Elation

# Proteus Hybrid Max



| | |
|---|---|
| Manufacturer | **Elation** |
| Type | **Profile spot** |
| DMX modes | **4** |
| DMX footprint | **32, 43 channels** |
| Beam angle | **1.8-45°** |
| Pan range | **540°** |
| Tilt range | **253°** |
| Size (W × H × D) | **340 × 470 × 300 mm** |
| GDTF fixture type | **797D1A4C-0486-4FDD-85C0-D…** |

## Controls

Focus · Frost · Iris · Prism · Prism rotation · Zoom · CMY colour mixing · Colour temperature · Colour wheel · Strobe · Dimmer · Pan and tilt · Movement speed · Animation wheel · Gobos · Gobo rotation

## Safety-relevant functions

Service functions · Strobe

## DMX modes

| | |
|---|---|
| Standard Pan360 | 32 ch |
| Standard Pan540 | 32 ch |
| Extended Pan360 | 43 ch |
| Extended Pan540 | 43 ch |

## Standard Pan360

32 channels

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **1** | Pan | 127 | |
| **2** | Pan Fine | 255 | Fine byte of Pan |
| **3** | Tilt | 128 | |
| **4** | Tilt Fine | 128 | Fine byte of Tilt |
| **5** | Pan Rotate | 0 | 0–2 Disable<br>3–126 Rotating CW Fast to Slow<br>127–129 No rotation (Fixture stops at its current position)<br>130–253 Rotating CCW Fast to Slow<br>254–255 No rotation (Fixture stops at its current position) |
| **6** | Cyan | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **7** | Magenta | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **8** | Yellow | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **9** | C TO | 0 | |

## Standard Pan360 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **10** | Color Wheel | 0 | 0–15 Open (wheel slot 1)<br>16–17 White/Red Split (wheel slot 1)<br>18–19 Red (wheel slot 2)<br>20–21 Red/Green Split (wheel slot 2)<br>22–23 Green (wheel slot 3)<br>24–25 Green/Yellow Split (wheel slot 3)<br>26–27 Yellow (wheel slot 4)<br>28–29 Yellow/PurpleSplit (wheel slot 4)<br>30–31 Purple (wheel slot 5)<br>32–33 Purple/Cyan Split (wheel slot 5)<br>34–35 Cyan (wheel slot 6)<br>36–37 Cyan/Orange Split (wheel slot 6)<br>38–39 Orange (wheel slot 7)<br>40–41 Orange/Magenta Split (wheel slot 7)<br>42–43 Magenta (wheel slot 8)<br>44–45 Magenta/Light Green Split (wheel slot 8)<br>46–47 Light Green (wheel slot 9)<br>48–49 Light Green/Pink Split (wheel slot 9)<br>50–51 Pink (wheel slot 10)<br>52–53 Pink/UV Split (wheel slot 10)<br>54–55 UV (wheel slot 11)<br>56–57 UV/CTB Split (wheel slot 11)<br>58–59 CTB (wheel slot 12)<br>60–61 CTB/CTOSplit (wheel slot 12)<br>62–63 CTO (wheel slot 13)<br>64–65 CTO/HighCRI Split (wheel slot 13)<br>66–67 HighCRI (wheel slot 14)<br>68–69 HighCRI/Dark Amber Split (wheel slot 14)<br>70–71 Dark Amber (wheel slot 15)<br>72–73 Dark Amber/Deep Red Split (wheel slot 15)<br>74–75 Deep Red (wheel slot 16)<br>76–77 Deep Red/Blue Split (wheel slot 16)<br>78–79 Blue (wheel slot 17)<br>80–81 Blue/White Split (wheel slot 17)<br>82–127 Open (wheel slot 1)<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **11** | Gobo | 0 | 0–10 Beam Open (wheel slot 1)<br>11–21 Spot Open (wheel slot 2)<br>22–31 Gobo 1 (wheel slot 3)<br>32–41 Gobo 2 (wheel slot 4)<br>42–51 Gobo 3 (wheel slot 5)<br>52–61 Gobo 4 (wheel slot 6)<br>62–71 Gobo 5 (wheel slot 7)<br>72–81 Gobo 6 (wheel slot 8)<br>82–91 Gobo 7 (wheel slot 9)<br>92–101 Gobo 8 (wheel slot 10)<br>102–112 Gobo 1 (wheel slot 3)<br>113–123 Gobo 2 (wheel slot 4)<br>124–134 Gobo 3 (wheel slot 5)<br>135–145 Gobo 4 (wheel slot 6)<br>146–156 Gobo 5 (wheel slot 7)<br>157–167 Gobo 6 (wheel slot 8)<br>168–178 Gobo 7 (wheel slot 9)<br>179–189 Gobo 8 (wheel slot 10)<br>190–221 CW Fast to Slow<br>222–223 Stop<br>224–255 CCW Slow to Fast |

## Standard Pan360 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **12** | Gobo Rotation | 0 | 0–126 Index Min<br>127–224 CW Fast to Slow<br>225–254 Stop<br>255–255 CCW Slow to Fast |
| **13** | Gobo Rotation Fine | 0 | Fine byte of Gobo Rotation |
| **14** | Gobo 2 | 0 | 0–13 Open (wheel slot 1)<br>14–18 Gobo 1 (wheel slot 2)<br>19–23 Gobo 2 (wheel slot 3)<br>24–28 Gobo 3 (wheel slot 4)<br>29–33 Gobo 4 (wheel slot 5)<br>34–38 Gobo 5 (wheel slot 6)<br>39–43 Gobo 6 (wheel slot 7)<br>44–48 Gobo 7 (wheel slot 8)<br>49–53 Gobo 8 (wheel slot 9)<br>54–58 Gobo 9 (wheel slot 10)<br>59–63 Gobo 10 (wheel slot 11)<br>64–68 Gobo 11 (wheel slot 12)<br>69–73 Gobo 12 (wheel slot 13)<br>74–78 Gobo 13 (wheel slot 14)<br>79–83 Gobo 14 (wheel slot 15)<br>84–88 Gobo 15 (wheel slot 16)<br>89–93 Gobo 16 (wheel slot 17)<br>94–99 Gobo 1 (wheel slot 2)<br>100–105 Gobo 2 (wheel slot 3)<br>106–111 Gobo 3 (wheel slot 4)<br>112–117 Gobo 4 (wheel slot 5)<br>118–123 Gobo 5 (wheel slot 6)<br>124–129 Gobo 6 (wheel slot 7)<br>130–135 Gobo 7 (wheel slot 8)<br>136–141 Gobo 8 (wheel slot 9)<br>142–147 Gobo 9 (wheel slot 10)<br>148–153 Gobo 10 (wheel slot 11)<br>154–159 Gobo 11 (wheel slot 12)<br>160–165 Gobo 12 (wheel slot 13)<br>166–171 Gobo 13 (wheel slot 14)<br>172–177 Gobo 14 (wheel slot 15)<br>178–183 Gobo 15 (wheel slot 16)<br>184–189 Gobo 16 (wheel slot 17)<br>190–221 CW Fast to Slow<br>222–223 Stop<br>224–255 CCW Slow to Fast |
| **15** | Animation Wheel1 | 0 | 0–0 Open<br>1–127 Open to Dots<br>128–255 Dots to Lines |
| **16** | Animation Wheel1Pos | 0 | 0–127 Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **17** | Animation Wheel2 | 0 | 0–127 Open<br>128–255 Waves |
| **18** | Animation Wheel2Pos | 0 | 0–127 Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **19** | Prism | 0 | 0–63 Open (wheel slot 1)<br>64–95 8 Facet prism (wheel slot 2)<br>96–127 6 Facet Linear (wheel slot 3)<br>128–255 Open (wheel slot 1) |

## Standard Pan360 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **20** | Prism Rotation | 0 | 0–127 Index Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **21** | Prism | 0 | 0–63 Open (wheel slot 1)<br>64–95 16 Facet prism (wheel slot 4)<br>96–127 4 Facet Linear (wheel slot 5)<br>128–255 Open (wheel slot 1) |
| **22** | Prism Rotation | 0 | 0–127 Index Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **23** | Focus | 0 | |
| **24** | Focus Fine | 0 | Fine byte of Focus |
| **25** | Zoom | 127 | |
| **26** | Zoom Fine | 255 | Fine byte of Zoom |
| **27** | Shutter / Strobe | 63 | 0–31 Shutter CLOSED<br>32–63 NO Function (Shutter OPEN)<br>64–95 Strobe Effect SLOW to FAST<br>96–127 NO Function (Shutter OPEN)<br>128–159 Pulse Effect In Sequences<br>160–191 NO Function (Shutter OPEN)<br>192–223 Random Strobe Effect SLOW to FAST<br>224–255 NO Function (Shutter OPEN) |
| **28** | Dimmer | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **29** | Dimmer Fine | 0 | Fine byte of Dimmer |
| **30** | Iris | 0 | 0–191 Open to Close<br>192–223 Pulse Closing fast to slow<br>224–255 Pulse Opening slow to fast |
| **31** | Frost1 | 0 | |

### Standard Pan360 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **32** | Control1 | 0 | 0–10 Idle<br>11–12 Pan Shortest Path<br>13–14 Pan Continue Path<br>15–16 Pan Range 540 (default)<br>17–18 Pan Range 360<br>19–20 Pan Range 360 short<br>21–39 Idle<br>40–49 On<br>50–59 Off<br>60–66 Power 370W<br>67–73 Power 430W<br>74–79 Power 560W<br>80–84 Fixture<br>85–87 Pan Tilt<br>88–90 Color<br>91–93 Gobo<br>94–96 Dimmer<br>97–99 Other Features<br>100–164 Idle<br>165–166 CMY Smooth<br>167–168 CMY Fast<br>169–170 Vent Cleaning On<br>171–172 Vent Cleaning Off<br>173–174 Hibernation Off<br>175–176 Hibernation<br>177–178 Sun Protection On<br>179–180 Sun Protection Off<br>181–190 Pan Tilt Smooth<br>191–200 Pan Tilt Fast<br>201–210 Dimming Linear<br>211–220 Dimming Square<br>221–230 Dimming Inverse Square<br>231–240 Dimming S-Curve<br>241–249 Idle<br>250–251 Display OFF<br>252–253 Display ON<br>254–255 Idle |

## Standard Pan540

32 channels

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **1** | Pan | 127 | |
| **2** | Pan Fine | 255 | Fine byte of Pan |
| **3** | Tilt | 128 | |
| **4** | Tilt Fine | 128 | Fine byte of Tilt |
| **5** | Pan Rotate | 0 | 0–2 Disable<br>3–126 Rotating CW Fast to Slow<br>127–129 No rotation (Fixture stops at its current position)<br>130–253 Rotating CCW Fast to Slow<br>254–255 No rotation (Fixture stops at its current position) |
| **6** | Cyan | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |

## Standard Pan540 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **7** | Magenta | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **8** | Yellow | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **9** | C TO | 0 | |
| **10** | Color Wheel | 0 | 0–15 Open (wheel slot 1)<br>16–17 White/Red Split (wheel slot 1)<br>18–19 Red (wheel slot 2)<br>20–21 Red/Green Split (wheel slot 2)<br>22–23 Green (wheel slot 3)<br>24–25 Green/Yellow Split (wheel slot 3)<br>26–27 Yellow (wheel slot 4)<br>28–29 Yellow/PurpleSplit (wheel slot 4)<br>30–31 Purple (wheel slot 5)<br>32–33 Purple/Cyan Split (wheel slot 5)<br>34–35 Cyan (wheel slot 6)<br>36–37 Cyan/Orange Split (wheel slot 6)<br>38–39 Orange (wheel slot 7)<br>40–41 Orange/Magenta Split (wheel slot 7)<br>42–43 Magenta (wheel slot 8)<br>44–45 Magenta/Light Green Split (wheel slot 8)<br>46–47 Light Green (wheel slot 9)<br>48–49 Light Green/Pink Split (wheel slot 9)<br>50–51 Pink (wheel slot 10)<br>52–53 Pink/UV Split (wheel slot 10)<br>54–55 UV (wheel slot 11)<br>56–57 UV/CTB Split (wheel slot 11)<br>58–59 CTB (wheel slot 12)<br>60–61 CTB/CTOSplit (wheel slot 12)<br>62–63 CTO (wheel slot 13)<br>64–65 CTO/HighCRI Split (wheel slot 13)<br>66–67 HighCRI (wheel slot 14)<br>68–69 HighCRI/Dark Amber Split (wheel slot 14)<br>70–71 Dark Amber (wheel slot 15)<br>72–73 Dark Amber/Deep Red Split (wheel slot 15)<br>74–75 Deep Red (wheel slot 16)<br>76–77 Deep Red/Blue Split (wheel slot 16)<br>78–79 Blue (wheel slot 17)<br>80–81 Blue/White Split (wheel slot 17)<br>82–127 Open (wheel slot 1)<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |

## Standard Pan540 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **11** | Gobo | 0 | 0–10 Beam Open (wheel slot 1)<br>11–21 Spot Open (wheel slot 2)<br>22–31 Gobo 1 (wheel slot 3)<br>32–41 Gobo 2 (wheel slot 4)<br>42–51 Gobo 3 (wheel slot 5)<br>52–61 Gobo 4 (wheel slot 6)<br>62–71 Gobo 5 (wheel slot 7)<br>72–81 Gobo 6 (wheel slot 8)<br>82–91 Gobo 7 (wheel slot 9)<br>92–101 Gobo 8 (wheel slot 10)<br>102–112 Gobo 1 (wheel slot 3)<br>113–123 Gobo 2 (wheel slot 4)<br>124–134 Gobo 3 (wheel slot 5)<br>135–145 Gobo 4 (wheel slot 6)<br>146–156 Gobo 5 (wheel slot 7)<br>157–167 Gobo 6 (wheel slot 8)<br>168–178 Gobo 7 (wheel slot 9)<br>179–189 Gobo 8 (wheel slot 10)<br>190–221 CW Fast to Slow<br>222–223 Stop<br>224–255 CCW Slow to Fast |
| **12** | Gobo Rotation | 0 | 0–126 Index Min<br>127–224 CW Fast to Slow<br>225–254 Stop<br>255–255 CCW Slow to Fast |
| **13** | Gobo Rotation Fine | 0 | Fine byte of Gobo Rotation |
| **14** | Gobo 2 | 0 | 0–13 Open (wheel slot 1)<br>14–18 Gobo 1 (wheel slot 2)<br>19–23 Gobo 2 (wheel slot 3)<br>24–28 Gobo 3 (wheel slot 4)<br>29–33 Gobo 4 (wheel slot 5)<br>34–38 Gobo 5 (wheel slot 6)<br>39–43 Gobo 6 (wheel slot 7)<br>44–48 Gobo 7 (wheel slot 8)<br>49–53 Gobo 8 (wheel slot 9)<br>54–58 Gobo 9 (wheel slot 10)<br>59–63 Gobo 10 (wheel slot 11)<br>64–68 Gobo 11 (wheel slot 12)<br>69–73 Gobo 12 (wheel slot 13)<br>74–78 Gobo 13 (wheel slot 14)<br>79–83 Gobo 14 (wheel slot 15)<br>84–88 Gobo 15 (wheel slot 16)<br>89–93 Gobo 16 (wheel slot 17)<br>94–99 Gobo 1 (wheel slot 2)<br>100–105 Gobo 2 (wheel slot 3)<br>106–111 Gobo 3 (wheel slot 4)<br>112–117 Gobo 4 (wheel slot 5)<br>118–123 Gobo 5 (wheel slot 6)<br>124–129 Gobo 6 (wheel slot 7)<br>130–135 Gobo 7 (wheel slot 8)<br>136–141 Gobo 8 (wheel slot 9)<br>142–147 Gobo 9 (wheel slot 10)<br>148–153 Gobo 10 (wheel slot 11)<br>154–159 Gobo 11 (wheel slot 12)<br>160–165 Gobo 12 (wheel slot 13)<br>166–171 Gobo 13 (wheel slot 14)<br>172–177 Gobo 14 (wheel slot 15)<br>178–183 Gobo 15 (wheel slot 16)<br>184–189 Gobo 16 (wheel slot 17)<br>190–221 CW Fast to Slow<br>222–223 Stop<br>224–255 CCW Slow to Fast |

## Standard Pan540 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **15** | Animation Wheel1 | 0 | 0–0 Open<br>1–127 Open to Dots<br>128–255 Dots to Lines |
| **16** | Animation Wheel1Pos | 0 | 0–127 Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **17** | Animation Wheel2 | 0 | 0–127 Open<br>128–255 Waves |
| **18** | Animation Wheel2Pos | 0 | 0–127 Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **19** | Prism | 0 | 0–63 Open (wheel slot 1)<br>64–95 8 Facet prism (wheel slot 2)<br>96–127 6 Facet Linear (wheel slot 3)<br>128–255 Open (wheel slot 1) |
| **20** | Prism Rotation | 0 | 0–127 Index Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **21** | Prism | 0 | 0–63 Open (wheel slot 1)<br>64–95 16 Facet prism (wheel slot 4)<br>96–127 4 Facet Linear (wheel slot 5)<br>128–255 Open (wheel slot 1) |
| **22** | Prism Rotation | 0 | 0–127 Index Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **23** | Focus | 0 | |
| **24** | Focus Fine | 0 | Fine byte of Focus |
| **25** | Zoom | 127 | |
| **26** | Zoom Fine | 255 | Fine byte of Zoom |
| **27** | Shutter / Strobe | 63 | 0–31 Shutter CLOSED<br>32–63 NO Function (Shutter OPEN)<br>64–95 Strobe Effect SLOW to FAST<br>96–127 NO Function (Shutter OPEN)<br>128–159 Pulse Effect In Sequences<br>160–191 NO Function (Shutter OPEN)<br>192–223 Random Strobe Effect SLOW to FAST<br>224–255 NO Function (Shutter OPEN) |
| **28** | Dimmer | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **29** | Dimmer Fine | 0 | Fine byte of Dimmer |
| **30** | Iris | 0 | 0–191 Open to Close<br>192–223 Pulse Closing fast to slow<br>224–255 Pulse Opening slow to fast |
| **31** | Frost1 | 0 | |

### Standard Pan540 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **32** | Control1 | 0 | 0–10 Idle<br>11–12 Pan Shortest Path<br>13–14 Pan Continue Path<br>15–16 Pan Range 540 (default)<br>17–18 Pan Range 360<br>19–20 Pan Range 360 short<br>21–39 Idle<br>40–49 On<br>50–59 Off<br>60–66 Power 370W<br>67–73 Power 430W<br>74–79 Power 560W<br>80–84 Fixture<br>85–87 Pan Tilt<br>88–90 Color<br>91–93 Gobo<br>94–96 Dimmer<br>97–99 Other Features<br>100–164 Idle<br>165–166 CMY Smooth<br>167–168 CMY Fast<br>169–170 Vent Cleaning On<br>171–172 Vent Cleaning Off<br>173–174 Hibernation Off<br>175–176 Hibernation<br>177–178 Sun Protection On<br>179–180 Sun Protection Off<br>181–190 Pan Tilt Smooth<br>191–200 Pan Tilt Fast<br>201–210 Dimming Linear<br>211–220 Dimming Square<br>221–230 Dimming Inverse Square<br>231–240 Dimming S-Curve<br>241–249 Idle<br>250–251 Display OFF<br>252–253 Display ON<br>254–255 Idle |

## Extended Pan360

43 channels

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **1** | Pan | 127 | |
| **2** | Pan Fine | 255 | Fine byte of Pan |
| **3** | Tilt | 128 | |
| **4** | Tilt Fine | 128 | Fine byte of Tilt |
| **5** | Pan Rotate | 0 | 0–2 Disable<br>3–126 Rotating CW Fast to Slow<br>127–129 No rotation (Fixture stops at its current position)<br>130–253 Rotating CCW Fast to Slow<br>254–255 No rotation (Fixture stops at its current position) |
| **6** | Cyan | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **7** | Cyan Fine | 0 | Fine byte of Cyan |

## Extended Pan360 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **8** | Magenta | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **9** | Magenta Fine | 0 | Fine byte of Magenta |
| **10** | Yellow | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **11** | Yellow Fine | 0 | Fine byte of Yellow |
| **12** | C TO | 0 | |
| **13** | C TO Fine | 0 | Fine byte of C TO |
| **14** | Color Wheel | 0 | 0–15 Open (wheel slot 1)<br>16–17 White/Red Split (wheel slot 1)<br>18–19 Red (wheel slot 2)<br>20–21 Red/Green Split (wheel slot 2)<br>22–23 Green (wheel slot 3)<br>24–25 Green/Yellow Split (wheel slot 3)<br>26–27 Yellow (wheel slot 4)<br>28–29 Yellow/PurpleSplit (wheel slot 4)<br>30–31 Purple (wheel slot 5)<br>32–33 Purple/Cyan Split (wheel slot 5)<br>34–35 Cyan (wheel slot 6)<br>36–37 Cyan/Orange Split (wheel slot 6)<br>38–39 Orange (wheel slot 7)<br>40–41 Orange/Magenta Split (wheel slot 7)<br>42–43 Magenta (wheel slot 8)<br>44–45 Magenta/Light Green Split (wheel slot 8)<br>46–47 Light Green (wheel slot 9)<br>48–49 Light Green/Pink Split (wheel slot 9)<br>50–51 Pink (wheel slot 10)<br>52–53 Pink/UV Split (wheel slot 10)<br>54–55 UV (wheel slot 11)<br>56–57 UV/CTB Split (wheel slot 11)<br>58–59 CTB (wheel slot 12)<br>60–61 CTB/CTOSplit (wheel slot 12)<br>62–63 CTO (wheel slot 13)<br>64–65 CTO/HighCRI Split (wheel slot 13)<br>66–67 HighCRI (wheel slot 14)<br>68–69 HighCRI/Dark Amber Split (wheel slot 14)<br>70–71 Dark Amber (wheel slot 15)<br>72–73 Dark Amber/Deep Red Split (wheel slot 15)<br>74–75 Deep Red (wheel slot 16)<br>76–77 Deep Red/Blue Split (wheel slot 16)<br>78–79 Blue (wheel slot 17)<br>80–81 Blue/White Split (wheel slot 17)<br>82–127 Open (wheel slot 1)<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **15** | Color Wheel Fine | 0 | Fine byte of Color Wheel |

## Extended Pan360 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **16** | Gobo | 0 | 0–10 Beam Open (wheel slot 1)<br>11–21 Spot Open (wheel slot 2)<br>22–31 Gobo 1 (wheel slot 3)<br>32–41 Gobo 2 (wheel slot 4)<br>42–51 Gobo 3 (wheel slot 5)<br>52–61 Gobo 4 (wheel slot 6)<br>62–71 Gobo 5 (wheel slot 7)<br>72–81 Gobo 6 (wheel slot 8)<br>82–91 Gobo 7 (wheel slot 9)<br>92–101 Gobo 8 (wheel slot 10)<br>102–112 Gobo 1 (wheel slot 3)<br>113–123 Gobo 2 (wheel slot 4)<br>124–134 Gobo 3 (wheel slot 5)<br>135–145 Gobo 4 (wheel slot 6)<br>146–156 Gobo 5 (wheel slot 7)<br>157–167 Gobo 6 (wheel slot 8)<br>168–178 Gobo 7 (wheel slot 9)<br>179–189 Gobo 8 (wheel slot 10)<br>190–221 CW Fast to Slow<br>222–223 Stop<br>224–255 CCW Slow to Fast |
| **17** | Gobo Rotation | 0 | 0–126 Index Min<br>127–224 CW Fast to Slow<br>225–254 Stop<br>255–255 CCW Slow to Fast |
| **18** | Gobo Rotation Fine | 0 | Fine byte of Gobo Rotation |
| **19** | Gobo 2 | 0 | 0–13 Open (wheel slot 1)<br>14–18 Gobo 1 (wheel slot 2)<br>19–23 Gobo 2 (wheel slot 3)<br>24–28 Gobo 3 (wheel slot 4)<br>29–33 Gobo 4 (wheel slot 5)<br>34–38 Gobo 5 (wheel slot 6)<br>39–43 Gobo 6 (wheel slot 7)<br>44–48 Gobo 7 (wheel slot 8)<br>49–53 Gobo 8 (wheel slot 9)<br>54–58 Gobo 9 (wheel slot 10)<br>59–63 Gobo 10 (wheel slot 11)<br>64–68 Gobo 11 (wheel slot 12)<br>69–73 Gobo 12 (wheel slot 13)<br>74–78 Gobo 13 (wheel slot 14)<br>79–83 Gobo 14 (wheel slot 15)<br>84–88 Gobo 15 (wheel slot 16)<br>89–93 Gobo 16 (wheel slot 17)<br>94–99 Gobo 1 (wheel slot 2)<br>100–105 Gobo 2 (wheel slot 3)<br>106–111 Gobo 3 (wheel slot 4)<br>112–117 Gobo 4 (wheel slot 5)<br>118–123 Gobo 5 (wheel slot 6)<br>124–129 Gobo 6 (wheel slot 7)<br>130–135 Gobo 7 (wheel slot 8)<br>136–141 Gobo 8 (wheel slot 9)<br>142–147 Gobo 9 (wheel slot 10)<br>148–153 Gobo 10 (wheel slot 11)<br>154–159 Gobo 11 (wheel slot 12)<br>160–165 Gobo 12 (wheel slot 13)<br>166–171 Gobo 13 (wheel slot 14)<br>172–177 Gobo 14 (wheel slot 15)<br>178–183 Gobo 15 (wheel slot 16)<br>184–189 Gobo 16 (wheel slot 17)<br>190–221 CW Fast to Slow<br>222–223 Stop<br>224–255 CCW Slow to Fast |

## Extended Pan360 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **20** | Gobo 2 Fine | 0 | Fine byte of Gobo 2 |
| **21** | Animation Wheel1 | 0 | 0–0 Open<br>1–127 Open to Dots<br>128–255 Dots to Lines |
| **22** | Animation Wheel1Pos | 0 | 0–127 Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **23** | Animation Wheel2 | 0 | 0–127 Open<br>128–255 Waves |
| **24** | Animation Wheel2Pos | 0 | 0–127 Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **25** | Prism | 0 | 0–63 Open (wheel slot 1)<br>64–95 8 Facet prism (wheel slot 2)<br>96–127 6 Facet Linear (wheel slot 3)<br>128–255 Open (wheel slot 1) |
| **26** | Prism Rotation | 0 | 0–127 Index Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **27** | Prism Rotation Fine | 0 | Fine byte of Prism Rotation |
| **28** | Prism | 0 | 0–63 Open (wheel slot 1)<br>64–95 16 Facet prism (wheel slot 4)<br>96–127 4 Facet Linear (wheel slot 5)<br>128–255 Open (wheel slot 1) |
| **29** | Prism Rotation | 0 | 0–127 Index Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **30** | Prism Rotation Fine | 0 | Fine byte of Prism Rotation |
| **31** | Focus | 0 | |
| **32** | Focus Fine | 0 | Fine byte of Focus |
| **33** | Zoom | 127 | |
| **34** | Zoom Fine | 255 | Fine byte of Zoom |
| **35** | Focus1Adjust | 0 | 0–50 Auto Focus Off<br>51–100 5-15m<br>101–150 15-150m<br>151–255 Idle |
| **36** | Focus1Adjust Fine | 0 | Fine byte of Focus1Adjust |
| **37** | Shutter / Strobe | 63 | 0–31 Shutter CLOSED<br>32–63 NO Function (Shutter OPEN)<br>64–95 Strobe Effect SLOW to FAST<br>96–127 NO Function (Shutter OPEN)<br>128–159 Pulse Effect In Sequences<br>160–191 NO Function (Shutter OPEN)<br>192–223 Random Strobe Effect SLOW to FAST<br>224–255 NO Function (Shutter OPEN) |
| **38** | Dimmer | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **39** | Dimmer Fine | 0 | Fine byte of Dimmer |

### Extended Pan360 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **40** | Iris | 0 | 0–191 Open to Close<br>192–223 Pulse Closing fast to slow<br>224–255 Pulse Opening slow to fast |
| **41** | Frost1 | 0 | |
| **42** | Position MSpeed | 0 | 0–224 Max<br>225–225 Min<br>226–235 Blackout By Movement<br>236–245 Blackout by wheel changes<br>246–255 Function |
| **43** | Control1 | 0 | 0–10 Idle<br>11–12 Pan Shortest Path<br>13–14 Pan Continue Path<br>15–16 Pan Range 540 (default)<br>17–18 Pan Range 360<br>19–20 Pan Range 360 short<br>21–39 Idle<br>40–49 On<br>50–59 Off<br>60–66 Power 370W<br>67–73 Power 430W<br>74–79 Power 560W<br>80–84 Fixture<br>85–87 Pan Tilt<br>88–90 Color<br>91–93 Gobo<br>94–96 Dimmer<br>97–99 Other Features<br>100–164 Idle<br>165–166 CMY Smooth<br>167–168 CMY Fast<br>169–170 Vent Cleaning On<br>171–172 Vent Cleaning Off<br>173–174 Hibernation Off<br>175–176 Hibernation<br>177–178 Sun Protection On<br>179–180 Sun Protection Off<br>181–190 Pan Tilt Smooth<br>191–200 Pan Tilt Fast<br>201–210 Dimming Linear<br>211–220 Dimming Square<br>221–230 Dimming Inverse Square<br>231–240 Dimming S-Curve<br>241–249 Idle<br>250–251 Display OFF<br>252–253 Display ON<br>254–255 Idle |

## Extended Pan540

43 channels

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **1** | Pan | 127 | |
| **2** | Pan Fine | 255 | Fine byte of Pan |
| **3** | Tilt | 128 | |
| **4** | Tilt Fine | 128 | Fine byte of Tilt |
| **5** | Pan Rotate | 0 | 0–2 Disable<br>3–126 Rotating CW Fast to Slow<br>127–129 No rotation (Fixture stops at its current position)<br>130–253 Rotating CCW Fast to Slow<br>254–255 No rotation (Fixture stops at its current position) |

## Extended Pan540 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **6** | Cyan | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **7** | Cyan Fine | 0 | Fine byte of Cyan |
| **8** | Magenta | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **9** | Magenta Fine | 0 | Fine byte of Magenta |
| **10** | Yellow | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **11** | Yellow Fine | 0 | Fine byte of Yellow |
| **12** | C TO | 0 | |
| **13** | C TO Fine | 0 | Fine byte of C TO |
| **14** | Color Wheel | 0 | 0–15 Open (wheel slot 1)<br>16–17 White/Red Split (wheel slot 1)<br>18–19 Red (wheel slot 2)<br>20–21 Red/Green Split (wheel slot 2)<br>22–23 Green (wheel slot 3)<br>24–25 Green/Yellow Split (wheel slot 3)<br>26–27 Yellow (wheel slot 4)<br>28–29 Yellow/PurpleSplit (wheel slot 4)<br>30–31 Purple (wheel slot 5)<br>32–33 Purple/Cyan Split (wheel slot 5)<br>34–35 Cyan (wheel slot 6)<br>36–37 Cyan/Orange Split (wheel slot 6)<br>38–39 Orange (wheel slot 7)<br>40–41 Orange/Magenta Split (wheel slot 7)<br>42–43 Magenta (wheel slot 8)<br>44–45 Magenta/Light Green Split (wheel slot 8)<br>46–47 Light Green (wheel slot 9)<br>48–49 Light Green/Pink Split (wheel slot 9)<br>50–51 Pink (wheel slot 10)<br>52–53 Pink/UV Split (wheel slot 10)<br>54–55 UV (wheel slot 11)<br>56–57 UV/CTB Split (wheel slot 11)<br>58–59 CTB (wheel slot 12)<br>60–61 CTB/CTOSplit (wheel slot 12)<br>62–63 CTO (wheel slot 13)<br>64–65 CTO/HighCRI Split (wheel slot 13)<br>66–67 HighCRI (wheel slot 14)<br>68–69 HighCRI/Dark Amber Split (wheel slot 14)<br>70–71 Dark Amber (wheel slot 15)<br>72–73 Dark Amber/Deep Red Split (wheel slot 15)<br>74–75 Deep Red (wheel slot 16)<br>76–77 Deep Red/Blue Split (wheel slot 16)<br>78–79 Blue (wheel slot 17)<br>80–81 Blue/White Split (wheel slot 17)<br>82–127 Open (wheel slot 1)<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **15** | Color Wheel Fine | 0 | Fine byte of Color Wheel |

## Extended Pan540 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **16** | Gobo | 0 | 0–10 Beam Open (wheel slot 1)<br>11–21 Spot Open (wheel slot 2)<br>22–31 Gobo 1 (wheel slot 3)<br>32–41 Gobo 2 (wheel slot 4)<br>42–51 Gobo 3 (wheel slot 5)<br>52–61 Gobo 4 (wheel slot 6)<br>62–71 Gobo 5 (wheel slot 7)<br>72–81 Gobo 6 (wheel slot 8)<br>82–91 Gobo 7 (wheel slot 9)<br>92–101 Gobo 8 (wheel slot 10)<br>102–112 Gobo 1 (wheel slot 3)<br>113–123 Gobo 2 (wheel slot 4)<br>124–134 Gobo 3 (wheel slot 5)<br>135–145 Gobo 4 (wheel slot 6)<br>146–156 Gobo 5 (wheel slot 7)<br>157–167 Gobo 6 (wheel slot 8)<br>168–178 Gobo 7 (wheel slot 9)<br>179–189 Gobo 8 (wheel slot 10)<br>190–221 CW Fast to Slow<br>222–223 Stop<br>224–255 CCW Slow to Fast |
| **17** | Gobo Rotation | 0 | 0–126 Index Min<br>127–224 CW Fast to Slow<br>225–254 Stop<br>255–255 CCW Slow to Fast |
| **18** | Gobo Rotation Fine | 0 | Fine byte of Gobo Rotation |
| **19** | Gobo 2 | 0 | 0–13 Open (wheel slot 1)<br>14–18 Gobo 1 (wheel slot 2)<br>19–23 Gobo 2 (wheel slot 3)<br>24–28 Gobo 3 (wheel slot 4)<br>29–33 Gobo 4 (wheel slot 5)<br>34–38 Gobo 5 (wheel slot 6)<br>39–43 Gobo 6 (wheel slot 7)<br>44–48 Gobo 7 (wheel slot 8)<br>49–53 Gobo 8 (wheel slot 9)<br>54–58 Gobo 9 (wheel slot 10)<br>59–63 Gobo 10 (wheel slot 11)<br>64–68 Gobo 11 (wheel slot 12)<br>69–73 Gobo 12 (wheel slot 13)<br>74–78 Gobo 13 (wheel slot 14)<br>79–83 Gobo 14 (wheel slot 15)<br>84–88 Gobo 15 (wheel slot 16)<br>89–93 Gobo 16 (wheel slot 17)<br>94–99 Gobo 1 (wheel slot 2)<br>100–105 Gobo 2 (wheel slot 3)<br>106–111 Gobo 3 (wheel slot 4)<br>112–117 Gobo 4 (wheel slot 5)<br>118–123 Gobo 5 (wheel slot 6)<br>124–129 Gobo 6 (wheel slot 7)<br>130–135 Gobo 7 (wheel slot 8)<br>136–141 Gobo 8 (wheel slot 9)<br>142–147 Gobo 9 (wheel slot 10)<br>148–153 Gobo 10 (wheel slot 11)<br>154–159 Gobo 11 (wheel slot 12)<br>160–165 Gobo 12 (wheel slot 13)<br>166–171 Gobo 13 (wheel slot 14)<br>172–177 Gobo 14 (wheel slot 15)<br>178–183 Gobo 15 (wheel slot 16)<br>184–189 Gobo 16 (wheel slot 17)<br>190–221 CW Fast to Slow<br>222–223 Stop<br>224–255 CCW Slow to Fast |

## Extended Pan540 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **20** | Gobo 2 Fine | 0 | Fine byte of Gobo 2 |
| **21** | Animation Wheel1 | 0 | 0–0 Open<br>1–127 Open to Dots<br>128–255 Dots to Lines |
| **22** | Animation Wheel1Pos | 0 | 0–127 Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **23** | Animation Wheel2 | 0 | 0–127 Open<br>128–255 Waves |
| **24** | Animation Wheel2Pos | 0 | 0–127 Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **25** | Prism | 0 | 0–63 Open (wheel slot 1)<br>64–95 8 Facet prism (wheel slot 2)<br>96–127 6 Facet Linear (wheel slot 3)<br>128–255 Open (wheel slot 1) |
| **26** | Prism Rotation | 0 | 0–127 Index Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **27** | Prism Rotation Fine | 0 | Fine byte of Prism Rotation |
| **28** | Prism | 0 | 0–63 Open (wheel slot 1)<br>64–95 16 Facet prism (wheel slot 4)<br>96–127 4 Facet Linear (wheel slot 5)<br>128–255 Open (wheel slot 1) |
| **29** | Prism Rotation | 0 | 0–127 Index Position<br>128–189 CW Fast to Slow<br>190–193 Stop<br>194–255 CCW Slow to Fast |
| **30** | Prism Rotation Fine | 0 | Fine byte of Prism Rotation |
| **31** | Focus | 0 | |
| **32** | Focus Fine | 0 | Fine byte of Focus |
| **33** | Zoom | 127 | |
| **34** | Zoom Fine | 255 | Fine byte of Zoom |
| **35** | Focus1Adjust | 0 | 0–50 Auto Focus Off<br>51–100 5-15m<br>101–150 15-150m<br>151–255 Idle |
| **36** | Focus1Adjust Fine | 0 | Fine byte of Focus1Adjust |
| **37** | Shutter / Strobe | 63 | 0–31 Shutter CLOSED<br>32–63 NO Function (Shutter OPEN)<br>64–95 Strobe Effect SLOW to FAST<br>96–127 NO Function (Shutter OPEN)<br>128–159 Pulse Effect In Sequences<br>160–191 NO Function (Shutter OPEN)<br>192–223 Random Strobe Effect SLOW to FAST<br>224–255 NO Function (Shutter OPEN) |
| **38** | Dimmer | 0 | 0–62 0 %<br>63–126 25 %<br>127–190 50 %<br>191–254 75 %<br>255–255 100 % |
| **39** | Dimmer Fine | 0 | Fine byte of Dimmer |

## Extended Pan540 (continued)

| Ch | Function | Default | DMX values |
|---|---|---|---|
| **40** | Iris | 0 | 0–191 Open to Close<br>192–223 Pulse Closing fast to slow<br>224–255 Pulse Opening slow to fast |
| **41** | Frost1 | 0 | |
| **42** | Position MSpeed | 0 | 0–224 Max<br>225–225 Min<br>226–235 Blackout By Movement<br>236–245 Blackout by wheel changes<br>246–255 Function |
| **43** | Control1 | 0 | 0–10 Idle<br>11–12 Pan Shortest Path<br>13–14 Pan Continue Path<br>15–16 Pan Range 540 (default)<br>17–18 Pan Range 360<br>19–20 Pan Range 360 short<br>21–39 Idle<br>40–49 On<br>50–59 Off<br>60–66 Power 370W<br>67–73 Power 430W<br>74–79 Power 560W<br>80–84 Fixture<br>85–87 Pan Tilt<br>88–90 Color<br>91–93 Gobo<br>94–96 Dimmer<br>97–99 Other Features<br>100–164 Idle<br>165–166 CMY Smooth<br>167–168 CMY Fast<br>169–170 Vent Cleaning On<br>171–172 Vent Cleaning Off<br>173–174 Hibernation Off<br>175–176 Hibernation<br>177–178 Sun Protection On<br>179–180 Sun Protection Off<br>181–190 Pan Tilt Smooth<br>191–200 Pan Tilt Fast<br>201–210 Dimming Linear<br>211–220 Dimming Square<br>221–230 Dimming Inverse Square<br>231–240 Dimming S-Curve<br>241–249 Idle<br>250–251 Display OFF<br>252–253 Display ON<br>254–255 Idle |