# TITAN 1080p Pro Series II

## TITAN 1080p-500 • TITAN 1080p-700 • TITAN 1080p *Ultra Contrast*



## Overview

Digital Projection International (DPI), Texas Instruments' first DLP™ partner and the original innovator of the 3-chip DLP™ projector, proudly introduces the newest of our compact 1080p Pro Series II Displays, the TITAN Pro 1080p-500, 700 and *Ultra Contrast*.

Weighing in at just 59.5 and 68 lbs., the twin-lamp TITAN 1080p-500 and dual lamp 1080p-700 and *Ultra Contrast* displays employ the latest in Texas Instruments' 1080p dark chip, 3-chip DLP™ technology to deliver up to 10,000 lumens and up to 5000:1 contrast. Compact, robustly built and ultra-quiet for their performance class, TITANs are unmatched solutions for staging, command and control, visualization, business, and educational venues. For staging, the TITAN can be ordered with DP's RapidRig™ flying and stacking frame, which provides integrated pitch, roll and yaw adjustments, simplifying installation and alignment accuracy.

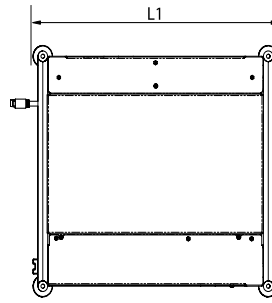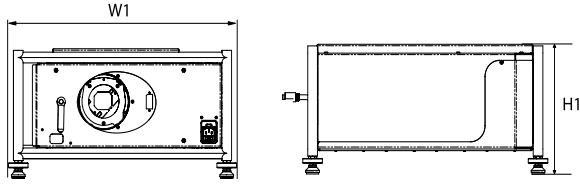Other key benefits of the TITAN 1080p line include:
- DP's *NextGen* electronics, featuring class leading de-interlacing with SD and HD sources processed using auto 3:2 and 2:2 extraction
- Minimal video delay from input to screen - as low as 1 frame, depending on source
- Sealed optics to protect DMD's and other focal plane components from airborne contaminants
- Seven user-selectable inputs, including HDCP compliant DVI plus SD/HD-SDI
- ColorMax calibration capabilities including enhanced seven-point color correction for broader color space and accurate color alignment
- User selectable Xenon-color mode processing, which enables the projector to closely replicate the spectral performance of a Xenon lamp
- Twin (1080p-500) or Dual (1080p-700/*Ultra Contrast*) high intensity discharge lamps, which can be run individually or simultaneously, with a typical life of up to 2000 hours per lamp
- A range of precision optics with extended lens shift, compatible with all TITAN and LIGHTNING sx+ and 1080p models
- DP's CoolTek engineering, which delivers the highest lumen performance with the lowest thermal (BTU) and noise level (dB) output

The TITAN 1080p-500 and 1080p-700 and *Ultra Contrast* Pro Series II displays are priced and sized for every venue and everyday use - bringing the precision of Digital Projection to your venue.

## PERFORMANCE SPECIFICATIONS

**Brightness** (±10%)
1080p-500:   6,000 ANSI Lumens
1080p-700:   10,000 ANSI Lumens
*Ultra Contrast*:   5,000 ANSI Lumens

**Contrast Ratio** (±10%)
1080p-500/700: 2000:1
1080p *Ultra Contrast*: 5000:1

**Display Type**
3 x .95" Darkchip 1080p DMD™ with Fast Transit Pixels for smooth greyscale and improved contrast

**DMD Specification**
1920 x 1080 pixels native, 12˚ tilt angle

**Fill Factor**
87%

**Sealed Optics at DMD™ Interface**
Protects DMD's™ from optical contamination

**Source Compatibility**
- Composite, s-video, and color difference video standards
- RGB graphics standards up to 1920 x 1080
- DVI standards with HDCP compliance
- High definition RGB and color difference standards
- High definition / standard definition serial digital formats (SD/HD-SDI) (from 4/08)

**Video Processing**
- Enhanced 7 point color correction
- Xenon Color Mode - User selectable yellow notch filter and xenon-color mode processing, enable the projector to closely replicate xenon lamp spectral performance.
- Class leading Video de-interlacing/processing of SD and HD sources using auto 3:2 and 2:2 extraction, ruggedized for editing discontinuities
- Pixel-based motion adaptive interpolation
- User selectable preset, parametric de-gamma and user downloadable de-gamma
- Frame Delay: as low as 1 frame, source dependant
- Auto mode selection - plug and play setup

**Network Connection**
LAN via RJ 45, Wireless 802.11b, full protocol feature set

**Lamp Type**
1080p-500:   Twin High Intensity Discharge module (2 x 250W lamps)
1080p-700:   Dual HID modules (2 x 350W)
(& *Ultra Contrast*)

**Lamp Life** (typical)[1]
1080p-500: 1500 hours dual lamp mode / 3000 hours single lamp mode
1080p-700: 2000 hours / 4000 hours
(& *Ultra Contrast*)

**Lens Mount**
**Zoom**: Motorized horizontal and vertical lens shift, zoom and focus,
**Fixed**: Manual Focus.

**Lens Shift** (maximum)
**Fixed 1.12 and Zoom Lenses:**
Vert: +0.7, -0.5 frame
Hor: ±0.1875 frame
**0.67 Fixed lens:**
Vert: ±0.1 frame; Hor: ±0.1 frame

**Lens Options**
0.67   :1   fixed
1.12   :1   fixed (1.2-2.0m throw)
1.12   :1   fixed (3-15m throw)
1.39-1.87 :1 zoom
1.87-2.56 :1 zoom
2.56-4.16 :1 zoom
4.16-6.96 :1 zoom
- 1.12:1 Lenses include manual aperture
- High-contrast lenses available for 0.67:1 and all zoom lenses

**Mechanical Mounting**
- Front or rear table; Front or rear ceiling (ceiling mount optional)
- Rugged, staging tolerant chassis with integrated handles
- Optional rigging /stacking frame with integrated pitch, roll and yaw adjustments

**Weight** (chassis only)
1080p-500:59.5 lbs (27 kg)
1080p-700/UC: 68 lbs (31kg)

## INPUT CAPABILITIES

| Type | Connector | Quantity |
|---|---|---|
| Composite | BNC | 1 |
| S-Video | 4-pin mini DIN | 1 |
| Component Interlaced/Std def Y, Cr/Pr, Cb/Pb, S | BNCx4 | 1 |
| Graphics Progressive RGB/Progressive Interlaced Hi def Y, Cr/Pr, Cb/PB | BNCx5 | 1 |
| RGBHV (Progressive) | D sub (15-pin) | 1 |
| Digital RGB | DVI | 1 |
| Serial Digital SD/HD-SDI (SMPTE 259M/292M) | BNC | 1 |

# TITAN Pro Series II

**DIGITAL PROJECTION**


TITAN 1080p-700 side panel


shown with optional rigging frame

## Projector Dimensions

| 500 Series | 700 Series & Ultra Contrast |
|---|---|
| Projector dimensions (in)<br>L1 22.1   W1 20.7   H1 10 | Projector dimensions (in)<br>L1 25.4   W1 21.4   H1 10 |
| Projector dimensions (mm)<br>L1 561   W1 525   H1 254 | Projector dimensions (mm)<br>L1 645.4   W1 543.5   H1 253.5 |

## ADVANCED TECHNICAL SPECIFICATIONS

| PARAMETERS | TITAN 1080p-500 | TITAN 1080p-700 / TITAN 1080p Ultra Contrast |
|---|---|---|
| Native Color Temperature | 6500°K ±1000°K; white balance-adjustment: 3000°K to 10000°K<br>User selectable Xenon-like colorimetry using dynamic optical and electronic enhancement. ||
| HDTV Formats Supported | 1080i (50Hz, 60Hz), 1080p (24Hz, 25Hz, 30Hz, 50Hz, 60Hz), 1080 24sf, 720p (50, 60Hz), 480i, 480p ||
| Scan Rates Supported | Horizontal: 15kHz to 100kHz / Vertical: 24Hz to 85Hz ||
| Remote Control | Addressable IR remote control, wireless and wired with loop-through / On board invertable keypad ||
| Automation Control | LAN connection via RJ45  / RS232 9-pin D type ||
| Operating/Storage Temperature | Operating: 0 to 40°C / Storage: -10 to 50°C ||
| Operating Humidity | 20 to 80% non-condensing ||
| Thermal Dissipation | 2,600 BTU/hr | 2,900 BTU/hr |
| Fan Noise | Less than 42dBA | Less than 45dBA |
| Power Requirements | 100-240 VAC ±10%, 50/60Hz single phase ||
| Power Consumption | 750 watts maximum | 950 watts maximum |

| Projectors | Part # |
|---|---|
| TITAN 1080p-500 | 108-642 |
| TITAN 1080p-700 | 108-722 |
| TITAN 1080p *Ultra Contrast* | 108-781 |

| Lenses | HB Part # |
|---|---|
| 0.67:1 | 105-607 |
| 1.12:1 | 105-608 |
| 1.12:1 (short) | 105-609 |
| 1.16 - 1.49:1 | 109-236 |
| 1.39 - 1.87:1 | 105-610 |
| 1.87 - 2.56:1 | 105-611 |
| 2.56 - 4.16:1 | 105-612 |
| 4.16 - 6.96:1 | 105-613 |
| 6.92 - 10.36:1 | 109-235 |

| Accessories | Part # |
|---|---|
| Twin 250 Watt Lamp & Housing | 001-742 |
| 300 Watt Lamp & Housing* (2 required) | 107-694 |
| 350 Watt Lamp & Housing* (2 required) | 108-772 |
| RapidRig™ Frame | 107-956 |
| TITAN 500 Series Adjustable Ceiling Mount | 105-021 |
| TITAN 700/UC Series Adjustable Ceiling Mount | 108-499 |
| Infrared Remote (Replacement) | 105-023 |

* Includes high-performance replacement air filter(s)

**ColorMAX™**

**DLP — PICTURE BY — TEXAS INSTRUMENTS**

1 Based on 4-6 hour/day operational profile.  Venue and application conditions may impact actual lamp life.
See Digital Projection's Product Warranty Statement for details on lamp warranty.
Installations requiring horizontal or vertical tilt orientations greater than 15 degrees may reduce the
actual operational hours of one of the two lamps.