Panasonic



98-inch 4K UHD LCD Display **TH-98LQ70W**

Product specification (design and specification subject to change without notice)

DISPLAY

DISFLAT	
Screen Size (Diagonal)	98-inch (2476.9 mm)
Panel Type	IPS / Direct-LED
Aspect Ratio	16:9
Effective Display Area (W x H)	2159 x 1214 mm
Number of Pixels (H x V)	3840 x 2160 pixels
Brightness	500 cd/m
Contrast Ratio	1300:1
Dynamic Contrast Ratio	500000 : 1
Response Time	8 ms (G to G)
Viewing Angle (Horizontal / Vertical)	178° / 178°
Panel Life Time	approx. 50000 hours (typ)*
* When the panel lifetime is at 50% of t Panel lifetime may be shortened due t	the brightness under the condition of 25 degrees Celsius (+/- 2 degrees celsius). o usage environment.
CONNECTION TERMINAL	
HDMI IN	HDMI TYPE A Connector x 4

	HDMI 1 ^{*1} / HDMI 2 ^{*1} (Up to 4K@50/60Hz)				
	HDMI 3*1 / HDMI 4*2 (Up to 2K@50/60Hz)				
DisplayPort IN	DisplayPort x 1 (DP1.2a)* ²				
DVI-D IN	DVI-D 24pin x 1 ^{*3}				
AUDIO IN (L/R)	Stereo mini jack (M3) x 1set (shared with PC IN)				
PC IN	Mini D-sub 15pin x 1 (Female)* ⁴				
AUDIO IN (L/R)	Stereo mini jack (M3) x 1set (shared with DVI-D IN)				
Function Slot	SLOT NX x 2*5 (Vacant)				
*1: HDCP1 4 supported Embedded audio supported					

*1: HDCP1.4 supported, Embedded audio supported *2: HDCP1.3 supported, Embedded audio supported *3: Compliance with DVI Revision 1.0, HDCP1.1 supported *4: RGB / YPbPr switchable *5: Option 3G-SDI terminal board TY-TBN03G: (w/ active through)

CONTROL	

SERIAL IN	D-sub 9pin x 1*1
LAN	RJ45 x 1 100BASE-TX*2
DIGITAL LINK	RJ45 x 1 100BASE-TX (shared with LAN)
1	

*1: RS-232C compatible *2: PJLink compatible (shared with DIGITAL LINK)

AUDIO	
AUDIO OUT	Stereo mini jack (M3) x 1
Built in Speaker	20 W [10 W + 10 W] (10% THD)
ELECTRICAL	
Power Requirements	220-240 V AC, 50/60Hz
Power Consumption	620 W (653 VA)
	2116 BTU
On Mode Average Power Consumption*	480 W
Power Off Condition	0.3 W
Stand-by Condition	0.5 W
Network Stand-by Mode	3 W
* Based on IEC 62087 Ed.2 measuremen	nt method
MECHANICAL	
Dimensions (W x H x D)	2233 x 1288 x 122 mm
Bezel Width	32.5 mm
Carton Dimensions (W x H x D)	2406 x 1520 x 460 mm
Weight	approx. 136 kg
Gross Weight	approx. 161 kg
Cabinet Material / Color	Metal / Black
Protective Glass	Yes
Mount Screw Holes	Diameter: M16, Valid screw depth: 26 mm
Eyebolt Screw Holes	Diameter: M12, Valid screw depth: 25 mm

■ INSTALLATION REQUIREMENT

Orientation	Landscape / Portrait
Tilting Angle	10 degrees with landscape setting / 5 degrees with portrait setting

* Please contact your sales representative with regard to the tilt angle before installation.

ENVIRONMENTAL

Operating Environment	Temperature	: 0°C to 40°C*1 : 0°C to 35°C*2
	Humidity	: 20% to 80% (Non condensation)
	Altitude	: 0 to 2400 m* ³
Storage Environment	Temperature	: -20℃ to 60 ℃
	Humidity	: 20% to 80% (Non condensation)

*1: for up to 1400 m altitude
*2: for between 1400 m and 2400 m altitude
*3: When using the unit where it is 1400 m and higher and below 2400 m above sea level, make sure [High altitude mode] is set to [ON].

MAIN FEATURE

Automatic Picture Position	Yes
4 Input Multi Display (up to FHD)	Yes
Screen Saver	Yes
PC Power Management	Yes
HDMI Power Management	Yes
DVI-D Power Management	Yes
ECO Mode	Yes
Button Lock	Yes
Remote-control Lock	Yes
Power-on Screen Delay	Yes
Input Search	Yes
Local Dimming	Yes
Operating Time*	24h/day

* In case of running for a long time, the moving image is recommended to be displayed. If you display a still picture for an extended period, the image retention might remain on the screen. However, image retention can gradually disappear by displaying movie images.

OPTIONAL ACCESSORIES

3G-SDI Terminal Board	TY-TBN03G*1		
Pedestal	TY-ST103PF9		
Wall-hanging Bracket	TY-WK103PV9		
Celling-hanging Bracket	TY-CE103PS10*2		
Digital Interface Box	ET-YFB100G		
*1: 2 boards (total 3G-SDI x 4) required for 4K@50/60Hz,			

1 board (total 3G-SDI x 2) required for up to 4K@25/30Hz *2: Tilt angle limited to 10 degree maximum

STANDARD (CERTIFICATIONS)

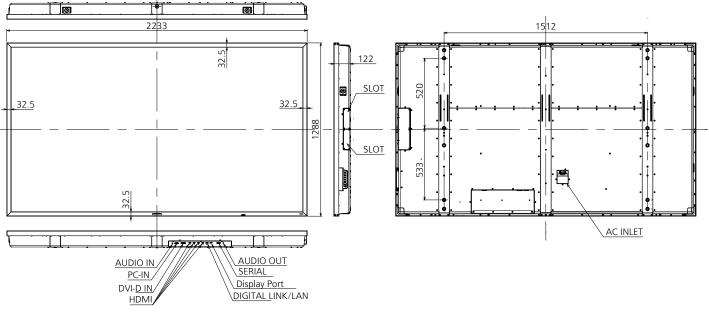
Safety Regulations	Europe : EN60065, IEC60065, EAC Asia : AS / NZS60065, SASO, IEC60065 / SS, IEC60065 / PAI		
Radiation Regulations	Europe : EN55022 Class-B, EN55024, EN61000-3-2, EN61000-3-3 Asia : CISPR22 Class-B		

INCLUDED ACCESSORIES

AC power cord (approx. 3 m), Operating Instructions (Book), (CD-ROM), Remote Control Transmitter, Batteries x 2, Clamper, Eyebolt cap, Eyebolt, Panasonic badge, Panasonic badge attachment plate, Allen wrench

DIMENSIONS

Cautions: This drawing is not a scale Units : mm



O CONNECTION TERMINAL

- [AUDIO OUT 🕀	SERIAL	DisplayPort	DIGITAL LINK		Homi A	VIN ⊕		DVI-D IN ⊕	PC IN 🕣	AUDIO IN ⊕
	AUDIO OUT G	3.3V = 500mA MAX	몲 LAN	HDMI 1 (4K)	HDMI 2 (4K)	HDMI 3	HDMI 4		FCIN ®	AUDIO IN ®	
	Ô	¢) ¢		\bigtriangleup		_	_	<u> </u>	0 ()0	o 🎆 o	Ø

* Specifications and appearance are subject to change without notice.

Preset Signals

Following signal timing is preset to this unit. These preset signals are written on EDID of the each input terminal. (Except for *6) In many cases, it is possible to receive the signals other than below with this unit's multi scan function. (Except for 4K signal)

~	Preset	signa	I
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Signal name	H-Freq. (kHz)	V-Freq. (Hz)	Dot clock ferquency (MHz)	PC IN	HDMI 1 HDMI 2	HDMI 3 HDMI 4 DVI-D IN	DIGITAL LINK	Display Port
525 (480) / 60i	15.73	59.94	13.5	v				
625 (576) / 50i	15.63	50.00	13.5	v				
525 (480) / 60i* ²	15.75	60.00	27.0		~	~	~	
625 (576) / 50i	15.63	50.00	27.0		~	~	~	
525 (480) / 60p*2	31.50	60.00	27.0	v	~	~	~	
625 (576) / 50p	31.25	50.00	27.0	v	~	v	~	
750 (720) / 60p*2	45.00	60.00	74.25	v	~	~	~	v
750 (720) / 50p	37.50	50.00	74.25	v	~	~	~	v
1125 (1080) / 60i*1*2	33.75	60.00	74.25	v	~	~	~	
1125 (1080) / 50i*1	28.13	50.00	74.25	v	~	~	~	
1125 (1080) / 24p*1*2	27.00	24.00	74.25	~	~	v	~	
1125 (1080) / 25p*1	28.13	25.00	74.25	v	~	~	~	
1125 (1080) / 30p*1*2	33.75	30.00	74.25	~	~	v	~	
1125 (1080) / 60p*1*2	67.50	60.00	148.5	~	~	v	~	~
1125 (1080) / 50p*1	56.25	50.00	148.5	~	~	v	~	~
640 x 480	31.47	59.94	25.18	~	~	~	~	V
800 x 600	37.88	60.32	40.00	~	~	v	~	~
1024 x 768	48.36	60.00	65.00	~	~	v	~	~
1280 x 768	47.70	60.00	80.14	~	✔*6	~	~	V
1366 x 768	48.39	60.04	86.71	~	✔*6	v	~	~
1280 x 1024	63.98	60.02	108.0	~	~	v	~	~
1600 x 900	60.00	60.00	108.0	v	~	~	~	v
1920 x 1080	67.50	60.00	148.5	~	~	v	~	~
1920 x 1200	74.04	59.95	154.0	~	~	v	~	~
4K signal	1	1			1	1	1	
3840 / 24p*2	54.00	24.00	297.0		~		~	v
3840 / 25p	56.25	25.00	297.0		~		~	v
3840 / 30p*2	67.50	30.00	297.0		~		~	v
4096 / 24p* ²	54.00	24.00	297.0		~		~	
3840 / 50p	112.5	50.00	594.0		v		✔*4	✔*5
3840 / 60p*2	135.0	60.00	594.0		 ✓ 		✔*4	✔*5
4096 / 50p	112.5	50.00	594.0		~		✔*4	
4096 / 60p*2	135.0	60.00	594.0		v		✔*4	
4K (Dual Link) signal			I					
3840 / 50p	112.5	50.00	297.0		✓ *3			
3840 / 60p*2	135.0	60.00	297.0		√ * ³			
4096 / 50p	112.5	50.00	297.0		✔*3*6			
4096 / 60p*2	135.0	60.00	297.0		✔*3*6			

*1: Based on SMPTE 274M standard.

*2: Compatible with frame frequency 1/1.001

*3: The format supports Dual Link. (see page 17)

*4: Supported in YC_BC_R 4:2:0 format

*5: Supported with MST (Multi Stream Transport) only *6: Not written on EDID

In some cases, these signals may not be displayed when setting Resolution on your PC.

(Note)

• Signals without above specification may not be displayed properly.

• For the signals when 3G-SDI Terminal Board with Audio is installed, refer to the manual included with it.