

# USER MANUAL

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## User Manual

20" LCD 1152 x 900 Native Resolution



**SNP120**

1U SUN LCD Drawer

Options :

- DC power



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## Before Installation

- It is very important to mount the equipment in a suitable cabinet or on a stable surface.
- Make sure the place has a good ventilation, is out of direct sunlight, away from sources of excessive dust, dirt, heat, water, moisture and vibration.

## Unpacking

The equipment comes with the standard parts shown in package content. Check and make sure they are included and in good condition. If anything is missing, or damaged, contact the supplier immediately.

## How To Clean Your LCD Monitor

### **Caution :**

- To avoid the risk of electric shock, make sure your hands are dry before unplugging your monitor from or plugging your monitor into an electrical outlet.
- When you clean your monitor, do not press down on the LCD screen. Pressing down on the screen can scratch or damage your display. Pressure damage is not covered under warranty.
- Use only cleansers made specifically for cleaning monitors and monitor screens. Cleansers not made to clean monitors and monitor screens can scratch the LCD display or strip off the finish.
- Do not spray any kind of liquid directly onto the screen or case of your monitor. Spraying liquids directly onto the screen or case can cause damage which is not covered under warranty.
- Do not use paper towels or abrasive pads to clean your monitor. Using an abrasive pad or any wood based paper product such as paper towels can scratch your LCD screen.

## Cleaning Your Monitor


To clean your LCD safely, please follow these steps :

- 1 Disconnect the power cord.
- 2 Gently wipe the surface using a clean, dry microfiber cloth. Use as little pressure as possible.

## Cleaning Tough Marks and Smudges

To remove tough marks and smudges, please follow these steps :

- 1 Disconnect the power cord.
- 2 Spray a small amount of non-abrasive cleanser on a microfiber cloth.

 **Caution :** Do not spray or apply any liquids directly onto the monitor. Always apply the solution to your microfiber cloth first, not directly on the parts you are cleaning.

- 3 Gently wipe the surface. Use as little pressure as possible.
- 4 Wait until your monitor is completely dry before plugging it in and powering it up.

## &lt;Part 1 &gt;

## &lt; 1.1 &gt; Package Content

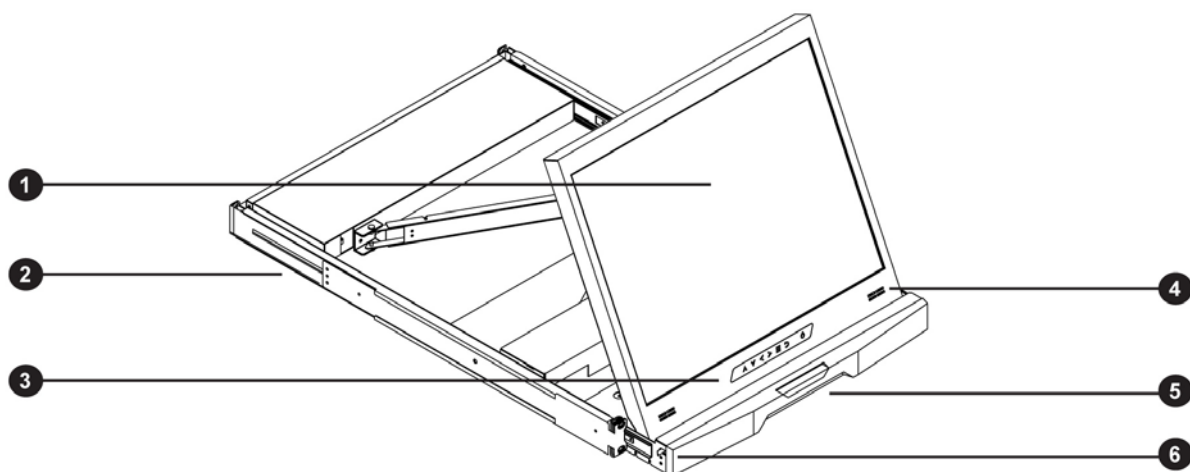
**SNP120 unit X 1**

- 6ft VGA cable X 1
- Power cord X 1
- M6 screw, cage nut & cup washer X 8



The above package content is only for the pure model ( VGA and DVI-D only ).  
It varies with options such as DC power.

## &lt; 1.2 &gt; Structure Diagram



① LCD panel

② Installation Slide

③ LCD OSD membrane

④ Audio speaker

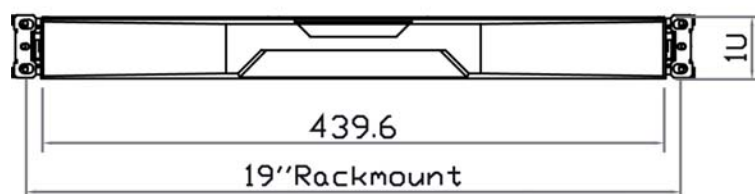
⑤ Carry handle to release the 2-pt lock

⑥ 2-point lock

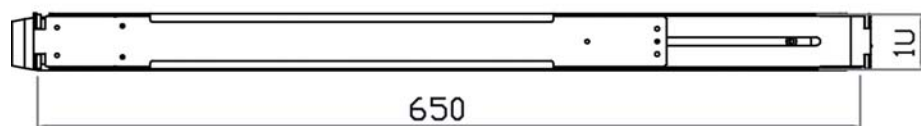


## < 1.2 > Dimension

Front View

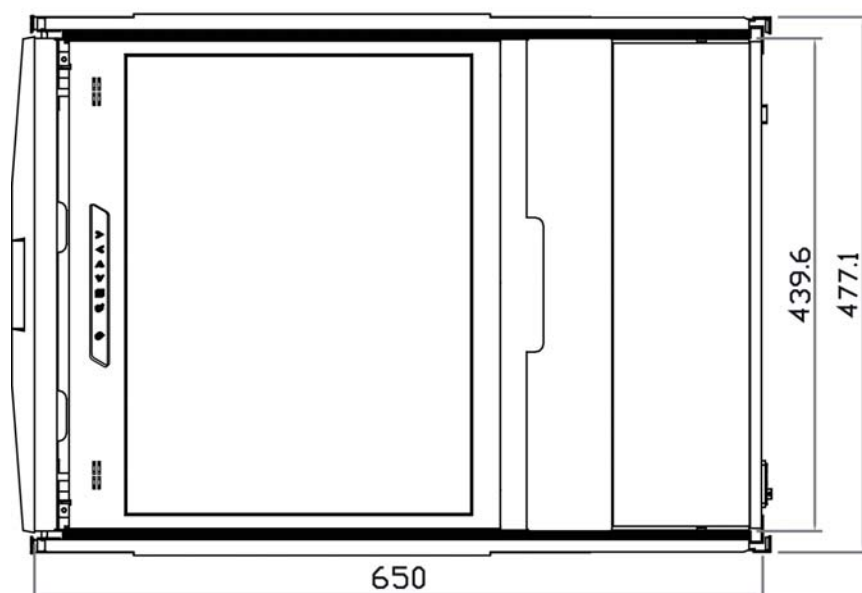


Side View



UNIT : mm  
1mm = 0.03937 inch

Top View



Model	Product Dimension (W x D x H)	Packing Dimension (W x D x H)	Net Weight	Gross Weight
SNP120	439.6 x 650 x 44 mm 17.3 x 25.6 x 1.73"	595 x 860 x 140 mm 23.4 x 33.9 x 5.5"	13.5 kg 30 lb	17.5 kg 39 lb

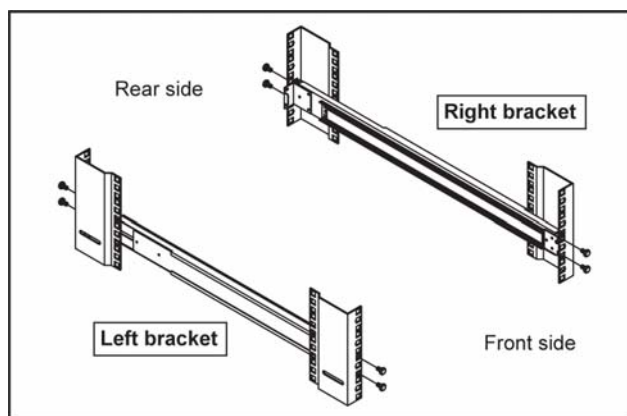


The weight is only for the pure models. It varies with accessories & options such as DC power.

## &lt; 1.3 &gt; Installation - How to install

## 1U 20" LCD Tray

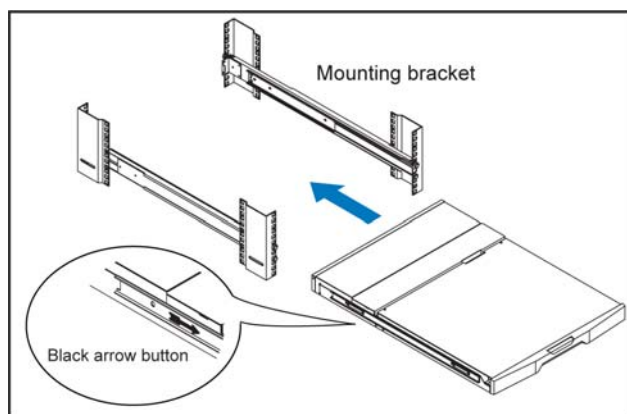
SNP120

**Step 1**

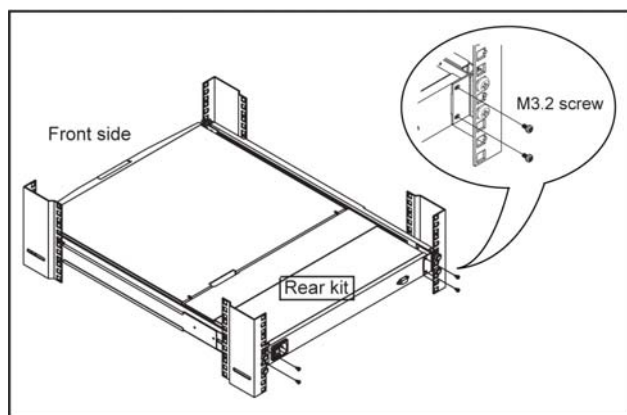
- Attach the left and right mounting bracket to rack 19" mounting rails.
- Adjust the mounting bracket to fit your rack.
- M6 screw x 8 pcs included.



**Leave all M6 screws slightly loose, until you complete the installation in step 3**

**Step 2**

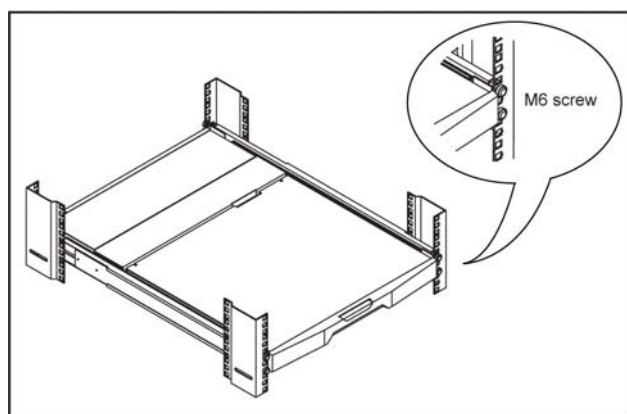
- Pick up the LCD tray.
- Pull and hold the left & right black arrow buttons on the rails.
- Return the LCD tray to park position.

**Step 3**

- Fix the [rear kit] to the mounting bracket with M3.2 screw x 4 pcs included.



**This step is necessary. Failure to complete this will cause damage.**

**Step 4****Complete the installation**

- Tighten all 8 pcs of M6 screw to complete the installation.

## &lt;Part 2 &gt;

## &lt; 2.1 &gt; Product Specifications

LCD Panel	Manufacturer		<b>LG</b>
	Panel Size ( diagonal )	20-inch TFT color LCD	
	Display pixel ( dots x lines )	1152 x 900 ( Direct )	
		1600 x 1200 ( Native )	
	Brightness ( typ. )	300	
	Contrast Ratio ( typ. )	800:1	
	Color	16.7 M	
	Viewing Angle ( L/R/U/D )	89/89/89/89	
	Response Time ( ms )	16	
	Dot pitch ( mm )	0.255	
	Display Area ( mm )	408.00H x 306.00V	
	Surface treatment	Anti-glare, Hard-coating	
	Surface hardness	3H	
	Backlight Type	CCFL	
	MTBF ( hrs )	45,000	

Video Connectivity	Digital	DVI	DVI-D, TMDS single link
	Analog	VGA	Analog 0.7Vp-p
	Plug & Play	DVI / VGA	VESA EDID structure 1.3
	Synchronization	VGA	Separate, Composite & SOG

Audio Connectivity	Audio Input	Connector	3.5mm stereo jack
		Impedance / Power level	30kQ / 750mV
	Audio Output	Connector	3.5mm stereo jack
		Resistance / Power level	30kQ / 2.8V
	Speaker Output	Power	2 x 2W

\*When the audio output is connected, speaker output is OFF

Power	Power Supply	Range	Auto-sensing 100 to 240VAC, 50 / 60Hz
	Power Consumption	Screen display ON	48W or less
		Power saving mode	4W or less
		Power button OFF	1W or less

Regulatory	Safety Approval	cUL, FCC & CE, RoHS
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## SNP120

Environmental Conditions	Operating	Temperature	0 to 50°C degree
		Humidity	20~90%, non-condensing
	Storage	Temperature	-5 to 60°C degree
		Humidity	5~90%, non-condensing
		Shock	10G acceleration (11ms duration)
		Vibration	5~500Hz 1G RMS random








Physical Specification	Product ( W x D x H )	439.6 x 650 x 44 mm 17.3 x 25.6 x 1.73 inch
	Packing ( W x D x H )	595 x 860 x 140 mm 23.4 x 33.9 x 5.5 inch
	Net Weight	13.5 kgs / 30 lbs
	Gross Weight	17.5 kgs / 39 lbs

Applicable Format	DVI-D / VGA Input	PC Signal	1152 x 900 x 66Hz
			1600 x 1200 x 60Hz
			1400 x 1050 x 60Hz
			1440 x 900 x 60Hz
			1360 x 768 x 60Hz
			1280 x 1024 x 60 / 75Hz
			1280 x 960 x 60Hz
			1280 x 760 x 60 / 75Hz
			1152 x 864 x 75Hz
			1024 x 768 x 60 / 70 / 75Hz
			848 x 480 x 60Hz
			800 x 600 x 60 / 72 / 75Hz
			720 x 400 x 70Hz
			640 x 480 x 60 / 72 / 75Hz
			640 x 400 x 70Hz
			640 x 350 x 70Hz





## < 2.2 > On-screen Display Operation ( OSD )



Membrane Switch	Function
	Turn the monitor on or off
	Display the OSD menu Act as an Enter key to select screen setting options
   	Scroll through menu options and adjust the displayed control
	Exit the OSD screen Go back to the previous on-screen sub-menu or main menu

Remark : All LED touch buttons in **WHITE** light.

The LED of **Power**  touch button will flash continuously when there is no signal input.

- ① All the LED touch buttons will automatically turn off after 10 minutes of idle status ( except the **Power**  ).
- ② Light up all membrane buttons, please press any button for 1 - 2 seconds ( except the **Power**  ).

## &lt; 2.2 &gt; On-screen Display Operation ( OSD )

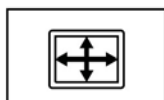
SNP120

## OSD Configuration Page

Ver: G56SN20SSTD701		1024 x 768 59.8Hz	
	<b>Image</b>		
	Brightness		50
	Contrast		50
	Color Temp	User	
	Red		255
	Green		255
	Blue		255
Adjust: ++		Select: ++	Set:  /
		Exit: ↵	

**Image:**

for the brightness, contrast, color temp, red, green, and blue

**Geometry:**

for the auto adjust, H position, V position, phase and clock

**Video:**

for the colour, tint, sharpness, noise reduction, DCDi and TV Setup

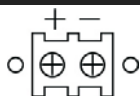
**Audio:**

for volume, bass, treble, balance, AVL and mute

**Misc:**

for the language, OSD position, graphic mode, ratio, reset and timer

## &lt; 3.3 &gt; Options : DC Power



Model	12V	24V	48V
<b>Input rating</b>			
Input voltage:	12-Volt	24-Volt	48-Volt
Input range:	9 ~ 18V	18 ~ 36V	36 ~ 75V
Input current			
- No load	50 mA	50 mA	50 mA
- Full load	4950 mA	2450 mA	1220 mA
<b>Output rating</b>			
Output voltage:	12-Volt	12-Volt	12-Volt
Output current:	4.16A	4.16A	4.16A
<b>Efficiency</b>	84%	85%	85%

## DC power



Option excludes 1 x power cord and 1 x AC power adapter



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