now left-justified. This ensures that it is only necessary to scroll to view comments that are too long to fit in the current window size.

20. **WebAPI User Numbers:**

It is now possible to select fixtures by user number via WebAPI.

21. **Active Fixture Auto Group:**

Patching active fixtures will now create auto groups if enabled.

22. **DMX Settings Scroll:**

When using the scroll bar in DMX Settings/TitanNet Overview the nodes will stay in view so that you can assign lines without having to move around.

23. **Active Fixture Banks and Clips:**

When patching CITP fixtures functions for all possible media banks and clips are now created even if there are no clips or thumbnails currently associated to ensure they can be accessed without having to update the personality.

24. **Active Playbacks Playback Page Number:**

Active playbacks on faders now show with the correct page number in the Active Playbacks window (previously the page number was based on the Pearl Expert pages).

25. **Set Patch Address by Wheels Limit According to Offset:**

When setting the DMX address by wheel (including by DMX slot) the address is now limited according to the current offset (by default the number of channels required for the selected mode). This prevents it going to impossible addresses where the fixture would span universes and ensures the fixture will fit within the universe.

26. **Import Button:**

The Import Show button in the Show Library window is now labelled more clearly.

27. **Reports:**

Reports have been revised to make them more useful and easier to read.

- The 'Playback ID' and 'Cue ID' columns have been removed where relevant as they were not useful and all sections are now ordered by user number instead.
- The 'Forward Tracking' column has been removed from the 'Memory Cue View' section and 'Delay In', 'Fade In', 'Delay Out', 'Fade Out', 'Fixture Overlap' and 'Curve' columns have been added.
- The 'Palette View' section now includes global palettes.
- The 'Cue View' section is now split into separate cue lists where the relevant cue list number and legend are shown above each section. The 'Macros', 'Fixtures Used', 'Effects' and 'Shapes' columns have been removed.
- The 'Shapes View' section has been removed.

- The 'Effect View' sections now include the associated playback user number where relevant.
- When generating reports the is now an indicator showing the progress in the prompt area.

28. **Delete Pixel Map from Cue:**

It is now possible to delete pixel map effects from cues via the Pixel Mapper Effect View.

After opening Playback View press the View button in the 'View Pixel Effect' column for the relevant cue to open the Pixel Mapper Effect View. Then press DELETE followed by the 'Effect' cell corresponding to the effect you would like to remove and finally softkey A to confirm.

Changes

1. **Dimmer and Shutter Wheel Page:**

The dimmer and shutter controls will now appear on the same wheel page where there is space so that you can see and edit them together.

2. **Shape Control Wheel Pages:**

The shape control wheel pages have been reordered so that speed, size and spread are now all on one page.

3. **Flip in Programmer:**

The Flip function will now automatically place the pan/tilt values in the programmer.

4. **Undo Invert and Freeze:**

The undo history no longer shows steps for invert or freeze fixture which are not currently undoable.

5. **Legacy Visualiser:**

The legacy Avolites Visualiser has been removed.

Bugs Fixed

1. **HTP fade out ignores overlap:**

Previously HTP controls would not follow overlap settings when fading out. This has now been fixed.

2. **Overlap doesn't work with copied cues:**

Fixed an issue where copying a cue in a cuelist didn't copy the fixture positions correctly which would result in overlap with fade not working.

3. **Chases intermittently do not play a shape in the chase step:**

Fixed an issue where shapes in chases would sometimes not run if the crossfade was set to zero.

4. **Delay in shapes:**

Fixed several issues with delay in shapes which would cause fixtures to be out of sync when using overlap.

5. **Fade out set incorrectly on live fades:**

Fixed an issue where manually fading out intensity by playback fader could cause flickering on the output if there was also a fade out time set.

6. **Virtual dimmers snap off after using scene master:**

Fixed an issue where the virtual controller would go to zero after using preset mode which would result in any virtually mastered controls not outputting.

7. **Chases play catch-up after pause by BPM master:**

Previously if a chase was paused by setting an associated BPM master to zero it could initially run too fast when the BPM master speed was increased. It will now start again at the correct speed.

8. **Cuelists ignore fade times with go in crossfade mode:**

Fixed an issue where using go on a cuelist set to manual crossfade mode would ignore fade

times and snap.

9. **Autoload doesn't use local times when changed from target:**

Fixed an issue where, if an autoloading cue had been set to use target times, changing it to use cue times would not use the local cue times as expected.

10. **Autoload ignores release times:**

Previously releasing an autoloaded cue would always snap out regardless of the master release, cue list release or associated cue release times. It will now use release times where cue release time has priority (when not set to global), followed by local release time (when not set to global) and finally by master (if both the local and cue release times are set to global).

11. **Overlapping autoload fades snap:**

Previously if you autoloaded the same memory in more than one cue it would not take any fade times into account and snap straight to the beginning of a fade instead.

12. **Autoload keeps running after flash+go:**

Previously if, while holding the flash button of a cue list on an autoloading cue with the fader raised, the fader was lowered and the cue list was advanced to the next cue, the cue autoloaded would continue to run. If the autoloaded cue contained dimmer levels the fixtures it would then be very difficult to turn them off again. This has now been fixed

13. **Total cue time calculation:**

Where there were cues with fade and delay times on individual attributes the total cue length would sometimes be calculated incorrectly resulting in link after cues starting later than expected. The total cue time is now calculated on a per attribute basis with the maximum length determined from this.

14. **Flash fade out goes to zero before snapping to level:**

Fixed an issue where intensity would fade out to zero instead of the HTP level when using flash with times.

15. **Global release ignores flash:**

Previously after flashing a playback with a global release mask it would not release according to the global mask. This has now been fixed.

16. **Mode 3 playbacks don't fade out dimmer shapes:**

Fixed a regression where firing mode 3 playbacks no longer cross-faded out active dimmer shapes from other playbacks.

17. **Block running shapes function broken:**

Previously attempting to use the block running shape functions in shapes and effects would not work. This has now been fixed.

18. **Global shape palettes don't copy:**

Fixed an issue where it was not possible to copy global shape palettes.

19. **Replace shape palette empty:**

Fixed an issue where replacing a shape palette would result in an empty palette.

20. **Palettes don't track as expected:**

Previously appending cues to tracked cue lists by fixture with an unrelated control in the programmer would result in any tracked palette information becoming hard values in the new cue and therefore would not update with the palette.

21. **Merge with track backwards does not work properly:**

Previously when merging into empty cues with track backwards the controls would not block correctly and also track forwards as a result. When merging with track backwards the controls will now correctly block.

22. **Merge/replace empty first cue with track backwards fails:**

Fixed an issue where attempting to merge or replace the first cue in a cue list would do nothing if the cue was empty and the update mode was set to backwards.

23. **Super fixture tracking:**

Fixed an issue where sub fixture controls would not track correctly when set via linked super fixture controls.

24. **Incorrect output when using snap back or jumping to previous cues:**

Fixed an issue where using snap back or jumping to previous cues could result in fixtures coming on when they shouldn't.

25. **MiD triggers with playback fader at zero:**

Fixed an issue where fixtures would incorrectly move in dark if the cue list fader was at zero.

26. **MID ignores point cue numbers:**

Fixed an issue where if MID was set to a point cue number it would ignore the point and move on the whole number (ie. MID cue 2.2 would move on cue 2 instead of 2.2)

27. **Update dimmers with OFF doesn't track:**

Fixed an issue where attempting to remove dimmer information from tracked cue lists using OFF had no affect on the cue output.

28. **Dimmers set to off still output in chases:**

Fixed an issue where HTP values would not turn off properly in chases.

29. **TNP disconnects when using pixel map masters:**

Fixed an issue where using a pixel map master over a large number of fixtures could cause TNP's to momentarily disconnect.

30. **Shape information lost after include/merge:**

Previously where a playback contained a shape with a group link, merging a filtered include (ie. advanced include part of the group) would break the group link. This has now been changed to maintain the group link if the same fixtures are merged back into an existing shape.

31. **Shapes on subfixtures don't use group centre:**

Previously running a shape across a group of multi-cell fixtures would result in the centre of a direction being derived from the middle of the first fixture rather the whole group layout. Shapes on subfixtures will now use the centre of the group layout to calculate directions.

32. **Shapes ignore pattern selection:**

Previously when creating a shape on a group filtered by pattern selection the shape would run on the whole selection. It will now run on the filtered selection as expected.

33. **Key Frame Shapes only work with 0-100 display ranges:**

Previously, if a function used in a key frame shape had a display range that was not percentage 0-100 it would not work properly. Key Frame Shapes will now work correctly for any type of function range.

34. **Tap tempo doesn't work on touch handles:**

Previously attempting to tap tempo on touch handles (for example a BPM master in the Playbacks window) would not work properly and instead go straight to the maximum speed. It is now possible to tap on touch handles.

35. **Record forgets type when changing mode:**

In previous versions after entering the record mode menu the record type would reset to create memory. This could result in accidentally recording the wrong type of cue if you had selected chase or cue list prior to this and not noticed. It now remembers the type selection when changing record mode.

36. **Replace cue ignores mask:**

Previously replacing a cue would ignore the record mask. This now works as expected.

37. **Record by stage ignores super fixture controls:**

Fixed an issue where recording multi-celled fixtures by stage would only record the cell information.

38. **Unsupported modes patch incorrectly in Capture:**

Previously when using fixtures that have Capture support in some modes but not others,

patching an unsupported mode would result in the wrong mode being added to the integrated Capture if auto-update was enabled. Unsupported modes no longer attempt to patch in Capture.

39. **Can't include from unfold:**

    Previously attempting to include an unfolded cue would not work. It is now possible to include unfolded cues.

40. **Fan group as fixture ignores selection order:**

    Previously when using fan group as fixture the order in which the groups were selected would be ignored. Fan group as fixture now follows the group selection order.

41. **Fan turns off when changing curve:**

    Previously with Press and Hold Fan enabled, changing the curve while holding fan would cause fan to turn off. The fan menu would also exit. This has now been fixed so that fan always remains on while held in press and hold mode and will return to the fan menu after changing curve.

42. **Fan in edit palette clears selection:**

    Previously when editing a palette pressing the FAN button would immediately clear the selection. The selection is now retained after pressing FAN.

43. **All All terminates edit palette:**

    Previously pressing All All while editing a palette would cause the menu to exit. It will now remain in the Edit Palette menu as expected.

44. **Flip pan/tilt in edit palette clears selection and exits menu:**

    Previously if the flip pan/tilt function was used while in the edit palette menu it would clear the selection and exit the menu meaning it was not possible to quickly flip the pan and tilt locations in positional palettes when using the edit palette function. When using the flip pan/tilt function in edit palette it will now maintain selection and return to the edit palette menu as expected.

45. **Touch range fixture selection macros:**

    Previously when recording macros dragging a marquee fixture range selection by touch would only select the first fixture when fired. This has now been fixed so that range select macros now select the complete range of fixtures.

46. **Can't move pixel map layer master to playbacks or groups:**

    Fixed an issue where it was not possible to move a pixel map layer master to the playbacks or groups windows despite it being a legal location.

47. **Pan/Tilt threshold disable broken:**

    In previous versions disabling the pan/tilt threshold user setting did not work. This has now been resolved.

48. **Reminder Dim doesn't work correctly with cells:**

    Previously using rem dim on the intensity of cells in multi-cell fixtures would always set the intensity of all cells to zero. Rem dim on cells will now retain the selected cell intensities as expected.

49. **Can't multi-select autoload times in playback view:**

    Previously it was not possible to marquee select over more than one autoload times row or select all cues by touching the column header in cue list playback view. You can now select multiple cue autoload times to edit like other parameters.

50. **Pearl Expert change fixture handle broken:**

    Previously attempting to change the handle location of fixtures selected via the LCD Fixture Patch would not work as expected. This has now been fixed.

51. **RDM broken:**

    Previously RDM fixtures were not appearing correctly in patch view. This has been fixed.

52. **Shape view doesn't update to reflect changes:**

    Previously shape view refused to update to show edited parameters. It has now adjusted its attitude.

53. **Release programmer doesn't clear selection:**

Previously, with fixtures in the programmer, holding release and pressing clear would result in the fixture handles showing as selected when they weren't. Releasing the programmer now also clears the selection.

54. **Raised motorised faders on empty handles don't move on page change:**

On consoles with motorised faders if a fader associated with an empty handle was lifted it would often fail to change level when changing page for the first time. The fader level will now always update on page change.

55. **Quick assign handle order:**

Previously when quick assigning a range of handles in show library the resulting order could appear in a seemingly random order. Now they order as expected.

56. **Workspace shortcut handle size:**

Previously when recalling workspace shortcuts containing windows set to dynamic handle size, the handle size would change to their fixed size instead. The windows now recall with the handle size that was saved.

57. **Channel grid stops updating values in playbacks mode:**

Previously Channel Grid would stop updating the level of controls in playbacks mode after viewing an associated cue. This has now been fixed.

58. **Flash full/out broken:**

Previously the flash full and flash out functions on consoles with dedicated buttons did not work. This has been fixed.

59. **Highlight sticks on after new show:**

Previously if a new show was started with highlight enabled it would remain on until the highlight button was pressed which could cause fixtures to light unexpectedly when selected after patching. Highlight is now turned off on a new show.

60. **Highlight stays on after clear:**

Previously if you cleared the programmer with no fixtures selected with highlight enabled it would remain enabled despite the highlight LED indicator suggesting otherwise meaning fixtures would unexpectedly highlight immediately when selected. Clearing with no fixtures selected will now turn off highlight.

61. **Can't delete shape with double-tap:**

Previously attempting to delete a shape by pressing DELETE and then double-tapping it in the Shape View window did not work. You can now delete fixtures from the Shape View window by double-tapping.

62. **Connect to size master gets stuck:**

Previously connecting to a size master would attempt to connect and connect/connect would not exit. Connect/size master will now do nothing.

63. **Fixture filter greyed out:**

Fixed an issue where a missing fixture type could result in a greyed-out fixture filter in the Cue View window.

64. **Layout Editor cells turn green:**

Fixed an issue where the cell properties in the Layout Editor were not being reset properly when changing layouts. This could result in cells incorrectly showing in green when editing the layout of a non-celled fixture immediately after a celled fixture.

65. **Playback view empty in preset mode:**

Fixed an issue that could result in cues not showing in playback view when a scene master is patched and set to preset mode.

66. **Clear located attributes clears selection:**

Fixed an issue where locating with [Clear Located Attributes] enabled would cause the current selection to clear.

67. **Palettes don't highlight in blind:**

Fixed an issue where palettes wouldn't highlight when applied in blind mode.

68. **Added shape fixtures don't sync:**

Previously when fixtures were added to shapes they would be out-of-sync in the programmer. When new fixtures are added they will add in sync.

69. **Output glitches with Winamp timecode:**

Fixed an issue where the time read from Winamp could go backwards a few milliseconds and interrupt cue fades resulting in incorrect output.

70. **Cue number highlights in Playback View after View Cue:**

Fixed an issue where the cue number would highlight in playback view for any cues where the associated 'View' button had been pressed.

71. **Current cue indicator lost when loading cuelist:**

Previously if you snapped to a cue in a non-active cuelist and then raised the associated cue list fader the current cue indicator would disappear from the touch playback area.

72. **No preview with scribble motion blur:**

Fixed an issue where applying a motion blur animation to a scribble image in the pixel mapper would cause the preview to disappear from the effect editor.

73. **Point cues don't display correctly in prompt:**

Previously when using the syntax CUE <x> <.> <y> the prompt would incorrectly show 'CUE xy' which could cause confusion. The prompt will not include the point where relevant.

74. **BPM masters on motorised faders:**

Fixed an issue where BPM masters set to control the multiplier on motorised faders could end up moving to the wrong level when changing page.

75. **sACN triggers use non-DMX packets:**

Fixed an issue where non-DMX packets would incorrectly be treated as DMX and potentially cause unexpected results when using sACN triggers.

76. **Edit shape view changes wheel value:**

Fixed an issue where editing a shape parameter in the Shape View window would cause the new value to be displayed in the associated wheel when connected to a shape in the programmer.

77. **Can't edit cue times while in record cue list menu:**

Fixed an issue where it was not possible to edit cue parameters in the Playback View while in the record cue list menu.

78. **Selective clear doesn't remove fixtures:**

Previously when using selective clear, the deselected fixtures were not removed from the programmer meaning they would record by fixture. Selective clear now removes the deselected fixtures from the programmer.

79. **Highlight with orientation broken:**

Previously enabling highlight while editing a layout would cause all the cells of suitable multi-pixel fixtures to highlight in red. This has now been fixed so that multi-cell fixtures follow the highlight rules set in the personality file (where relevant this will usually be top-left green, bottom-right red with the remaining cells yellow when using highlight in the layout editor)

80. **Negative values don't display correctly in Cue View:**

Previously any controls set to negative values would show as '-' in cue view. It will now show the correct value.

81. **Fixtures on faders don't work with scene master:**

Fixed an issue where adjusting the dimmer level of a fixture patched to a fader by fader would do nothing when in preset mode.

82. **Button size doesn't work in Active Playbacks window:**

Previously changing the button size in display options for the Active Playbacks window had no effect. Changing button size in the Active Playbacks window now works like other windows.

83. **Macros on hard keys circumvent lock:**

Fixed an issue where it was possible to fire macros assigned to hard keys while the console was locked.

84. **DMX view location column broken:**

Previously the location column in the DMX view window would always show '-'. It now shows the handle location as expected.

85. **Backup sACN output stops on show sync:**

Fixed an issue where disabling DMX would set the ports to receive mode and stop sACN traffic. This was particularly problematic when using consoles in a TitanNET session backup configuration with sACN.

86. **Can't select other cells after autoload in Playback View:**

Fixed an issue where it was not possible to jump to other cells in playback view after selecting an autoload cell.

87. **Align ignores spread:**

Previously when aligning shapes the target fixtures would not use the spread from the source.

88. **Align Key Frame Shapes:**

Fixed an issue where it was not possible to align key frame shapes.

89. **Macro LED stops flashing after record:**

Fixed an issue where, while recording a macro, the macro LED would stop flashing after exiting the record menu.

90. **Shapes on subfixtures don't import:**

Fixed an issue where shapes on subfixtures would not import correctly.

91. **Can't update personalities when a custom personality is missing:**

Previously if a show contained a user edited personality and the file was not present in the custom personalities folder (for example if the show was used on a different console) then update personality would never show any personalities available where relevant. This has now been fixed so that if the filename of a user personality has been changed any other fixture updates will still show as expected.

92. **Renumber chase in menu doesn't work:**

Fixed an issue where the renumber all cues option in the record chase menu would not work when used immediately after inserting a cue without leaving the menu first.

93. **Compatibility view pages missing:**

The pages for the Fixtures and Playbacks and Groups and Palettes windows went missing in 10.0. After an exhaustive search they have finally been relocated and reunited. A happy ending.

94. **Multi-cell Fixture View:**

Fixed an issue where controls from the super fixture would not be shown in Fixture View for multi-celled fixtures.

95. **Playback Option macro softkey missing:**

Someone had stolen the Macro Links softkey from cue list playback cue options. It has now been recovered!

96. **Fade and delay times with @ menu:**

Fixed an issue where attempting to set a fade or delay time using the @ keys on fixed functions would not work and cause subsequent times entered for range functions to be zero.

97. **Follow World Page Change loads on wrong page:**

Fixed an issue where restarting the software with pages set to follow world page change would always start on the first page and lose page legends.

98. **Live update cells:**

Fixed an issue where merging dimmers in multi-celled fixtures into active playbacks would not

take effect until the playback was killed and refired.

99. **Copy multi-cell fixtures corrupts Capture:**

Fixed an issue where copying fixtures with cells appeared to corrupt other fixtures in the integrated Capture.

100. **Deleted fixtures reappear in tracked cue list view:**

Fixed an issue where fixtures removed from cue list cues would still be shown when viewing the cue.

101. **Incorrect output when updating properties on live playbacks:**

Fixed an issue where updating the time properties of a live playback would not work properly and could result in unexpected output.

102. **Arena Virtual Panel DBO button broken:**

Fixed an issue where the DBO button didn't work in the Arena Virtual Panel.

103. **Adjusting linked cell attributes affects unrelated attributes:**

Fixed an issue where adjusting a cell control by attribute editor or scroll wheel would cause any identical controls in the master to change unexpectedly.

104. **View active fixture error:**

Fixed an issue where attempting to view a fixture patch as an active fixture would result in an error.

105. **Tiger Touch Virtual Panel Rem Dim/ Flash and Scroll mode buttons don't work:**

Fixed an issue where the Rem Dim, Flash and Scroll mode buttons on the Tiger Touch Virtual Panel didn't work.

106. **Global palettes missing from reports:**

Previously when generating reports with palettes they would not include any global palettes. All palette types are now included in palette reports.

107. **Touching outside the area closes virtual keyboard in Effect Editor:**

Previously when using the virtual keyboard to create a scribble element accidentally touching elsewhere in the Effect Editor window would close the virtual keyboard. This has now been changed so that touching in the Effect Editor window no longer closes the virtual keyboard.

108. **Set step legend in unfold does not update live:**

Previously when using the set step legend function on unfolded chases the new legend would not update live in the playback legend. It now updates as you type.

109. **Import palette type label:**

Fixed an issue where palettes from an imported show were always labelled as normal in the show library regardless of their actual type.

110. **Edit Palette menu softkeys don't show new legends correctly:**

Previously if a palette legend was changed the softkeys in the Edit Palette menu would not always update to show the new legend correctly. This has now been fixed.

111. **Insert before step number wrong after renumber chase:**

Previously after inserting chase steps and renumbering, attempting to insert a new step would result in the wrong step being show on the insert softkey. It now shows the correct step number.

112. **Key Frame Effect Shape view update:**

Fixed an issue where the Key Frame Effect View would not update correctly when viewing new shapes while the window was open.

113. **Cue view and Select If incorrect with tracking off:**

Fixed an issue where cue view would still show fixtures previous tracked after turning off tracking in a cue list and using select if would incorrectly select all the fixtures instead of just the ones with hard values.

114. **Cues come back to life unexpectedly when played out of sequence:**

Fixed an issue where firing a cue in a cue list out of sequence could result in fixtures and fade times from previous cues being used resulting in the wrong output.

115. **'Incoming' Triggers typo:**

In previous versions the word 'incoming' was spelt incorrectly when using triggers. This has now been corrected. Get some.