



# Quick Installation Guide

## 2/4/8 Ports Mini-Matrix KVM Switches

### Objectives

- This guide includes instructions for installing HSL Mini-Matrix SX22D-N, SX22H-N, SX42DU-N, SX42HU-N, SX82DU-N devices.
- A Mini-Matrix allows sharing keyboard, video, mouse, audio and USB peripherals between multiple computers.
- For further assistance please refer to HSL website <http://www.highseclabs.com>.

### General

- Verify that all peripherals and computers are turned off prior to connecting them to the product.
- The Mini-Matrix's back panel is divided into Console Ports and Computer Ports sections.
  - Connect peripherals which are due to be shared by the Mini-Matrix to the Console ports.
  - Connect each computer that requires access to the shared peripherals to a Computer port group.
  - Make sure that every computer is connected to a separate Computer port group.
  - Computer port group numbers are represented by push buttons on the product's front panel.
  - Switch peripherals between computers by pressing the push buttons on the product's front panel.

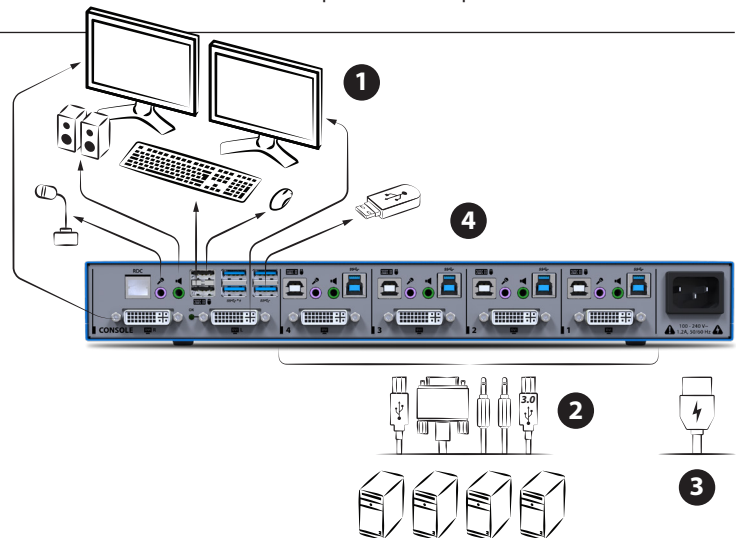
### SX42DU-N Model is shown

#### 1 Connect peripherals to the Mini-Matrix Console ports:

- **Keyboard:** Connect a USB keyboard to the corresponding Mini-Matrix console keyboard port.
- **Video:** Connect two monitors to the Mini-Matrix console video ports.
- **Primary & secondary display screen size:** It is highly recommended to use identical primary and secondary display monitors. EDID information is taken from the primary display (console port #1) and sent to all connected computers. In case of using non-identical displays, connect the smaller display to the primary console display port.
- **Mouse:** Connect a USB mouse to the corresponding Mini-Matrix console mouse port.
- **Audio out peripherals:** Connect headphones / speakers to the Mini-Matrix console audio-out ports (colored green).
- **USB peripherals:** Connect USB peripherals to the Mini-Matrix console USB port.
- **Audio in peripherals:** Connect a microphone to the Mini-Matrix console audio-in ports (colored pink).

#### 2 Connect computers to the Mini-Matrix Computer ports:

- **Computer keyboard & mouse connection:** Connect each computer to the Mini-Matrix keyboard & mouse computer port using a USB A to USB B cable. Connect the USB A end to the computer and the USB B end to MM.
- **Computer video connection:** Connect each computer to the MM computer video port using the corresponding video cable (VGA/HDMI/DVI/DP).
- When using dual screen computers with a 4 port MM, connect PC#1 to video port 1 & 2 and PC#2 to video port 3 & 4.
- **Dual screen support:** Download and install the HSL Multi Display Driver on computers that have multiple screens (currently available only for Windows - <http://highseclabs.com/dl.php?fid=446>).
- **Computer audio connection:** Connect each computer to the Mini-Matrix audio-in and audio-out ports using an audio cable. Connect one end of the cable to the computer's audio port using the 1/8" (3.5mm) stereo plug. Connect the other end of the audio cable to the Mini-Matrix audio-in/audio-out computer port.
- **Computer USB peripherals:** Connect each computer to the Mini-Matrix USB computer port using a USB A to USB B cable. Connect the USB A end to the computer and the USB B end to Mini-Matrix.



#### 3 Power ON your system:

- **Power ON the monitor:** Make sure that the monitors are turned ON prior to powering ON the Mini-Matrix.
- **Power ON the system:** Connect all peripherals and computers to the MM prior to powering it up. Power ON the MM by plugging it to the AC wall outlet. By default, after product power-up, the active channel will be computer #1, indicated by the applicable front panel push button LED lit.

**Note:** Power ON self-test: As the product powers-up it performs a self-test procedure. In case of self-test failure for any reason, including jammed buttons, the product will be Inoperable. Self-test failure will be indicated by abnormal LED behavior – for further information please refer to the Mini-Matrix setup guide.

#### 4 Switching between computers:

- Switch between computers by pressing the corresponding front panel button on the Mini-Matrix. The front panel button of the selected computer will illuminate.



### Supported Hardware

The Mini-Matrix switches support most standard speakers, microphones and USB keyboards and mice.

### Environmental

- Operating temperature is 32° to 104° F (0° to 40° C).
- Storage temperature is -4° to 140° F (-20° to 60° C).
- Humidity requirements are 0-80% relative humidity, non-condensing.

### SX22x-N Dimensions

177 (W) x 82 (D) x 35 (H) mm, Weight: 0.52 kg

### SX42xU-N Dimensions

342 (W) x 148 (D) x 42 (H) mm, Weight: 1.3 kg

### SX82DU-N Dimensions

440 (W) x 192 (D) x 48 (H) mm, Weight: 2.4 kg

## Safety and Regulatory Statements

### Safety Symbols

One or more of the following symbols may be included in your product documentation and/or on the product.



**Instructions:** This symbol is intended to alert the user to the presence of important operating and maintenance (servicing) instructions in the product user manual.



**Dangerous Voltage:** This symbol is intended to alert the user to the presence of uninsulated dangerous voltage within the product's enclosure that may be of sufficient magnitude to constitute a risk of electric shock to persons.



**Power On:** This symbol indicates the principal on/off switch is in the on position.



**Power Off:** This symbol indicates the principal on/off switch is in the off position.



**Protective Grounding Terminal:** This symbol indicates a terminal which must be connected to earth ground prior to making any other connections to the equipment.

### Safety Precautions

**WARNING:** To avoid a potentially fatal shock hazard and possible damage to equipment, please observe the following precautions.

- Do not disable the power grounding plug. The grounding plug is an important safety feature.
- Plug the power cord into a grounded (earthed) outlet that is easily accessible at all times.
- Disconnect the power from the product by unplugging the power cord from either the electrical outlet or the product. The AC inlet is the main disconnect for removing power to this product. For products that have more than one AC inlet, to remove power completely, all AC line cords must be disconnected.
- This product has no serviceable parts inside the product enclosure. Do not open or remove product cover.

**CAUTION:** Some HSL products contain a lithium battery. This battery is not a field replaceable item, and replacement should not be attempted by a user. If errors occur when using the product and the battery is suspected, contact HSL Technical Support.

**WARNING:** For Service Personnel Only - There is a risk of explosion if the battery is replaced with an incorrect type. Dispose of used batteries according to the manufacturer's instructions.

This product is for use with other products that are Listed or Certified by a Nationally Recognized Testing Laboratory (NRTL).

### 8-PORT



### 2-PORT