GIGABIT ETHERNET RACKMOUNT WEB-SMART WEB-SMART SWITCH USER MANUAL MODELS 524063 & 524087



Model shown: 524063, 24-port



INT-524063/524087-UM-0308-01

INTRODUCTION

Thank you for purchasing the INTELLINET NETWORK SOLUTIONS[™] Gigabit Ethernet Rackmount Web-Smart Switch, Model 524063 (24-port) or Model 524087 (16-port).

This handy device lets you increase the speed of your network with 10/100/1000 Mbps auto-sensing ports that automatically detect optimal network speeds, and it lets you increase the speed of your *own* work through user-friendly Web-based management for uncomplicated administration.

Easy-to-follow instructions in this user manual help make installation of the switch quick and simple, so you'll also soon be enjoying the benefits of these additional features:

- · All RJ-45 ports with Auto-MDIX (auto uplink) support
- · Supports NWay auto-negotiation
- · Broadcast storm control with multicast packet rate settings
- · Store and forward switching architecture
- · Full/half duplex operation
- IEEE 802.3x flow control for full duplex
- · Zero packet loss backpressure flow control for half duplex
- Packet filtering/forwarding rates: 1,488,000 pps (1000 Mbps), 148,800 pps (100 Mbps), 14,880 pps (10 Mbps)
- · Supports port controls (speed, flow control and maximum frame size)
- Supports VLAN (tag-based and port-based)
- Supports link aggregation (trunking)
- · Supports QoS (Quality of Service) with 2 priority levels
- Provides IEEE 802.1x port-based security
- · Supports port mirroring
- · Supports jumbo frames up to 9.6 kBytes
- 19" rackmount
- · LEDs for power, link/activity, connection speed
- Lifetime Warranty

NOTE: Some screen images have been modified to fit the manual format.



SETUP

INTELLINET								
16 Port Gigabit Ethernet Rackmount Web-Smart Switch	1000M	2	4	8	10	12	14	16
	LINK/ACT							
	1000M							
POWER	LINK/ACT		3	7	9			15

LED	Status	Operation
POWER	On	There is power to the unit.
1000M	On	The corresponding port is transmitting/receiving at 1000 Mbps.
	Off	The corresponding port is transmitting/receiving at 10/100 Mbps.
LINK/ACT	On	The corresponding port is connected to another device.

- · Using twisted-pair cable, connect the switch to your computer.
- Using the included power cord, connect the Gigabit Ethernet Rackmount Web-Smart Switch to an AC power source.

CONFIGURATION

- 1. Set your PC's IP address to 192.168.2.xxx (where "xxx" is a value from 2 to 254).
- 2. Open the Web browser; go to 192.168.2.1 to display the configuration login screen.





 Enter "admin" in the Password field, then click "Apply." The authentication process will now allow you to navigate among/within the process.

Configuration	Please enter password to login
System Ports VLANs Aggregation LACP RSTP 802.1X	Password: •••••

the primary menu options: Configuration, Monitoring and Maintenance.

Configuration

System

This screen presents the MAC address, system firmware version and several other settings/ readings. You can change the user name, password and IP address, then click "Apply" to confirm any changes. After that, you can reset the switch to make the new username, password or IP address take effect.

	Configuration	System Configura	tion				
4	System	MAC Address	00-03-cd-07-00-00				
	VLANs	S/W Version	Luton24 2.29				
	Aggregation	H/W Version	1.0				
	LACP	Temperature	0°C				
	802.1X	Active ID Address	102 169 2 1				
	IGMP Snooping	Active IF Address	255 255 255 0				
	Mirroring Quality of	Active Subnet Wask	255.255.255.0				
	Service	Active Gateway	0.0.0.0				
	Filter	DHCP Server	0.0.0.0				
	Rate Limit	Lease Time Left	0 secs				
	Monitoring		-				
	Statistics	DHCP Enabled					
	Detailed	Fallback IP Address	192.168.2.1				
	Statistics LACP Status	Fallback Subnet Mask	255.255.255.0				
	IGMP Status	Fallback Gateway	0.0.0.0				
	VeriPHY Ping	TFTP Server Enabled					
	Maintenance	Management VLAN	1				
		Name					
	Factory Default	Password					
	Software Upload	Inactivity Timeout (secs)	0				
	File Transfer	SNMP enabled					
	Logout	SNMP Trap destination	0.0.0.0				
		SNMP Read Community	public				
		SNMP Write Community	private				
		SNMP Trap Community	public				
	~	Apply Refresh					



Ports

This screen gives you the option of enabling/disabling Jumbo Frames. Plus, by selecting each individual port you can:

- enable/disable
 the port
- choose between full and half duplex

	Port Configuration										
	Configuration	Enable	Enable Jumbo Frames 🗖								
<	System Ports VLANs										
	Aggregation	Port	Link	Mode	Flow Control						
	RSTP	1	Down	Auto Speed 🖌							
	802.1X	2	Down	Auto Speed 💌							
	Mirroring	3	Down	Auto Speed 🖌							
	Quality of Service	4	100FDX	Auto Speed 💌							
	Filter	5	Down	Auto Speed ⊻							
	Rate Limit	6	Down	Auto Speed 🔽							
	Storm Control	7	Down	Auto Speed 💌							
	Monitoring	8	Down	Auto Speed ⊻							
	Statistics	9	Down	Auto Speed 🖌							
	Overview	10	Down	Auto Speed 💌							
	Detailed Statistics	11	Down	Auto Speed 💌							

- · select a Mode option from the dropdown menu, such as "Auto Speed"
- enable/disable Flow Control

VLAN

Depending on the model of the Gigabit Ethernet Rackmount Web-Smart Switch, there are either 24 VLAN groups (1 – 24 for Model 524063) or 16 VLAN groups (1 – 16 for Model 524087). Select and enter a group into the "VLAN ID" field, click

Configuration	Port Segmentation (VLAN) Configuration
System Ports	Add a VLAN
VLANs Aggregation LACP	VLAN ID
RSTP 802.1X IGMP Snooping	bbA
Mirroring Quality of Service	VLAN Configuration List
Filter Rate Limit Storm Control	
Monitoring	Modify Delete Refresh
Statistics	Port Config

"Add," then click the port number(s) you want to put into the selected VLAN group.

Aggregation/Trunking

Set up any port trunk groups you prefer, then click the port numbers you want to include in the same group. There are eight groups that can be created, and the maximum number of ports for any one group is 24 for Model 524063; 16 for Model 524087.



Configuration	Aggregatio	n/	Tru	Ink	ing	g C	on	fig	ura	atio	on														
System	Group\Port	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24
VLANs	Normal																								
Aggregation	Group 1		0																						0
RSTP	Group 2																								
IGMP Snooping	Group 3																								
Mirroring Quality of	Group 4																								
Service	Group 5																								
Rate Limit	Group 6																								
Storm Control	Group 7																								
Monitoring	Group 8																								
Statistics Overview Detailed	Apply Refres	1																							

LACP

Select the port number(s) for which you want to enable/disable the protocol.

System	Port	Protocol Enabled	Key Value
VLANs	1		auto
Aggregation	2		auto
RSTP	3		auto
IGMP Snooping	4		auto
Mirroring	5		auto
Service	6		auto
Filter Rate Limit	7		auto
Storm Control	8		auto
Monitoring	9		auto

Configuration

RSTP

Select the port number(s) for which you want to enable/ disable the protocol.

	RSTP System	Configuration		
Configuration	System Priority	32768 💌		
System	Hello Time	2		
VLANs	Max Age	20		
Aggregation	Forward Delay	15		
RSTP	Force version	Normal		
IGMP Snooping Mirroring Quality of Service Filter	RSTP Port Co	onfiguration		
Rate Limit	Port	Protocol Enabled	Edge	Path Cost
Storm Control	Aggregations			
Monitoring	1			auto
Statistics	2			auto
Overview	3		V	auto



802.1x

Configuration	802.1	X Configura	tion	I			
System	Mode	:	Disabl	ed 🔽			
VLANs	RADIU	IS IP	0.0.0.0				
Aggregation	RADIU	IS UDP Port	1812				
BSTP	RADIU	S Secret					
802.1X			_				
Mirroring	Port	Admin State		Port State			
Quality of	1	Force Authorized	×	802.1X Disabled	Re-authenticate	Force Reinitialize	Statistics
Service	2	Force Authorized	×	802.1X Disabled	Re-authenticate	Force Reinitialize	Statistics
Filter Rate Limit	3	Force Authorized	~	802.1X Disabled	Re-authenticate	Force Reinitialize	Statistics
Storm Control	4	Force Authorized	~	802.1X Disabled	Re-authenticate	Force Reinitialize	Statistics
1							

This screen gives you drop-down menu options — "Auto," "Force Authorized" and "Force Unauthorized" — for the Admin State of the selected port(s).



Port Mirroring

Port Mirroring is used to mirror traffic from a source port to a destination port for analysis. Select the destination port (1 - 24 for Model 524063; 1 - 16 for Model 524087) in the left-hand column, then select the source port by checking the corresponding "Mirror Source" box in the right-hand column.

Configuration	Mirroring C	Configuration
System Ports VI ANs	Port	Mirror Source
Aggregation	1	
	2	
802.1X	3	
IGMP Snooping	4	
Quality of	5	
Service	6	
Rate Limit	7	
Storm Control	8	



QoS (Quality of Service)

When QoS Mode is enabled, you can select the Quality of Service for each individual port.

^

Configuration	QoS Confi	guration
System Ports VLANs Aggregation LACP RSTP 802.1X IGMP Snooping Minoring Quality of Service	QoS Mode	QoS Disabled

Filter

Select the port number(s) for which you want to enable/disable IP address filtering.

Rate Limit

Select the port number(s) for which you want to establish/change speed settings.

Configuration	Filte	r Configur	ation		
System			Source IP Filter		DHCP Server
Ports	Роп	Mode	IP Address	IP Mask	Allowed
Aggregation	1	Disabled 💌 📔			
LACP RSTP	2	Disabled 💌 📔			
B02.1X	3	Disabled 💌 📔			
Mirroring	4	Disabled 🖌 📔			
Quality of Service	5	Disabled 🖌 📔			
Filter	6	Disabled 💌 📔			
tate Linit					

Configuration	Rate Limi	t Configuration	
System	Port	Policer	Shaper
VLANs	1	No Limit 💌	No Limit 💌
Aggregation	2	No Limit 💌	No Limit 💌
RSTP	3	No Limit 💌	No Limit 💌
802.1X	4	No Limit 💌	No Limit 🔽
Mirroring	5	No Limit 💌	No Limit 💌
Quality of	6	No Limit 💌	No Limit 💌
Filter	7	No Limit 💌	No Limit 🔽
Rate Limit	8	No Limit 🔽	No Limit 🔽

Configuration

Storm Control

This screen lets you configure the various settings of Storm Control in order to minimize interference with traffic to and from the switch.

J		, second
System Ports VI ANs	Storm Number of fram	Control nes per second
Aggregation	ICMP Rate	No Limit 💌
LACP RSTP 802.1X	Learn Frames Rate	No Limit 💌
IGMP Snooping	Broadcast Rate	No Limit 👱
Mirroring Quality of	Multicast Rate	No Limit 💌
Service Filter	Flooded unicast Rate	No Limit 💌
Storm Control	Apply Refresh	<u></u>

Storm Control Configuration



Monitoring

Statistics Overview

LACP	^			Stat	istics Ov	erview for	all ports	
802.1X IGMP Snooping Mirroring		Clear	Refresh					
Quality of		Port	Tx Bytes	Tx Frames	Rx Bytes	Rx Frames	Tx Errors	Rx Errors
Service		1	0	0	0	0	0	0
Rate Limit		2	0	0	0	0	0	0
Storm Control		3	0	0	0	0	0	0
Monitoring		4	98880	207	63304	539	0	0
Morntoring		5	0	0	0	0	0	0
Statistics		6	0	0	0	0	0	0
Overview		7	0	0	0	0	0	0
Statistics		8	0	0	0	0	0	0
LACP Status		9	0	0	0	0	0	0
RSTP Status		10	0	0	0	0	0	0
IGMP Status		44	0	0	0	0	0	0

This screen lets you monitor the current status and statistics for each of the ports.

Detailed Statistics

						_				
LACP =				Statis	stics f	or Po	rt 1			
802.1X										
IGMP Snooping	Clear Refresh	Port 1	Port 2	Port 3	Port 4	Port 5	Port 6	Port 7	Port 8	
Mirroring			Port	Port	Port	Port	Port	Port	Port	
Quality of		Port 9	10	11	12	13	14	15	16	
Service			10	<u> </u>	14	10		10	10	
Filter Data Limit		Port	Port	Port	Port	Port	Port	Port	Port	
Storm Control		<u>17</u>	<u>18</u>	<u>19</u>	<u>20</u>	<u>21</u>	22	<u>23</u>	<u>24</u>	
	Rec	eive To	tal				Trans	mit To	tal	
Monitoring	Rx Packets			0	Tx Packet	s				0
	Rx Octets			0	Tx Octets					0
Statistics	Rx High Priority Packets				Tx Hiah P	riority Pa	ckets			
Detailed	Rx Low Priority Packets	iority Packets					ckets			
Statistics	RxBroadcast				Tx Broad	ast				_
LACP Status	Rx Multicast				Tx Multica	ist				
RSTP Status	Rx Broad- and Multicast			0	Tx Broad-	and Mult	icast			0
VeriPHY	Rx Error Packets			0	Tx Error F	ackets				0
Ping	Receive	Size Co	ounters	3		Tra	nsmit S	Size Co	unters	
	Ry 64 Bytes				Ex 64 Byte	25				
Maintenance	Dv 65 127 Evtor				Ty 65 127 Eutoc					
Marrie Darstart	Dx 109 255 Dites				TV 100-127	5 Puton				
Factory Default	RX 120-200 Dytes				D 120-20	1 Puton				

This screen lets you view detailed statistics by clicking on the port in the top panel.



LACP Status

LĂČP RSTP 802.1X	^	LACP Aggre	ACP Aggregation Overview																			
IGMP Snooping Mirroring		Group/Port	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
Quality of Service		Normal					Π															Γ
Filter Rate Limit Storm Control																						
Monitoring		Legend																				
Statistics Overview		Down		Po	rt l	ink	do	wn	ı													
Detailed Statistics LACP Status		0 Blocked	Blocked Port Blocked by RSTP. Number is Partner port number if other switch has LACP enabled.								tch											
IGMP Status		0 Learning Port Learning by RSTP																				
Ping		Forwardir	ıg	Po	rt l	ink	up	an	d f	orw	are	ling	fran	nes								
Maintenance		0 Forwarding Port link up and forwarding by RSTP. Number is Partner port number if other switch has LACP enabled.																				

This screen lets you view the LACP (Link Aggregation Control Protocol) status for LACP ports. *NOTE:* Only 16 ports will display for Model 524087.

RSTP Status

RSTP 802.1X IGMP Snooping	1	RSTP VL	AN Bridge	٥v	erview							
Mirroring Quality of Service	of		Bridge ID		Hello Time	Max Age		Fwd Delaj	l y Te	opology	Root Id	
Filter Rate Limit Storm Control		1	32769:00-0 cd-07-00-0	3- 1	2	20		15	St	eady	This sv Root!	vitch is
Monitoring	(Refresh										
Statistics Overview Dotailed	- 1	RSTP Po	rt Status									
Statistics		Port/Gro	up Vlan Id H	Patl	h Cost Edg	ge Port	P 2	2p Port	Proto	col Por	t State	
RSTP Status		Port 1								Nor	-STP	
IGMP Status		Port 2								Nor	-STP	
Ping		Port 3								Nor	-STP	
Maintenance		Port 4								Nor	-STP	
Warm Restart		Port 5								Nor	-STP	

This screen lets you view the RSTP (Rapid Spanning Tree Protocol) status for RSTP ports.



IGMP Status

Monitoring	^	IGMP	Status						
Statistics Overview Detailed		VLAN ID	Querier	Queries transmitted	Queries received	v1 Reports	v2 Reports	v3 Reports	v2 Leaves
Statistics LACP Status		1	Idle	0	0	0	0	0	0
RSTP Status IGMP Status		Refresh							

This screen lets you view the IGMP (Internet Group Management Protocol) status for IGMP ports.

Monitoring: VeriPHY Cable Diagnostics

This screen lets vou check the	RSTP 802.1X IGMP Snooping	VeriPHY Cable Diagnostics								
cable status for	Quality of	Port	Port 1 💌							
cabic status ioi	Service	Mode	Full	~						
all ports: Select a	Rate Limit	Apply								
port and mode	Storm Control	1.4693								
from the drop-	Monitoring									
down menus.	Statistics	Cable Stat	us							
	Overview Detailed Statistics	Pair	Length [m]	Sta	itus					
	LACP Status	A	-		-					
	IGMP Status	В	-		-					
6	VeriPHY	С	-		-					
	=	D	-		-					
· · · · · · · · · · · · · · · · · · ·										
Ping Parameters	RSTP 802.1X	[^] Ping Para	meters							
This screen lets	IGMP Snooping	Target IP address								
	Quality of	Count	1 💌							
you set the target	Service	Time Out (in secs) 1 V								
IP address.	Rate Limit									
	Storm Control	Apply								
	Monitoring	Ping Res	ults							
	Statistics	Target IP a	ddress		0.0.0.0					
	Overview Detailed	Status			Test complete					
	Statistics	Received r	eplies		0					
	RSTP Status	Request tin	neouts		0					
	IGMP Status	Average Re	esponse Tim	ie (in ms)	0					
	Ping									
	Maintenance	Refresh								



Maintenance

arm Doctort Ping w

warm Restart	Filig	wann Kestart
Click "Yes" to	Maintenance	Are you sure you want to perform a Warm
repoot the	vvarm Restard	
 Model Processing and 		La constante de

switch in order to affect any changes.

Factory Default

Click "Yes"	Maintenance 🥤	Factory Default
he factory defaults.	Warm Restart Factory Default Software Upload	Are you sure you want to perform a Factory Default? Yea 🔤

Additional Menu Options

For Software Upload, Configuration, File Transfer and Logout procedures, select the menu option and follow the on-screen instructions.



SPECIFICATIONS

Standards

- IEEE 802.1d (Spanning Tree Protocol)
- IEEE 802.1w (Rapid Spanning Tree Protocol)
- IEEE 802.1p (Traffic Prioritization)
- IEEE 802.1g (VLAN Tagging)
- IEEE 802.3 (10Base-T Ethernet)
- IEEE 802.3u (100Base-TX Fast Ethernet)
- IEEE 802.3ab (Twisted Pair Gigabit Ethernet)
- IEEE 802.3ad (Link Aggregation)
- IEEE 802.3x (flow control, for full duplex mode)

General

- · Media support:
 - 10Base-T Cat3. 4. 5 UTP/STP RJ-45
 - 100Base-TX Cat5 UTP/STP RJ-45
 - 1000Base-T Cat5e UTP/STP RJ-45
- · Packet filter/forwarding rate:
 - 1.488.000 pps (1000 Mbps)
 - 148,800 pps (100 Mbps)
 - 14.880 pps (10 Mbps)
- · Buffer memory:
 - Model 524063: 500 kBytes
 - Model 524087: 340 kBytes
- MAC address table: 8192 entries
- Switch architecture: store and forward
- · Certifications: FCC Class A, CE Mark

Configuration Options

- Port link speed: 10 Mbps, 100 Mbps, 1000 Mbps
 Storage temperature: -20 90°C (-4 194°F) or auto-negotiation
- Flow control on/off per port
- · Full/half duplex per port
- VI AN⁻
 - Model 524063: 24 groups
 - Model 524087: 16 aroups
- · Port Mirroring for all ports with sniffer port configuration

- Port Aggregation/Trunking:
 - Model 524063: 8 groups with up to 24 member ports per trunk
 - Model 524087: 8 groups with up to 16 member ports per trunk
- · QoS: 2 priority levels
- · Broadcast Storm configuration with ICMP rate, broadcast rate, multicast rate, flooded unicast rate
- · Port filter configuration: enable/disable, IP address, subnet mask, DHCP Server allowed/ disallowed

I FDs

- Power
- Link/Act
- 1000 Mbps

Power

- Internal power supply, 100 240 V AC, 50/60 Hz
- Power consumption: 20 Watts (maximum)

Environmental

- Metal housing, 19" rackmount, 1 U
- Dimensions: 440 (L) x 220 (W) x 44 (H) mm (17.3 x 8.7 x 1.7 in.)
- Weight: 3.0 kg (6.4 lbs.)
- Operating temperature: 0 55°C (32 131°F)
- Operating humidity: 10 90% RH, non-condensing

Package Contents

- Gigabit Ethernet Rackmount Web-Smart Switch
- User manual





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