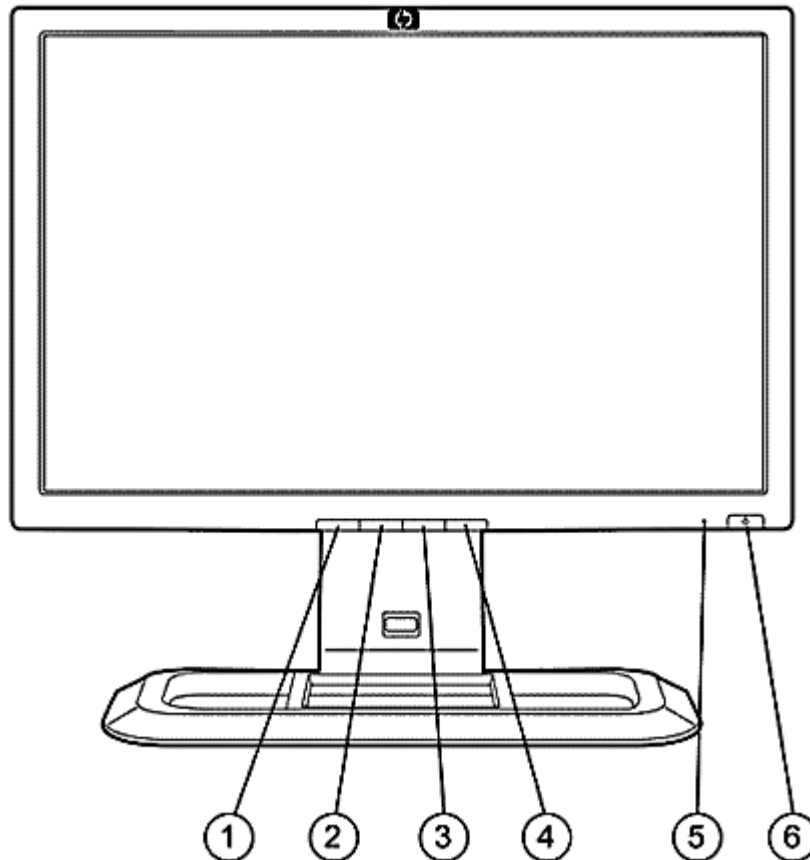


## Overview



1. **Menu/select:** Opens, selects or exits the OSD menu.
2. **"-"/Auto:** Navigates backward through the OSD menu and decreases adjustment levels; when the OSD menu is inactive, activates the auto adjustment feature to optimize the screen image.
3. **"+":** Navigates forward through the OSD menu and increases adjustment levels.
4. **Input select:** Select video input (DVI-D or VGA)
5. **Power LED:** fully powered = green; sleep mode = amber; sleep timer mode = flashing amber.
6. **Power:** Turns the monitor on or off.

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## Models

### Business Desktops

Carbonite: RA373AA#ABA

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## Models

4 Year Next Business Day Warranty Extension

U7934E

5 Year Next Business Day Warranty Extension

U7935E

## Technical Specifications

Panel	Type	Active matrix, thin film transistor (TFT)	
	Viewable Image Area (diagonal)	19 in (48.25 cm) maximum viewable	
	Screen Opening (WxH)	14.9 x 12.0 in (38.0 x 30.5 cm)	
	Panel Type	PVA	
	Aspect Ratio	5:4	
	Viewing Angle (typical) <sup>1</sup>	178 degrees horizontal/178 degrees vertical (10:1 minimum contrast ratio)	
	Brightness (typical) <sup>1</sup>	300 nits (cd/m <sup>2</sup> )	
	Contrast Ratio (typical) <sup>1</sup>	1000:1 (typical)	
	Response Time (typical) <sup>1</sup>	6 ms (typical gray to gray) <sup>2</sup>	
	Color Gamut	72%	
	Pixel Pitch	0.294 mm	
	Backlight Lamp Life (to half brightness)	50K hours	
	Bezel Width	13 mm	
	Video/Other Inputs	Plug and Play	Yes (supports VESA DDC2B and DDC/CI; PC2001 compliant)
Self Powered USB 2.0 Hub		One upstream, four downstream ports (cable included)	
Input Signal		Two DVI connectors (VGA analog or digital) with HDCP over digital DVI	
Input Impedance		75 ohms ± 2%	
Sync Input		Separate sync (HSYNC/VSYNC); composite sync, Sync on Green (activated through on-screen display)	
Video Cable		One DVI-D to DVI-D, and 1 DVI to VGA cables	
Video Cable Length		71 in (1.8 m)	
Signal Interface/ Performance	Horizontal Frequency	24 to 83 kHz	
	Vertical Frequency	48 to 76 Hz	
	Native Resolution	1280 x 1024 @ 75 Hz analog 1280 x 1024 @ 60 Hz digital	
	Maximum Resolution (Analog)	1280 x 1024 @ 75 Hz analog	
	Maximum Resolution (Digital)	1280 x 1024 @ 75 Hz digital	
	Preset VESA Graphic Modes (non-interlaced)		640 x 480 @ 60 Hz, 72 Hz, 75 Hz
			720 x 400 @ 70 Hz
			800 x 600 @ 60 Hz, 72 Hz, 75 Hz
			1024 x 768 @ 60 Hz, 70 Hz, 75 Hz
			1280 x 1024 @ 60 Hz, 75 Hz
Preset MAC Mode		832 x 624 @ 75 Hz	
		1152 x 870 @ 75 Hz	

## Technical Specifications

	Preset VGA Mode	640 x 480 @ 60 Hz, 72 Hz
	Preset SUN Mode	1152 x 900 @ 76 Hz
	Fail Safe Mode	Yes (limits out of range signal messages)
	Maximum Pixel Clock Speed	140 MHz
	User Programmable Modes	Yes, 15
	Anti-Glare	Yes
	Anti-Static	Yes
	AssetControl	Yes (accessible on HP Compaq Business Desktops featuring Intelligent Manageability)
	Default Color Temperature	Yes (6500k, 9300k, sRGB, Custom User)
On Screen Display (OSD) Controls	Buttons or Switches	Power on/off; 3-button OSD; second level OSD buttons include dual-input switch, dedicated auto adjust switch
	Languages	English, Spanish, French, German, Netherlands, Italian, Japanese, Simplified Chinese
	User Controls	Size and Positioning Contrast Brightness Clock, Clock Phase Selectable Color Temperature Serial Number Mode Displayed Sleep Timer Input Selection Factory Reset
Power	Power Supply	Auto-ranging, 90 to 265 VAC; internal power supply
	Input Power	100 ~ 240 VAC
	Nominal Current	1.5 A maximum
	Frequency	50 ~ 60 Hz
	Typical Power Consumption	< 35 watts
	Maximum	< 55 watts
	Power Saving	< 2 watts
	Off Mode	0 watts (when master power switch is in the off position)
	Power Cable Length	74.8 in (1.9 m); non-captive
Mechanical	Dimensions (H x W x D)	<b>Unpacked w/stand</b> 14.85 min to 18.79 max x 15.9 x 8.78 inches (37.72 min to 47.72 max x 40.39 x 22.29 cm)

### Technical Specifications

<b>Base area</b> (Footprint D x W)	8.78 x 11.88 inches (22.29 x 30.18 cm)
<b>Display head only</b> (Without stand) (H x W x cm) D)	12.96 x 15.9 x 2.4 inches (32.91 x 40.39 x 6.1)

<b>Weight</b>	<b>Unpacked w/stand</b>	15.6 lbs (7.06 kg)
	<b>Unpacked w/o stand</b>	9.26 lbs (4.19 kg)
	<b>Packaged</b>	20.5 lbs (9.27 kg)

**Bezel width** 12.5 mm left and right, 12.75 mm top and bottom

**Tilt Range** -4 degrees to +30 degrees

**Swivel Range** ± 45 degrees horizontal swivel

**Height Adjustable** Yes (4 in/100mm adjustment range)

**Pivot Rotation** Yes, 90 degrees

**Base** Ships attached and is removable

#### Environmental

**Temperature – Operating** 41° to 95° F (5° to 35° C)

**Temperature – Non-operating** -4° to 140° F (-20° to 60° C)

**Humidity – Operating** 20% to 80%

**Humidity – Non-operating** 5% to 95%

**Altitude – Operating** 0 to 12,000 ft (0 to 3,658 m)

**Altitude – Non-operating** 0 to 40,000 ft (0 to 12,192 m)

#### Environmental Data

**Eco-Label Certifications and Declarations** This product has received or is in the process of being certified to the following approvals and may be labeled with one or more of these marks:

- ENERGY STAR®
- CECP
- EPEAT™ Silver

<b>Energy Consumption</b> (in accordance with ENERGY STAR® test method)	AC Input Voltage at 100 VAC +/- 5 VAC, 50 Hz +/- 3 Hz	AC Input Voltage at 115 VAC +/- 5 VAC, 60 Hz +/- 3 Hz	AC Input Voltage at 230 VAC +/- 5 VAC, 50 Hz +/- 3 Hz
<b>Normal Operation</b>	35.7 watts	35.6 watts	35.1 watts
<b>Sleep</b>	1.08 watts	1.14watts	1.23 watts
<b>Off</b>	0.93 watts	0.94 watts	0.92 watts

<b>Heat Dissipation<sup>3</sup></b>	100 VAC, 50 Hz	115 VAC, 60 Hz	230 VAC, 50 Hz
<b>Normal Operation</b>	121.7 BTU/hr	121.4 BTU/hr	119.7 BTU/hr
<b>Sleep</b>	3.68 BTU/hr	3.89 BTU/hr	4.19 BTU/hr
<b>Off</b>	3.17 BTU/hr	3.21 BTU/hr	3.14 BTU/hr

### Technical Specifications

<b>Longevity and Upgrading</b>	Upgradeability features contained in the product include: One upstream and four downstream USB ports
<b>Ergonomics</b>	The monitor meets the ergonomic requirement of EN-ISO 13406-2 for flat panel displays.
<b>Additional Information</b>	<p>This product is in compliance with the Restrictions of Hazardous Substances (RoHS) Directive, 2002/95/EC.</p> <p>This HP product is designed to comply with the Waste Electrical and Electronic Equipment (WEEE) Directive, 2002/96/EC.</p> <p>This product is in compliance with California Proposition 65 (State of California; Safe Drinking Water and Toxic Enforcement Act of 1986).</p> <p>This product is in compliance with the IEEE 1680 (EPEAT) standard at the Silver level, see <a href="http://www.epeat.net">www.epeat.net</a>.</p> <p>Plastics parts weighing over 25 grams used in the product are marked per ISO 11469 and ISO1043.</p> <p>Display meets the requirement for low frequency electromagnetic fields per TCO and prEN50279 A/B/C.</p> <p>This product contains 0% recycled materials (by wt.)</p> <p>This product is 98.6% recyclable when properly disposed of at end of life.</p> <p>Packaging Materials</p> <ul style="list-style-type: none"><li>● Corrugated – 0.955 kg</li><li>● Plastic (other) – 0.055 kg</li><li>● Polystyrene – 0.24 kg</li></ul>
<b>Material Usage</b>	<p>This product does not contain any of the following substances in excess of regulatory limits (refer to the HP General Specification for the Environment at <a href="http://www.hp.com/hpinfo/globalcitizenship/environment/supplychain/gen_specifications.html">www.hp.com/hpinfo/globalcitizenship/environment/supplychain/gen_specifications.html</a>):</p> <ul style="list-style-type: none"><li>● Asbestos</li><li>● Certain Azo Colorants</li><li>● Certain Brominated Flame Retardants – may not be used as flame retardants in plastics</li><li>● Cadmium</li><li>● Chlorinated Hydrocarbons</li><li>● Chlorinated Paraffins</li><li>● Formaldehyde</li><li>● Halogenated Diphenyl Methanes</li><li>● Lead carbonates and sulfates</li><li>● Lead and Lead compounds</li></ul>

## Technical Specifications

- Mercuric Oxide Batteries
- Nickel – finishes must not be used on the external surface designed to be frequently handled or carried by the user.
- Ozone Depleting Substances
- Polybrominated Biphenyls (PBBs)
- Polybrominated Biphenyl Ethers (PBBEs)
- Polybrominated Biphenyl Oxides (PBBOs)
- Polychlorinated Biphenyl (PCB)
- Polychlorinated Terphenyls (PCT)
- Polyvinyl Chloride (PVC) – except for wires and cables, and certain retail packaging has been voluntarily removed from most applications.
- Radioactive Substances
- Tributyl Tin (TBT), Triphenyl Tin (TPT), Tributyl Tin Oxide (TBTO)

### Packaging

HP follows these guidelines to decrease the environmental impact of product packaging:

- Eliminate the use of heavy metals such as lead, chromium, mercury and cadmium in packaging materials.
- Eliminate the use of ozone-depleting substances (ODS) in packaging materials.
- Design packaging materials for ease of disassembly.
- Maximize the use of post-consumer recycled content materials in packaging materials.
- Use readily recyclable packaging materials such as paper and corrugated materials.
- Reduce size and weight of packages to improve transportation fuel efficiency.
- Plastic packaging materials are marked according to ISO 11469 and DIN 6120 standards.

### End-of-life Management and Recycling

Hewlett-Packard offers end-of-life HP product return and recycling programs in many geographic areas. To recycle your product, please go to: [www.hp.com/recycle](http://www.hp.com/recycle) or contact your nearest HP sales office. Products returned to HP will be recycled, recovered or disposed of in a responsible manner.

### Hewlett-Packard Corporate Environmental Information

For more information about HP's commitment to the environment:

Global Citizenship Report

[www.hp.com/hpinfo/globalcitizenship/gcreport/index.html](http://www.hp.com/hpinfo/globalcitizenship/gcreport/index.html)

Eco-label certifications

[www.hp.com/hpinfo/globalcitizenship/environment/productdesign/ecolabels.html](http://www.hp.com/hpinfo/globalcitizenship/environment/productdesign/ecolabels.html)

ISO 14001 certificates:

[www.hp.com/hpinfo/globalcitizenship/environment/operations/envmanagement.html](http://www.hp.com/hpinfo/globalcitizenship/environment/operations/envmanagement.html)

### Options

HP Silver LCD Speaker Bar—Part number: EE418AA

Powered directly by the monitor or PC, seamlessly attaches to the monitor's bezel to bring full multimedia support to select HP flat panel monitors. Features include dual speakers with full sound range and external jack for



### Technical Specifications

headphones. Sold separately. For more information, refer to the product's QuickSpec.

**HP Integrated Work Center Stand—Part number: GN783AA**

Allows mounting of the monitor and an HP Compaq dc7800 or dc7900 Ultra-slim Desktop PC or HP t5000 series Thin Client on a single stand for the convenience of an "all-in-one" form factor. Sold separately. For more information, refer to this product's QuickSpec document.

**HP Security Lock—Part number PC766A**

Combines aircraft-grade steel and Kevlar fiber to securely lock down your monitor and help prevent theft.

#### Other

**Accessories Included**

One DVI-D to DVI-D cable, one DVI-I to VGA cable, one USB cable, and CD-ROM with Pivot Pro software, HP Display Assistant software, and HP Display LiteSaver software.

**Software**

Pivot Pro software from Portrait Displays, Inc. interacts with your PC's native graphics driver to enable seamless portrait screen redraws with a simple mouse-click or keyboard command. Pivot Pro supports 90-degree portrait and landscape views. Language support is available in English, Japanese, French, German, Spanish, Italian, and Traditional and Simplified Chinese.

HP Display Assistant is a software utility that allows monitor adjustment, color calibration, and security/asset management using the Display Data Channel Command Interface (DDC/CI) protocol of the connected desktop PC.

HP Display LiteSaver feature allows you to schedule Sleep mode at preset times to help protect the monitor against image retention, drastically lower power consumption and energy costs, and extend the lifespan of the monitor.

**User Guide Languages**

English, Bahasa, B. Portuguese, French, LA Spanish, Korean, Simplified Chinese, Traditional Chinese, Japanese, Danish, Dutch, Finnish, German, Italian, Norwegian, Swedish, Greek, Polish, Russian, Slovenian, Turkish

**Warranty Languages**

English

**Color**

Carbonite, two-tone carbonite and silver (EMEA only)

**VESA Mounting**

Yes (swing arm/wall mount not included); base must be removed for mounting options)

**VESA External Mounting**

Yes (standard 4 hole pattern, 100 mm)

**Security Lock-ready**

Yes

#### Certification and Compliance

Australian ACA Approval, Canadian Requirements/CSA, CE Marking, China CCIB/CCEE Approval, CISPR Requirements, Eastern European Approvals, ENERGY STAR® qualified, FCC Approval, German Ergonomic (TUV and GS Mark), ISO 13406-2 Compliant (Pixel Defect Guidelines), Mexican NOM Approval, PC99 Certified, S. Korean MIC Approval, Taiwan BSMI Approval, TCO 99 or 03 depending on region (emissions, ergonomics, environment), TUV-Ergo, UL Listed, VCCI Approvals, Microsoft® Windows® Certification, Windows Vista® Premium Certification, EPEAT™ Silver™



#### Compatibility

VESA Video Signal Standard (VSIS) Compliant video cards have been tested and proven compatible for use with the HP LP1965 19-inch LCD Monitor. Recommended for use with HP products.

#### Service and Warranty

Three years parts, labor, and on-site service. 24-hour, 90-day, toll-free technical support. Replacement options may include second business day on-site service, or next business day direct replacement, at HP's

## Technical Specifications

sole discretion.<sup>4</sup> With direct replacement, HP will ship a replacement display product directly to you. Using the prepaid shipping labels provided, return your failed display to HP in the same packaging as the replacement. Certain restrictions and exclusions apply. For details see your product warranty or contact HP Customer Support.

<sup>1</sup> All performance specifications represent the typical specifications provided by HP's component manufacturers; actual performance may vary either higher or lower.

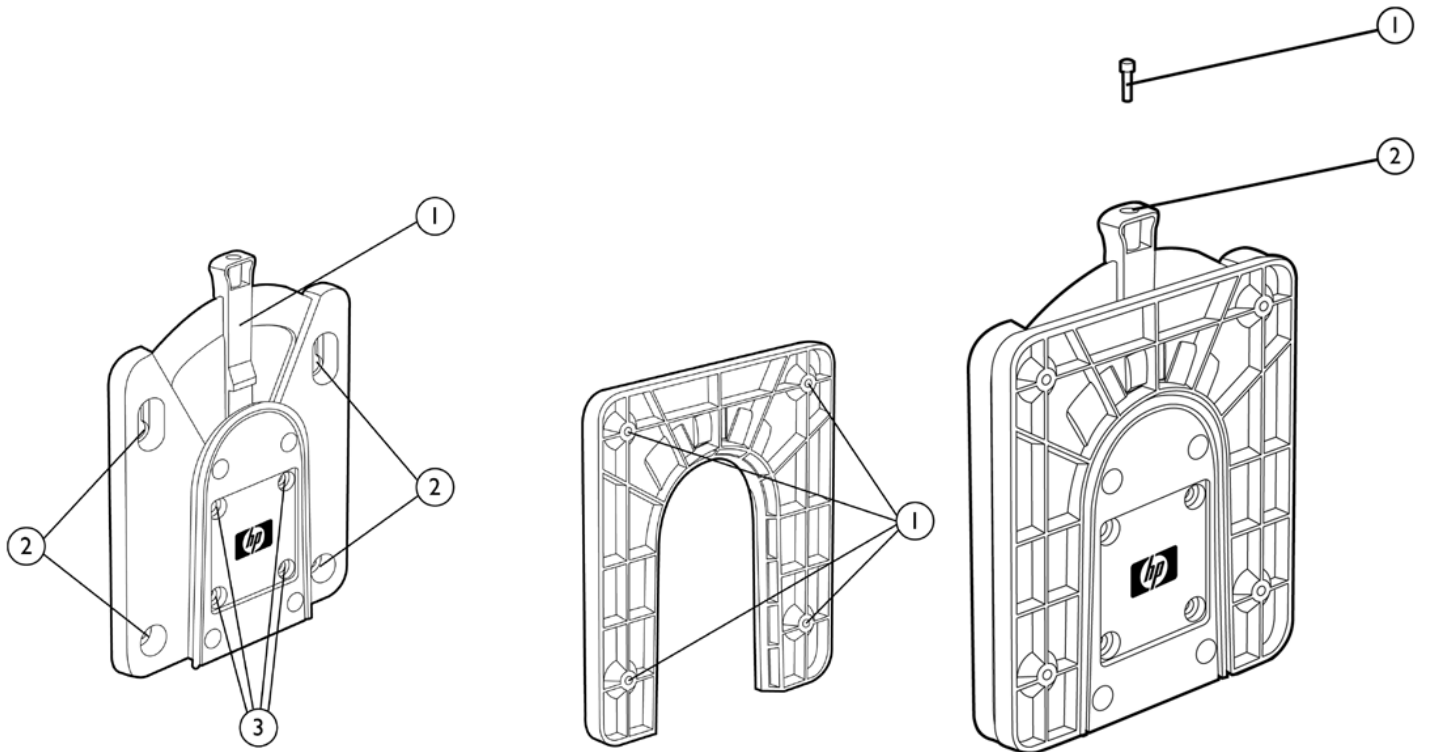
<sup>2</sup> 20 ms rise and fall.

<sup>3</sup> Heat dissipation is calculated based on the measured watts, assuming the service level is attained for one hour.

<sup>4</sup> HP Care Pack Services extend service contracts beyond the standard warranties. Service starts from date of hardware purchase. To choose the right level of service for your HP product, use the HP Care Pack Services Lookup Tool at [www.hp.com/go/lookuptool](http://www.hp.com/go/lookuptool). Additional HP Care Pack Services information by product is available at [www.hp.com/hps/carepack](http://www.hp.com/hps/carepack). Service levels and response times for HP Care Packs may vary depending on your geographic location.



### Overview - HP LCD Monitor Quick Release



1. Release/locking
2. Four 100 mm VESA mount screw holes
3. Mounting holes for attachment to back of HP LP1965, LP2065, and HP LP2465 monitor stands

1. Four 100 mm VESA mount screw holes

1. Locking pin screw
2. Locking pin hole on release/locking arm

## Introduction

The HP Quick Release, which ships standard with the HP LP1965 19-inch LCD Monitor, is an easy to use, 100 mm VESA-compliant, flat panel monitor mounting solution that allows you to quickly and securely attach a flat panel monitor to a variety of stands, brackets, arms or wall mounts. HP Quick Release can also be used for mounting any combination of devices that are compatible with the 100 mm VESA Flat Display Mounting Interface Standard. The failsafe "Sure-Lock" mechanism snaps the monitor (or mounted device) securely in place, and can be further secured with a theft-deterrent security screw.

## Uniquely flexible product configurations

HP Quick Release enables uniquely flexible product configuration alternatives in a variety of settings, such as:

- Storefronts/kiosks: Mount flat panel monitors for easy viewing and add touchscreens for interactivity.
- Trade shows: Securely mount LCD TVs or monitors in common areas and quickly remove them for safekeeping at the end of the day.
- Front office environments: Minimize desk space requirements with wall or swing-arm mounting of monitors in reception areas.
- Training labs: Mount a monitor directly on a 100 mm VESA-compatible PC or an HP Thin Client for all-in-one convenience.
- Medical/institutional settings: Securely mount monitors in nursing stations and public areas.

## Overview - HP LCD Monitor Quick Release

- Conference rooms: Mount projectors (with 100 mm VESA-compliant pre-drilled holes) on ceilings, and monitors on walls or tables.

### Technical Specifications - HP LCD Monitor Quick Release

Mechanical	Dimensions (H x W x D)	Packaged	7.8 x 6.25 x 1.5 in (19.8 x 15.9 x 3.8 cm)
		Unpackaged	6.3 x 5.2 x 0.65 in (16 x 13.2 x 1.65 cm)
	Weight	Packaged	1.1 lb (0.49 kg)
		Unpackaged	0.82 lb (0.37 kg)
Additional components	<ul style="list-style-type: none"><li>• Eight 10 mm mounting screws (for attachment to VESA compliant monitor mounts)</li><li>• Eight 15.5 mm mounting screws (for attachment to HP Thin Client products)</li><li>• Four 20 mm mounting screws (for attachment to back of select HP flat panel monitor stands)</li><li>• One Quick Release "locking" screw</li></ul>		
Color	Carbonite		
Notes	<ol style="list-style-type: none"><li>1. No HP monitors allow positioning of a thin client product between a monitor screen and its stand.</li><li>2. The Quick Release device is not to be used between a monitor screen and its stand unless provided that way from the factory.</li><li>3. Under no circumstances is the Quick Release device intended to be used in an orientation where the Release/Lock lever is oriented downward.</li></ol>		
Supported weight capacity	The HP Quick Release has been designed to support a maximum of up to 24 lbs (10.9 kg) depending upon the mounting configuration used. Please note this is a total weight limit for all devices mounted, i.e. the combined weight of the monitor and a second device such as an HP Thin Client cannot exceed 24 pounds. Because mounting surfaces vary widely and the final mounting method and configuration may vary, mounting fasteners are not supplied (other than the VESA-compliant screws). HP recommends that you consult with a qualified engineering, architectural or construction professional to determine the appropriate type and quantity of mounting fasteners required for your application and to ensure that your mounting solution is properly installed to support applied loads.		

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