



OMEN by HP 31.5 inch QHD 165Hz Gaming Monitor - OMEN 32q (780K0AA)

Overview



TAKE YOUR FUN UP A NOTCH

Reach new possibilities with the OMEN by HP 31.5-inch QHD 165Hz Gaming Monitor. Quick performance and vibrant color let you get lost in the games you love most, while the sleek design functions to look and feel great on your desk.

165Hz

NO LAG. ALL SPEED.

Frame by frame, experience all the action with no distractions. To keep things smooth, this display boasts a fast 165Hz refresh rate and 1ms GTG response time with Overdrive to cut motion blur[1], so every pixel keeps up with you. Leave screen tearing and lag in the dust, thanks to AMD FreeSync™ Premium technology[2].



REFINE YOUR PLAY SPACE

Made to impress in and out of game, the new OMEN look blends sophistication and fun to elevate what a gaming setup can look like. It's equipped with ports perfect for connecting your gaming PC, console, and even a work PC. Thanks to the easy cable management and the adjustable stand, your desk will be just how you like it.

HDR

SEE A WORLD YOU CAN STEP INTO

Mistake virtual for IRL while you explore your favorite worlds with the crisp visuals of QHD resolution[3]. For lifelike gameplay, escape into a wide array of vibrant colors, hues, and shades with the 99% sRGB and 95% DCI-P3 color gamut[1]. Even in shadow, easily make out details and shading with HDR and up to 400 nits of brightness[1].

Features

QHD Resolution

Get lost in the captivating definition and sharp details of 3.7 million pixels. 2560 x 1440 Quad HD resolution transforms all your content for a remarkable entertainment experience on this 31.5" diagonal monitor.^[3]

165Hz refresh rate

Crisp action and responsive gameplay with virtually no artifacting or screen tearing.^[1]

HDR

Explore new worlds with richer colors thanks to a peak brightness of 400 nits.^[1]

More Colors to Play With

Get deeper hues and a wide array of colors with 99% sRGB and 95% DCI-P3 for precisely recreated colors so lifelike you get lost in your gameplay.^[1]

1ms GTG Response Time with Overdrive

Eliminates motion blur for crisp, fluid gameplay no matter what's happening on-screen.^[1]

AMD FreeSync™ Premium Technology

Game confidently with a high refresh rate, low framerate compensation, and low latency.^[2]

[1] All performance specifications represent the typical specifications provided by HP's component manufacturers; actual performance may vary, either higher or lower.

[2] Requires a monitor and AMD Radeon graphics, both with FreeSync Premium support. AMD FreeSync™ Premium requires mandatory low framerate compensation and at least 120 Hz refresh rate at minimum FHD. See www.amd.com/freesync for complete details. Confirm capability with your system manufacturer before purchase. GD-161.

[3] Quad high-definition (QHD) content required to view QHD images.

Specifications

Display size (diagonal)	31.5"
Panel technology	IPS; LCD
Display size (diagonal)	80 cm (31.5")
Aspect ratio	16:9 ^[1]
Native resolution	QHD (2560 x 1440) ^[1,2]
Resolutions supported	640 x 480; 720 x 400; 800 x 600; 1024 x 768; 1280 x 720; 1280 x 800; 1280 x 1024; 1440 x 900; 1600 x 900; 1680 x 1050; 1920 x 1080; 1920 x 1200; 2560 x 1440
Pixel pitch	0.27 x 0.27 mm
Brightness	400 nits ^[1]
Contrast ratio	1000:1 ^[1]
Response time (typical)	1ms GtG (with overdrive)
Dimensions (W x D x H)	71.35 x 5.25 x 42.62 cm (without stand)
Dimensions (W x D x H)	28.09 x 2.07 x 16.78 in (without stand)
Dimensions With Stand (W x D x H)	71.35 x 24.33 x 61.88 cm
Weight	8.98 kg (with stand)
Weight	19.8 lb (with stand)
Display features	Height adjustable; Pivot; Tilt
Onscreen controls	Management; Information; Exit; Input; Color; Image; Power; Menu; Gaming
Display colors	Up to 16.7 million colors supported
Display scan frequency (horizontal)	30-255 kHz
Display scan frequency (vertical)	60-165 Hz (DisplayPort™); 55-144 Hz (HDMI)
Camera	No integrated camera
Power	100 - 240 VAC 50/60 Hz
Power consumption	83 W (maximum), 48 W (typical), 0.5 W (standby)
Operating temperature range	5 to 35°C
Operating humidity range	20 to 80% RH
Sustainable impact specifications	Low Halogen; Molded paper pulp cushion inside box is 100% sustainably sourced and recyclable; Outside box and corrugated cushions are 100% sustainably sourced and recyclable; 85% ITE-derived closed loop plastic

Certifications and compliances	BIS; BSMI; CB; CCC; CE; CEL; CSA; EAC; FCC; ISO 9241-307; KC/KCC; NOM; PSB; TUV Bauart; TUV LBL; VCCI; WEEE; ISC; California Energy Commission (CEC); WW application; ICE; Ukraine certificates; TÜV Flicker free certified; UAE safety; UAE RoHS; South Africa safety; CEL Grade 2 ^[9]
Physical security	None
Management Software	OMEN Gaming Hub ^[8]
UPC number	(A2N) 197029617668; (ABA) 197029617699; (ABB) 197029617712; (ABT) 197029617743; (ABU) 197029617750; (ABV) 197029617781; (AC8) 197029617804; (ACQ) 197029617811; (AKH) 197029617842; (UUG) 197029617859; (UUZ) 197029617873
What's in the box	Monitor; DisplayPort™ cable; Warranty card; Quick Setup Poster; AC power cord ^[7]

Additional specifications

Audio port	1 x 3.5 mm Audio Jack (Audio Out)
Backlight lamp life minimum (to half brightness)	30,000 hours
Backlight type	Edge-lit
Base area footprint (imperial)	8.85 x 9.25 in
Base area footprint (metric)	22.49 x 23.49 cm
Bezel	3-sided borderless
Color gamut	99% sRGB; 95% DCI-P3
Curvature	Flat
Datasheet photo 1	AHID/52a910acc958d57aeebcc68ee4cfba2c425d276d
Datasheet photo 2	AHID/9ce99338f68003ddb736b46c22b9d43370efdf4c
Datasheet photo 3	AHID/3be0a51fa101f968b07cd0ec46fe303180083d19
Datasheet photo 4	AHID/47e1983cf6739d785a96f843805f46fcb25b438d
Detachable stand	Yes
Display area (imperial)	27.45 x 15.44 in
Display area (metric)	69.73 x 39.23 cm
Display contrast ratio (dynamic)	10000000:1
DisplayPort™	1 DisplayPort™ 1.4
Flicker-free	Yes
HDCP	Yes, DisplayPort™ and HDMI
HDMI	2 HDMI 2.0
HDR	HDR 400
Hardness	3H
Haze	25%
Height adjustment range	100 mm
Horizontal viewing angle	178°
Low blue light	Yes, HP Eye Ease (Eyesafe® Certified)
Non-Operating Humidity Range	5-95%
Operating temperature range	41 to 95°F
Package dimensions (W x D x H)	82.1 x 17.4 x 52.1 cm
Package dimensions (W x D x H)	32.32 x 6.85 x 20.51 in
Package weight	13.43 kg
Package weight	29.6 lb
Pallet (layers)	4

Pallet dimensions	41.5 x 32.72 x 87.64 in
Pallet dimensions (W x D x H)	105.4 x 83.1 x 222.6 cm
Pallet weight	338.62 kg
Pallet weight	744.96 lb
Panel bit depth	True 8 bit
Pixels per inch (ppi)	92 ppi
Power supply type	Internal
Product brand name	HP
Product color	Black
Product dimensions with stand (W x D x H)	28.09 x 9.58 x 24.36 in
Products per pallet	24
Products per pallet layer	6
Refresh rate (maximum)	165 Hz
Resolution (maximum)	QHD (2560 x 1440 @ 165 Hz)
Screen treatment	Anti-glare
Special features	AMD FreeSync™ Premium; Gaming Console Compatible
Stand color	Black
Stand type	Base stand; With stand; Height adjustable stand
Tilt	-5 to +20°
Total CO2e (kg) footnote number	[60]
UNSPSC code	43211902
VESA mounting	100 mm x 100 mm (bracket included)
Vertical viewing angle	178°
Video connectors	HDMI; DisplayPort™-in
Viewable diagonal size	31.5" (80 cm)
pivot	±90°

[1] All specifications represent the typical specifications provided by HP's component manufacturers; actual performance may vary either higher or lower.

[2] DisplayPort™ 1.4 or HDMI 2.0 required to drive panel at its native resolution. The video card of the connected PC must be capable of supporting 2560 x 1440 at 60 Hz with 8-bit color using one DisplayPort™, HDMI. The video card of the connected PC must be capable of supporting 2560 x 1440 and include one DisplayPort™ or one HDMI outputs to drive the monitor at the Preferred Mode.

[7] Included cables may vary by country.

[8] Host PC requires Windows 10. OMEN Gaming Hub is available on the Microsoft store.

[9] Monitors produced from June 2024 comply with China regulation GB 21520-2023.

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