

L2 Managed Switch - 10 GE with 2 Combo SFP



GEL-1072

H/W Version: 1

LevelOne GEL-1072 is a Layer 2-Plus Managed switch with 10 x 1000Base-T ports associated with 2 x SFP (Small Form Factor Pluggable) slots. Despite its affordable pricing, the GEL-1072 is equipped with advanced features such as Single IP Management which allows users to manage up to 32 switches under the same web interface, Easy Configuration Port (ECP), IPv6, IEEE 802.1D/w/s Spanning Tree, IEEE 802.1X Access Control, IEEE 802.3az Green Ethernet and more. An ideal network solution for workgroups and edge deployments, or anyone looking for an affordable and efficient way to expand their network.

IP Clustered Stacking Solution

With the design and implementation of SIP (Single IP Management), network administrators are allowed to virtually stack GEL-1072, GTL-2880, GTP-2880, and GTL-5280 together and manage them as one logical unit through a single IP address regardless of geographical locations of those switches. Comparing to traditional stacking, IP clustering eliminates the use of costly cables and connectors. Furthermore, it minimizes the impact of any single point of failure.

LevelOne Easy Configuration Port (ECP) Technology

Each switch port can now be fully optimized through a predefined role and settings which are based on the type of a device such as an IP camera or a VoIP phone

to be connected to. For instance, even if a surveillance system integrator who lacks of IT administration skills, can still easily enables the role and applies settings like VLAN, QoS, port security and spanning tree to all connected IP cameras on a single Web UI within a few minutes. Hence, simplifying network deployment and ensuring consistent configurations across the network.

Enhanced Security Measures

We are always committed to providing the highest level of protection for your network resources against intrusion attacks and unauthorized access. Delivering robust access control, each Access Control List (ACL) consists of up to 256 entries, allowing you to configure a fine-grained restriction policy based on frame type, TCP/UDP ports, MAC address and VLAN ID in order to get deep inspection on your network traffic. In addition, with the implementation of port-based authentication (IEEE 802.1X), messages can be encrypted, therefore preventing intruders from getting authentication credentials.



- 1. Power LED
- 2. Reset Button
- 3. Console Port
- 4. 10/100/1000Mbps RJ-45 LAN Ports

- 5. 10/100/1000Mbps RJ-45 LAN Ports
- 6. SFP (Mini-GBIC) Slot
- 7. Power Socket
- 8. Wall Mount

Technical Specification

Standard Compliance

IEEE 802.3 10-BASE-T (Ethernet)
 IEEE 802.3u 100-BASE-TX (Fast Ethernet)
 IEEE 802.3ab 1000BASE-T (Gigabit Ethernet)
 IEEE 802.1D MAC Bridges
 IEEE802.1p priority tags
 IEEE802.1Q VLAN
 IEEE802.3ac VLAN tagging
 IEEE802.3ad Link aggregation control protocol
 IEEE802.1w Fast Spanning Tree
 IEEE802.1X authentication
 IEEE802.3az: Energy Efficient Ethernet

Performance

Switching Capacity:

20 Gbps switching fabric with up to 14.88 Mpps forwarding rates
 8K MAC addresses entries with auto-learning function
 Supports Jumbo frame, up to 9K
 Broadcast/Multicast/unicast Storm Suppression
 Port Mirroring

Network Interface

8 x RJ-45 10/100/1000BASE-T ports
 2 x Gigabit RJ-45/SFP (Mini-GBIC) shared slots

Software

Layer 2 feature

Spanning Tree Protocol:
 - IEEE 802.1D Spanning Tree Protocol (STP)
 - IEEE 802.1w Rapid Spanning Tree Protocol (RSTP)
 - IEEE 802.1s Multiple Spanning Tree Protocol (MSTP)
 Trunking:
 - IEEE 802.3ad Link Aggregation Control Protocol (LACP)
 - Trunk groups: 5 groups, up to 10 ports per group
 VLAN:
 - Support up to 4K VLANS simultaneously (1~4094 VLAN IDs)
 - Port-base VLAN
 - IEEE 802.1q tag-base VLAN
 - protocol-based VLAN
 - MAC-based VLAN
 - Management VLAN
 - Private VLAN Edge (PVE)
 - Voice VLAN supported
 - GVRP Supported
 DHCP Relay (Layer 2):
 - Relay of DHCP traffic to DHCP server in different VLAN
 IGMP Snooping:
 - IGMP v1/v2/v3 snooping
 - IGMP Queried
 - IGMP Proxy
 - MLD v1/v2 snooping

Security

SSH v1/v2 supported
 HTTPS/SSL
 IEEE 802.1X
 Dynamic VLAN assignment
 PVE: L2 isolation between clients in the same VLAN
 Port based/MAC based/ IP address based security
 Radius/Tacacs+ authentication supports
 Storm control: Broadcast, multicast, unicast
 ACLs: Support for up to 256 entries

QoS

Priority Queues: 8 hardware queues per port
 Scheduling:
 - Strict priority and Weighted Round-Robin (WRR)
 - Queue assignment based on DSCP and class of service (802.1p/ CoS)

Traffic classification based on Port based; 802.1p VLAN priority based; IPv4/IPv6 precedence/ type of service (ToS) / DSCP based; Differentiated Services (DiffServ); classification and re-marking ACLs, trusted QoS
 Rate Limiting: Ingress policer; egress shaping and rate control
 IPv6 applications: Web/ SSL, Telnet/ SSH, ping, Simple Network Time Protocol (SNTP), Trivial File Transfer Protocol (TFTP), SNMP, Syslog, IPv6 host mode, IPv6 stateless address auto-configuration.
 Duplicate address detection (DAD), ICMP version6, IPv6 QoS
 Prioritize IPv6 packets in hardware, IPv6 ACL Drop or rate limit IPv6 packets in hardware

Management

Switch Management:

Firmware upgrade via web browser (HTTP/HTTPS) and TFTP server, or console port.

CLI via console port or Telnet (SSH secure support)

SNMP v1, v2c, v3 User-based Security Model (USM)

Firmware & Configuration:

Dual firmware images

RMON (groups 1, 2, 3 and 9)

Firmware upgrade via web browser (HTTP/HTTPS) and TFTP, or console port

Easy Configuration Port (ECP) can configure client's QoS and security capabilities.

Single IP management (SIP):

Single IP management for a virtual stack function of up to 32 switches of GTL-2880/GTL-5280/GTP-2880/GTL-1072

UPnP

s-Flow

Event / Error Log / Syslog

LLDP

IPv6 feature:

- IPv6 host mode
- IPv6 stateless address auto-configuration
- Duplicate address detection (DAD)
- ICMP version6
- IPv6 QoS Prioritize IPv6 packets in hardware

Green Ethernet

IEEE 802.3az Energy Efficient function:

Automatically turns off Ethernet port when detecting link down or Idle of client.

Cable length detection:

- Adjusts the signal strength based on the cable length
- Reduces the power consumption for cables shorter

Hardware

LED Indication

Power LED, Gigabit Port activity LED and SFP Module LED

Dimension

280mm (W) x 166mm (D) x 44mm (H)

Weight

1.382Kg

Power Supply

100-240 VAC 50~60 Hz, internal , universal

Temperature

Operating: 0°C ~ 40°C

Storage: -20°C ~ 70°C

Humidity

Operating: 10% ~ 90% (Non-condensing)

Certifications

CE, FCC

Key Features

- 10 Gigabit Ethernet ports with 2 shared SFP slots
- Single IP management supports up to 32 switches (GTL-2880/GTL-5280/GTL-1072/GTP-2880)
- Easy Configuration Port (ECP) for easy deployment of network devices such as IP phone or network camera
- Managed and deployed at IPv6 network operation
- IEEE 802.1X port-based authentication with Access Control List (ACL) of up to 256 entries for easy network security
- IEEE 802.1s Multiple Spanning Tree Protocol (MSTP) and port mirroring
- Minimize carbon footprint with advanced Energy Efficient Technology (IEEE 802.3az)
- IEEE 802.1Q VLAN allows network segmentation to enhance performance and security
- IEEE 802.3ad LACP for auto port aggregation of up to 5 groups, 10 ports per group
- Supports Dual Firmware image which protects against failed firmware upgrade
- Provides QoS control based on ToS/DSCP for advanced traffic prioritization and bandwidth management
- DDMI SFP transceiver supported

Related Product



GTL-5280

L2 Plus Managed Switch -
48 GE with 4 Combo SFP + 4 10GE SFP+



GTP-2880

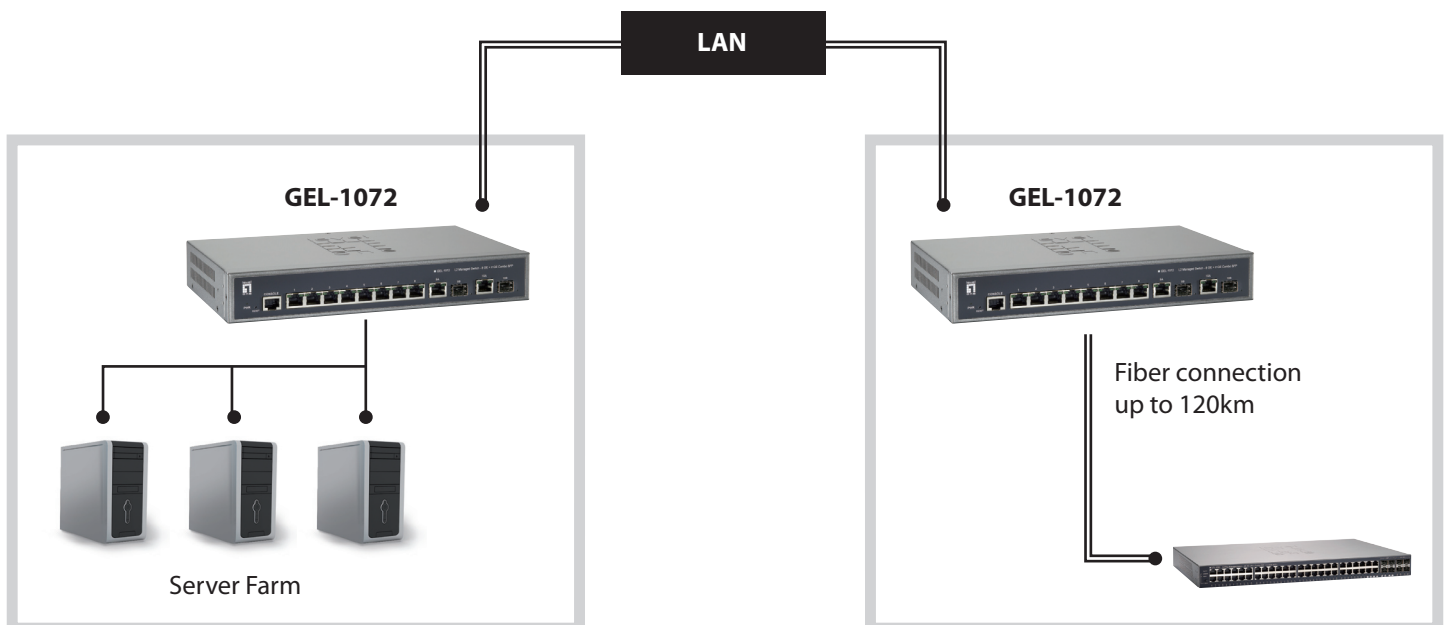
L2 Plus Managed Switch -
24 GE PoE with 4 Combo SFP + 4 10GE SFP+

Product Diagram

— Ethernet Cable (RJ-45)

== Fiber

Virtual stack (SIP) with
GTL-5280, GTL-2880, GTP-2880, GEL-1072



Order Information**GEL-1072:** L2 Managed Switch - 10 GE with 2 Combo SFP**Package Contents**

GEL-1072
 Power Cord
 Mounting Kit
 DB-9 RS-232 to RJ-45 Console Cable
 CD Manual
 QIG (Quick Install Guide)

Optional Accessories

GVT-0300
 1.25Gbps SFP Transceiver,
 Duplex LC connector (550m)



GVT-0301
 1.25Gbps SFP Transceiver,
 Duplex LC connector (10km)



GVT-0302
 1.25Gbps SFP Transceiver,
 Duplex LC connector (80km)



SFP-3001
 1.25Gbps SFP Transceiver,
 Duplex LC connector (550m)



SFP-3211
 1.25Gbps SFP Transceiver,
 Duplex LC connector (10km)



SFP-3611
 1.25Gbps SFP Transceiver,
 Duplex LC connector (80km)



SFP-3111
 1.25Gbps SFP Transceiver,
 Duplex LC connector, MLX
 (2km)



SFP-3411
 1.25Gbps SFP Transceiver, SM,
 EZX, Duplex LC connector
 (120km)



SFP-3711
 1.25Gbps SFP Transceiver, SM,
 EZX, Duplex LC connector
 (120km)



SFP-9221
 1.25Gbps Bi-Di SFP
 Transceiver, SM, Simplex LC
 connector (10km)



SFP-9231
 1.25Gbps Bi-Di SFP
 Transceiver, SM, Simplex LC
 connector (10km)



SFP-9321
 1.25Gbps Bi-Di SFP
 Transceiver, SM, Simplex LC
 connector (20km)



SFP-9331
 1.25Gbps Bi-Di SFP
 Transceiver, SM, Simplex LC
 connector (20km)



SFP-9421
 1.25Gbps Bi-Di SFP
 Transceiver, SM, Simplex LC
 connector (40km)



SFP-9431
 1.25Gbps Bi-Di SFP
 Transceiver, SM, Simplex LC
 connector (40km)