**Orchestrating** a brighter world

NE

MultiSync<sup>®</sup> CB651Q (Infrared Touch) LCD 65" Ultra-High Definition Large Format Touch Display

# Datasheet





#### Enter a world of interactive white-boarding

Upgrade your lectures and meetings with NEC's all-in-one collaboration boards, in three different sizes, featuring UHD resolution and up to 20 touch points. Based on infrared touch technology the user experiences perfect usability with a rapid touch response. Business and educational sessions start-up instantly with built-in whiteboard and wireless screen sharing functionalities without any hidden costs. The embedded annotation tool lets you annotate over any content shown on the screen.

For more demanding applications, the OPS slot provides the opportunity to enhance the computing power. With sizes including 65", 75" and 86", the NEC CB Series offers the ideal solution for your meeting and class rooms.

All NEC CB Series displays come with three magnetic pens and a wall-mount fitting for easy installation.

# **Benefits**

**Out-of-the-box collaboration** – thanks to embedded computing with built-in annotation tools and wireless presentation capabilities.

Multi-Touch - true multi-touch support with up to 20 simultaneous touch points.

**Protective Glass** – premium toughened glass protects the security of the panel yet delivers a perfect touch experience with anti-glare coating to minimise reflections and fingerprints.

Simple operation - with easy front access to USB ports and controls for major functionalities

**Ease of Use** – enhance the display with an optional "Windows based" Slot-in-PC using the integrated Ultra High Resolution OPS option slot, thereby simplifying installations and reducing the points of failure.

**Cost Saving Device Management** – save effort whilst managing all connected NEC devices from a centralised location by using the NaViSet Administrator 2 software tool.

## **Product Information**

| Product Name  | MultiSync <sup>®</sup> CB651Q (Infrared Touch)           |  |
|---------------|--|--|
| Product Group | LCD 65" Ultra-High Definition Large Format Touch Display |  |
| Order Code    | 60004822   |  |

## Display

| Panel Technology                   | IPS with Direct LED backlights       |
|------------------------------------|--------------------------------------|
| Active Screen Area (W x H)<br>[mm] | 1,428.5 x 803.5                      |
| Screen Size [inch/cm]              | 65 / 163.9                           |
| Aspect Ratio                       | 16:9                                 |
| Pixel Pitch [mm]                   | 0.372                                |
| Brightness [cd/m²]                 | 350, 300 (shipment setting)          |
| Contrast Ratio (typ.)              | 1200:1                               |
| Viewing Angle [°]                  | 178 / 178 (at contrast ratio > 10:1) |
| Colour Depth [bn]                  | 1,073 (10bit)                        |
| Response Time (typ.) [ms]          | 9 (grey-to-grey)                     |
| Haze Level [%]                     | 3                                    |
| Supported Orientation              | Landscape                            |
|                                    |                                      |

## Synchronisation Rate

| Horizontal Frequency [kHz] | 26 - 135 |
|----------------------------|----------|
| Vertical Frequency [Hz]    | 23 - 86  |

## Resolution

| Native Resolution      | 3840 x 2160          |                     |             |
|------------------------|----------------------|---------------------|-------------|
| Supported Resolutions  | 4096 x 2016;         | 3840 x 2160;        | 1920 x 1080 |
| Supported on HDMI only | 4096 x 2016 (24 Hz); | 3840 x 2160 (60 Hz) |             |

## Connectivity

| Input Video Analogue  | 1 x VGA   |
|-----------------------|---|
| Input Video Digital   | 3 x HDMI  |
| Input Audio Analogue  | 1 x 3,5 mm jack                                     |
| Input Audio Digital   | 3 x HDMI  |
| Input Control         | LAN 100Mbit; RS232                                  |
| Input Data            | 2 x USB Type-B (Upstream); 6 x USB 2.0 (Downstream) |
| Output Audio Analogue | 1 x 3,5 mm jack                                     |
| Output Audio Digital  | 1 x SPDIF   |
| Output Control        | 1 x LAN 100Mbit                                     |
|                       |   |

# **Open Modular Intelligence**

| OPS Slot                 | Slot Technology: Open pluggable specification (NEC / Intel OPS standard) |
|--------------------------|--|
| OPS Max. Current / Power | 3.5 / 63   |
| Consumption [A / W]      |  |

#### Electrical

| Power Consumption Eco/max.<br>[W] | 160 Eco (shipment setting), 400 |
|-----------------------------------|---------------------------------|
| Power Savings Mode [W]            | < 0.5; < 2 (Networked Standby)  |

## **Environmental Conditions**

| Operating Temperature [°C] | +0 to +40 |
|----------------------------|-----------|
| Operating Humidity [%]     | 10 to 90  |

#### Mechanical

| Dimensions (W x H x D) [mm] | Without stand: 1,488.4 x 896.8 x 87.5 |  |
|-----------------------------|---------------------------------------|--|
| Weight [kg]                 | Without stand: 39.2                   |  |
| Bezel Width [mm]            | 18 (left, right and top); 45 (bottom) |  |
| VESA Mounting [mm]          | 4 holes; 600 x 400 (FDMI); M8         |  |

#### Glass

| Thickness [mm]         | 4                                    |  |  |
|------------------------|--------------------------------------|--|--|
| Туре                   | Thermal-tempered, anti-glare coating |  |  |
| Light Transmission [%] | 88 (+/- 1 %)                         |  |  |
| Reflection Rate [%]    | 4                                    |  |  |
| Hardness [H]           | 7                                    |  |  |

## Touch

| Touch Technology           | Infrared Touch   |  |
|----------------------------|--|--|
| Number of Touches          | Real multi-touch up to 20 touches  |  |
| Touch Method               | Finger; Gloves; Stylus (≥ 8 mm)  |  |
| Supported Operating System | Native Multi-Touch: Windows 7, Windows 8, Windows 10, Linux, Android; Default Mouse: Windows XP, Windows Vista, Mac OS X |  |
| Data Interface             | USB-HID  |  |
| Accuracy [mm]              | < 2  |  |

#### **Embedded Computing**

| Built-in Applications | File Manager; Input Select; Setting; Web Browser; Whiteboard - Mosaic Canvas; Wireless<br>Presentatiom - Mosaic Connect |  |
|-----------------------|---|--|
| System Memory         | 2G RAM  |  |
| Internal Storage      | 16GB ROM  |  |

## **Available Options**

| Accessories | Trolley (PD02MHA, PD03MHA); Wall mount (BalanceBox400-2; 1x standard wall mount<br>included); Wireless LAN module NP05LM2 (Europe); Wireless LAN Module NP05LM4 (Russia) |
|-------------|--|
| OPS Slot    | HDBaseT receiver; Intel $\ensuremath{\mathbb{R}}$ Atom, Celeron and Core CPUs; OPS-2C Quad 3G SDI  |

#### **Green Features**

#### **Additional Features**

| Special Characteristics | AMX NetLinx Support; Crestron Connected Support; Crestron RoomView Support; DICOM<br>Simulation; HDMI with UHD at 60 Hz; NaViSet Administrator 2; Scheduler |
|-------------------------|---|
| Colour Versions         | Black Front Bezel, Black Back Cabinet   |
| Safety and Ergonomics   | BSMI; CE; EAC; EMC Class B; FCC; PSB; RCM; REACH; RoHS; SASO; UL/C-UL   |
| Audio                   | Integrated Speakers (2 x 12 W)  |
| Shipping Content        | 3 x Stylus; HDMI Cable; Power Cable; Remote Control; USB cable; User Manual; VGA cable;<br>Wall Mount   |
| Warranty                | 3 years warranty incl. backlight  |
| Operating Hours         | 12/7  |



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