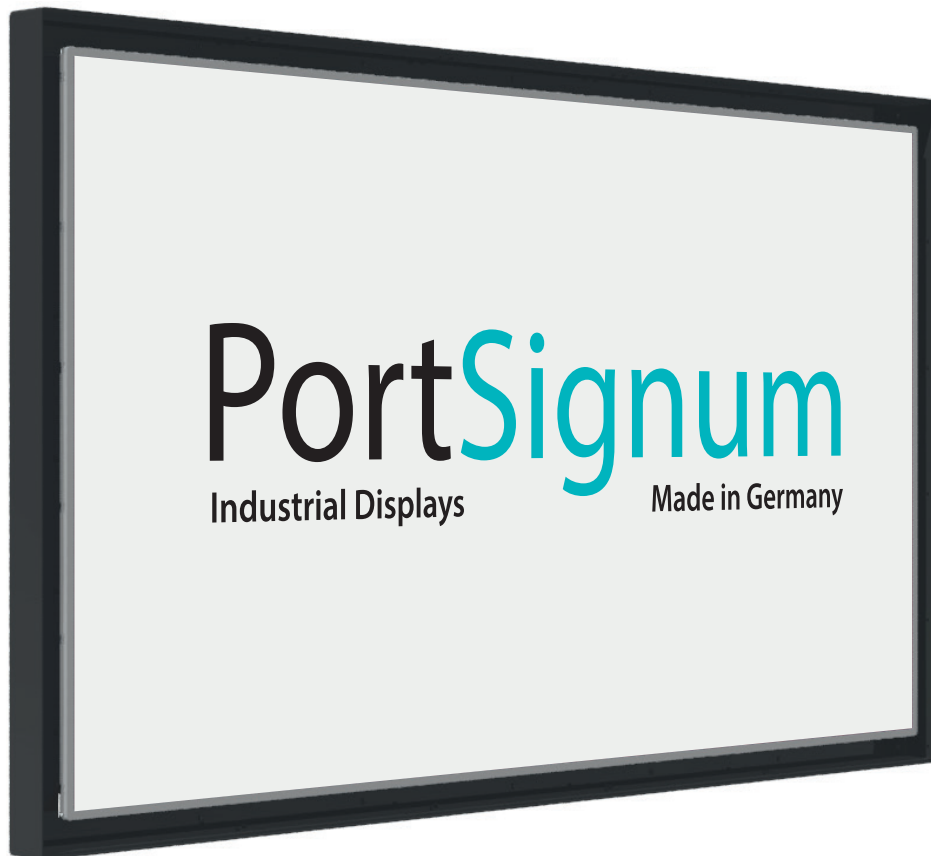


Data Sheet



42,5" TFT LCD open-frame monitor
Options for front bezel, protective glas and PCAP-touch
Mounting space for external mini-PCs and Raspberry Pi

PSIV-430

August 2023

Rev. 0.2

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REVISION HISTORY

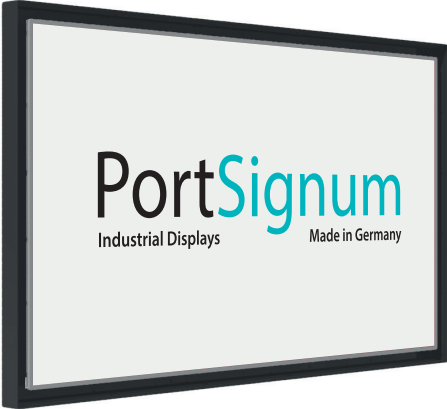
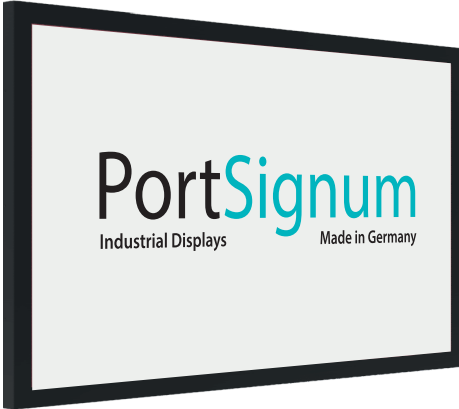
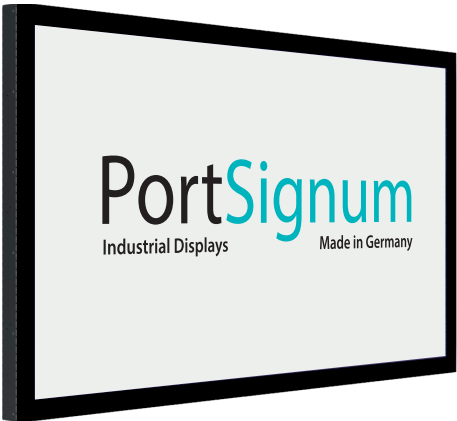
No.	Description	Date	Rev.	Page
1	Initial Release	Mai 2022	0.0	all
2	Overwork	Oct. 2022	0.1	10-17
3	Mechanical drawings update	Aug. 2023	0.2	14ff
4	Added Options for Rspberry Pi, dust protection and plexiglas	Aug. 2023	0.2	9,12

INTRODUCTION

Industrial 42,5" UHD open-frame display with various options for front bezels, protective glass and PCAP touch. A mounting space with additional 230V AC connector is available for customers to integrate a mini-PC behind the back cover.

Video input connectors for HDMI (2x), DP (2x). Audio headphone output.

Option overview:

	
PSIV-430 open-frame	PSIV-430 with bezel
	
PSIV-430 true-flat PCAP touch	PSIV-430 true-flat PCAP touch / front bezel

DISPLAY SPECIFICATION

Parameter	Unit	Value
Screen Technology		Active Matrix
Screen Diagonal	[mm]	1079.5 (42.5")
Active Area	[mm]	941.184 (H) x 529.416(V)
Display Colors	Colors	10 bit
Pixels	Pixel	3840 H x 2160 V
Pixel Arrangement		R:G:B Vertical Stripe
Display Operation Mode		Normally Black
Surface Treatment		anti-Glare, 3H, Haze = 44%
Display Orientation		Portrait / Landscape
Operating time		24/7
LED Life	hours	80.000 (Typ.) ¹
Frame Rate	Hz	60
White Luminance Center	[cd/m ²]	700 (Typ.)
Contrast Ratio		3000 (Typ.)
Response Time (G to G)	[ms]	8
Viewing Angle	[degree]	178 H / 178 V
Aspect Ratio		16 : 9

¹The lifetime (MTTF) is defined as the time which luminance of LED is 50% compared to its original value.

VIDEO CONNECTORS

1 - HDMI Signal Input 2x (HDMI 2.0, 4K2K@60Hz, HDCP2.2 Support)

Pin No.	SYMBOL	Pin No.	SYMBOL	Pin No.	SYMBOL
1	HDMI_DATA2+	8	GND	15	HDMI_SCL
2	GND	9	HDMI_DATA0-	16	HDMI_SDA
3	HDMI_DATA2-	10	HDMI_CLK+	17	GND
4	HDMI_DATA1+	11	HDMI_DET	18	HDMI_5V
5	GND	12	HDMI_CLK-	19	HDMI_HDP
6	HDMI_DATA1-	13	NC	20	GND
7	HDMI_DATA0+	14	NC	21	GND

2 - Display Port Signal Input 2x (4K2K@60Hz)

Pin No.	SYMBOL	Pin No.	SYMBOL	Pin No.	SYMBOL
1	LANE3-	8	GND	15	AUX_CHP
2	GND	9	LANE1+	16	GND
3	LANE3+	10	LANE0-	17	AUX_CHN
4	LANE2-	11	GND	18	HPD
5	GND	12	LANE0+	19	RETURN
6	LANE2+	13	CA DET	20	DP_5V
7	LANE1-	14	DP DET	-	-

3 - Audio Output (Head Phone 3.5Ø Stereo Jack)

Pin No.	SYMBOL	Pin No.	SYMBOL
1	GND	4	DETECTION (int.)
2	DETECTION (int.)	5	AUDIO LEFT
3	AUDIO RIGHT	-	-

ENVIRONMENTAL RATINGS

Parameter	Symbol	Unit	Min	Max
Operating Temperature	T _{OP}	°C	0	40
Storage Temperature	T _{ST}	°C	-20	60
Operating Ambient Humidity	H _{OP}	%RH	10	90
Storage Humidity	H _{ST}	%RH	10	90

ELECTRICAL SPECIFICATION

Parameter	Symbol	Unit	Value
Input Voltage	VAC	V	100-240
Power Consumption (without external PC)	PWR	W	130 (typ.)

MECHANICAL SPECIFICATION

Parameter	Unit	Value
Housing		Sheet Steel, Powder Coated, RAL 9005
VESA Mount	[mm]	400 x 400, 400 x 600
Weight PSIV-430 open-frame	kg	25,7
Dimension PSIV-430 open-frame (WxHxD)	[mm]	987 x 584 x 86

OSD-MENU

The OSD (On Screen Display) provides certain functions for display configuration. OSD is controlled by seven push-buttons. A LED indicates the display status.

Button Layout



LED	POWER	SOURCE	UP	DOWN
OFF: Display Off AMBER: No Signal GREEN: Normal State	DISPLAY ON/ OFF	SELECT VIDEO SOURCE	MOVE UP	MOVE DOWN
	RIGHT	LEFT	MENU	
	INCREASE VALUE AUDIO ON/OFF VOLUME+	DECREASE VALUE VOLUME-	OPEN OSD SELECT	

Remote Control



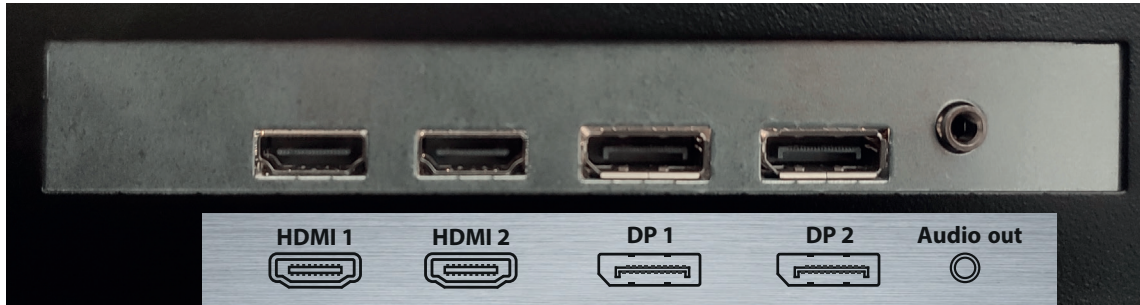
Menu Tree (button Menue)

Picture	Backlight	0-100
	Brightness	0-100
	Contrast	0-100
	Sharpness	0-4
Display	Disp Rotate	0°, 180°, LR Mirror, UD Mirror
	Disp Latency	Low, Medium, High
Color	Gamma	OFF, 1.8, 2.0, 2.2
	Temperature	9300, 7500, 6500, 5800
	Color Effect	Standard, Game, Movie, Photo
	PCM	User, Native
	HUE	0-100
	SAT	0-100
Advance	Aspect Ratio	Full, 16:9, 4:3, 5:4
	Over Scan	ON, OFF
	Over Drive	ON/OFF, OD/Gain
	DDCCI	ON, OFF
Input	DP Option	D0, D1
	Resolution	D0:DP1, D1:DP1, HDMI1, HDMI2
Other	Reset	
	Menu Time	0-100s
	OSD H Position	0-100
	OSD V Position	0-100
	OSD Language	Englisch, Korean, Chinese
	OSD Transparency	0-100
	OSD Rotate	0°, 90°, 270°, 180°
Information		

Source Selection (button Source)

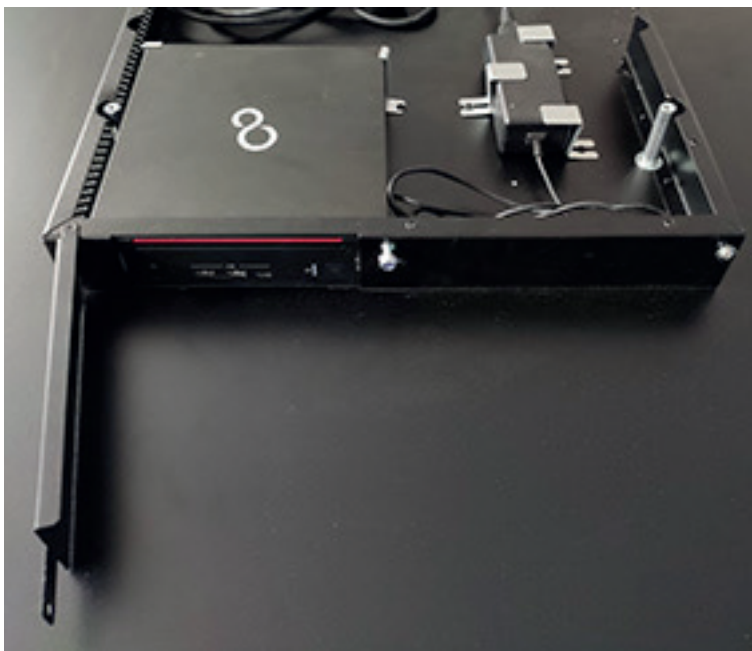
Auto Select
D0:DP 1
D0:DP 2
HDMI 1
HDMI 2

CONNECTOR LAYOUT



PC MOUNTING SPACE

A mounting space is available to integrate a PC on the back side of the display under the back cover. A service flap allows access to the front of the mini-PC from outside.



Supported PCs and controllers:

- **FUJITSU ESPRIMO Mini PC G Series**
- **HP EliteDesk 800 G6 Desktop**
- **Raspberry Pi**

Support for other PCs on request.

OPTIONS

Allowed combinations (C)

Product	C1	C2	C3	C4	C5
PSIV open- frame display	✓	✓	✓	✓	✓
Front bezel		✓	✓		
Protective glass / Plexiglass			✓		
True-flat PCAP touch				✓	✓
Protective bezel for PCAP touch					✓
Wall mount	✓	✓	✓	✓	✓
Dust and drip protection	✓	✓	✓	✓	✓
All PCs and controllers	✓	✓	✓	✓	✓

Front Bezel

Surface		Sheet steel, powder coated, RAL 9005
Combination with		Protective glass Plexiglass
Weight	[kg]	1.3
Dimensions PSIV-430 with option front bezel (WxHxD)	[mm]	991 x 588 x 87

Protective Glass with bezel

Protective Glas Specification		TSG safety glass, 3 mm, color neutral, anti-reflective T2 on both sides
Requires		Front bezel
Weight glass and front bezel	[kg]	5.0
Dimensions PSIV-430 with option protective glass and bezel(WxHxD)	[mm]	991 x 588 x 92,5

Plexiglass with bezel

Protective Plexiglass Specification		3mm, one side anti-glare
Requires		Front bezel
Weight glass and front bezel	[kg]	3.0
Dimensions PSIV-430 with option plexiglass and bezel (WxHxD)	[mm]	991 x 588 x 92,5

True-flat PCAP touch

Detection method		Projected capacitive
Input method		Finger and gloved Finger
Number of simultaneous touches		10
Glass thickness	[mm]	4
Glass standard		anti-glare
Interface		HID
OS with multitouch		Windows 10,8,7, Ubuntu 12.04, Linux, Android, Chrome OS
Data connectivity		USB 2.0
Touch accuracy	[%]	0.1 of sensor diagonal
Bezel color		Black
Weight	[kg]	6.8
Dimensions PSIV-430 with option true-flat PCAP touch (WxHxD)	[mm]	990.4 x 587.5 x 93

Protective bezel for PCAP touch

Surface		Sheet steel, powder coated, RAL 9005
Requires		True-flat PCAP touch
Weight touch with protective bezel	[kg]	9.7
Dimensions PSIV-430 with option protective bezel (WxHxD)	[mm]	997 x 594 x 93

Wall mount tiltable

Surface		Sheet steel, galvanized
Tilt range	[°]	0-13
Distance wall to display front (open frame)	[mm]	91,5



Integration kit for PC

PC/Controller type		Fujitsu ESPRIMO G Series HP EliteDesk 800 G6 Raspberry Pi
Surface		Sheet steel, galvanized

Dust and drip protection

Surface		Sheet steel, powder coated, RAL 9005
Dimensions	[mm]	780 x 51

CE-MARKING AND CERTIFICATION

CE: Class B

ORDER INFORMATION

Display:

Product No.: 9100021: Monitor PSIV-430 open frame

Options:

Product No.: 9100022: Front bezel 43"
Product No.: 9100023: Protective glass 43" (only with option front bezel)
Product No.: 9100048: Protective Plexiglass 43"
Product No.: 9100024: True-flat PCAP touch 43"
Product No.: 9100025: Protective bezel for PCAP touch 43"
Product No.: 9100040: Dust and drip protection

Options Mounting and PCs:

Product No.: 9100020: Wall mount, tiltable (fit for 43", 55", 65")
Product No.: 9100042: Integration Kit for FUJITSU Desktop Esprimo G Series
(mounting angles and power cable to monitor power outlet)
Product No.: 9100044: PC Fujitsu Esprimo G6012, i3 12 Gen., Win11 Pro, configuration on request
Product No.: 9100039: PC Fujitsu Esprimo G6012, i5 12 Gen., Win 11 Pro, configuration on request
Product No.: 9100049: PC Fujitsu Esprimo G6010, i7 10 Gen., Win 11 Pro, configuration on request
Product No.: 9100019: Integration Kit for HP EliteDesk 800 G6 Desktop
(mounting angles and power cable to monitor power outlet)
Product No.: 9100050: PC HP EliteDesk 800 G6, 10 Gen. Win 11 Pro, configuration on request
Product No.: 9100038: Integration kit for Raspberry Pi
Product No.: 9000019: Raspberry web!MASTER

Options Cables:

Product No.: 4100059: Power Cord IEC C13 (EU) black 1,2m
Product No.: 4100025: HDMI cable, 0.5 m
Product No.: 4100026: HDMI cable, 2.0 m
Product No.: 4100001: Display Port cable, 0.5 m
Product No.: 4100003: Display Port cable, 2.0 m
Product No.: 4100023: USB 2.0 cable, type A -> B, 0.5 m
Product No.: 4100024: USB 2.0 cable, type A -> B, 2.0 m

MECHANICAL DRAWINGS

Please refer to document 9100021_Rx.x