

Philips Brilliance LED-backlit LCD monitor

Notebook docking display 23" (58.4 cm) Full HD (1920 x 1080)





231P4QUPEB

# Simplicity with notebook docking display

# expand view with single-cable

This innovative notebook docking display with multimedia enables easy port replication. Expand your viewing workspace, keep peripherals connected, access internet, all with a single SuperSpeed USB cable.

#### Simplicity makes sense

- Single USB 3.0 cable docks your notebook to the display
- Transmit video and audio from the notebook with single cable
- Connect with Internet, Intranet with built in ethernet port
- · Access all peripherals and keyboard, mouse from the hub
- · True plug and play for hassle free dual display setup

#### **Ergonomic design**

- SmartErgoBase enables people-friendly ergonomic adjustments
- · Low bezel-to-table height for maximum reading comfort

### **Sustainable Eco-friendly solution**

- IPS technology for full colors and wide viewing angles
- PowerSensor saves up to 80% energy costs
- 65% post consumer recycled plastics with TCO Edge
- PVC-BFR free housing



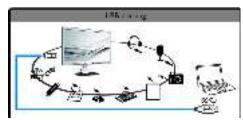
# Highlights

## Expand view with single cable



This innovative large Philips display enables easy port replication for any notebook. Especially suitable for latest Ultra book type devices with limited connectors, this display with built-in USB 3.0 hub, Ethernet, and stereo speakers enables you to transmit video, audio, and connect to internet or intranet directly with a single cable USB connection. By this advanced USB 3.0 or USB 2.0 plug and play connection, you can now expand your desktop using both your NBPC and Philips display's real-estate without having to worry about cumbersome resolution adjustments or mess around with cables.

#### **USB** hub for peripherals



You can now connect optional full sized Keyboard and mouse to this innovative Philips display's USB hub to improve your productivity. Simply connect your Notebook to this display with a single USB cable, and you are ready to utilize the attached additional peripherals like external HDD, camera, USB drive along with

Full HD video, Audio, and Internet functions. Should you prefer, you can of course still utilize your NBPC's keyboard and track pad as usual.

# **SmartErgoBase**



The SmartErgoBase is a monitor base that delivers ergonomic display comfort and provides cable management. The base's people-friendly height, swivel, tilt and rotation angle adjustments position the monitor for maximum comfort that can ease the physical strains of a long workday; cable management reduces cable clutter and keeps the workspace neat and professional.

#### Low bezel-to-table height



The Philips monitor, thanks to its advanced SmartErgoBase, can be lowered down almost to desk level for a comfortable viewing angle. Low bezel-to-table height is the perfect solution if you use bifocals, trifocals or progressive lens glasses for your computing work. Additionally, it allows for users with greatly different heights to

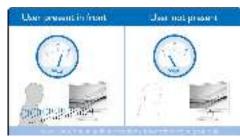
use the monitor in their preferred angle and height settings, helping them reduce fatigue and strain.

### **IPS** technology



IPS displays use an advanced technology which gives you extra wide viewing angles of 178/178 degree, making it possible to view the display from almost any angle - even in 90 degree Pivot mode! Unlike standard TN panels, IPS displays gives you remarkably crisp images with vivid colors, making it ideal not only for Photos, movies and web browsing, but also for professional applications which demand color accuracy and consistent brightness at all times.

## **PowerSensor**



PowerSensor is a built-in 'people sensor' that transmits and receives harmless infrared signals to determine if user is present and automatically reduces monitor brightness when user steps away from the desk, cutting energy costs by up to 80 percent and prolonging monitor life





















# Specifications

#### Picture/Display

- · LCD panel type: IPS LCD
- · Backlight type: W-LED system
- Panel Size: 23 inch / 58.4 cm
- Effective viewing area: 509.18 x 286.41 mm
- Aspect ratio: 16:9
- Optimum resolution: 1920 x 1080 @ 60Hz
- Response time (typical): 14 (Gray to Gray) ms
- SmartResponse (typical): 7 ms (GTG\_BW)
- Brightness: 250 cd/m<sup>2</sup>
- Contrast ratio (typical): 1,000:1
- SmartContrast: 20,000,000:1
- Pixel pitch: 0.265 x 0.265 mm
- Viewing angle: 178° (H) / 178° (V), @ C/R > 10
- Picture enhancement: SmartImage
- Display colors: 16.7 M
- Scanning Frequency: 30 -83 kHz (H) / 56 -75 Hz (V)

#### Connectivity

- · Signal Input: VGA (Analog)
- · Sync Input: Separate Sync (VGA only), Sync on Green (VGA only)

#### **USB** Connectivity

- USB: USB 2.0 x 1, USB 3.0 x 2
- Signal Input: USB 3.0 upstream
- Audio In/Out: through USB
- RJ45: through USB, 1Gbps
- Microphone in: through USB
- · Headphone out: through USB

#### Convenience

- Built-in Speakers: 1.5Wx2
- User convenience: SmartImage, Input, PowerSensor, Menu, Power On/Off
- Control software: SmartControl Premium(VGA only), DisplayLink Graphics Software
- · OSD Languages: English, French, German, Italian, Portuguese, Russian, Simplified Chinese, Spanish, Korean
- Other convenience: Kensington lock, VESA mount (100×100mm)
- Plug & Play Compatibility: DDC/CI (VGA only), Mac OS X, sRGB, Windows 10 / 8.1 / 8 / 7

#### **Stand**

- · Height adjustment: 130 mm
- Pivot: 90 degree
- Swivel: -65/65 degree
- Tilt: -5/20 degree

#### **Power**

- ECO mode: 11.3 W (typ.)
- On mode: 20.2 W (typ.) (EnergyStar 6.0 test method)
- Standby mode: <0.5 W (typ.)</li>
- · Off mode: Zero watts with AC switch
- · Power LED indicator: Operation White, Standby mode- White (blinking)
- Power supply: 100-240VAC, 50-60Hz, Built-in

#### **Dimensions**

- Product with stand(max height):  $547 \times 515 \times$ 220 mm
- Product with stand(max height): 21.5 x 20.3 x
- Product without stand (mm):  $547 \times 343 \times 60 \text{ mm}$
- Product without stand in inch:  $21.5 \times 13.5 \times 2.4$  inch
- Packaging in mm (WxHxD):  $600 \times 400 \times 263$  mm
- Packaging in inch (WxHxD): 23.6 x 15.7 x 10.4 inch

# Weight

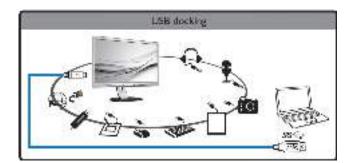
- Product with stand (kg): 6.00 kg
- Product with stand (lb): 13.20 lb
- Product without stand (kg): 3.90 kg
- Product without stand (lb): 8.58 lb
- Product with packaging (kg): 8.41 kg
- · Product with packaging (lb): 18.50 lb

# **Operating conditions**

- Temperature range (operation): 0°C to 40°C °C
- Temperature range (storage): -20°C to 60°C °C
- Relative humidity: 20%-80 %
- Altitude: Operation: +12,000ft (3,658m), Nonoperation: +40,000ft (12,192m)
- MTBF: 30,000 (backlight) hour(s)

#### **Sustainability**

· Environmental and energy: PowerSensor, EnergyStar 6.0, EPEAT Gold\*, TCO edge, RoHS





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- Recyclable packaging material: 100 % • Post consumer recycled plastic: 65%
- · Specific Substances: PVC / BFR free housing, Mercury free, Lead free

#### Compliance and standards

 Regulatory Approvals: CE Mark, cETLus, FCC Class B, PSB, SEMKO, TCO 6.0, TUV Ergo, TUV/GS, WEEE, CCC, CECP, C-tick, EAC, EMC

#### Cabinet

- Front bezel: Black
- · Rear cover: Black
- Foot: Black
- · Finish: Texture

- \* We recommend to use USB 3.0 connection between your Notebook PC and the Philips display to ensure smooth images, video and audio
- \* Activities such as screen sharing, on-line streaming video and audio over the Internet can impact your network performance. Your hardware, network bandwidth and its performance will determine overall audio and video quality.
- \* The notebook, keyboard, mouse as shown are for illustration purpose only, not included in the product.
- \* "IPS" word mark / trademark and related patents on technologies belong to their respective owners
- EPEAT Gold is valid only where Philips registers the product. Please visit www.epeat.net for registration status in your count
- Smart response time is the optimum value from either GtG or GtG (BW) tests.