

8-Port Video Switch





FCC INFORMATION

This is an FCC Class A product. In a domestic environment this product may cause radio interference in which case the user may be required to take adequate measures.

This equipment has been tested and found to comply with the limits for a Class A digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause harmful interference in which case the user will be required to correct the interference at his own expense.

RoHS

This product is RoHS compliant.

SJ/T 11364-2006

The following contains information that relates to China.

前供存む 有毒有害物质或元素						
部件名称	铅	汞	镉	六价铬	多溴联苯	多溴二苯醚
电器部件		0	0	0	0	0
机构部件	Ó	Ó	Ó	Ó	Ó	Ó

:表示该有毒有害物质在该部件所有均质材料中的含量均在SJ/T 11363-2006规定的限量要求之下。

- 表示符合欧盟的豁免条款,但该有毒有害物质至少在该部件的 某一均质材料中的含量超出SJ/T 11363-2006的限量要求。
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VSO801 USER MANUAL

ONLINE REGISTRATION

International	http://support.aten.com
North America	http://www.aten-usa.com/product_registration

TELEPHONE SUPPORT

International	886-2-8692-6959
China	86-10-5255-0110
Japan	81-3-5323-7178
Korea	82-2-467-6789
North America	1-888-999-ATEN ext 4988
United Kingdom	44-8448-158923

TECHNICAL SUPPORT

- For international online technical support including troubleshooting, documentation, and software updates: http://support.aten.com
- For North American technical support:

Email Suppor	t	support@aten-usa.com	
Online Technical Support	Troubleshooting Documentation Software Updates	http://www.aten-usa.com/support	
Telephone Su	pport	1-888-999-ATEN ext 4998	

PACKAGE CONTENTS

The VS0801 8-port Video Switch package contains the following items:

- 1 VS0801 8-port Video Switch
- 1 VGA/Audio Cable (1.8 m)
- 1 IR Remote Control Unit
- 1 Power Adapter
- 1 Rack Mount Kit
- 1 User Manual*
- 1 Quick Start Guide

Check to make sure that all the components are present and that nothing got damaged in shipping. If you encounter a problem, contact your dealer.

Read this manual thoroughly and follow the installation and operation procedures carefully to prevent any damage to the unit, and/or any of the devices connected to it.

* Features may have been added to the VS0801 since this manual was printed. Please visit our website to download the most up-to-date version of the manual.

OVERVIEW

With eight VGA/Audio input ports, the VS0801 8-port Video Switch allows you to conveniently display the video output of eight separate computer systems on all analog monitors or a multimedia projector. Rack mountable in only 1U of space, and with full audio support, the VS0801 is perfect for server room applications that require the monitoring of high quality video and audio output, allowing you to monitor work harsh environments from a safe location.

The IR remote control and convenient front panel pushbuttons allow you to quickly and easily toggle between VGA/Audio sources, while the front panel LEDs indicate the source device at a glance. In addition, with support for up to 300 MHz bandwidth, the VS0801 allows for the transmission of large amounts of information at very high speeds.

Furthermore, for complete system and install integration, RS-232 control is standard through the VS0801's built-in bi-directional RS-232 serial port that allows the switch to be controlled through a serial PC.

Designed for enterprise use, the VS0801 eliminates the extra cost of purchasing a separate monitor for each computer system, saves space and power in the server room, and provides high speed audio and video for a wide range of industrial and commercial applications.

FEATURES

- Displays the video output of up to eight computers on a single analog display
- Quick and easy switching between VGA/Audio sources via front panel pushbuttons or IR remote control
- Supports stereo audio
- Built-in bi-directional RS-232 serial port for high-end system control
- Supports up to 300 MHz bandwidth
- Superior video quality 2048x1536@60Hz; DDC; DDC2; DDC2B
- Supports all analog displays VGA, SVGA, UXGA, WUXGA, and multisync
- Plug-and-play no software installation required
- All-metal casing provides durability and protection
- Designed for enterprise use
- Rack Mountable

SYSTEM REQUIREMENTS

Source Devices(s)

The following equipment must be installed on the source device or computer that acts as a source of VGA/Audio content:

HDB-15 connector

DISPLAY DEVICE

 A VGA, SVGA, UXGA, WUXGA or multisync monitor or multimedia projector with an HDB-15 connector

CABLES

- 1 VGA/Audio cable for each source device you will be connecting
- 1 VGA/Audio cable for your display device
- Note: 1. One 1.8 m VGA/Audio cable is included in this package. We strongly recommend that you purchase high-quality cables of appropriate length since this will affect the quality of the audio and video display. Contact your dealer to purchase the correct cable sets.
 - 2. If you wish to utilize the VS0801's high-end serial controller function, you will also need to purchase an appropriate RS-232 cable. See *Installing the RS-232 Controller*, page 11.

COMPONENTS

VS0801 FRONT VIEW



No.	Component	Function
1	Port Selection Pushbuttons	Pressing a port selection pushbutton routes the VGA/Audio source from the corresponding input port to the output port for display.
2	Port LEDs	There is one port LED next to each port selection pushbutton. This lights green to indicate that the corresponding port has been selected. Port LED flashes when video output is disabled.
3	IR Receiver	This receives signals from the IR remote control.



No.	Component	Function
1	Grounding Terminal	The grounding wire (used to ground the unit) attaches here.
2	RS-232 Serial Port	This is the serial remote port for input source selection and high-end system control.
3	Video / Audio Input	Each input section is comprised of a VGA connector and a mini stereo audio jack. The cables that connect to the video and audio output ports on the computers / source devices plug in here.
4	Power Jack	The power adapter cable plugs in here.
5	Video / Audio Output	The cables that connect to the video and audio input ports on the video display plug in here.

IR REMOTE CONTROL



No.	Component	Function
1	Port Up / Port Down Buttons	Press the Port Up button to cycle forward through the source devices (1 to 2; 2 to 3; 8 to 1).
		Press the Port Down button to cycle backward through the source devices. (8 to 7; 7 to 6; \dots 1 to 8)
2	Port Selection Buttons	Press a button to bring the focus directly to the source device attached to its associated port.
3	On / Off Button	This button enables / disables the video output.
		Note: If video output is disabled, the corresponding port LED will flash until video is re-enabled.



- 1. Make sure that the power to all devices you will be installing has been turned off.
- 2. Make sure that all devices you will be installing are properly grounded.

Installation of the VS0801 is simply a matter of plugging in the appropriate cables.

To install the switch, refer to the installation diagram on page 12 as you perform the following three steps:

- 1. Use a VGA cable to connect the VGA input port on the video display device to the VGA output ports on the rear of the VS0801. Connect your speakers to the Audio output port.
- 2. Use VGA/Audio cables to connect the VGA/Audio output ports on the source device(s) to the VGA/Audio input ports on the VS0801. Eight VGA/Audio input ports are located on the rear of the switch.
- 3. Plug the provided power adapter into an appropriate AC power source; plug the power adapter cable into the Power Jack on the VS0801.

This completes the basic installation of the VS0801 8-port Video Switch. You may now power on the display and source devices.

INSTALLING THE RS-232 CONTROLLER

In order to use the RS-232 serial interface to attach a high-end controller (such as a PC) to the VS0801, use a serial cable such as a modem cable. The end connecting to the VS0801 should have a 9-pin male connector. Connect this to the serial interface on the rear of the VS0801. Refer to number 4 on the diagram on page 12.

Note: To configure the controller serial port, see page 14.

INSTALLATION DIAGRAM



Source Device Selection

The VS0801 8-port Video Switch offers easy and flexible source device selection with either the front panel pushbuttons, with the remote control, or through the RS-232 serial interface.

Note: Whenever the VS0801 is powered on, it automatically selects the first port. You may choose one of the methods outlined below to select a different port.

MANUAL SELECTION

To select a source device, press the pushbutton that corresponds to the port it is connected to.

Note: The SELECTED LED (green) light indicates which port is currently selected.

REMOTE CONTROL SELECTION

To select a source device with the remote control, press the number button that corresponds to the port it is connected to.

Alternatively, you may also cycle through the source devices by pushing the Port Up and Port Down buttons on the remote control unit.

- Use the Port Up button to select the next port in ascending order (from left to right on the front view panel).
- Use the Port Down button to select the next port in descending order (from right to left on the front view panel).
- **Note:** Aim the remote control unit at the IR receiver located on the front panel of the VS0801. For optimum performance, make sure there is a clear line-of-sight between the remote control unit and the IR receiver.

RS-232 SERIAL INTERFACE

The VS0801's built-in bi-directional RS-232 serial interface allows system control through a high-end controller or PC.

CONFIGURING THE SERIAL PORT

The controller's serial port should be configured as follows:

Baud Rate	19200
Data Bits	8
Parity	None
Stop Bits	1
Flow Control	None

SERIAL COMMANDS

The VS0801's serial commands are as follows

Control Packet Format								
Function Protocol	Start Code	Head	Function	Data Length	Data	Checksum	End Code	
Switch to Last Port	0x5A 0x7E	Port Code 0x81	Switch to Next Port 0x00	0x00	N/A	0x81	0x81 0xA5	
Switch to Next Port		0,01	Switch to Next Port 0x01		N/A	0x82		
Switch to Port 1			Switch to Next Port 0x08	0x01	0x31	0xBB		
Switch to Port 2					0x32	0xBC		
Switch to Port 3					0x33	0xBD		
Switch to Port 4					0x34	0xBE		
Switch to Port 5					0x35	0xBF		
Switch to Port 6					0x36	0xC0		
Switch to Port 7					0x37	0xC1		
Switch to Port 8					0x38	0xC2		

POWERING OFF AND RESTARTING

If you power off the VS0801, follows these steps before powering it on again:

- 1. Power off the attached devices.
- 2. Unplug the power adapter cable from the VS0801.
- 3. Wait 10 seconds, and then plug the power adapter cable back in.
- 4. After the VS0801 is powered on, power on the attached devices.

Note: Whenever the VS0801 is powered on, it automatically selects the first port.

SPECIFICATIONS

	Function		VS0801		
Display Connections			1		
Connectors	Device Video In		8 x HDB-15 Male (Blue)		
		Audio In	8 x Mini Stereo Jack Female (Green)		
	Display	Video Out	1 x HDB-15 Female (Blue)		
		Audio Out	1 x Mini Stereo Jack Female (Green)		
	RS-232 Pc	ort	1 x DB-9 Female (Black)		
	Power		1 x DC Jack		
LEDs	Selected		8 (Green)		
Video			2048 x 1536@60 Hz; DDC2B		
Power Consum	nption		DC5.3V, 1.01W		
Environment	Operating Temp.		0–50°C		
	Storage Temp.		-20–60°C		
Humidity			0–80% RH, Non-condensing		
Physical Housing			Metal		
Properties	Weight		2.10 kg		
	Dimensions (L x W x H)		43.2 x 15.4 x 4.4 cm		

LIMITED WARRANTY

IN NO EVENT SHALL THE DIRECT VENDOR'S LIABILITY EXCEED THE PRICE PAID FOR THE PRODUCT FROM THE DIRECT, INDIRECT, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES RESULTING FROM THE USE OF THE PRODUCT, DISK OR ITS DOCUMENTATION.

The direct vendor makes no warranty or representation, expressed, implied, or statutory with respect to the contents or use of this documentation, and specially disclaims its quality, performance, merchantability, or fitness for any particular purpose.

The direct vendor also reserves the right to revise or update the device or documentation without obligation to notify any individual or entity of such revisions, or update. For further inquires please contact your direct vendor.