DG-GO4300 Series OLT

USER MANUAL

(WEB Management)

V2.0.1

19-04-2019

As our products undergo continuous development the specifications are subject to change without prior notice.

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Chapter 1 System Description

1.1 Overview

1.1.1 OLT Introduction

The Web management user manual is for the OLTs listed in Table 1-1.

After you have completed installation, connection and commissioning of the equipment, you can start on configuring various services and functions for the equipment.

Products		8 ports GPON OLT
Chassis	Rack	1U 19 inch standard box
1000M Uplink Port	QTY	14
	Copper	8*10/100/1000M auto-negotiation
	SFP (Independent)	6*SFP
10000M Uplink Port	QTY	2
	SFP (Independent)	2*SFP+ (SFP+ is compatible with 10GE)
GPON Port	QTY	8
	Physical Interface	SFP Slots
Management Ports		1*10/100BASE-T out-band port(AUX), 1*CONSOLE port

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Management Mode	SNMP, WEB, Telnet and CLI

1.1.2 PC System Requirement

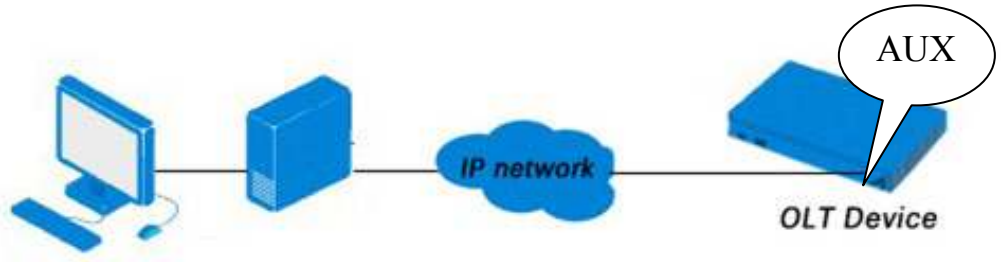
Table 1-2 PC System requirement

CPU	Memory	DISK	Video Card	Operating System
Frequency above 2GHz	2GB Or above	10GB disk space	65000 color resolving capability 1024*768 and above	Windows2008 Windows XP Windows 7 Windows 8 Windows 10

1.2 Connection

Connect the OLT AUX port to IP network. The OLT default management IP is 192.168.8.200.

Please set your PC IP to192.168.8.XXX (e.g.192.168.8.123).



Chapter 2 OLT Information

2.1 Login

Follow the steps to login:

1. Conform “1.2 Connection” to connect;

2. The device default IP address is 192.168.8.200;

3. Open your web browser, type the device IP in address bar;

4. Entry of the username and password will be prompted. Enter the default login User Name and Password. Both the username and password are "**admin**" by default.

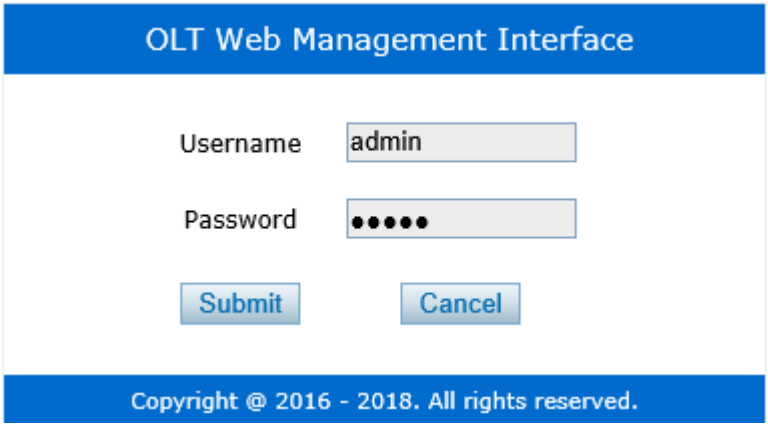


Figure 2-1: Login

2.2 Device Information

The OLT ports connection status are shown in the top of the interface, and about the OLT basic information.

OLT Information→Device Information

This part shows the OLT information such as system name, serial number, hardware version, firmware version, MAC address and system time. The system name can be modified if needed.

Figure 2-2: Device Information

Chapter 3 OLT Configuration

This section is about the basic service of OLT configuration.

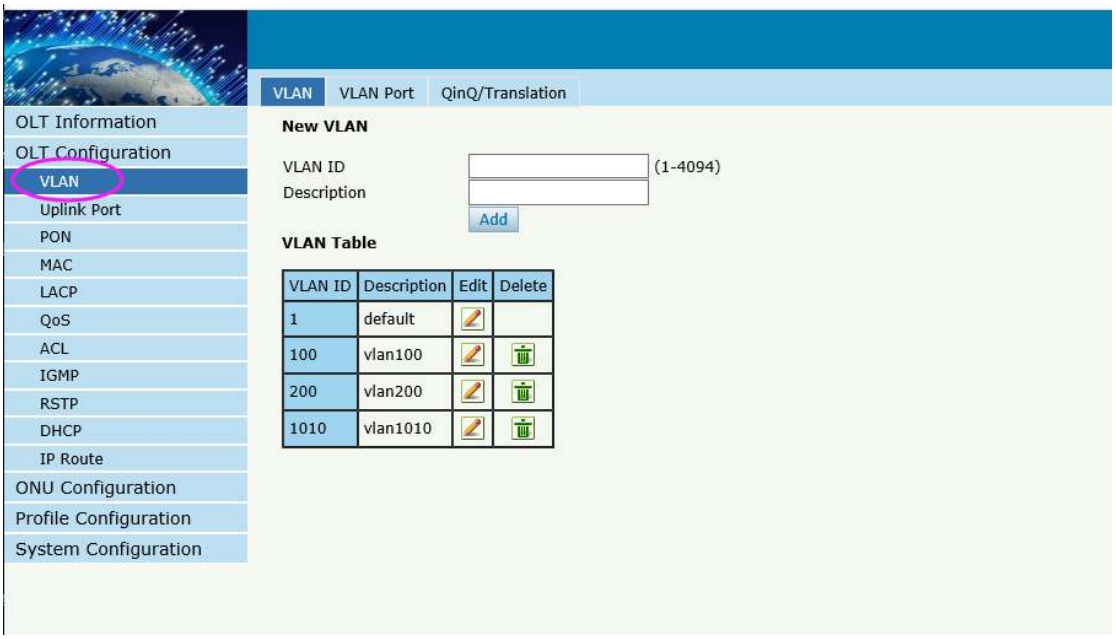
3.1 VLAN

OLT equipment switch engine is fully compliant with the IEEE 802.1Q VLAN standard and has the following main features:

- Support Port-based VLAN and IEEE 802.1Q VLAN.
- Support full 4K VLAN group, VID range 1~4095.

All switch ports, including uplink ports and downlink ports, support VLAN partition.

VLAN 1 is the system reserved VLAN, it includes all switch ports which are UNTAG mode.



3.1.1 Create VLAN

OLT Configuration→VLAN

In this user interface, we can create new VLANs.

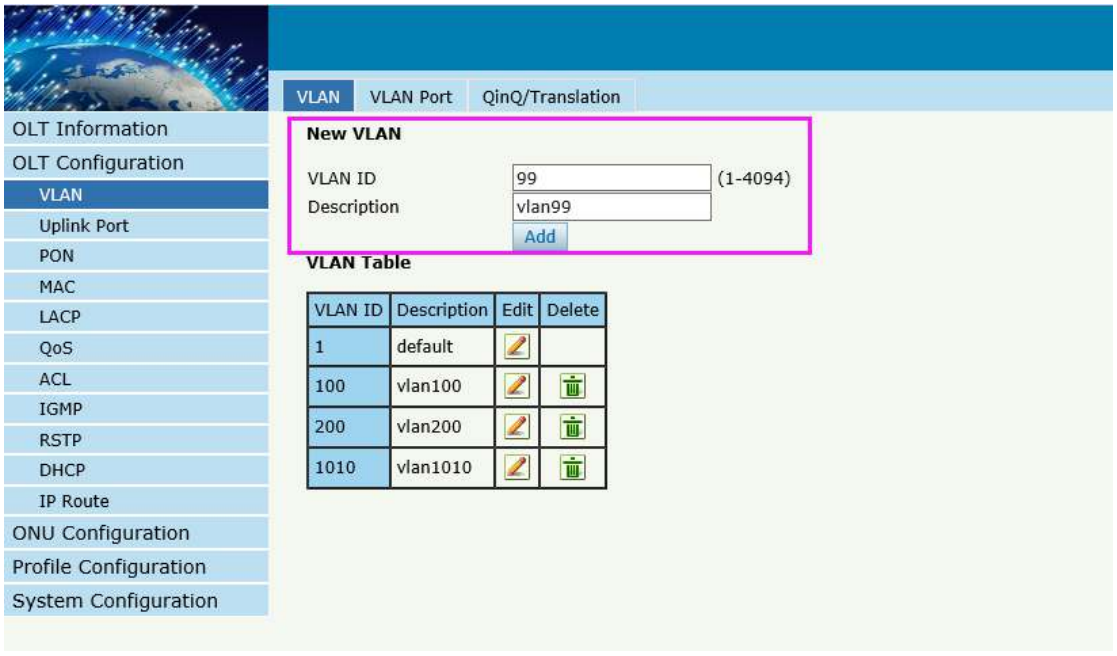


Figure 3-1: Create New VLAN

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3.1.2 VLAN Port

OLT Configuration →VLAN→VLAN Port.

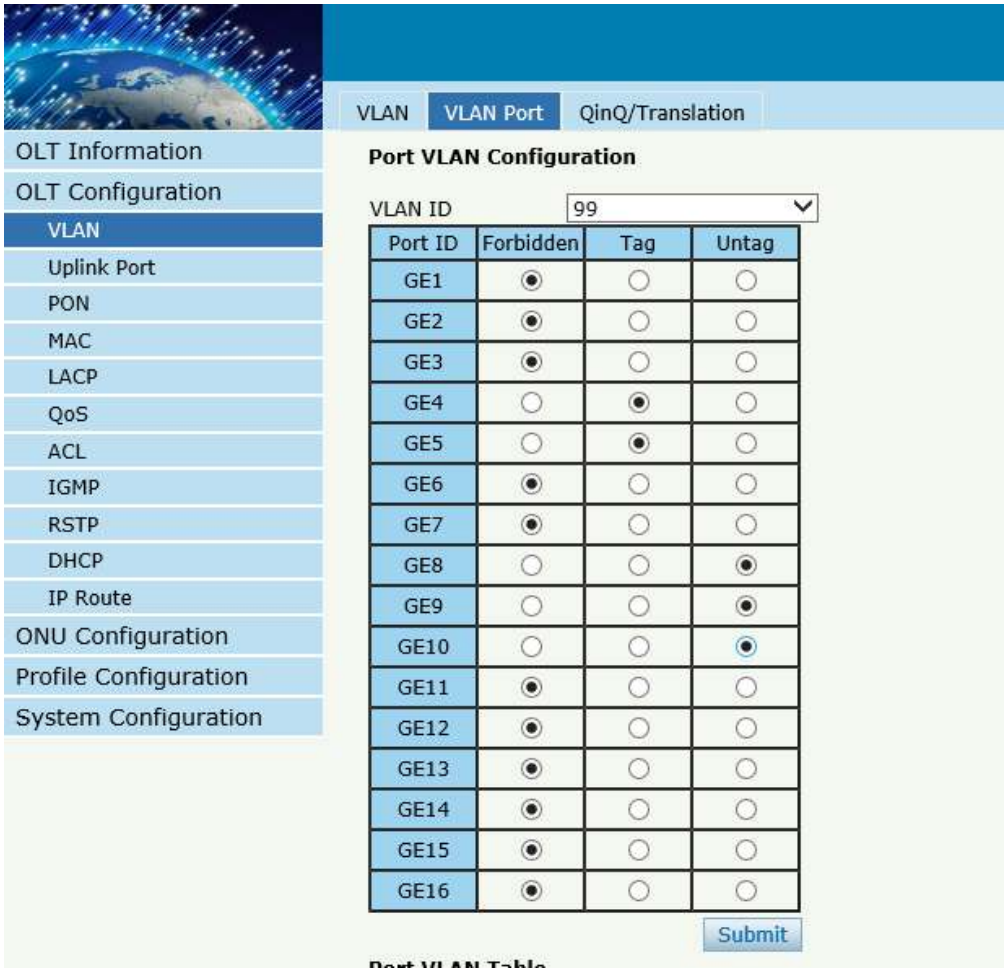

Figure 3-2: Add VLAN Port

3.1.3 QinQ/Translation

OLT Configuration→VLAN→QinQ/Translation

In this user interface, VLAN QinQ and VLAN translation can be configured. VLAN QinQ and translation are effective for ingress.

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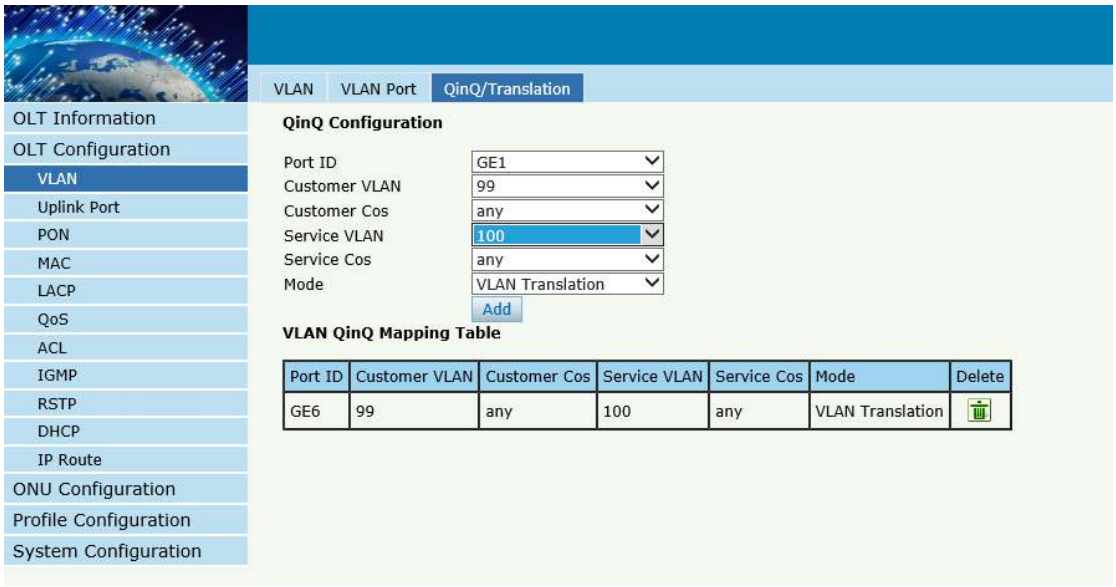

Figure 3-3: QinQ/Translation Configuration

3.2 Uplink Port

GE ports traffic statistics and basic configuration setting.

3.2.1 Information

OLT Configuration→Uplink Port→Information

This user interface displays traffic statistics of uplink ports.

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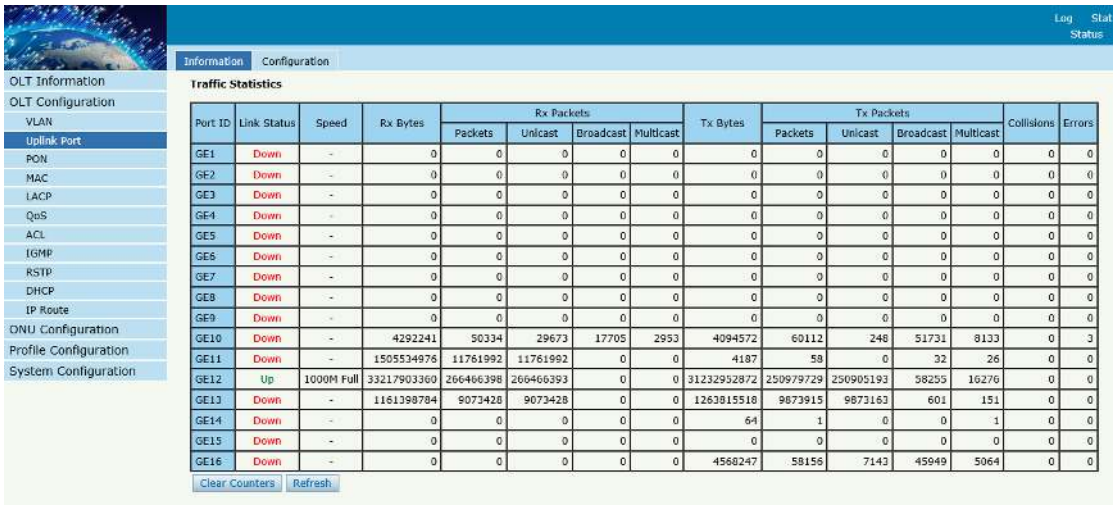


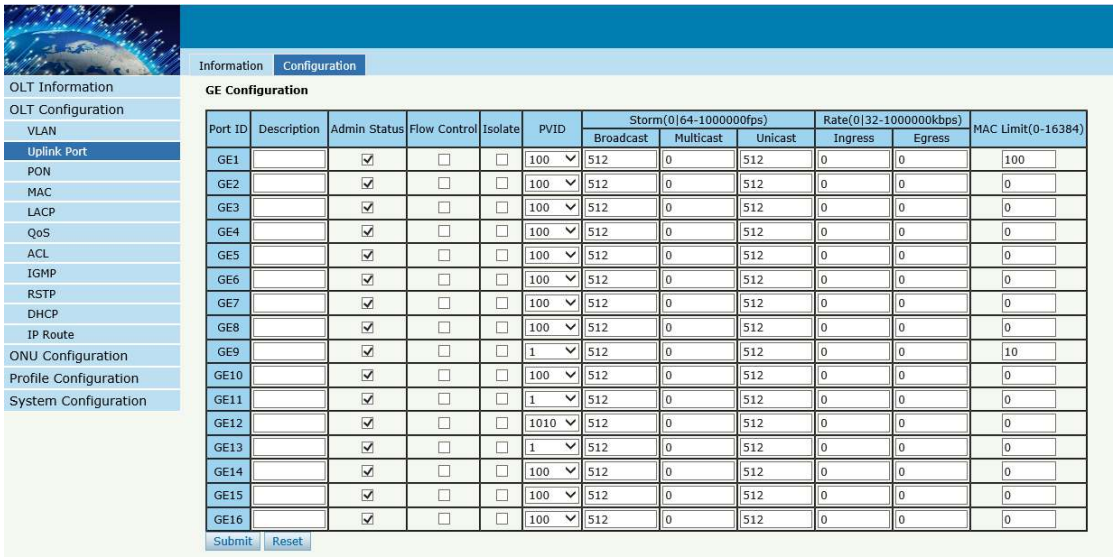
Port ID	Link Status	Speed	Rx Bytes	Rx Packets				Tx Bytes	Tx Packets				Collisions	Errors
				Packets	Unicast	Broadcast	Multicast		Packets	Unicast	Broadcast	Multicast		
GE1	Down	-	0	0	0	0	0	0	0	0	0	0	0	0
GE2	Down	-	0	0	0	0	0	0	0	0	0	0	0	0
GE3	Down	-	0	0	0	0	0	0	0	0	0	0	0	0
GE4	Down	-	0	0	0	0	0	0	0	0	0	0	0	0
GE5	Down	-	0	0	0	0	0	0	0	0	0	0	0	0
GE6	Down	-	0	0	0	0	0	0	0	0	0	0	0	0
GE7	Down	-	0	0	0	0	0	0	0	0	0	0	0	0
GE8	Down	-	0	0	0	0	0	0	0	0	0	0	0	0
GE9	Down	-	0	0	0	0	0	0	0	0	0	0	0	0
GE10	Down	-	4292241	50334	29673	17705	2953	4094572	60112	248	51731	8133	0	0
GE11	Down	-	1505534976	11761992	11761992	0	0	4187	58	0	32	26	0	0
GE12	Up	1000M Full	33217903360	266466398	266466393	0	0	31232952872	250979729	250905193	58255	16276	0	0
GE13	Down	-	1161398784	9073428	9073428	0	0	1263815518	9873915	9873163	601	151	0	0
GE14	Down	-	0	0	0	0	0	64	1	0	0	1	0	0
GE15	Down	-	0	0	0	0	0	0	0	0	0	0	0	0
GE16	Down	-	0	0	0	0	0	4568247	58156	7143	45949	5064	0	0

Figure3-4 : GE Traffic Statistics

3.2.2 Configuration

OLT Configuration→Uplink Port→Information

This user interface is used to configure port related functions and characteristic parameters of uplink port, such as port attributes, PVID, flow control, rate limit, storm inhibition, port isolation and so on.



Port ID	Description	Admin Status	Flow Control	Isolate	PVID	Storm(0|64-1000000fps)			Rate(0|32-1000000kbps)		MAC Limit(0-16384)
						Broadcast	Multicast	Unicast	Ingress	Egress	
GE1		☑	☐	☐	100	512	0	512	0	0	100
GE2		☑	☐	☐	100	512	0	512	0	0	0
GE3		☑	☐	☐	100	512	0	512	0	0	0
GE4		☑	☐	☐	100	512	0	512	0	0	0
GE5		☑	☐	☐	100	512	0	512	0	0	0
GE6		☑	☐	☐	100	512	0	512	0	0	0
GE7		☑	☐	☐	100	512	0	512	0	0	0
GE8		☑	☐	☐	100	512	0	512	0	0	0
GE9		☑	☐	☐	1	512	0	512	0	0	10
GE10		☑	☐	☐	100	512	0	512	0	0	0
GE11		☑	☐	☐	1	512	0	512	0	0	0
GE12		☑	☐	☐	1010	512	0	512	0	0	0
GE13		☑	☐	☐	1	512	0	512	0	0	0
GE14		☑	☐	☐	100	512	0	512	0	0	0
GE15		☑	☐	☐	100	512	0	512	0	0	0
GE16		☑	☐	☐	100	512	0	512	0	0	0

Figure3-5: Uplink Ports Configuration

Illustrations of each parameter:

Parameters	Illustration
Port ID	GE port has two types, fiber SFP (GE1 to GE8) and copper (GE9 to GE16).
Description	Descriptions or remarks of port.
Admin Status	Active or inactive status of port. It is "Enable" by default.
Flow Control	Enable or disable flow control function of uplink port to control congestion. It is "disable" by default.
Isolate	Port isolation with each other.
PVID	Default VLAN ID of the port.
Broadcast	Broadcast storm inhibition.
Multicast	Multicast storm inhibition.
Unknown Unicast	Unknown unicast storm inhibition.
Ingress Rate	Port ingress rate.
Egress Rate	Port egress rate.
MAC limit	Number of mac

3.3 PON

3.3.1 Information

OLT Configuration→PON→Information

This user interface is used to display parameters of PON port, such as PON module port current temperature, voltage, current, transmit power and the traffic statistics.

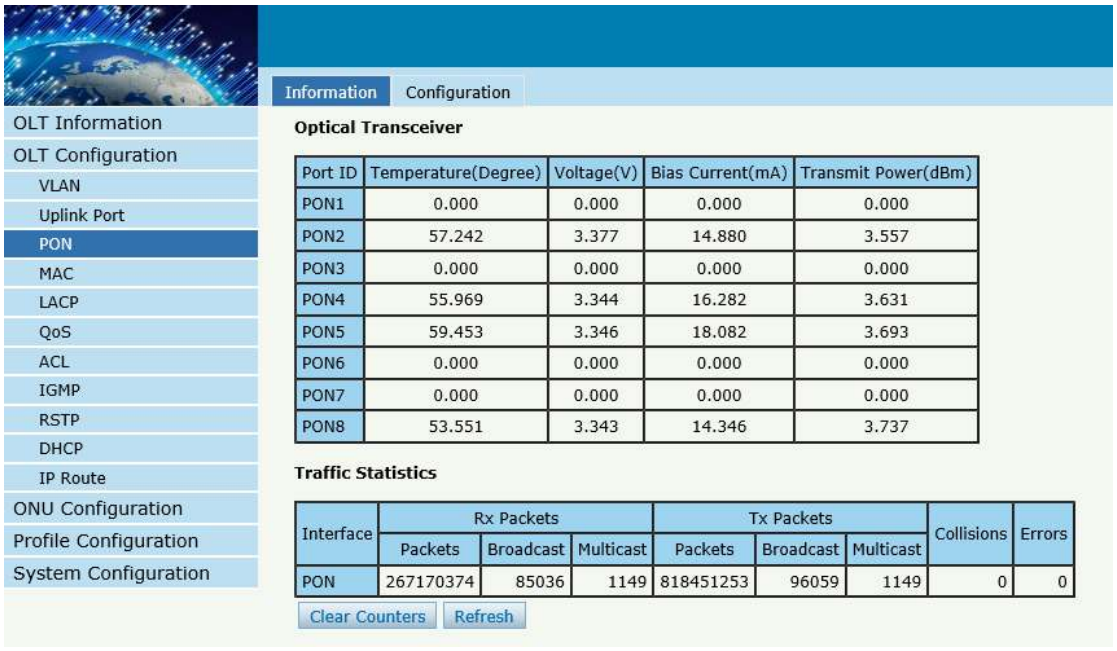


Figure3-6: PON Information

3.3.2 Configuration

OLT Configuration→PON→Configuration

This user interface is used to configure port status

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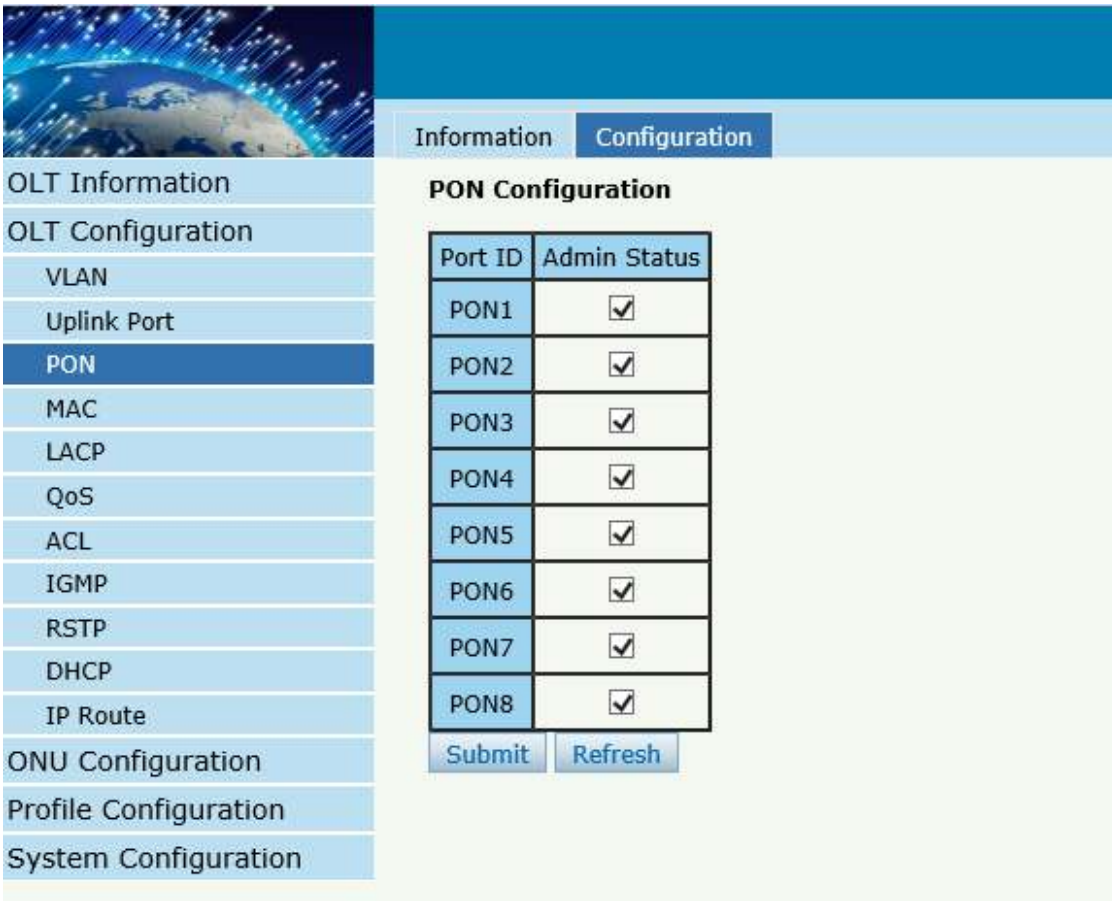

Figure3-7: PON configuration

3.4 MAC

In this section, you can check MAC address table of OLT, set MAC aging time and MAC limit of the ports.

3.4.1 MAC Table

OLT Configuration→MAC→MAC Table

This table displays MAC addresses learned by OLT at PON and GE port.

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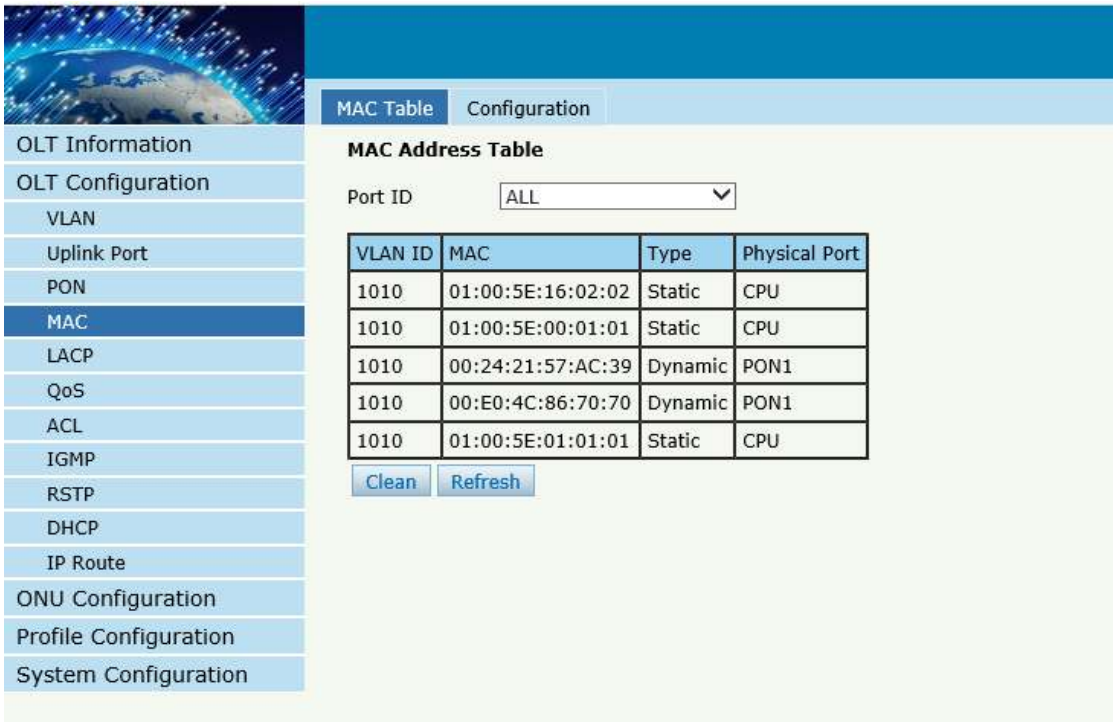

Figure3-8: MAC Address Table

3.4.2 Configuration

OLT Configuration→MAC→Configuration

The default MAC aging time of OLT is 300s, user can change the value between 10~1000000s. Also, user can add the MAC to the OLT manually.

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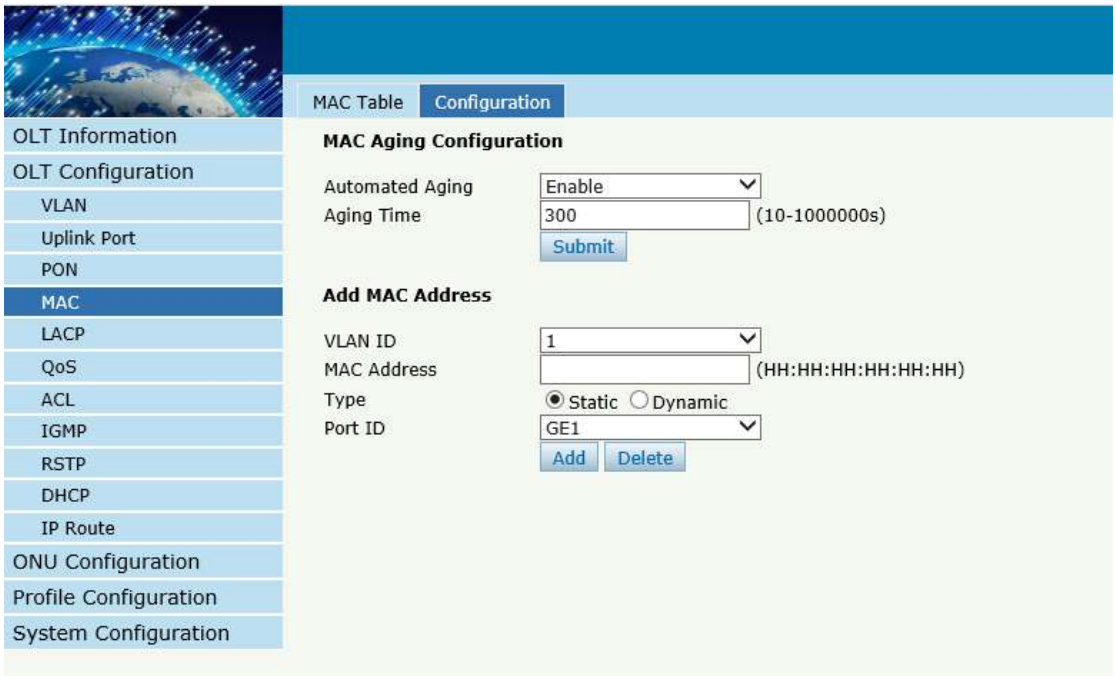

Figure 3-9:MAC Configuration

3.5 LACP

OLT Configuration→LACP→Static LACP

To assign and configure an uplink physical interface to an Ether Channel. When a link fails due to some reason, traffic will switch to another link automatically. The group range is from 1 to 4.Each group can add maximum of 4 ports. Only GE ports can be added in the channel groups.

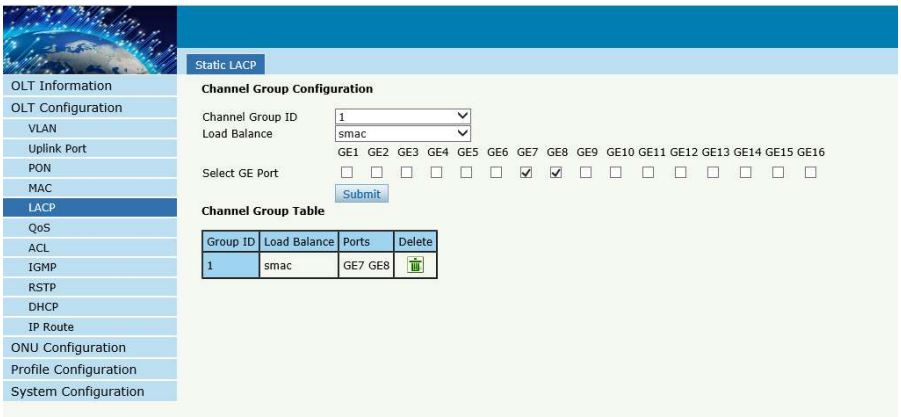

Figure 3-10: Create Static LACP

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3.6 QOS

OLT Configuration→QOS

When bandwidth is not enough or there is congestion in the network, queue scheduling can make sure high priority data traffic passes through the device firstly. Traffic will map to queues according to their priorities and transmit in the queues.

OLT supports eight queues altogether. Queue scheduling mode includes strict priority (SP), weighted round robin (WRR) and hybrid mode (SP-WRR).

Strict priority scheduling guarantees high priority traffic occupy as much as bandwidth. The lower priority traffics pass though only when there is remaining bandwidth.

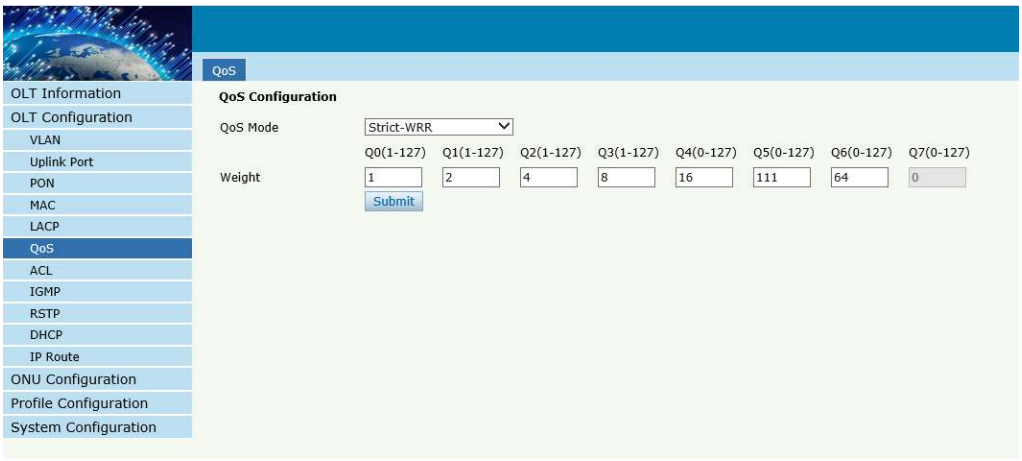

Figure 3-11: QOS Configuration

3.7 ACL

In order to filter data packages, network equipment need to setup a series of rules for identifying what need to be filtered. Only when matched with the rules the data packages can be filtered. ACL can achieve this function. Matched conditions of ACL rules can be source address, destination address, Ethernet type, VLAN, protocol port, and so on. These ACL rules also can be used in other situations, such as classification of stream in QoS. An ACL rule may contain one or several sub-rules, which have different matched conditions.

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This device supports the following types of ACL.

3.7.1 IP Filter

The filter is based on the IP address, including the source IP address and destination IP address.

OLT Configuration→ACL→IP Filter

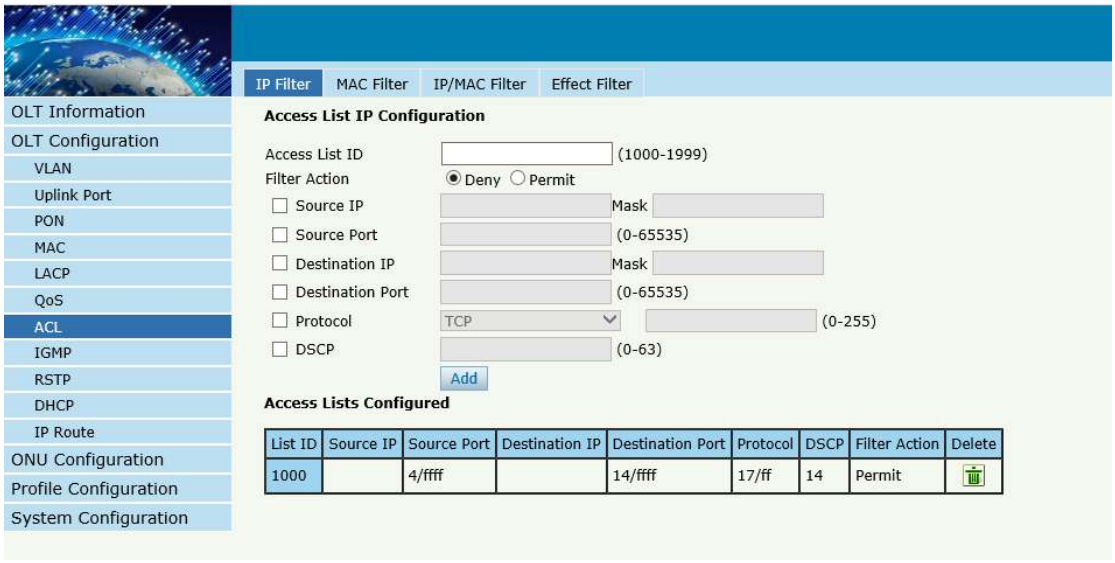

Figure 3-12: IP Filter

3.7.2 MAC Filter

The filter is based on the MAC address, including source MAC address and destination MAC address.

OLT Configuration→ACL→MAC Filter

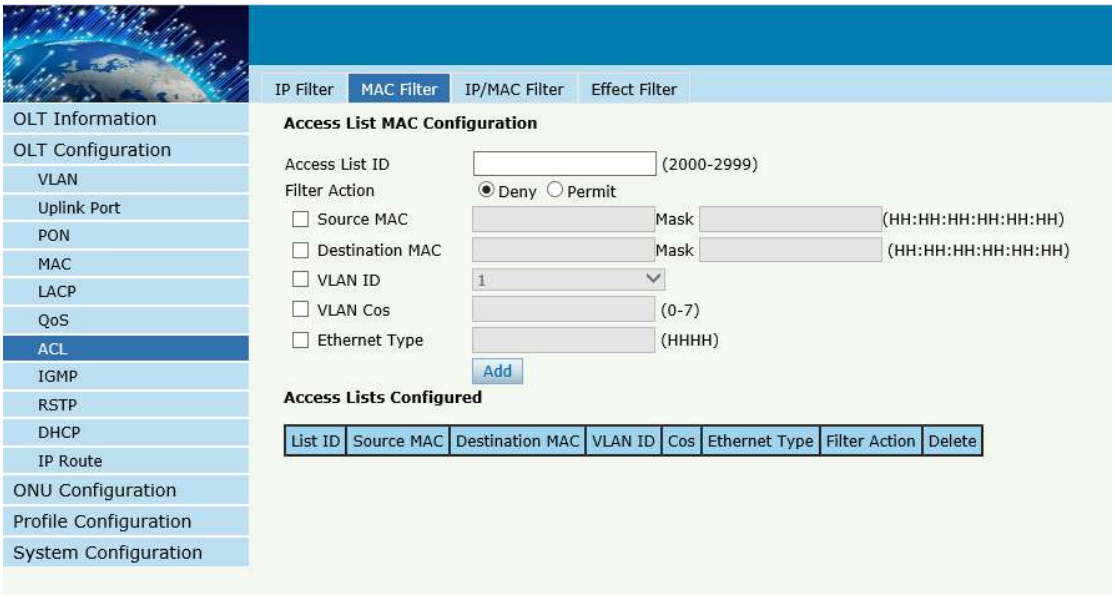

Figure 3-13: MAC Filter

3.7.3 IP/MAC Filter

OLT Configuration→ACL→IP/MAC Filter

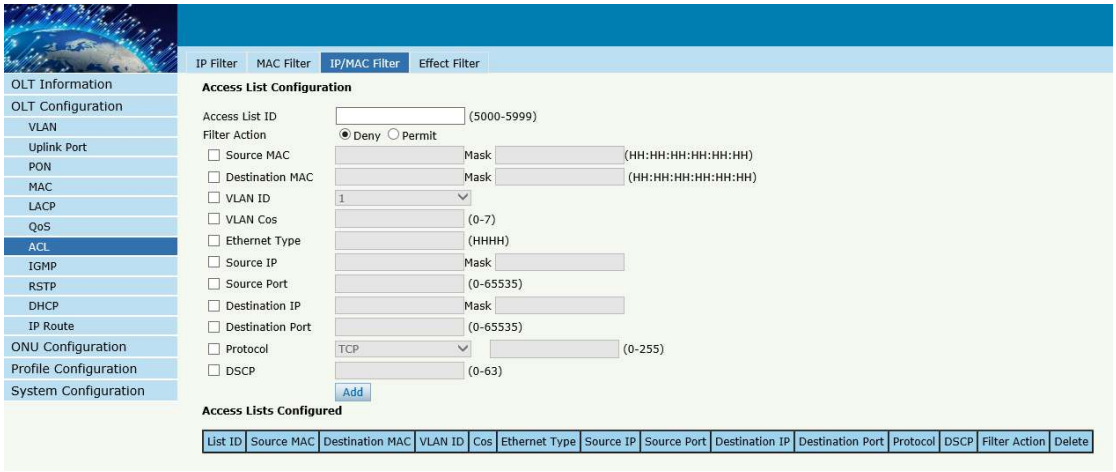

Figure 3-14 IP/MAC Filter

3.7.4 Effect Filter

Bind the access list to the ports. Each access list can be bound to several ports.

OLT Configuration→ACL→Effect Filter

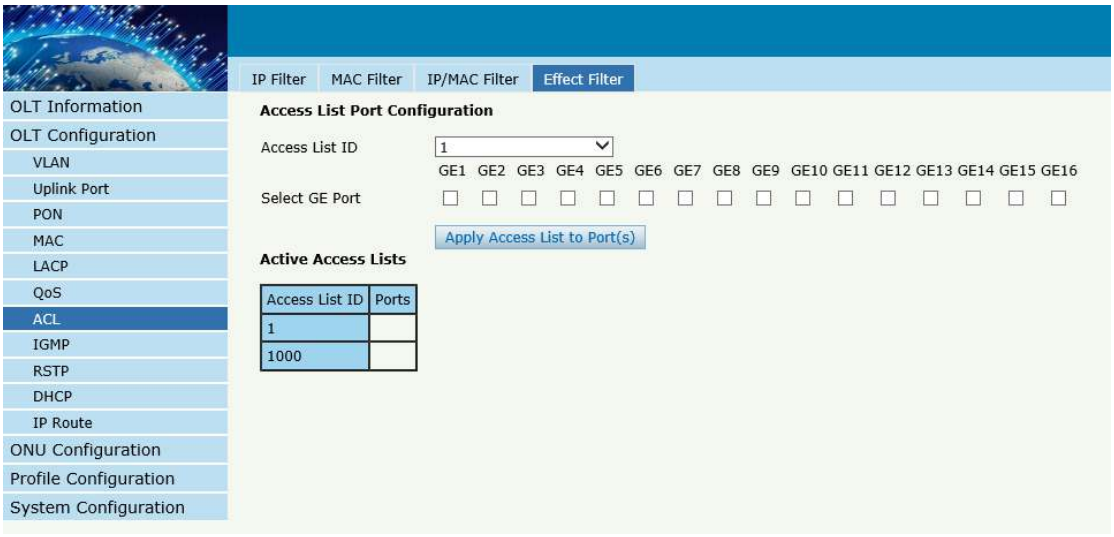

Figure 3-15: Bind Security Filter

3.8 IGMP

3.8.1 Group Member

When there is a multicast group produced, the group will display in this table.

OLT Configuration→IGMP→Group Member

Figure 3-16: Group Member

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3.8.2 Global

OLT Configuration →IGMP→Global.

IGMP basic configuration mainly contains parameters of query packet.

When IGMP status is checked, OLT works in IGMP snooping mode. IGMP snooping is the process of listening to Internet Group Management Protocol (IGMP) network traffic. The feature allows a network switch to "listen in" on the IGMP conversation between hosts and routers. By listening to these conversations, the switch maintains a map of which devices need which IP multicast streams. Multicasts may be filtered from the ports which do not need them and thus controls which ports receive specific multicast traffic. When IGMP status is disable, OLT works in transparent mode.

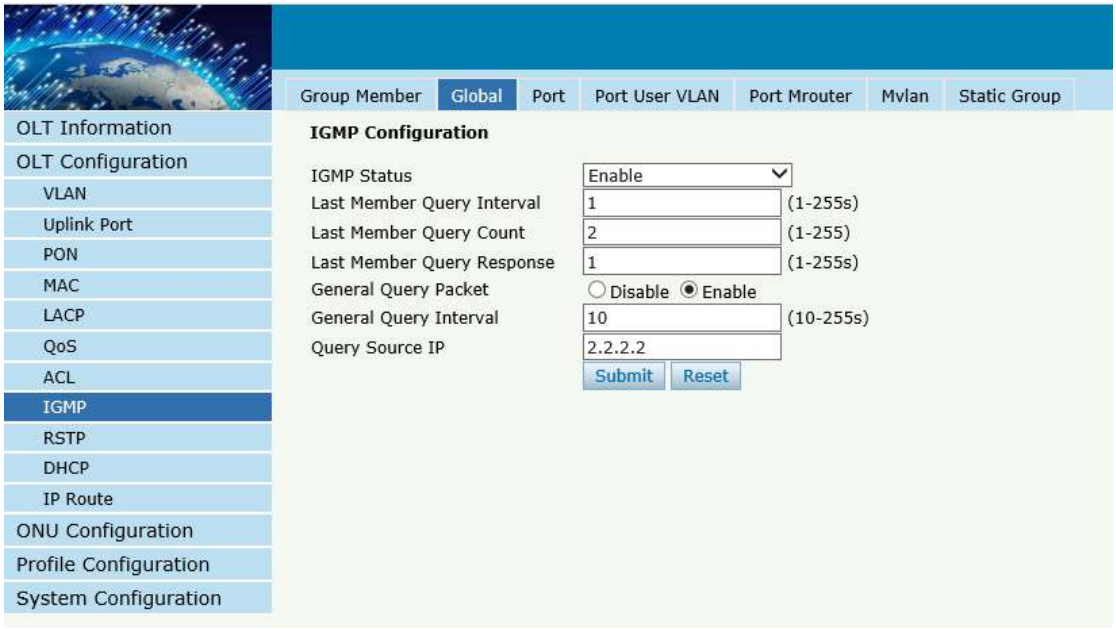

Figure 3-17: IGMP Global

3.8.3 Port

OLT Configuration →IGMP→Port.

This configuration is used to set the maximum number of multicast groups, filter and fast leave mode.

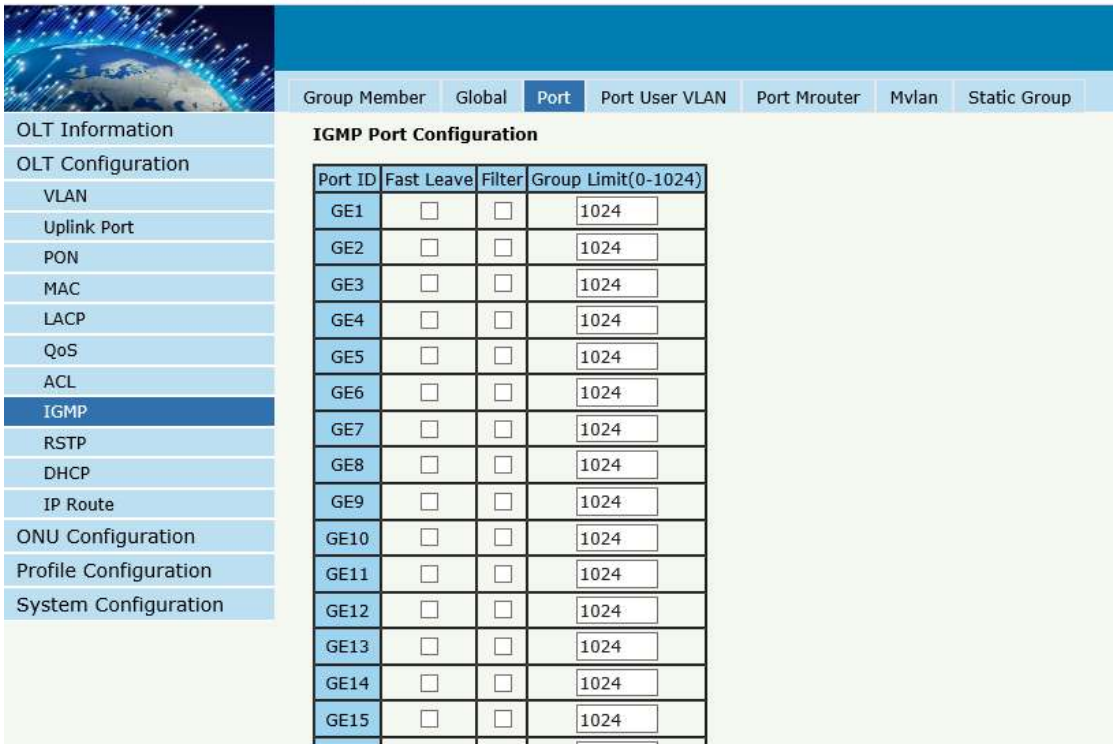

Figure 3-18: IGMP Port

3.8.4 Port User VLAN

OLT Configuration →IGMP→Port User VLAN

This configuration is used to configure IGMP VLAN for OLT. Generally, PON ports should be configured and user VLAN and group VLAN are the same. If user VLAN and group VLAN are different, multicast VLAN will be translated.

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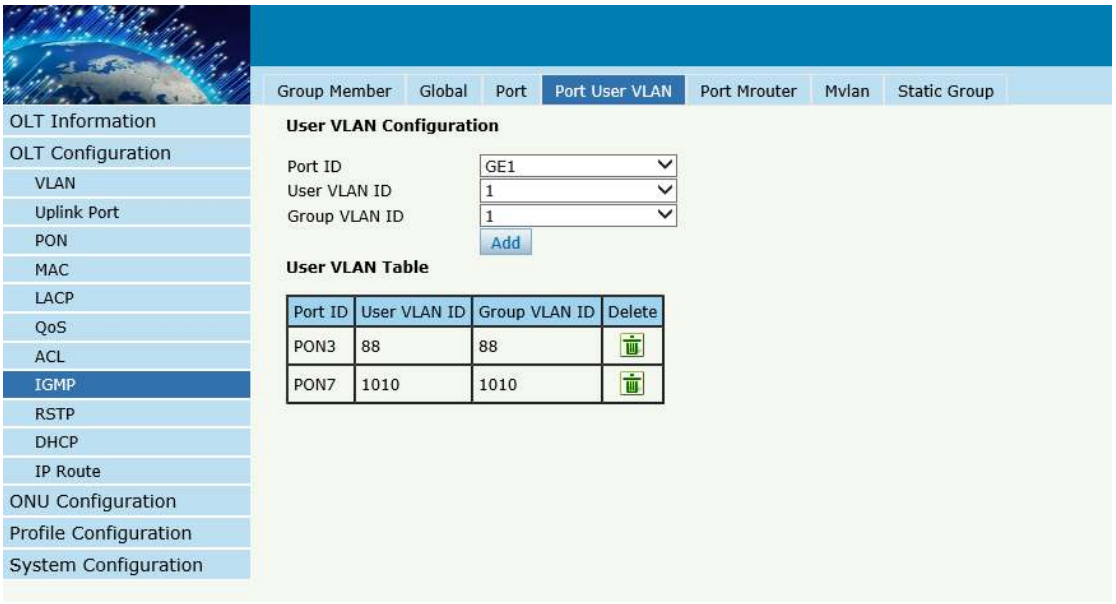

Figure 3-19: IGMP Port User VLAN

3.8.5 Port Mrouter

OLT Configuration →IGMP→Port Mrouter

Multicast router port is used to transmit IGMP signal messages. Generally, OLT uplink ports should be set as multicast router ports.

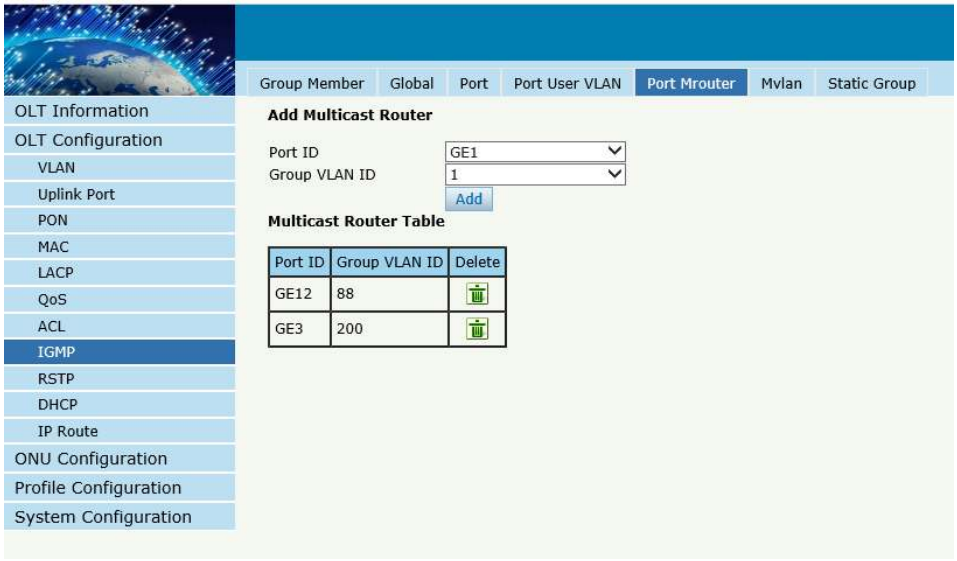

Figure 3-20: IGMP Port Mroute

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3.8.6 Mvlan

OLT Configuration →IGMP→Mvlan

This configuration is used to configure Mvlan and its mode.

IGMP mode	Unknown multicast	Igmp packet
Snooping	drop	trap –to -cpu
Disable(transparent)	forward	forward

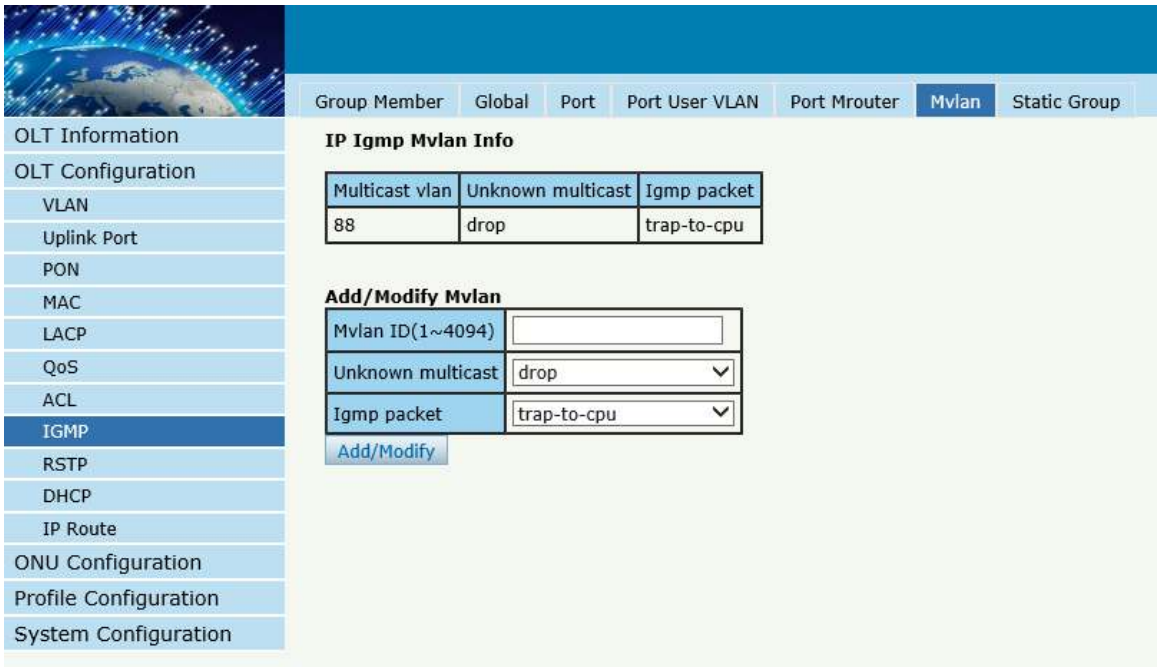

Figure 3-21: IGMP MVLAN

3.8.7 Static Group

OLT Configuration →IGMP→Static Group

This configuration is used to bind multicast IP address and VLAN ID.

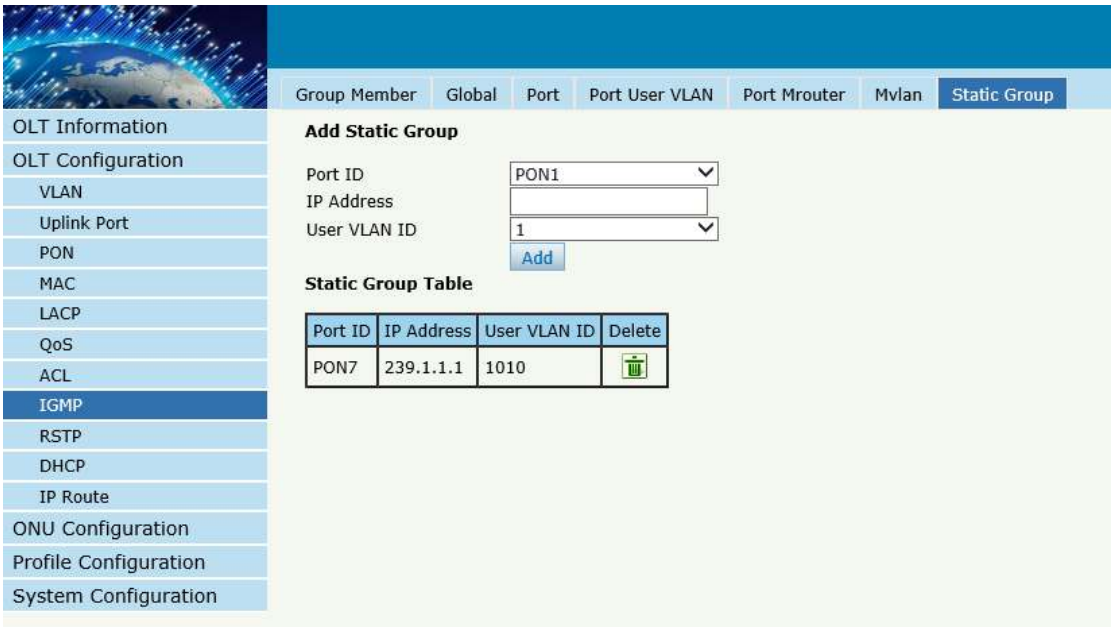

Figure 3-22: IGMP Static Group

3.9 RSTP

Spanning Tree Protocol is layer2 protocol, which is used to eliminate network loops by blocking network redundant links selectively. It has the feature of link backup as well.

3.9.1 Information

OLT Configuration→RSTP→Information

Global information mainly displays RSTP parameters of root bridge device.

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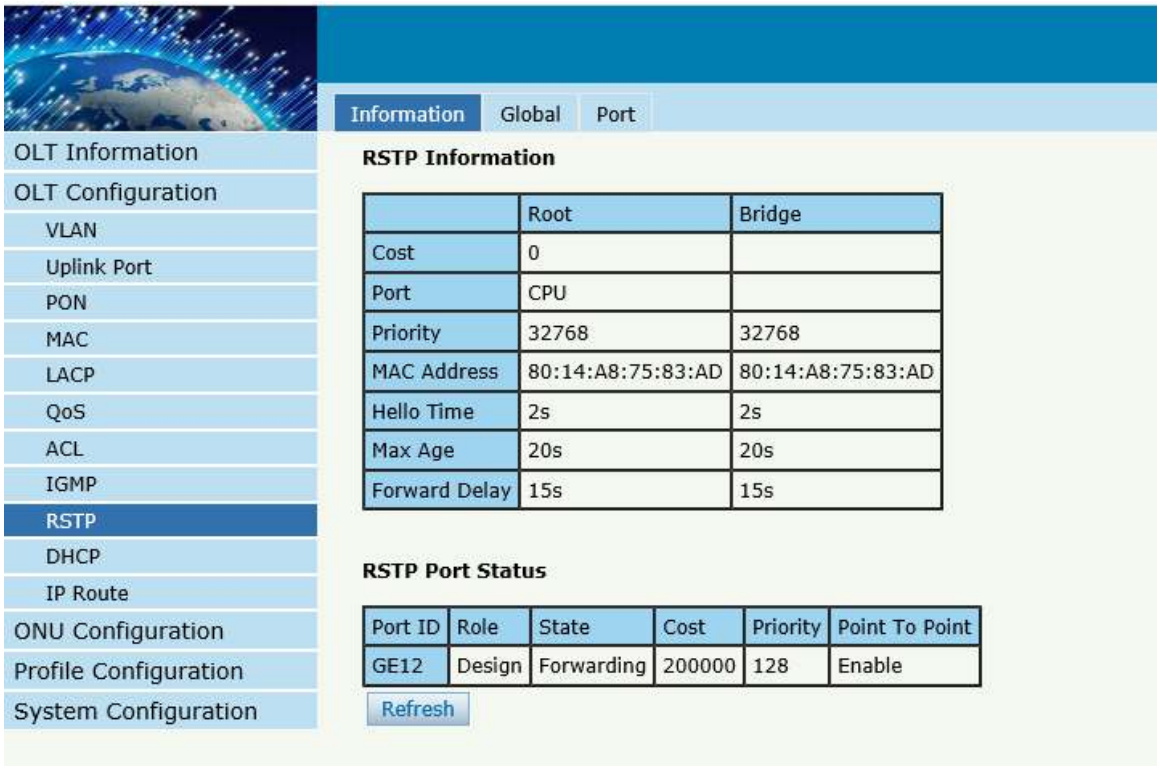

Figure 3-23:RSTP Information

3.9.2 Global

OLT Configuration→RSTP→Global

This configuration is used to set RSTP parameters of the device, which contains RSTP switch priority, hello time, max age, forward delay and MAC address.

Figure 3-24: RSTP Global Setup

3.9.3 Port

OLT Configuration→RSTP→Port .

This user interface is used to set port RSTP parameters which contain RSTP switch, priority, cost, edge port and point to point port.

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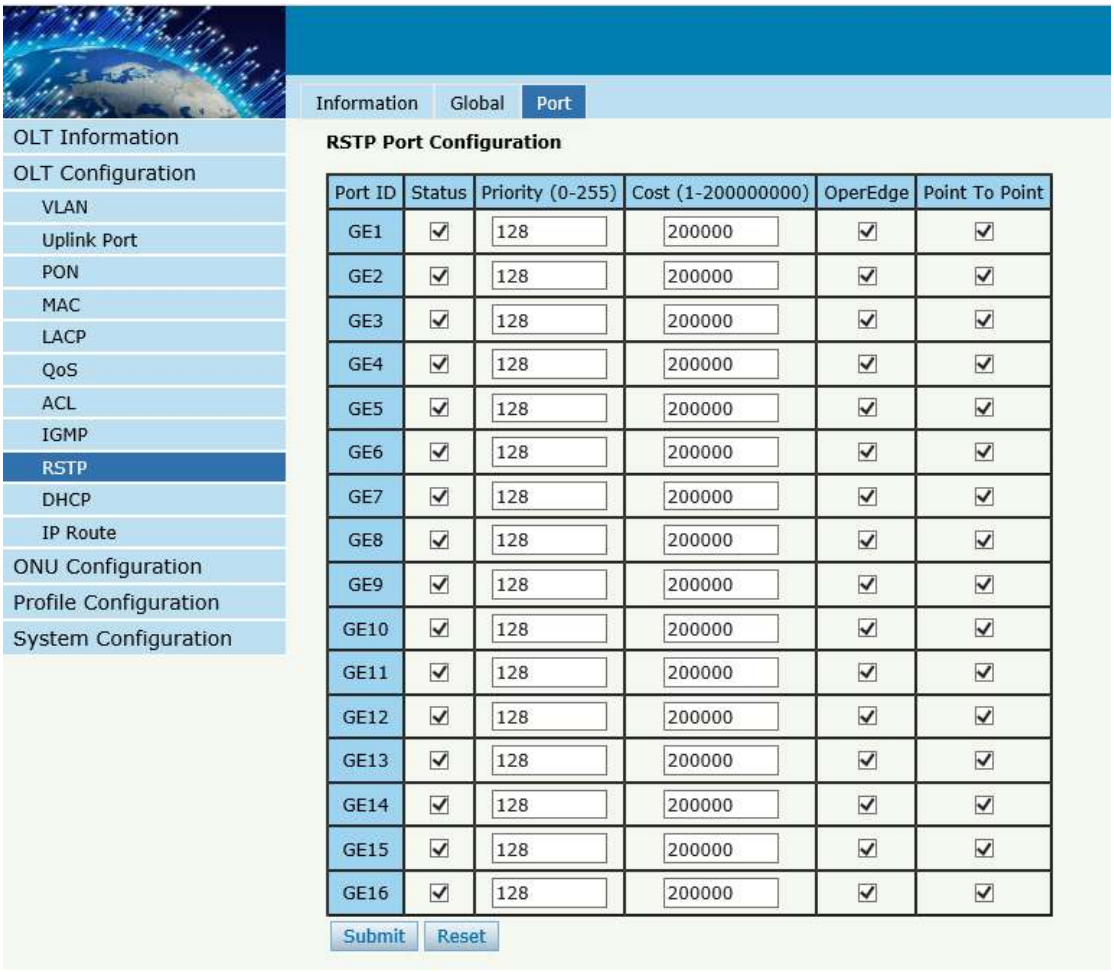

Figure 3-25: RSTP Port Setting

3.10 DHCP

OLT can support the following DHCP functions.

- DHCP Server
- DHCP Relay
- DHCP Snooping

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3.10.1DHCP Server

3.10.1.1 DHCP Lease

OLT Configuration→DHCP→DHCP Server→Lease

This table displays IP addresses assigned and their MAC addresses and lease time.

Figure 3-26: DHCP Lease

3.10.1.2 DHCP Configuration

OLT Configuration→DHCP→DHCP Server→Configuration

Sometimes the devices need dynamic IP addresses, but there is no special DHCP server in network. These configurations can solve the problem. OLT will be a DHCP server in network and assign IP addresses to other devices.

Before enabling DHCP server, you must configure IP address for the VLAN.

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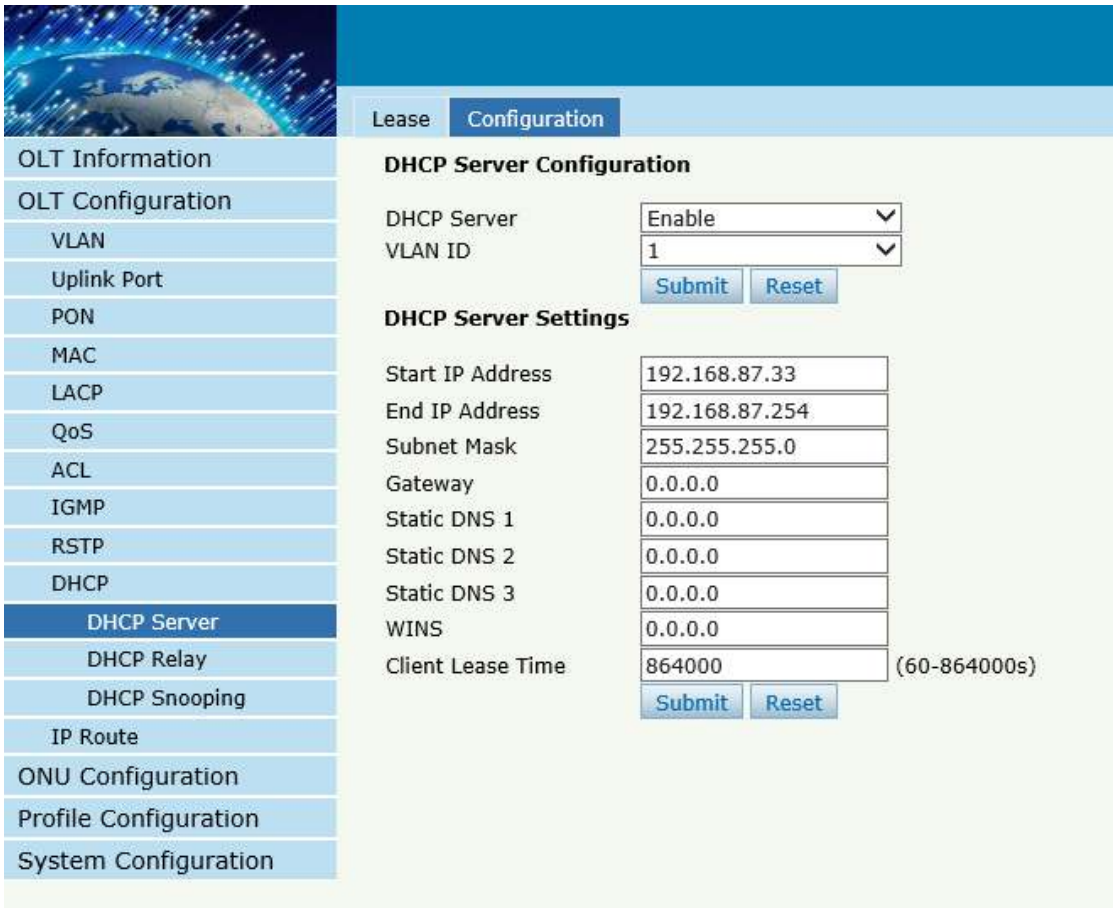

Figure 3-27:DHCP Configuration

3.10.2 DHCP Relay

3.10.2.1 DHCP Relay Configuration

OLT Configuration→DHCP→DHCP Relay

Because the DHCP service exists in one broadcast domain, the server and the client are usually in the same network segment. DHCP relay can solve the issue that DHCP server and client do not exist in the same network segment.

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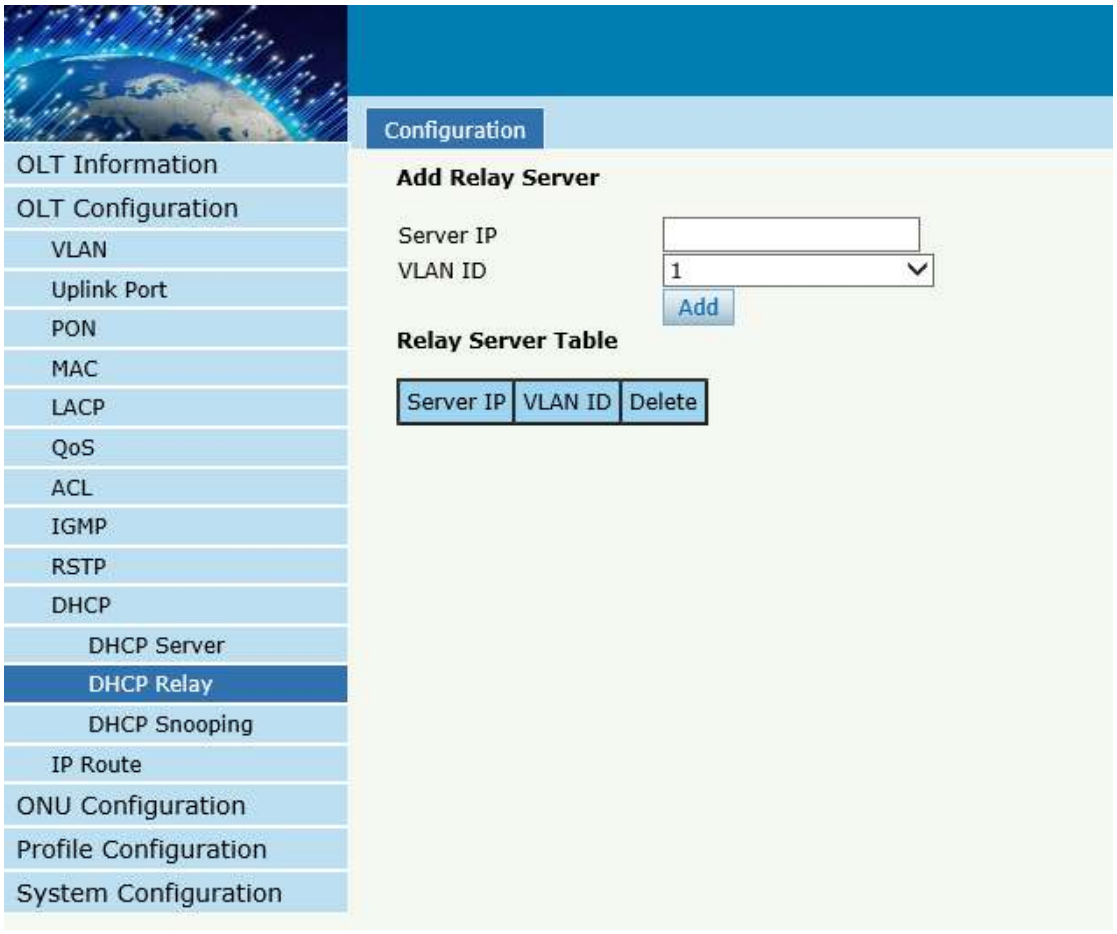

Figure 3-28:DHCP Relay Configuration

3.10.3 DHCP Snooping

3.10.3.1 DHCP Snooping Bind List

OLT Configuration→DHCP→DHCP Snooping→Bind List

The static bind of the DHCP Snooping will be shown ,

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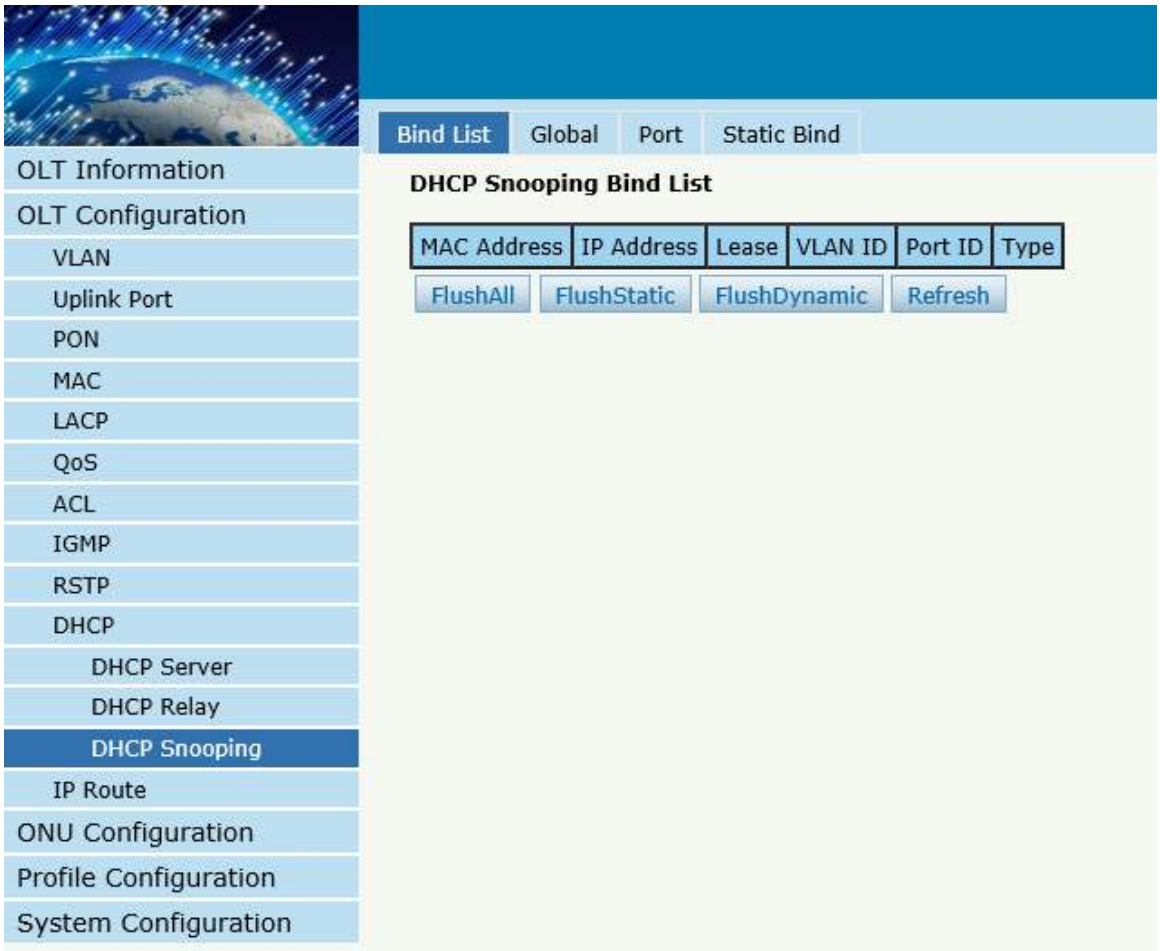

Figure 3-29:DHCP Snooping Bind List

3.10.3.2 Global

OLT Configuration→DHCP→DHCP Snooping→Global

DHCP Snooping is used to prevent the DHCP message attacking and guarantee network to get a correct IP address.

DHCP snooping global configuration mainly contains option 82 settings, DHCP traffic rate limit and snooping VLAN.

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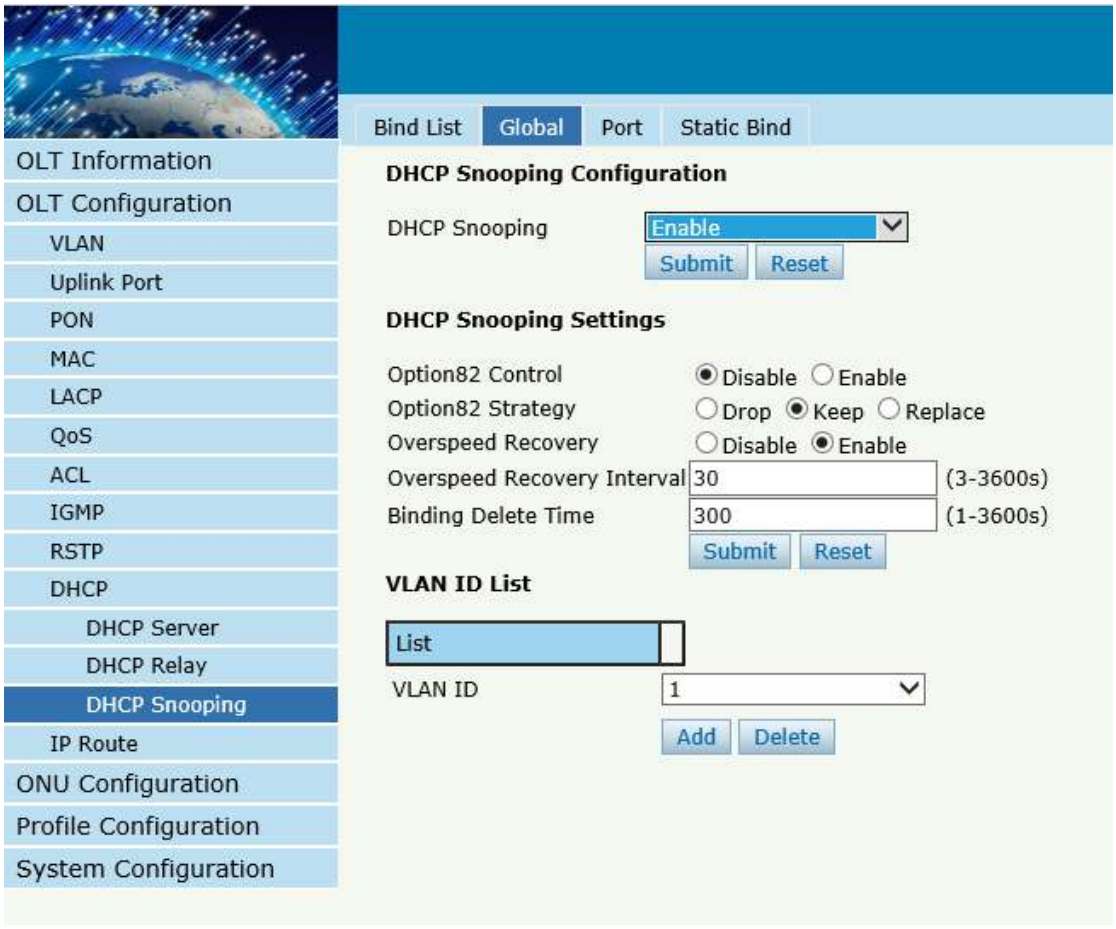

Figure 3-30:DHCP Snooping Global

3.10.3.3 Port

OLT Configuration→DHCP→DHCP Snooping→Port

This user interface is used to configure DHCP snooping parameters of ports which contain port type, option 82 parameters and rate limit.

All the ports are untrust ports by default. Option82 parameters, “Option 82 Circuit ID” and “Option 82 Remote ID”, are effective for untrust ports. “Limit Rate” is the ports’ max speed of receiving DHCP packets.

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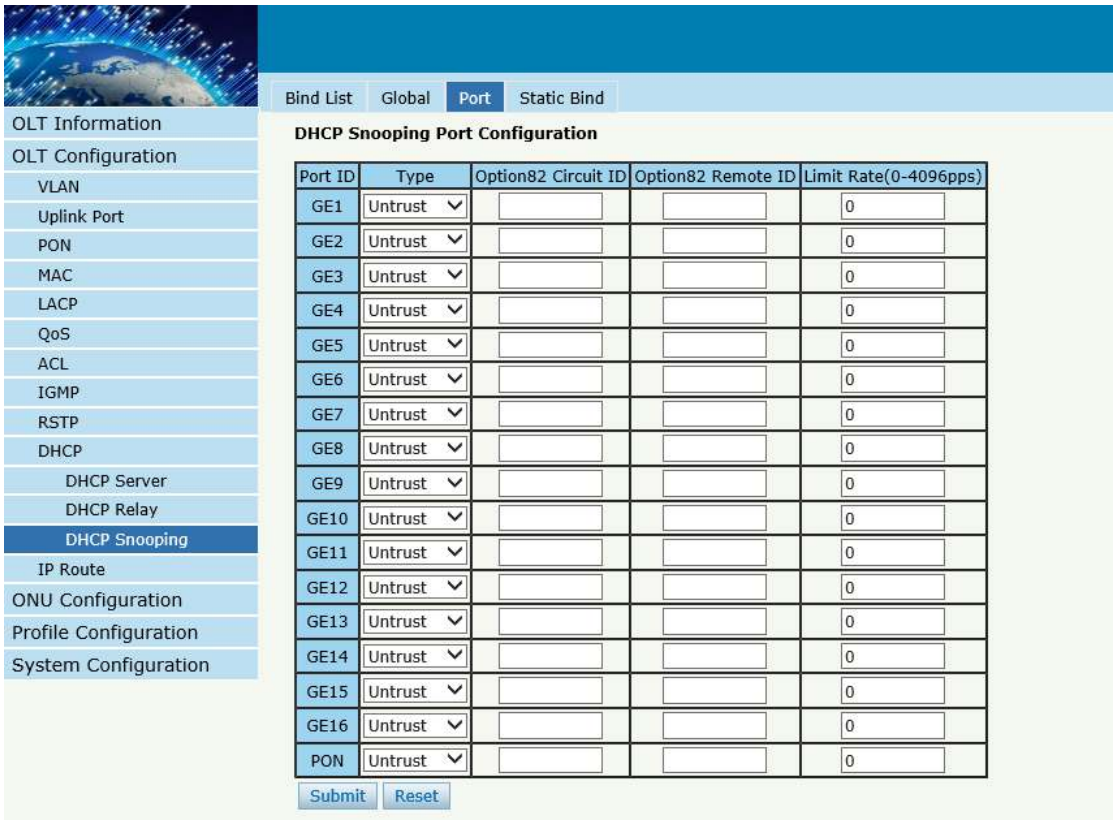

Figure 3-31:DHCP Snooping Port Setup

3.10.3.4 Static Bind

OLT Configuration→DHCP→DHCP Snooping→Static Bind

DHCP snooping binding is useful when a host needs a fixed IP address assigned by DHCP server from the specific port.

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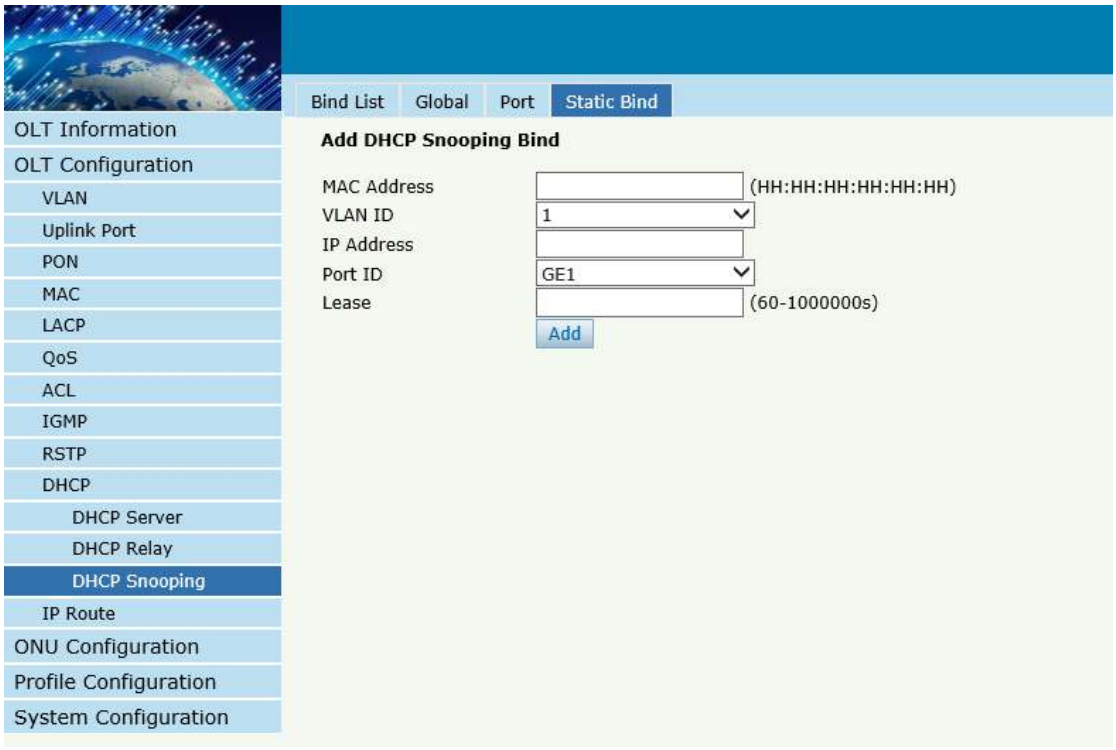

Figure 3-32 DHCP Snooping Static Bind

3.11 IP Route

3.11.1 VLAN IP

OLT Configuration→IP Route→VLAN IP

This configuration is used to configure IP address for VLAN. When the VLAN is added to a port, you can access the OLT by the IP address from the port.

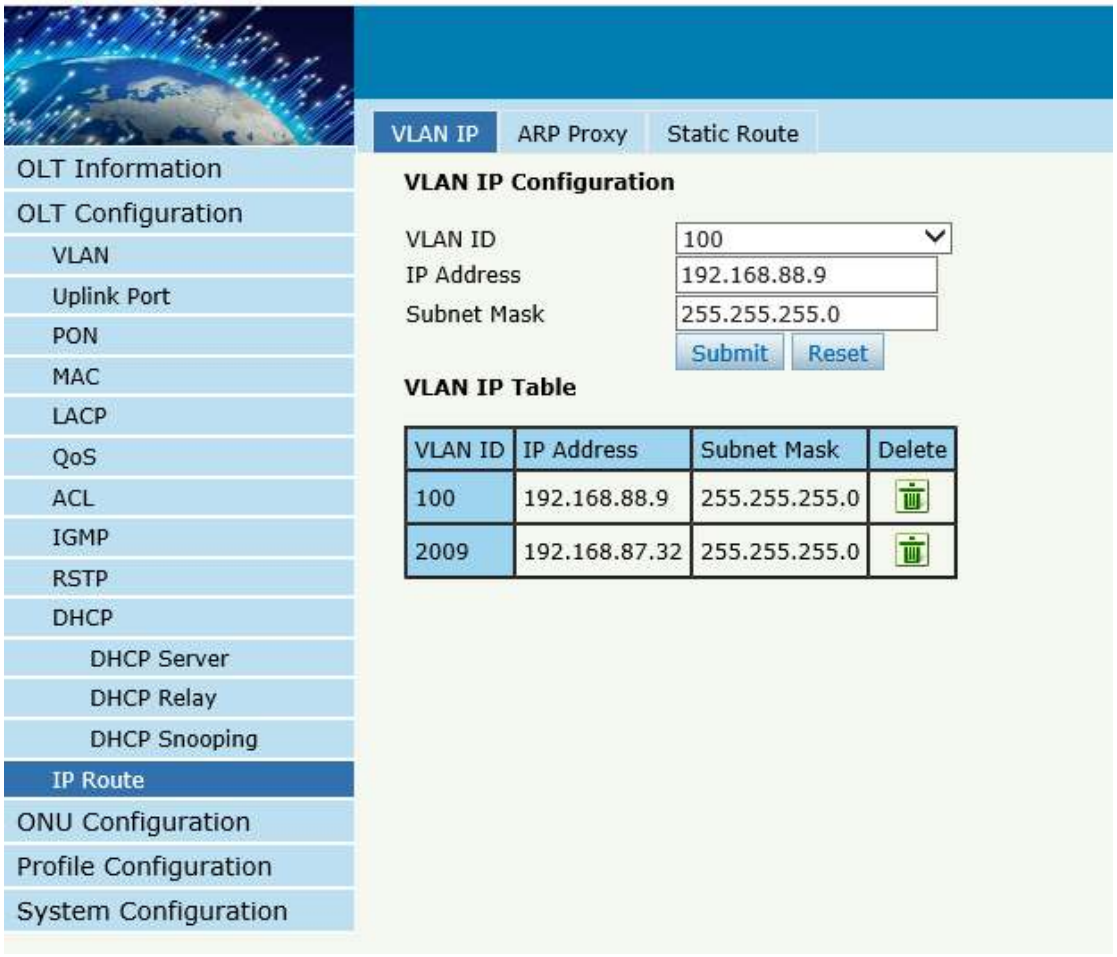

Figure 3-33:VLAN IP

3.11.2 ARP Proxy

OLT Configuration→IP Route→ARP Proxy

ARP Proxy is a technique by which a device on a given network answers the ARP queries for a network address that is not on that network. The ARP Proxy is aware of the location of the traffic's destination, and offers its own MAC address as final destination. The "captured" traffic is then typically routed by the Proxy to the intended destination via another interface or via a tunnel.

The process which results in the node responding with its own MAC address to an ARP request for a different IP address for proxying purposes is sometimes referred to as 'publishing'.

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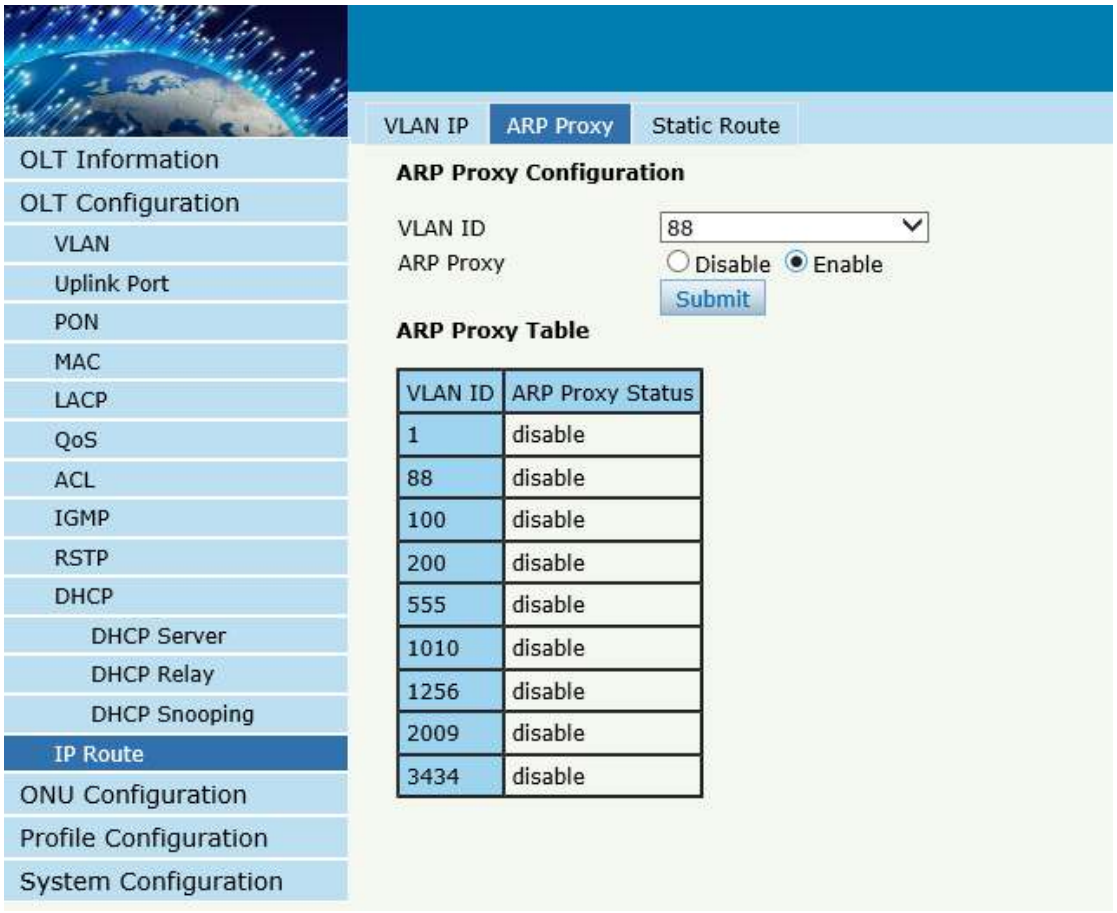

Figure 3-34: ARP proxy configuration

3.11.3 Static Route

OLT Configuration→IP Route→Static Route

Static route is a form of routing that a router uses for a manually-configured routing entry. In many cases, static routes are manually configured by a network administrator. Unlike dynamic routing, static routes are fixed and do not change if the network is changed or reconfigured.

The OLT only supports static route. After configured VLAN IP address, add static routes to make the network on the different network segment communicate with each other.

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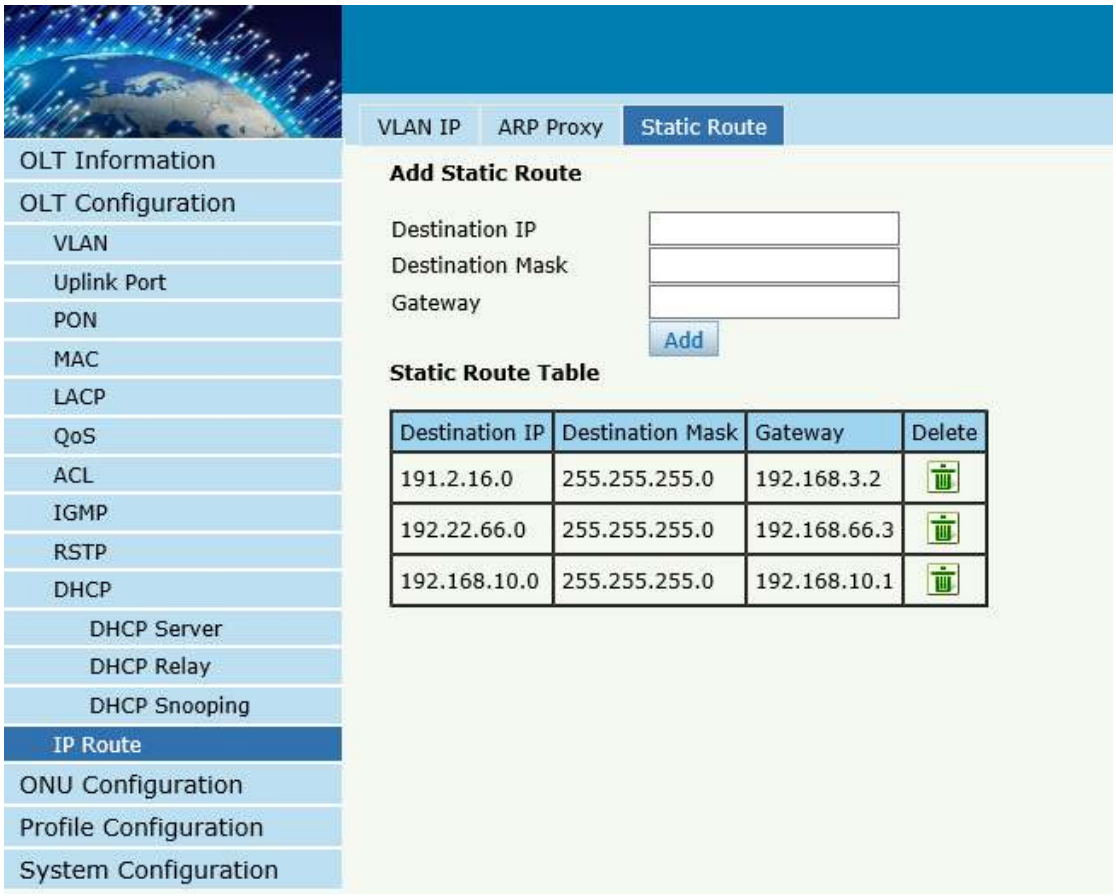

Figure 3-35: Static Route

Chapter 4 ONU Configuration

This chapter is about the ONU management by OLT.

4.1 ONU AuthList

4.1.1 ONU Status

ONU Configuration→ONU AuthList→ONU Status

Select PON port ID, all ONUs will be displayed in this interface.

You can check ONU Admin state, OMCC state and phase state.

If the phase state is working ,then the ONU is registered successfully

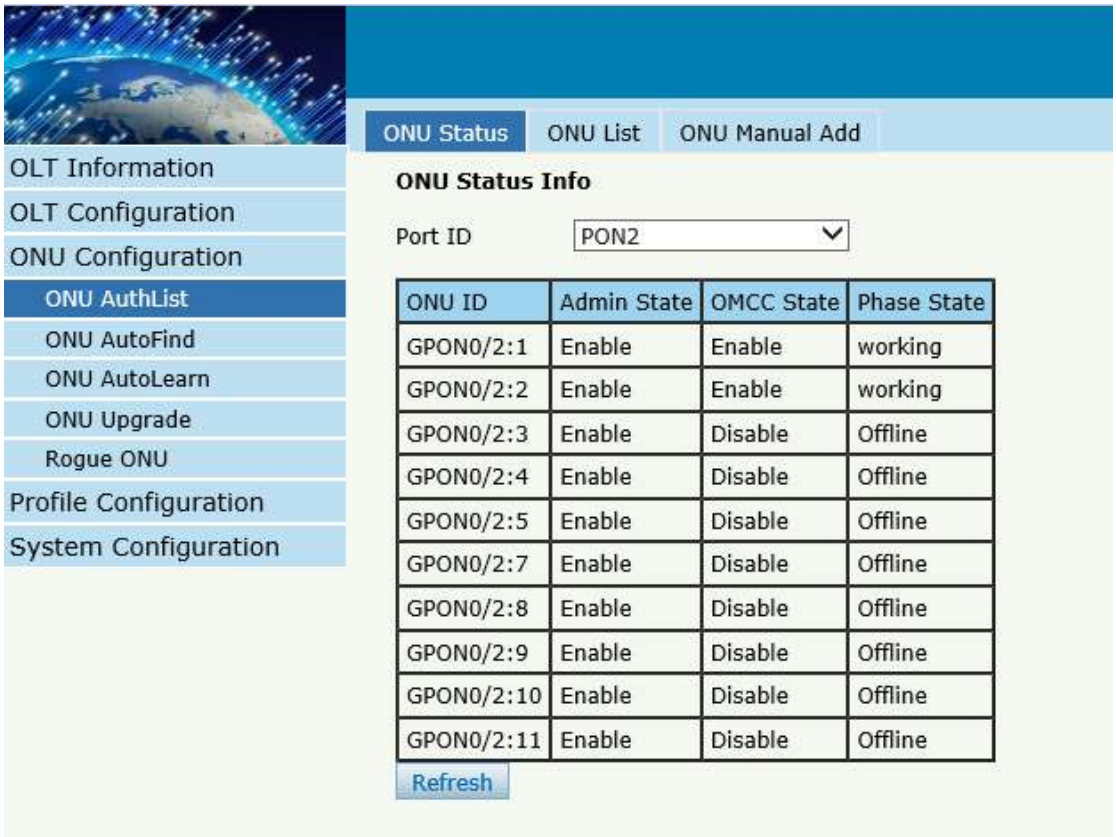

Figure 4-1 ONU Status

4.1.2 ONU List

ONU Configuration→ONU AuthList→ONU List

Select PON port ID, all ONUs will be displayed in this interface.

Figure 4-2 ONU List

4.1.2.1 Delete

ONU Configuration→ONU AuthList→ONU List

Delete ONU which you selected, the ONU will be deleted and the registration shows failed

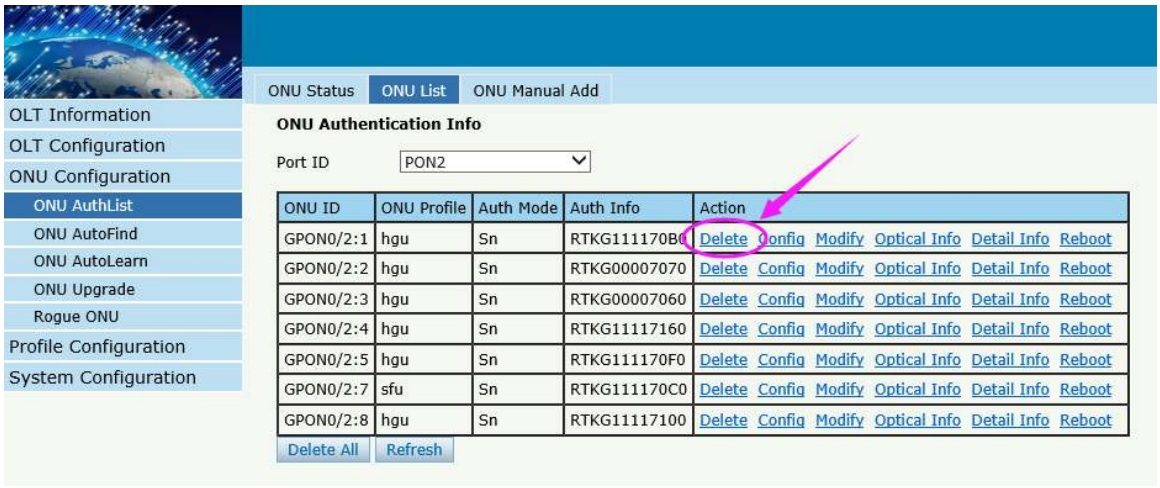

Figure 4-3Delete ONU

4.1.2.2 Config

ONU Configuration→ONU AuthList→ONU List

Configure ONU parameter informationwhich you selected,

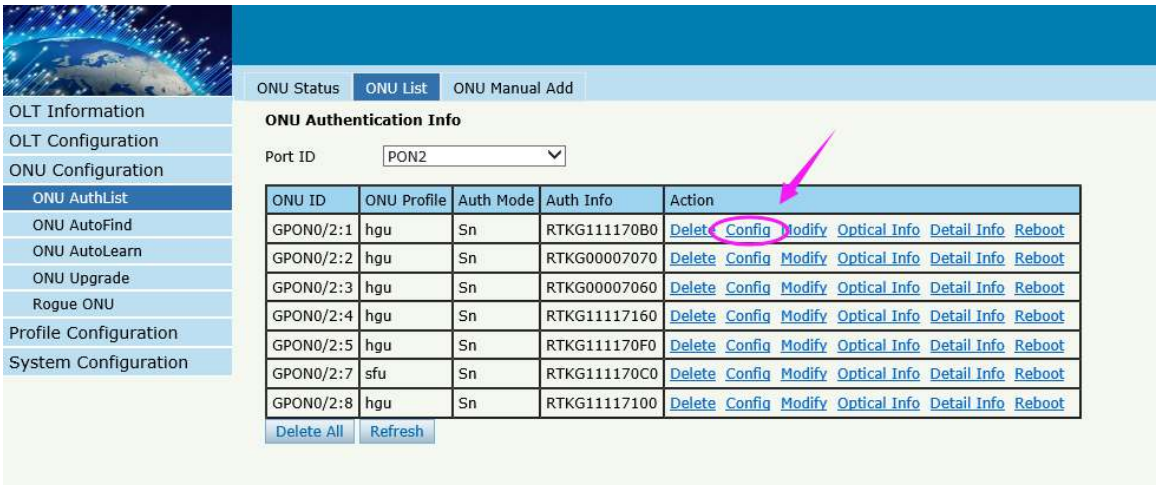

Figure 4-4 Configure ONU

Create a tcont ID and bind DBA templates

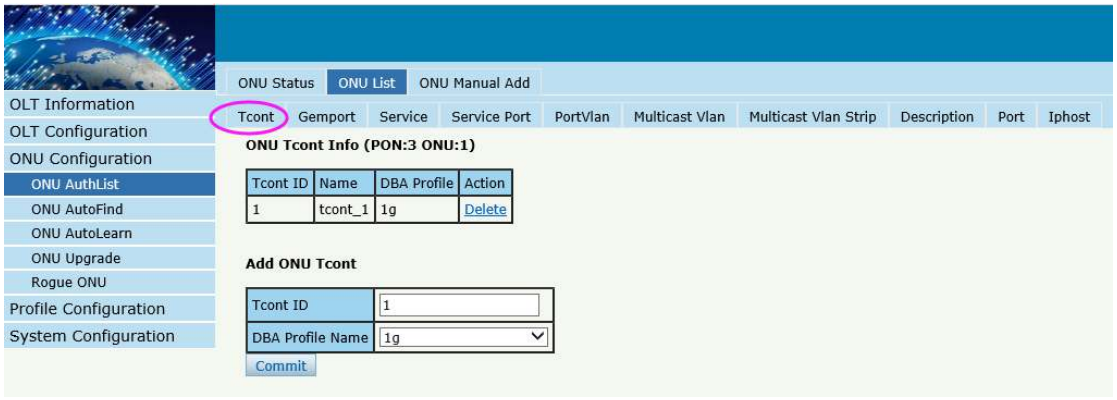

Figure 4-5 Create Tcont

Create a gemport ID and bind tcont ID

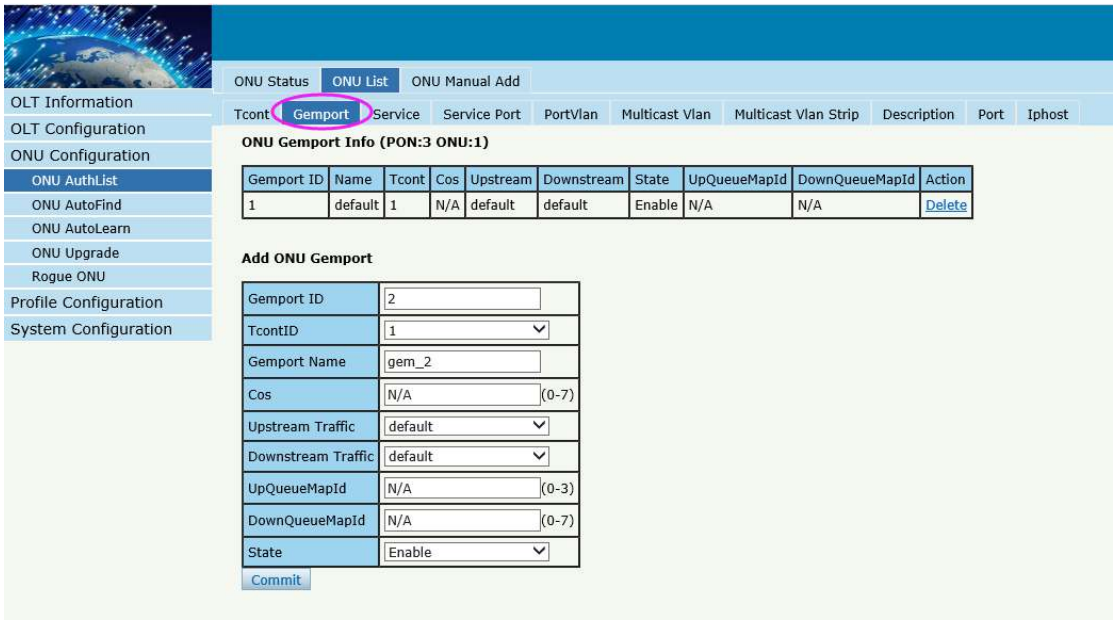

Figure 4-6 Create gemport

Create a service , Set the VLAN and VLAN mode and let it bind one gemport ID.

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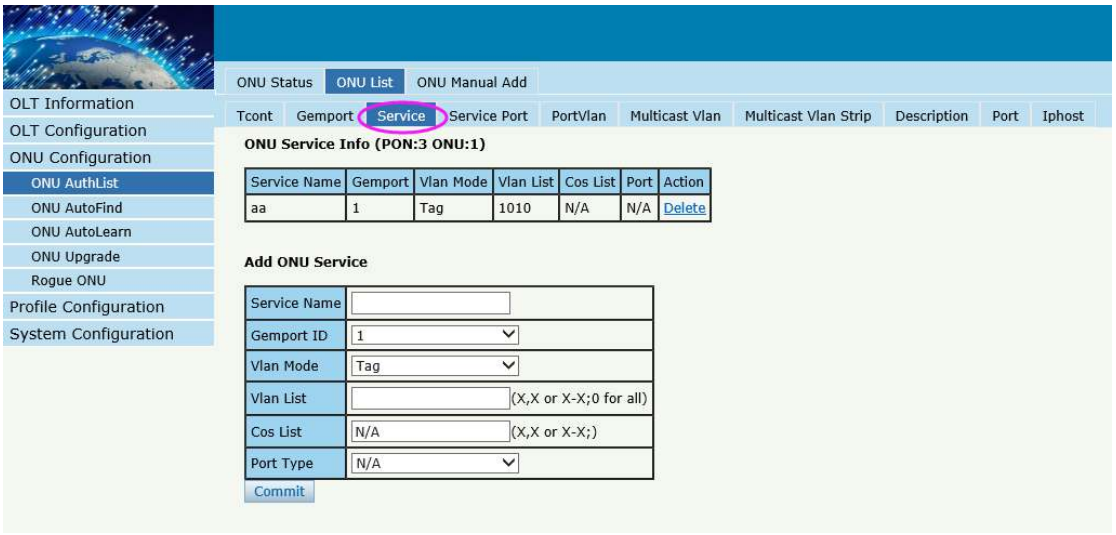

Figure 4-7 Create service

Create a service port, Set the user VLAN and translate VLAN and let it bind one gemport ID.

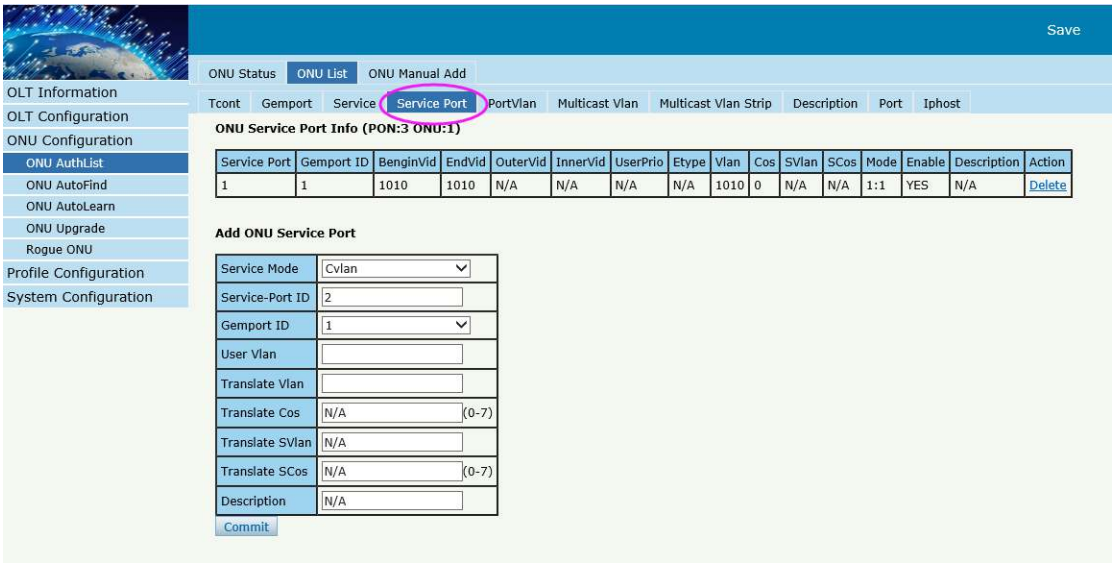

Figure 4-8 create service port

Set the VLAN mode of the ONU's port.

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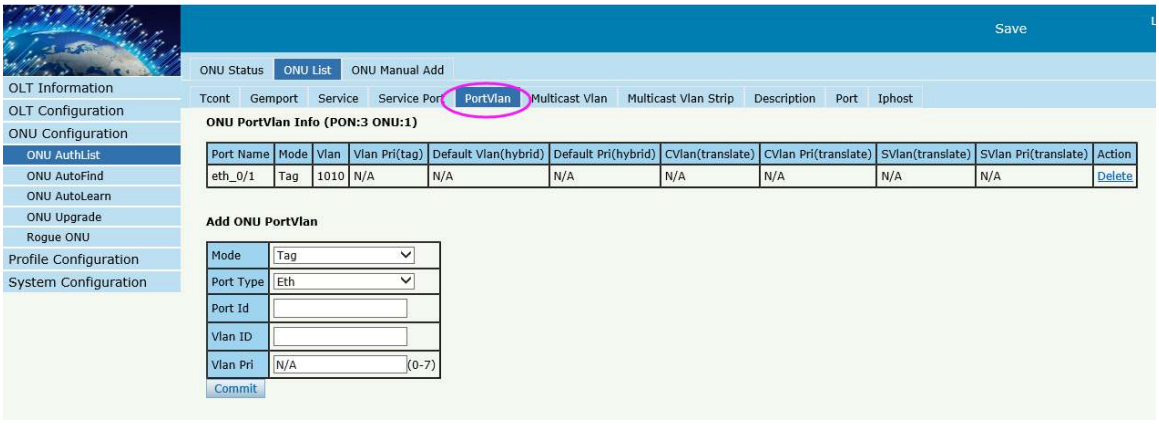

Figure 4-9 configure port VLAN mode

Set the Multicast VLAN of ONU

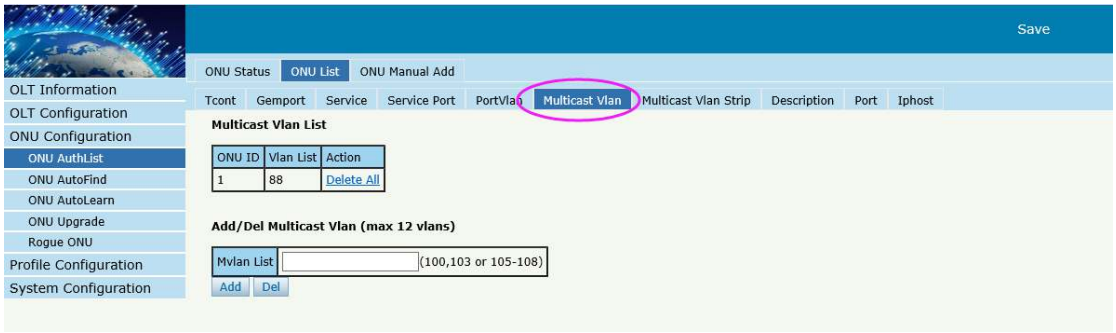

Figure 4-10 configure multicast VLAN

Set the Multicast VLAN mode of ONU's port

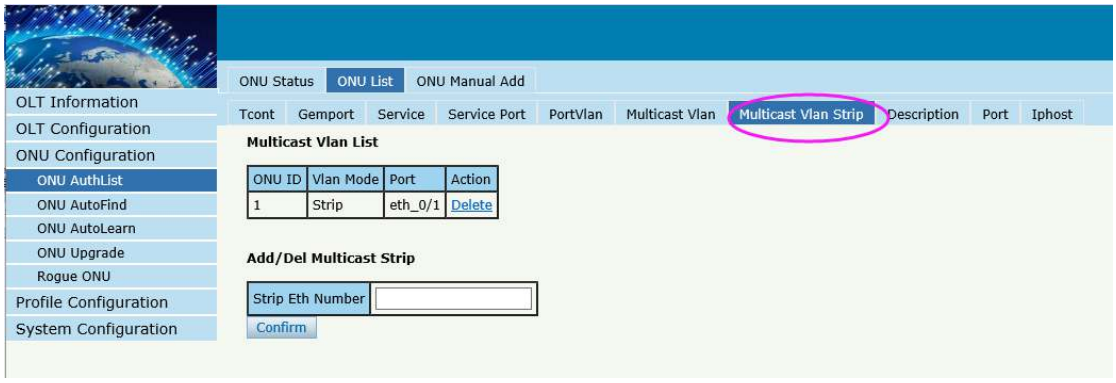

Figure 4-11 Configure multicast VLAN mode

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Description for ONU

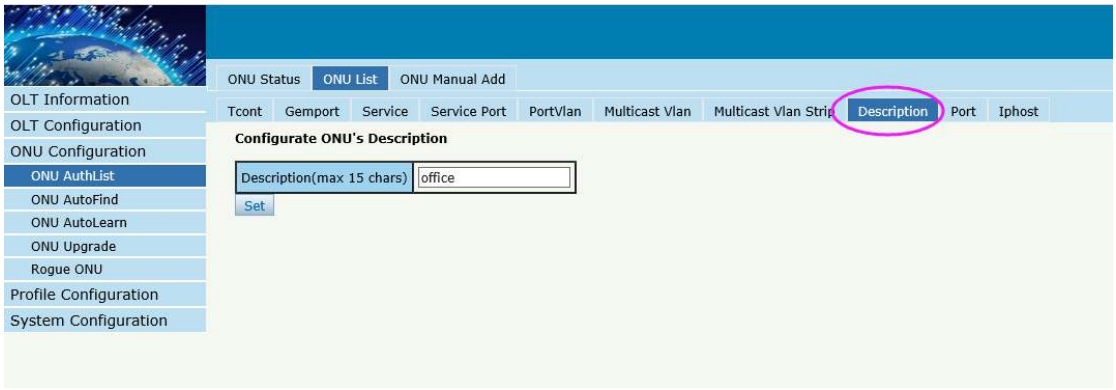


Figure 4-12 ONU's description

Port Basic State of ONU

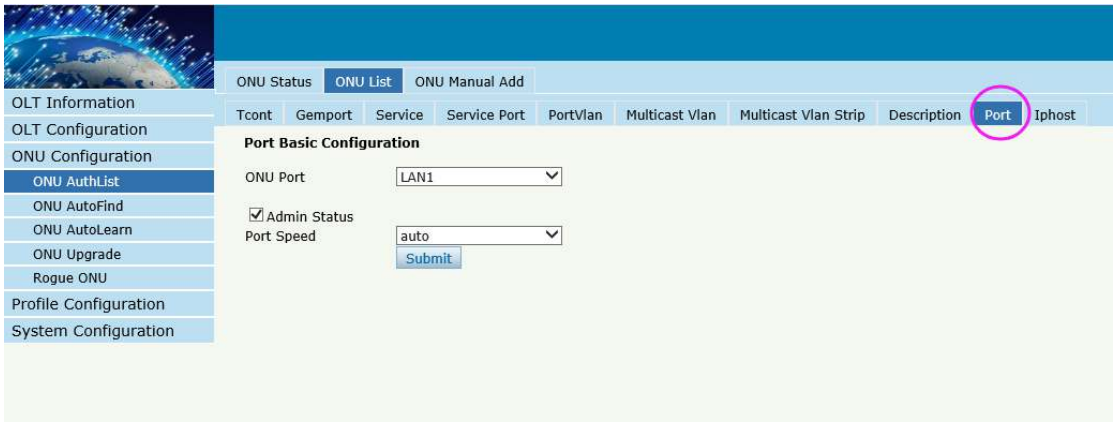


Figure 4-13 ONU's port state

Create Iphost for ONU wan connection.

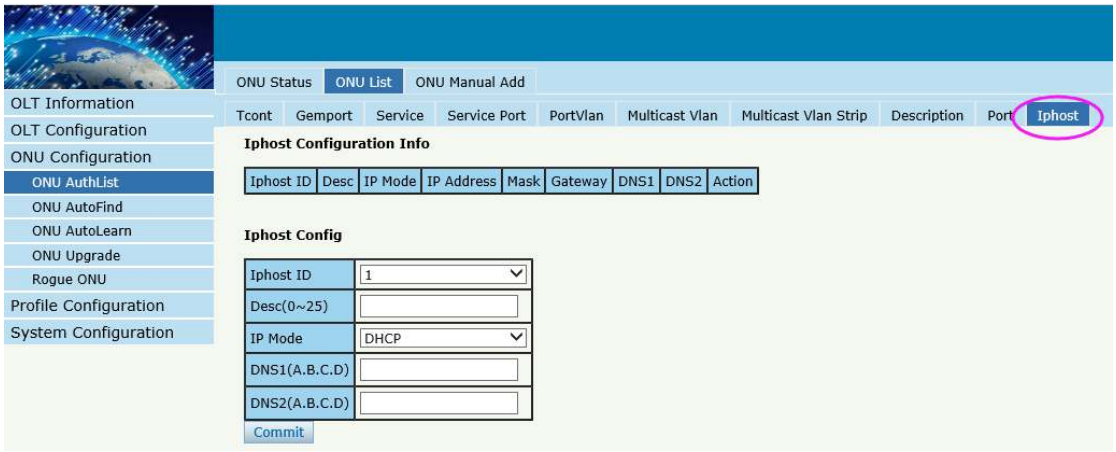
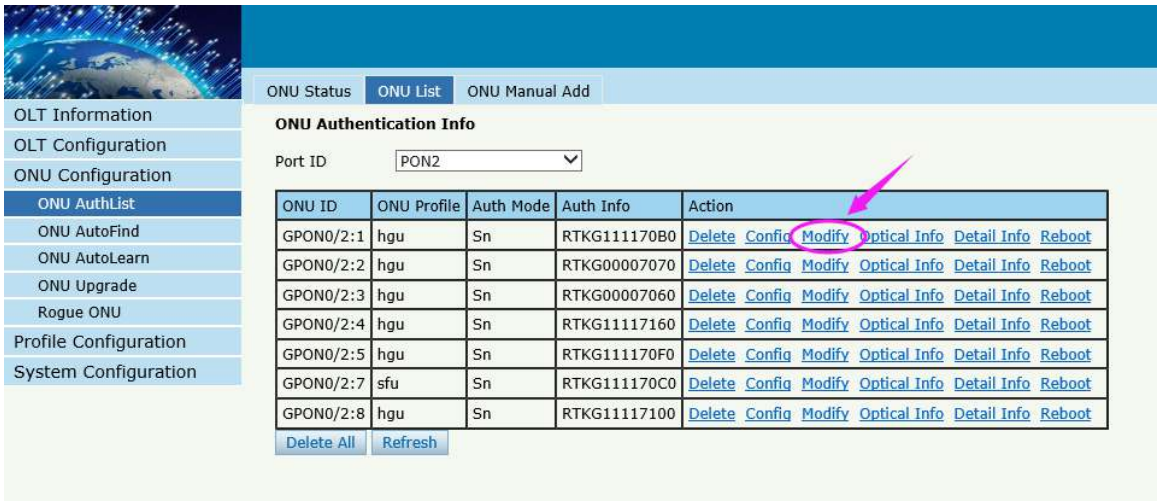


Figure 4-14 Configure IPhost

4.1.2.3 Modify

ONU Configuration→ONU AuthList→ONU List

Modify SN or LOID of ONUwhich you selected,



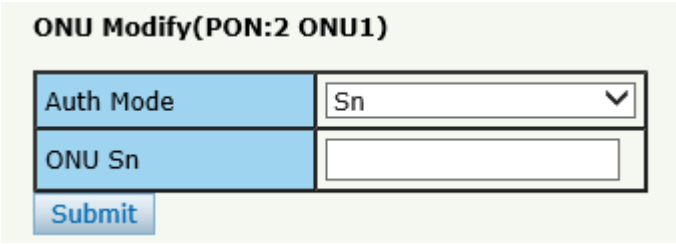


Figure 4-15 Modify ONU Registration mode

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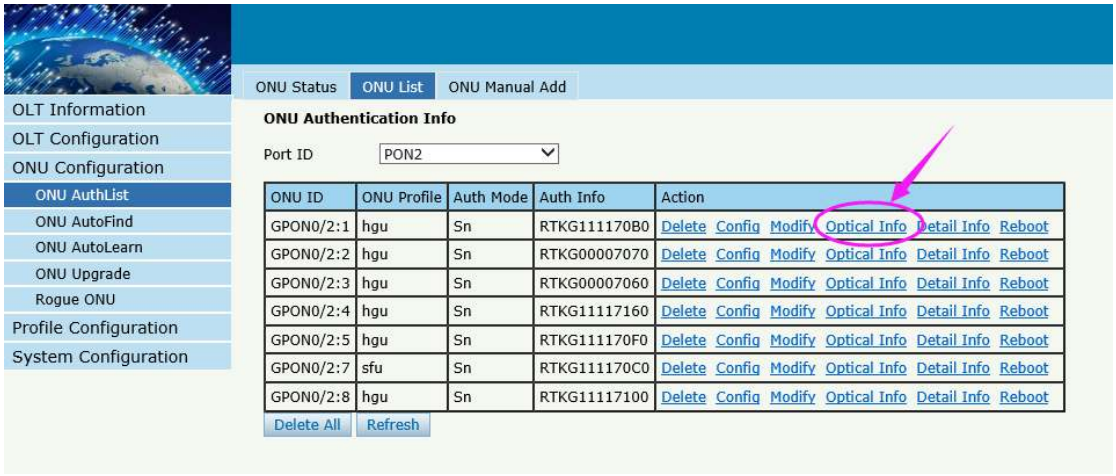
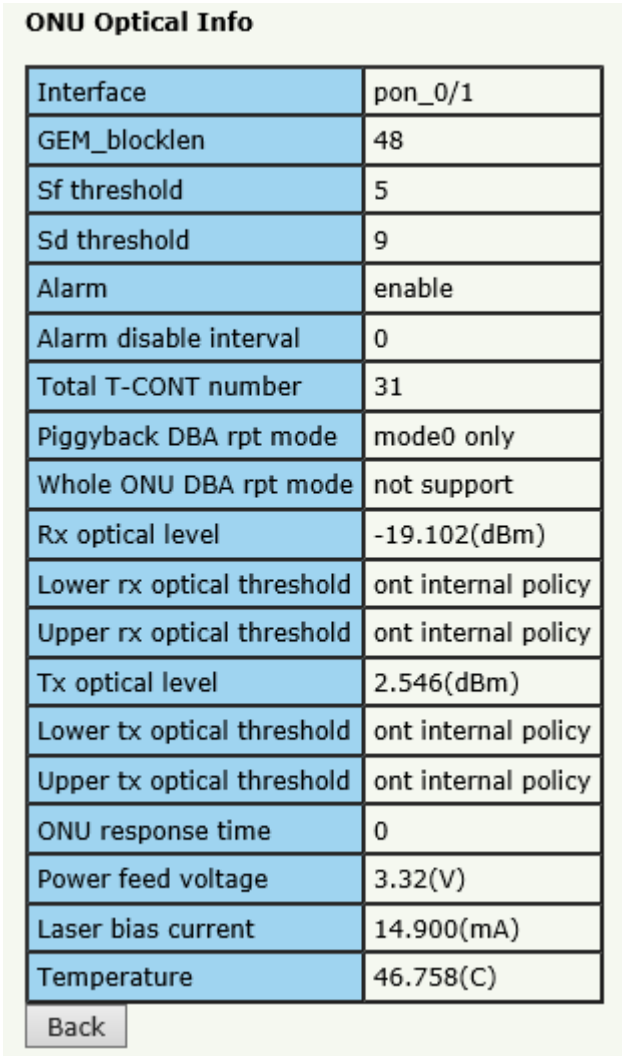
4.1.2.4 Optical Info

ONU Configuration→ONU AuthList→ONU List

Check the Optical Info of the ONU which you have selected.





ONU Optical Info

Interface	pon_0/1
GEM_blocklen	48
Sf threshold	5
Sd threshold	9
Alarm	enable
Alarm disable interval	0
Total T-CONT number	31
Piggyback DBA rpt mode	mode0 only
Whole ONU DBA rpt mode	not support
Rx optical level	-19.102(dBm)
Lower rx optical threshold	ont internal policy
Upper rx optical threshold	ont internal policy
Tx optical level	2.546(dBm)
Lower tx optical threshold	ont internal policy
Upper tx optical threshold	ont internal policy
ONU response time	0
Power feed voltage	3.32(V)
Laser bias current	14.900(mA)
Temperature	46.758(C)

Back

Figure 4-16 Optical info of ONU

4.1.2.5 Detail Info

ONU Configuration→ONU AuthList→ONU List

Check the Detail Info of ONU which you selected,

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ONU Detail Info

Description	N/A
Vendor ID:	RTKG
Version:	RTL960x
SN:	RTKG111170b0
Admin status:	unlock
Battery monitor:	false
Security mode:	aes
Product code:	0
Total priority queue num:	127
Total traffic schedule num:	31
Traffic management option:	priority-rate-controlled
Operate status:	enable
Equipment ID:	IGD
OMCC Version:	128
Security capability:	aes
Model:	IGD
Survival time:	N/A
TotalGemPortNum:	127
SysUpTime:	87763.00 s
Region code:	N/A
Product SN:	N/A
Chip info:	0

Back

Figure 4-17 Detail info of ONU

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4.1.2.6 Reboot

ONU Configuration→ONU AuthList→ONU List

Reboot ONU which you have selected,

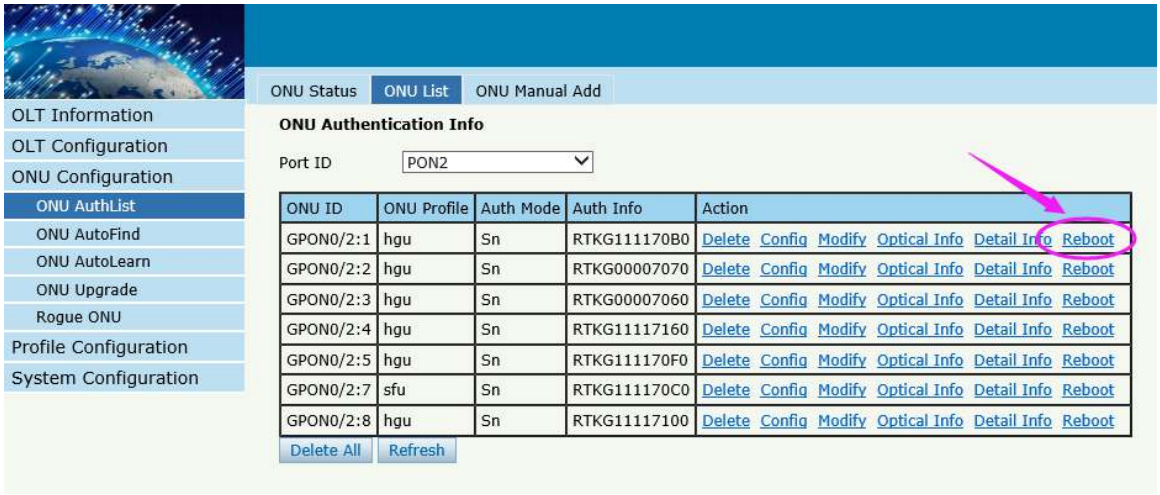

Figure 4-18 reboot ONU

4.1.3 ONU Manual Add

ONU Configuration→ONU AuthList→ONU Manual Add

You can manually add an ONU to your chosen PON port. ONU will appear on the ONU list after you click on 'Submit.'

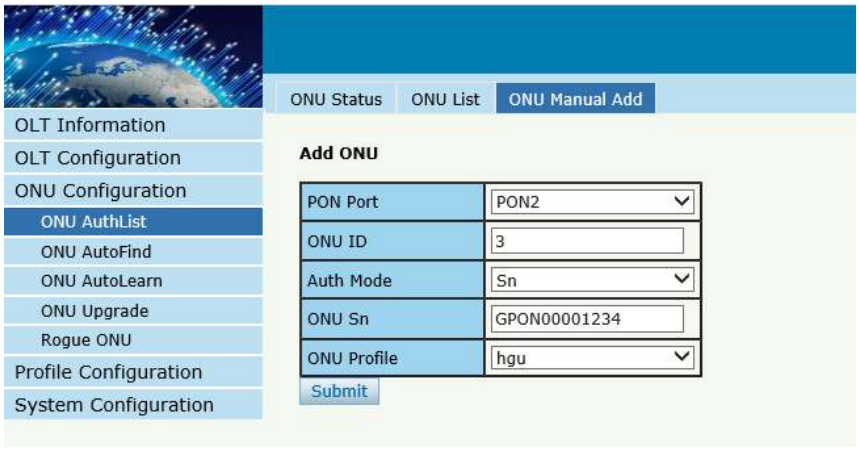

Figure 4-19 Manually add an ONU

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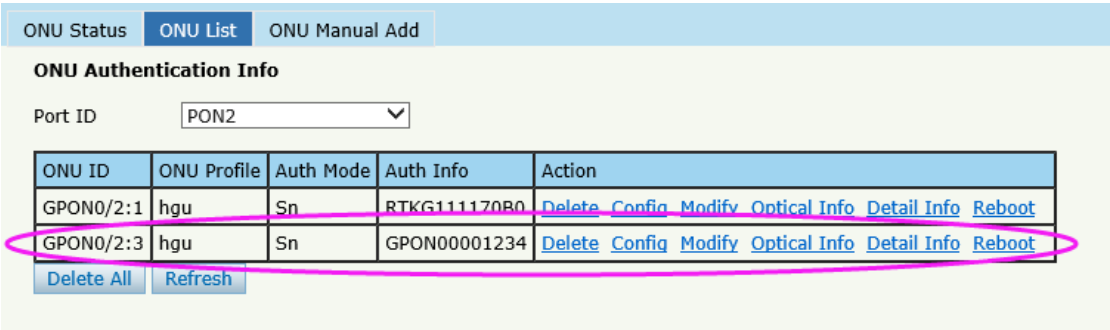

Figure 4-19 ONU info

4.2 ONU AutoFind

Configuration→AutoFind

After selecting PON port number, all ONUs which are authenticated, failed or not authenticated will be displayed in this interface. You can check the serial number of the ONUs.

More information will be shown under the ONU Detail menu.

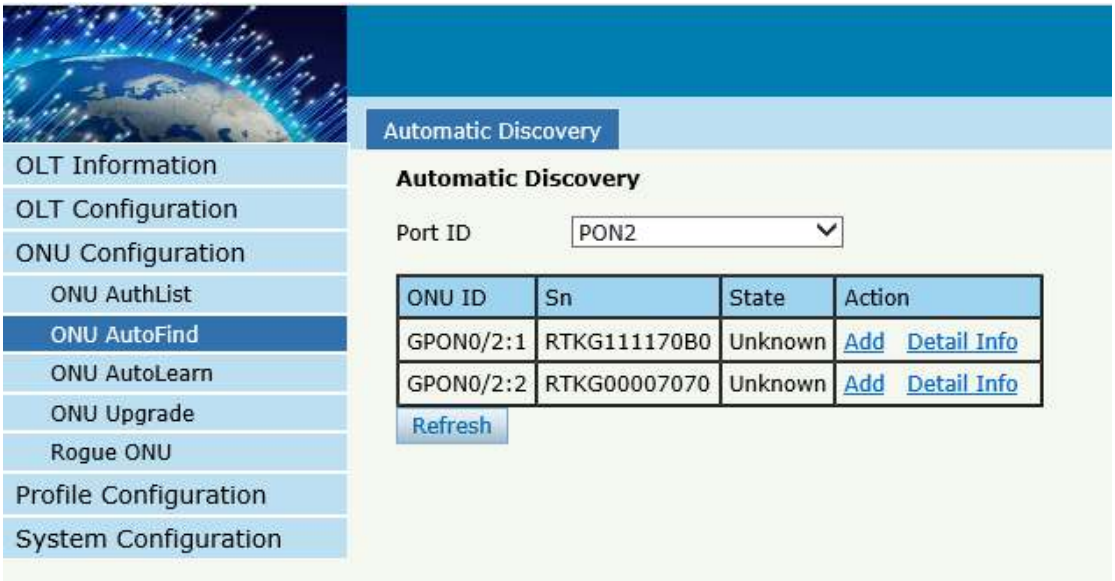

Figure 4-20 Authentication Mode

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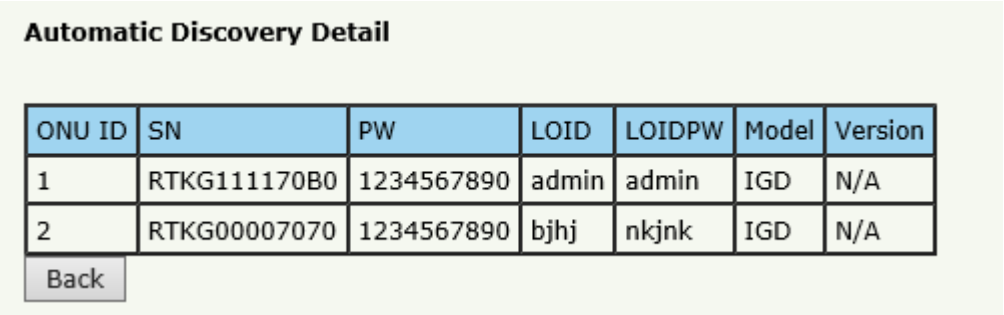

Figure 4-21 Detail info

4.3 ONU AutoLearn

4.3.1 ONU AutoLearn

Configuration→AutoLearn→ONU AutoLearn

ONU can be auto authenticated after enabling PON port automatic learning.

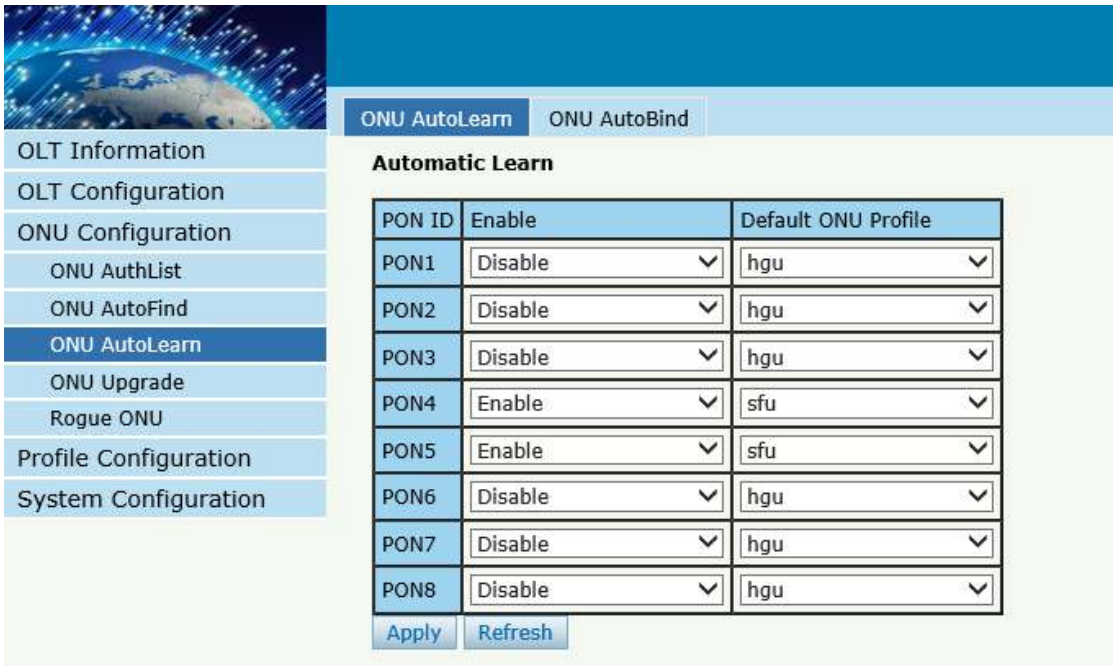

Figure 4-22 Automatic learn

4.3.2 ONU AutoBind

Configuration→AutoLearn→ONU AutoBind

Input the Equipment ID and bind the template you need

Note: you must build the template first

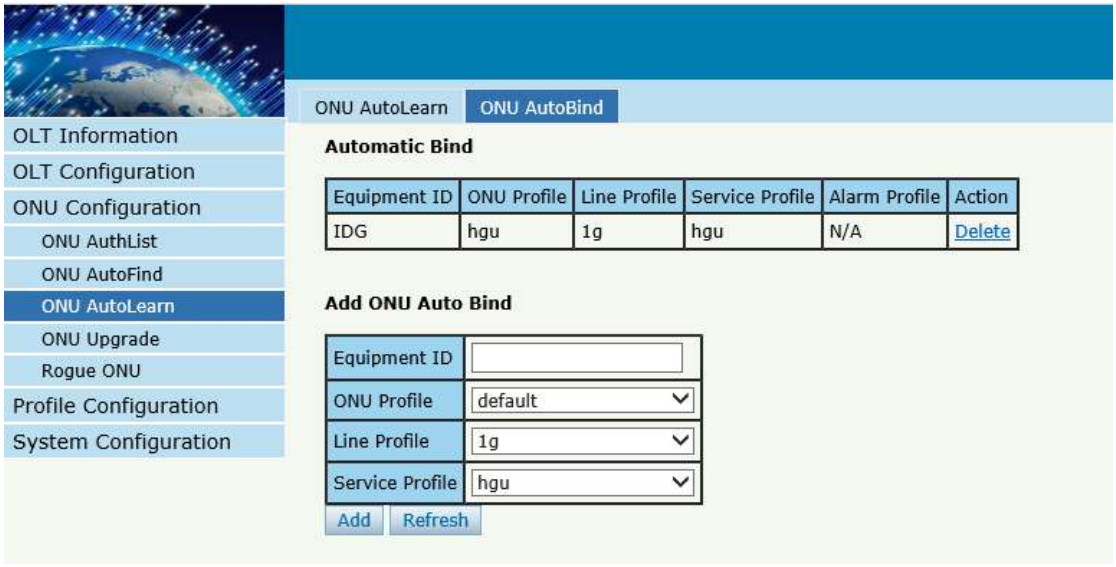

Figure 4-23 Bind profile

4.4 ONU Upgrade

ONU upgrade by OLT

4.4.1 Upload Image

Upload ONU firmware image which you need, the image will upload to OLT's RAM

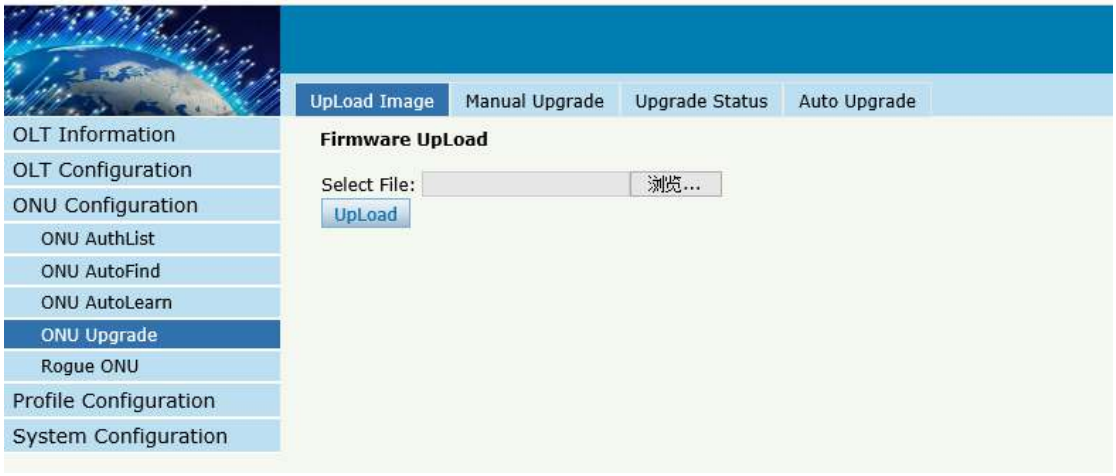

Figure 4-24 Upload image

If the operation is successful, the following will appear

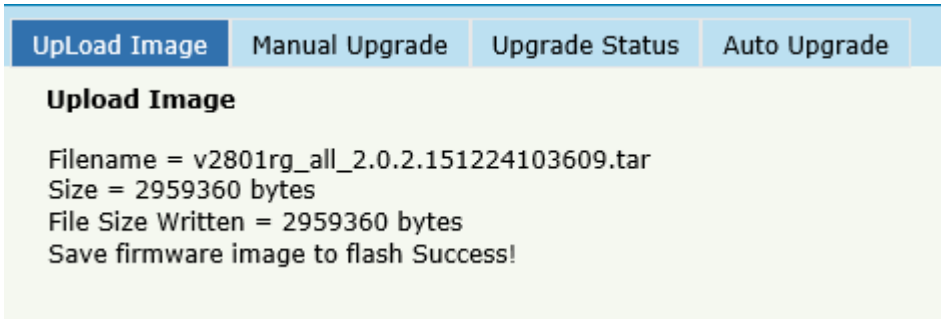

Figure 4-25 Upload info

4.4.2 Manual Upgrade

ONU Configuration→ONU Upgrade→Manual Upgrade

Select ONU which you need and click commit button

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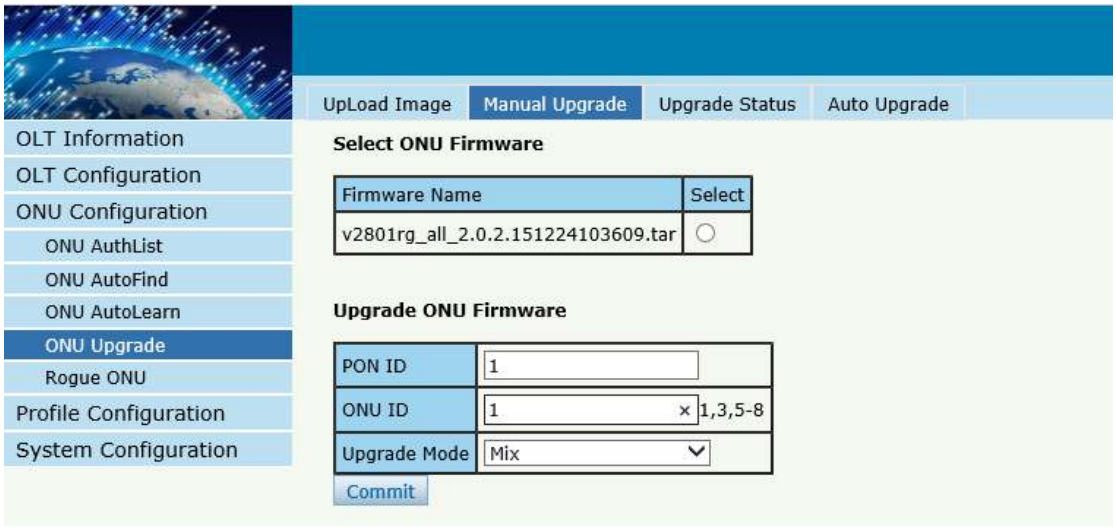

Figure 4-26 Manual Upgrade

4.4.3 Upgrade Status

ONU Configuration→ONU Upgrade→Upgrade Status

When ONU is upgrading, the list will be shown in this page.

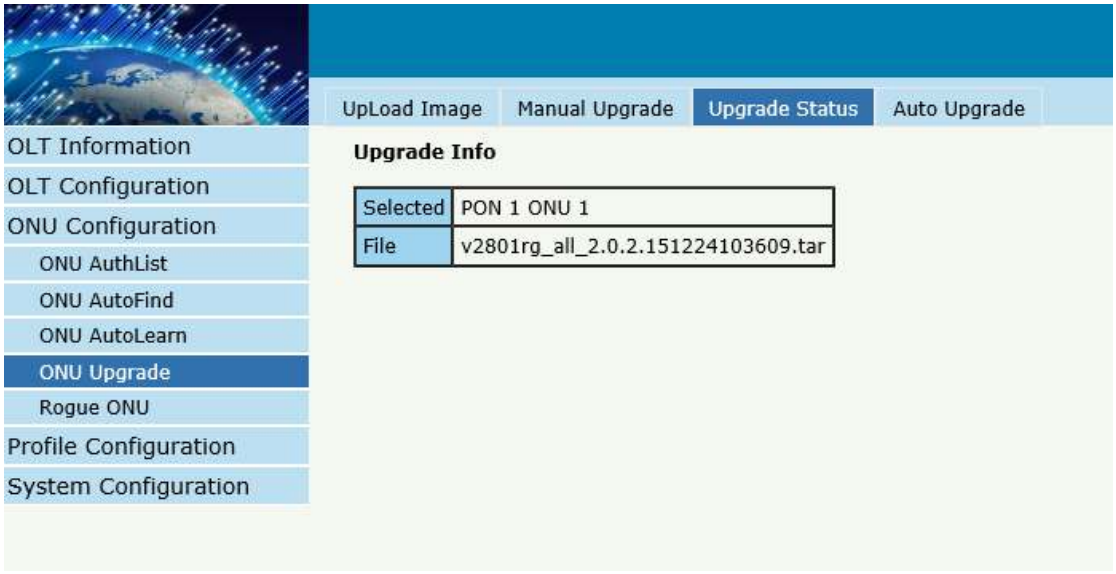

Figure 4-27 ONU Upgrade Status

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4.3.4 Auto Upgrade

ONU Configuration→ONU Upgrade→Auto Upgrade

The ONU firmware will be saved in the OLT's RAM first. When the ONU comes online, it will auto upgrade the firmware.

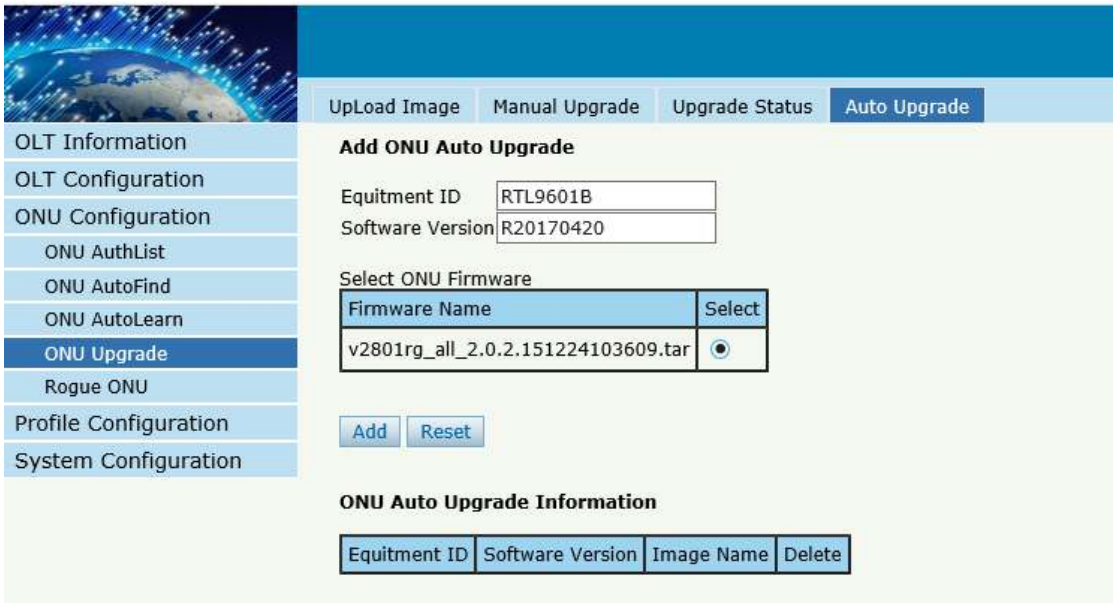

Figure 4-28 Auto Upgrade

4.5 Rogue ONU

ONU Configuration→Rogue ONU

Enable this function, If there is a rogue ONU, it will appear in the list

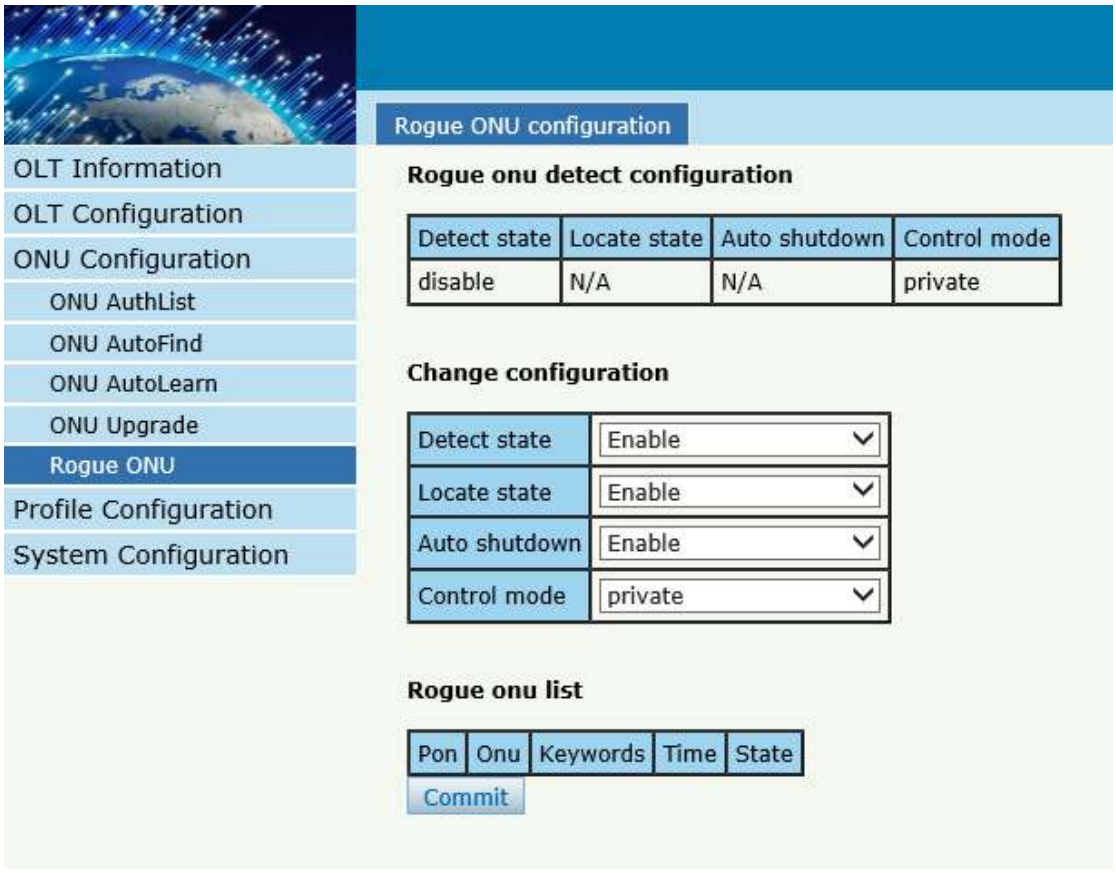

Figure 4-29 Rogue ONU detect

Chapter 5 Profile Configuration

This chapter is about the ONU profile configuration. It is designed for batch ONU management by OLT.

5.1 ONU Profile

The Onu profile is used for onu authorization, and each ONU must specify only one ONU profile when authorizated. The ONU profile specifies the capability of this ONU .

5.1.1 Information

Profile Configuration→ ONU profile→Information

The table displays ONU profile list. We can also do some operation, such as delete and check details info.

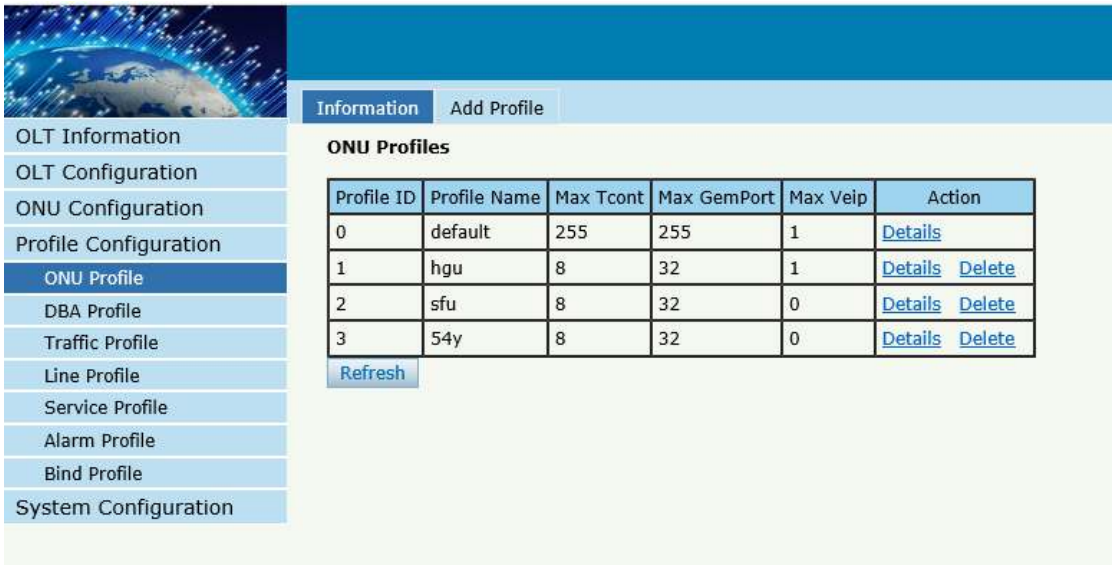

Figure 5-1 ONU profile list

5.1.2 Add profile

Create a new ONU profile what you need , Generally, ONU has two modes.

SFU mode (only using bridge mode):

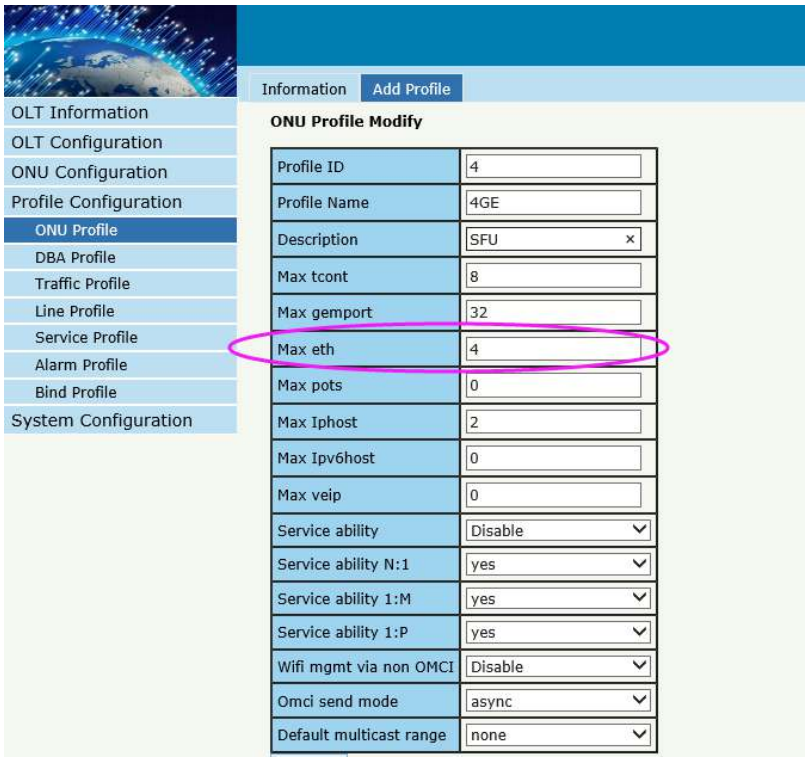

Figure 5-2 Add SFU profile

HGU mode (with the routing wan connection mode)

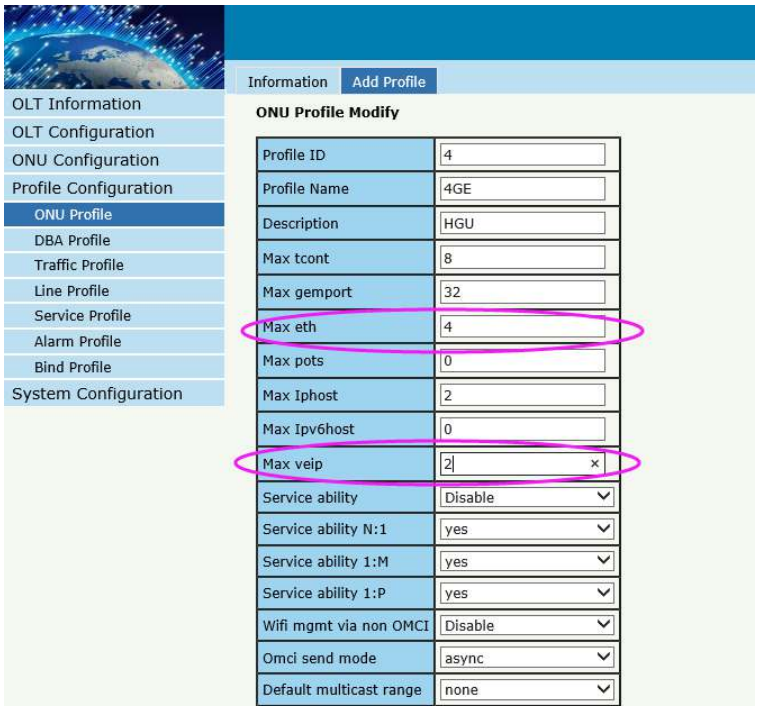

Figure 5-3 Add HGU profile

5.2 DBA Profile

DBA is a bandwidth allocation strategy that changes uplink bandwidth assigned to each T-CONT in real time according to the instant service status of each ONU. There are five BW types supported and make sure that fix<=assure<=max.

5.2.1 DBA profiles

Profile Configuration→DBA Profile →DBA Profiles

The table displays DBA profile list. We can also do some operation, such delete and modify.

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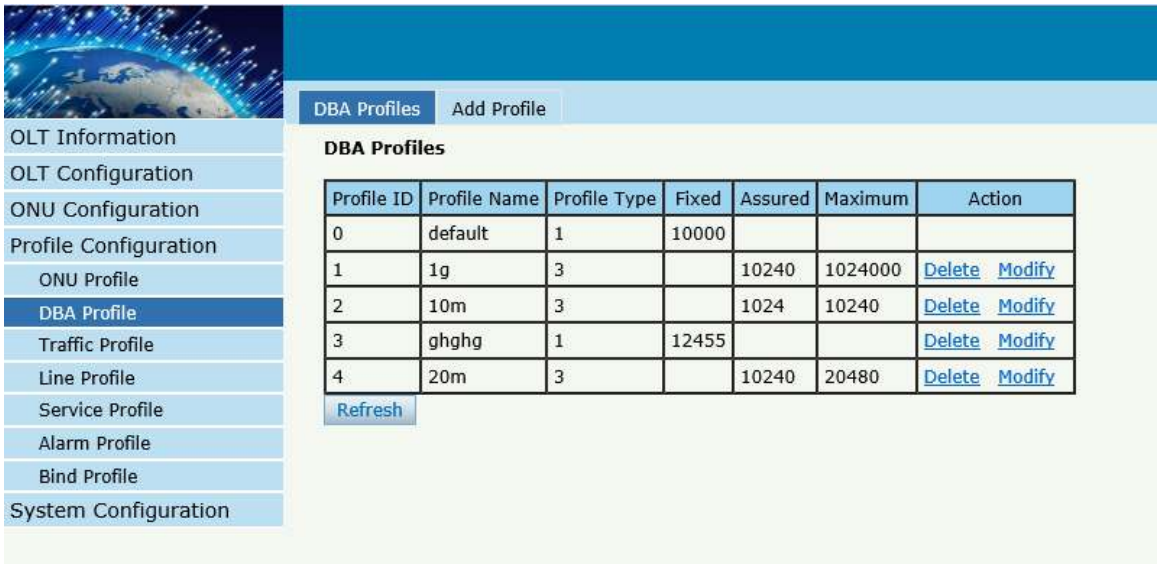

Figure 5-4 DBA profile list

5.1.2 Add profile

Profile Configuration→DBA Profile → Add profile

Types:1,2,3,4,5，In general, we use type3

Relationships:

BW Type	Delay Sensitive	Applicable T-CONT types				
		Type 1	Type 2	Type 3	Type 4	Type 5
Fixed	Yes	X				X
Assured	No		X	X		X
Non-Assured	No			X		X
Best Effort	No				X	X
Max.	No			X	X	X

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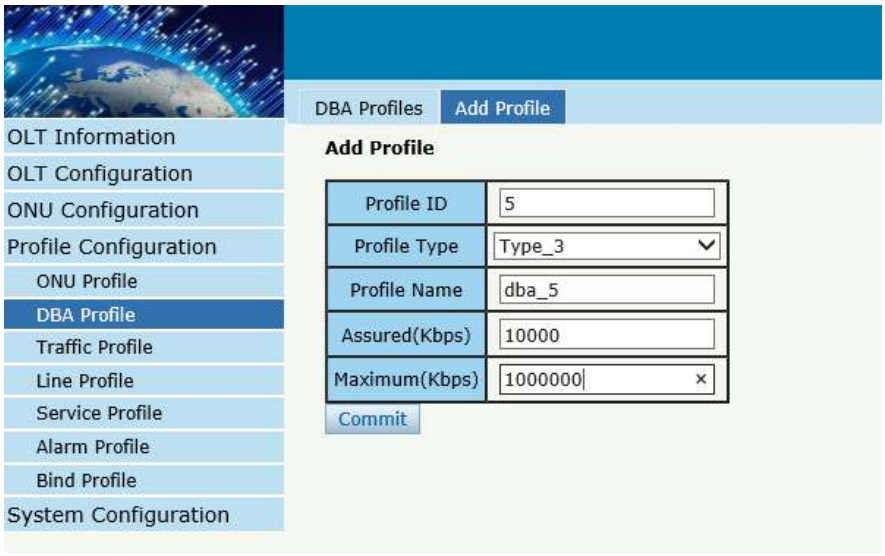

Figure 5-5 Add a DBA profile

5.3 Traffic Profile

Traffic profile is used by Gemport to specify the upstream/downstream bandwidth.

5.3.1 Traffic profiles

Profile Configuration→Traffic Profile → Traffic Profiles

The table displays Traffic profile list. We can also do some operation, such delete and modify.

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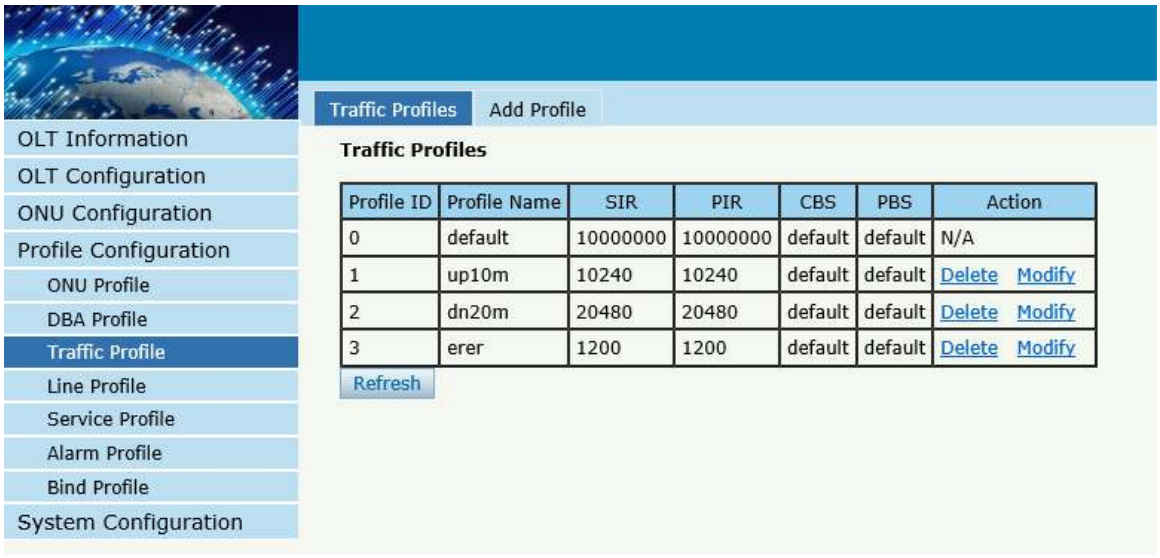

Figure 5-6 Traffic Profile list

5.2.2 Add profile

Profile Configuration→Traffic Profile → Add Profile

Configure Gemport to specify the upstream/downstream bandwidth.

SIR：Committed Information Rate

PIR：Peak Information Rate

CBS: Committed Burst Size

PBS: Peak Burst Size

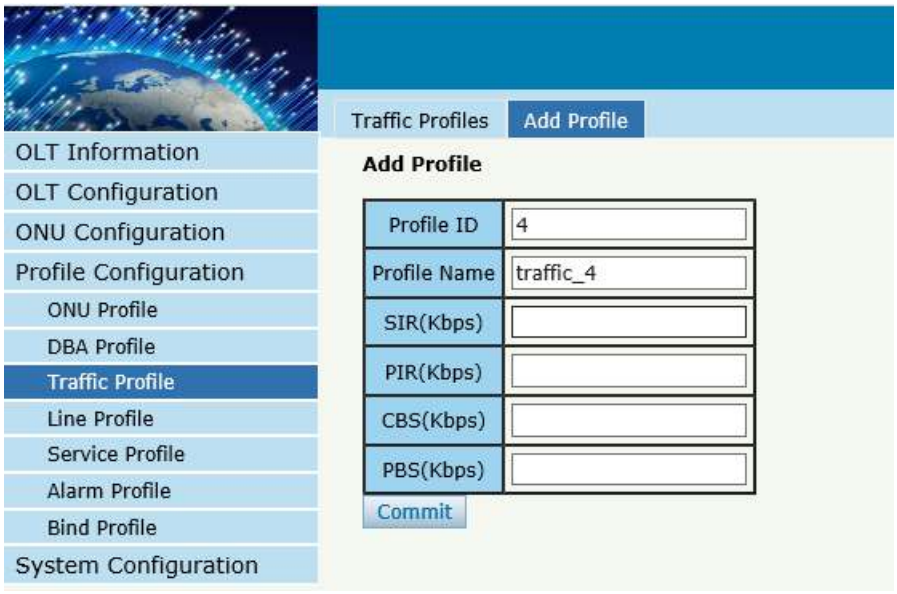

Figure 5-7 Add a traffic Profile

5.4 Line Profile

Line profile is used to configure the ANI side services of ONU such as t-cont, gem-port, service-port and so on.

5.3.1 Line profile

Profile Configuration→Line Profile → Line Profile

The table displays Line profile list. We can also do some operation, such delete and modify.

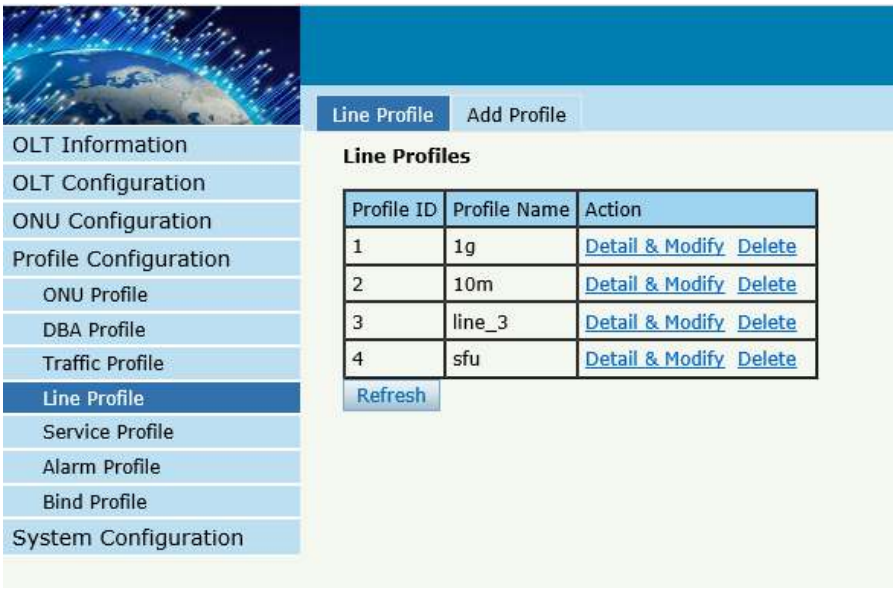

Figure 5-8 Line Profile list

5.3.2 Add profile

Profile Configuration→Line profile→Add profile

Create a new line profile

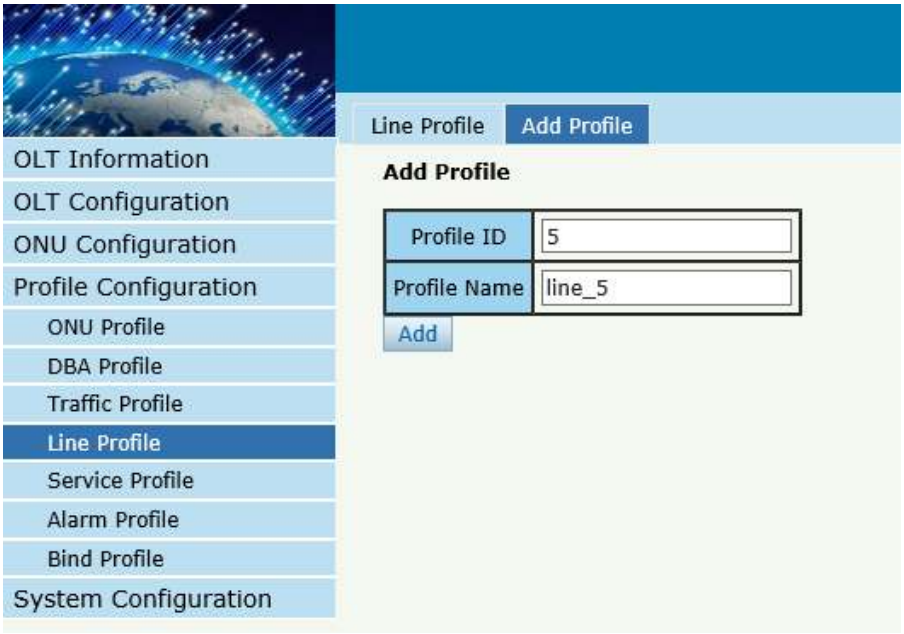

Figure 5-9 Add Line Profile

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Modify the line profile parameters

Figure 5-10 Modify Line Profile

Create a tcont ID and bind DBA templates

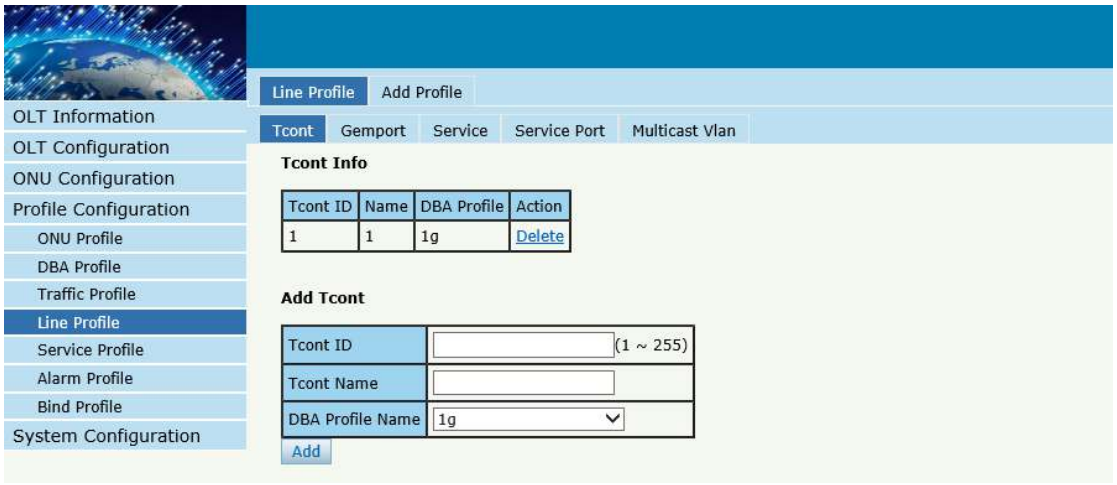

Figure 5-11 Add Tcont

Create a gemport ID and bind tcont ID

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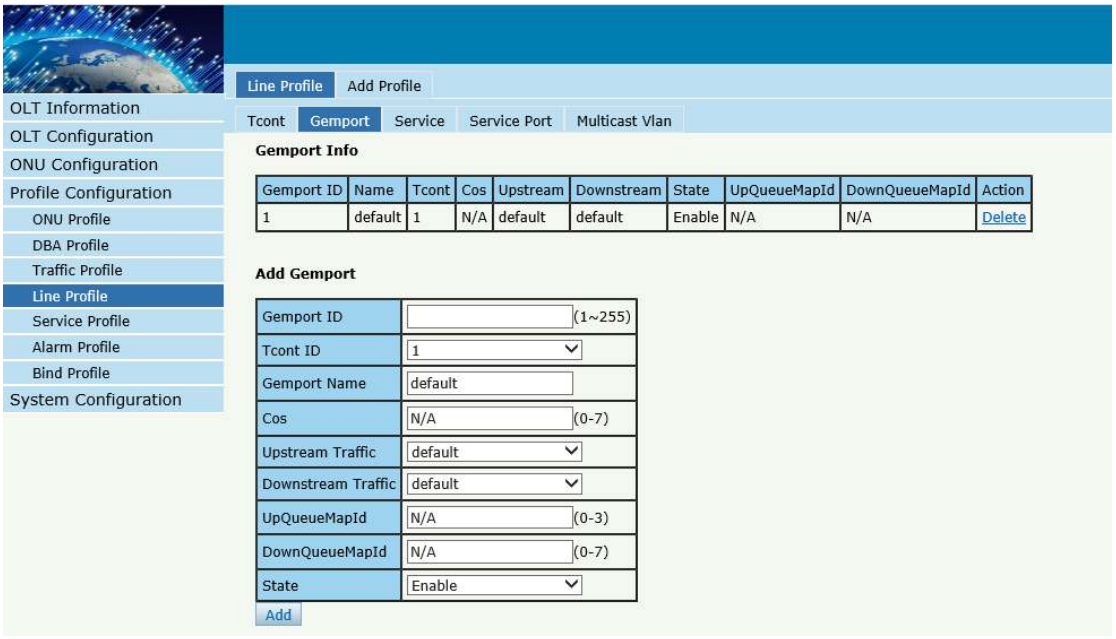

Figure 5-12 Add Gemport

Create a service , Set the VLAN and VLAN mode and let it bind one gemport ID.

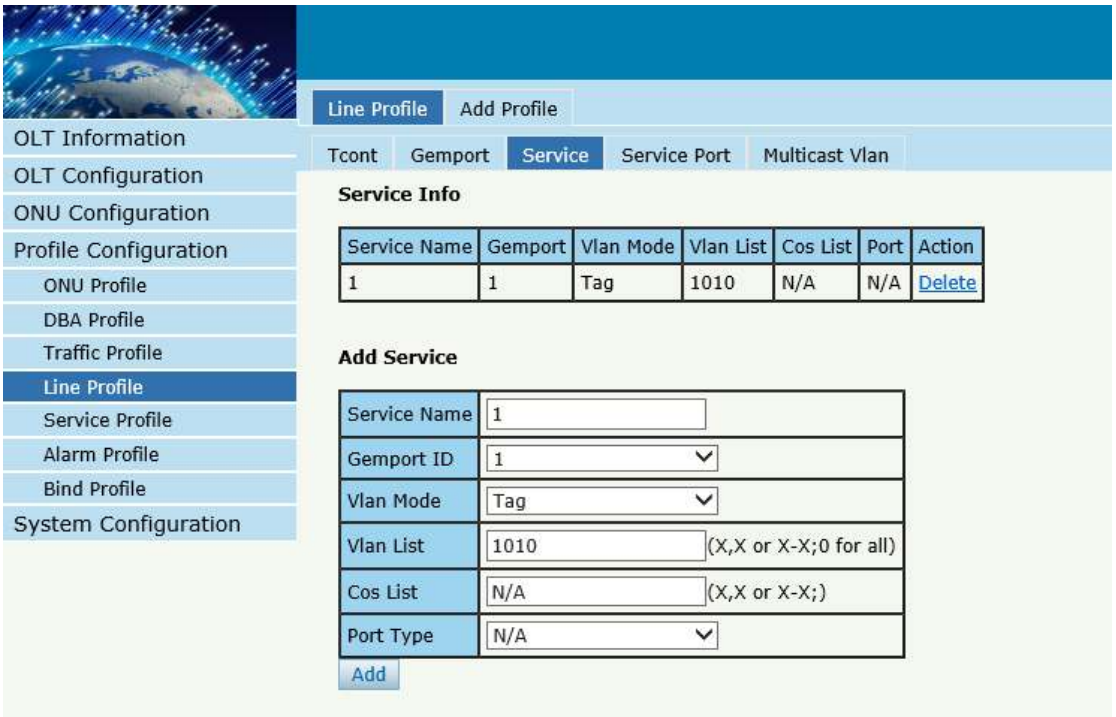

Figure 5-13 Add service

Create a service port, Set the user VLAN and translate VLAN and let it bind one gemport ID.

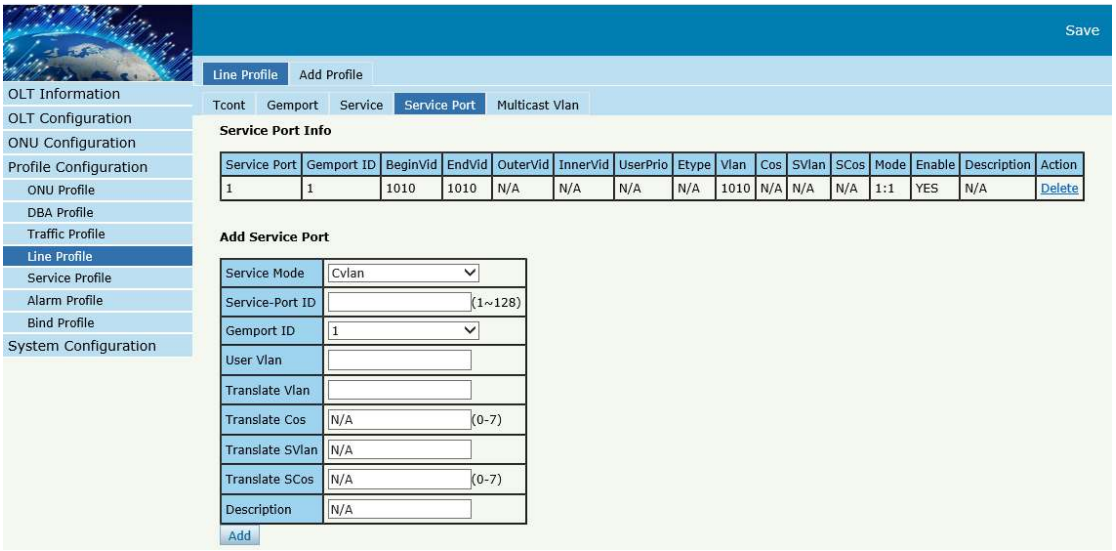

Figure 5-13 Add service port

Set the Multicast VLAN of ONU

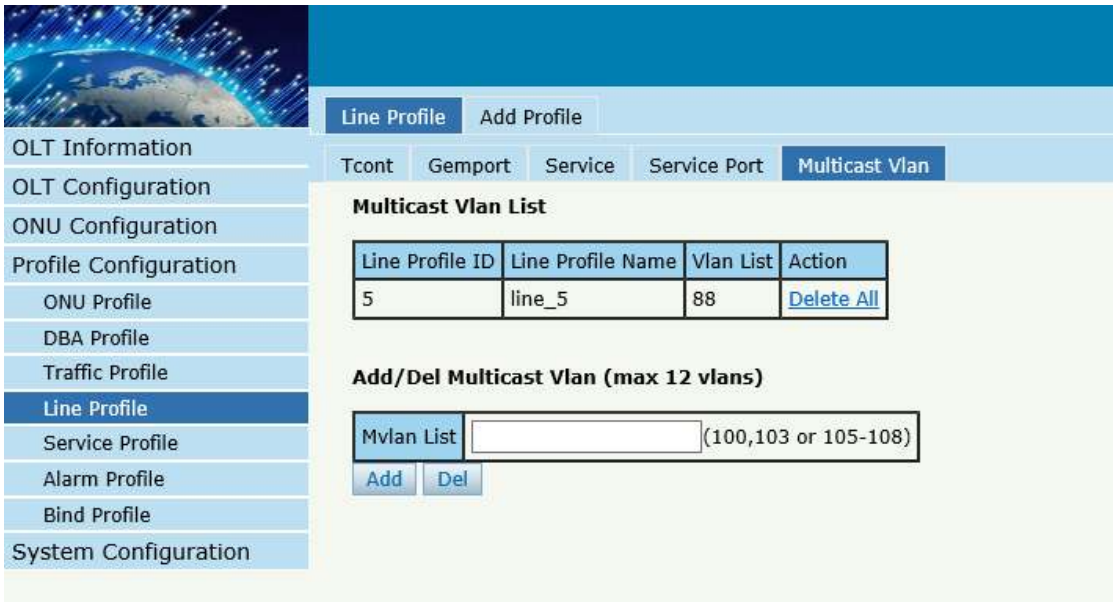

Figure 5-14 configure multicast VLAN

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5.5 Service Profile

Service profile is used to configure the UNI side services of ONU, such as Ethernet port, wifi, veip and so on.

5.3.1 Line profile

Profile Configuration→Line Profile → Line Profile

The table displays service profile list. We can also do some operation, such as delete and modify.

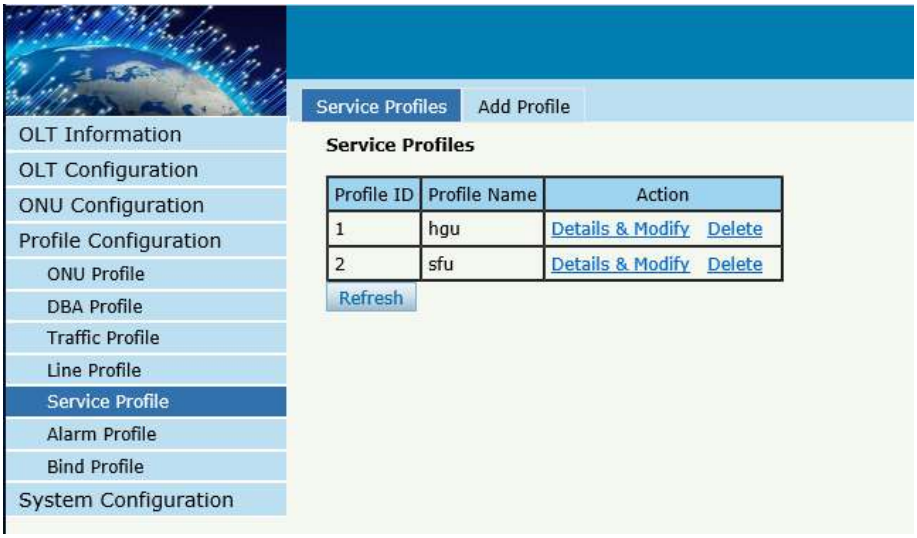

Figure 5-15 Service profile list

5.3.2 Add profile

Profile Configuration→Line Profile →Add Profile

Create a new service profile

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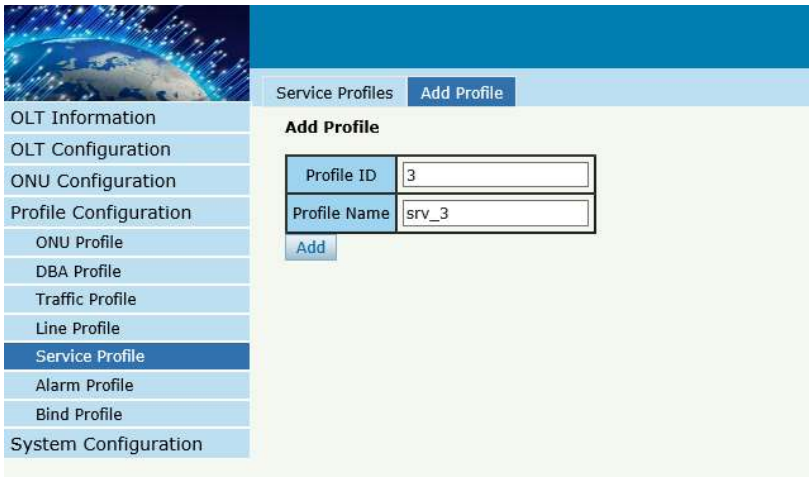

Figure 5-16 Add Service profile

Figure 5-17 Modify Service profile

Set the VLAN mode of the ONU's port.

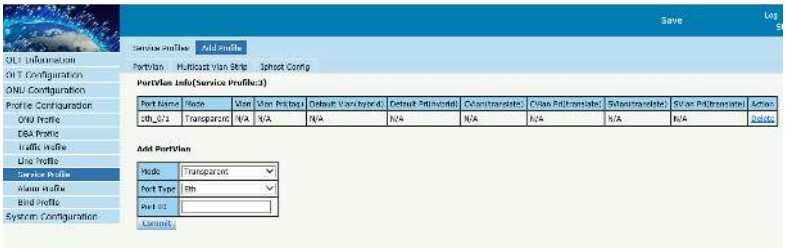

Figure 5-18 Port VLAN mode

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Set the Multicast VLAN mode of ONU's port

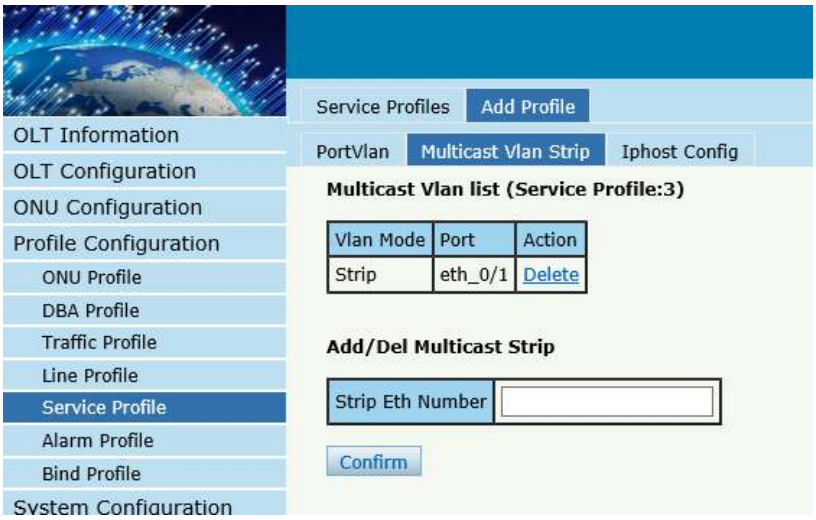

Figure 5-19 Port multicast VLAN mode

Create Iphost for ONU wan connection.

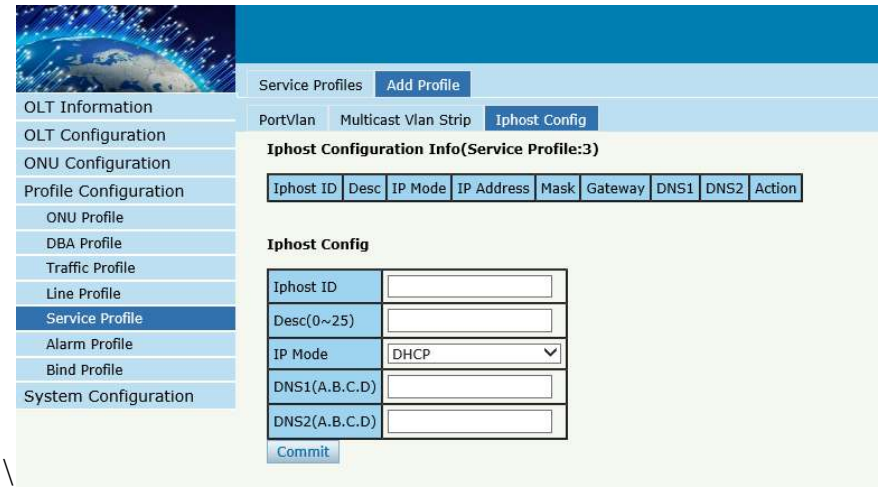

Figure 5-20 Add IPhost

5.6 Alarm Profile

Alarm profile is used to configure the parameters of ONU alarm.

5.4.1 Profile info

Profile Configuration→Alarm Profile →Profile info

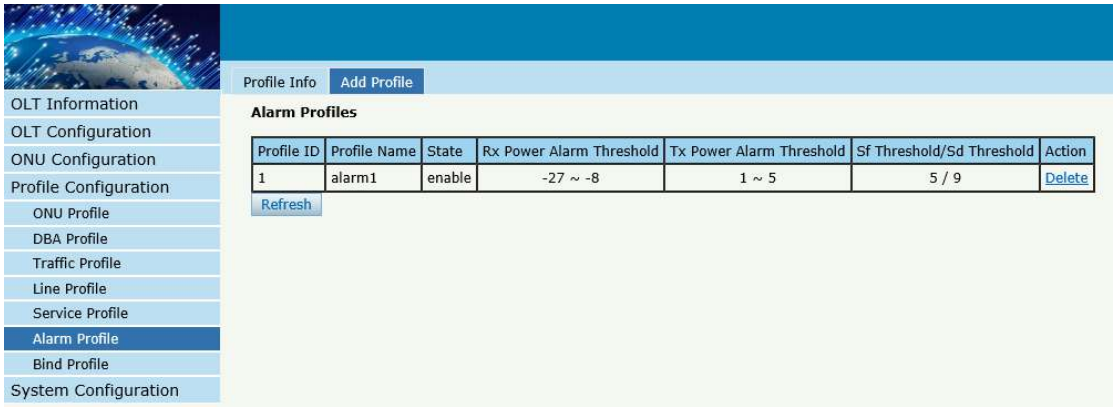

Figure 5-21 Alarm Profile list

5.4.2 Add profile

Profile Configuration→Alarm Profile →Add profile

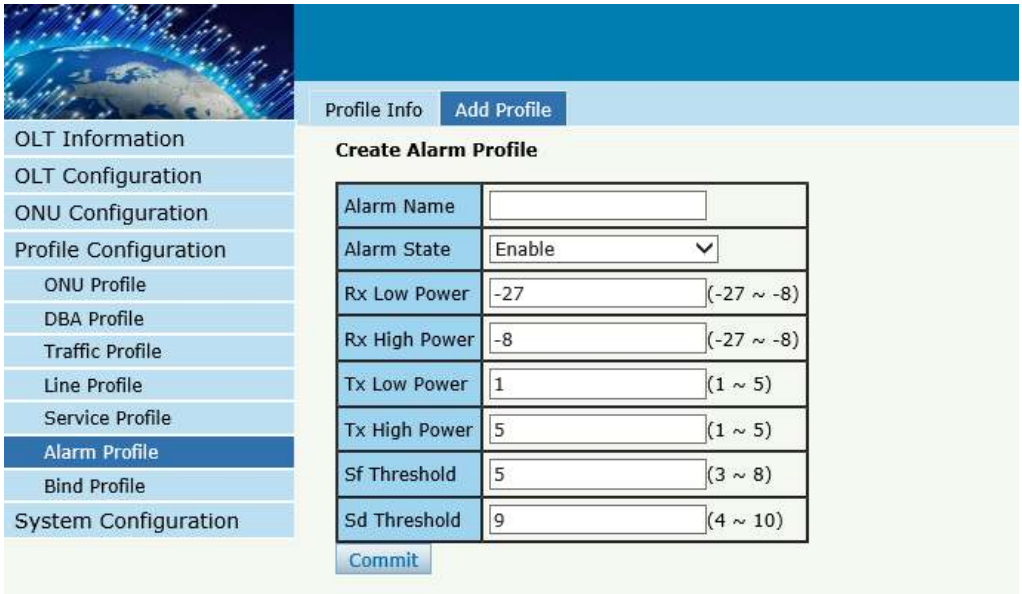

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Figure 5-21 Create Alarm profile

5.7 Bind Profile

After profile is configured, it is necessary to bind it to ONU.

Profile Configuration→Bind Profile

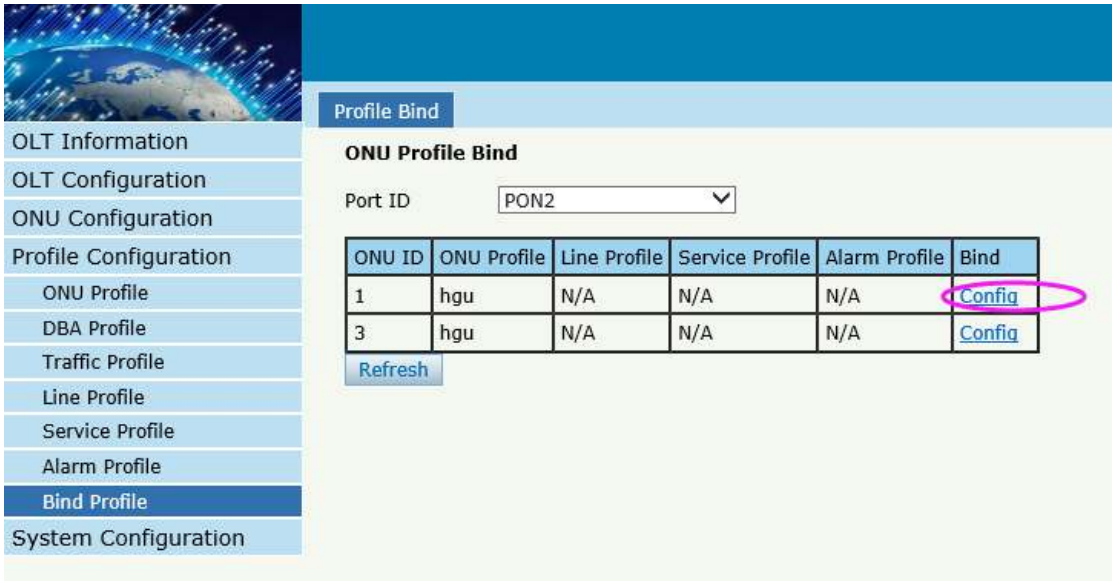

Figure 5-22 Bind profile

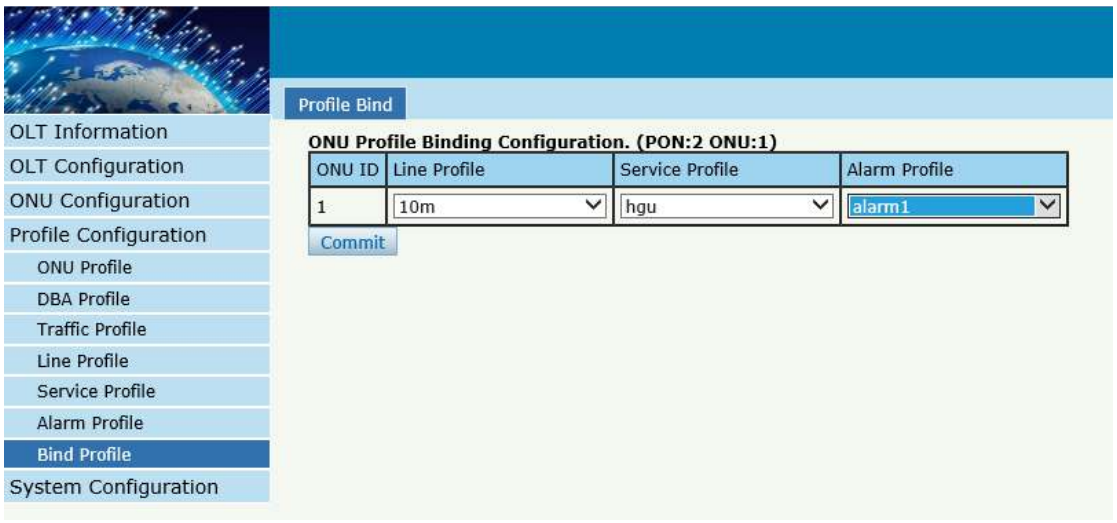

Figure 5-23 select Profile

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Chapter 6 System Configuration

This chapter is about the global management of OLT.

6.1 System Log

6.1.1 System Log

System Configuration→System Log

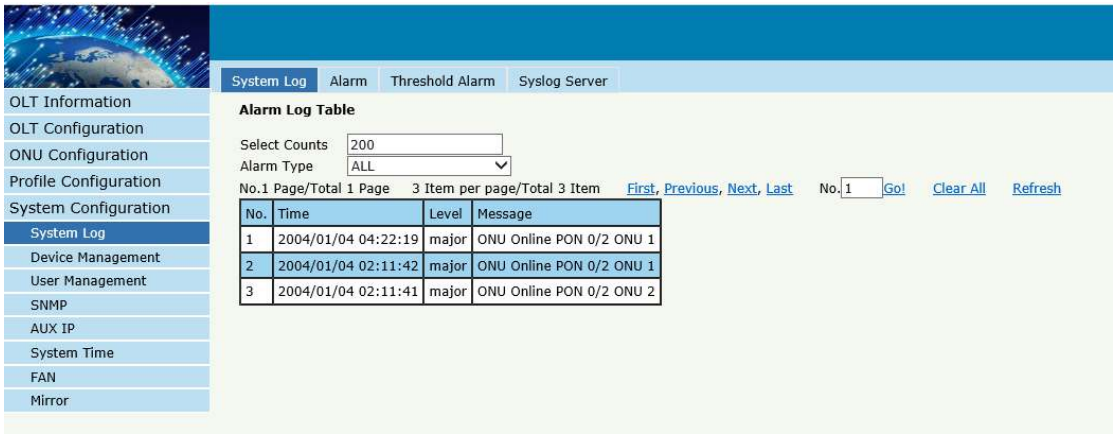
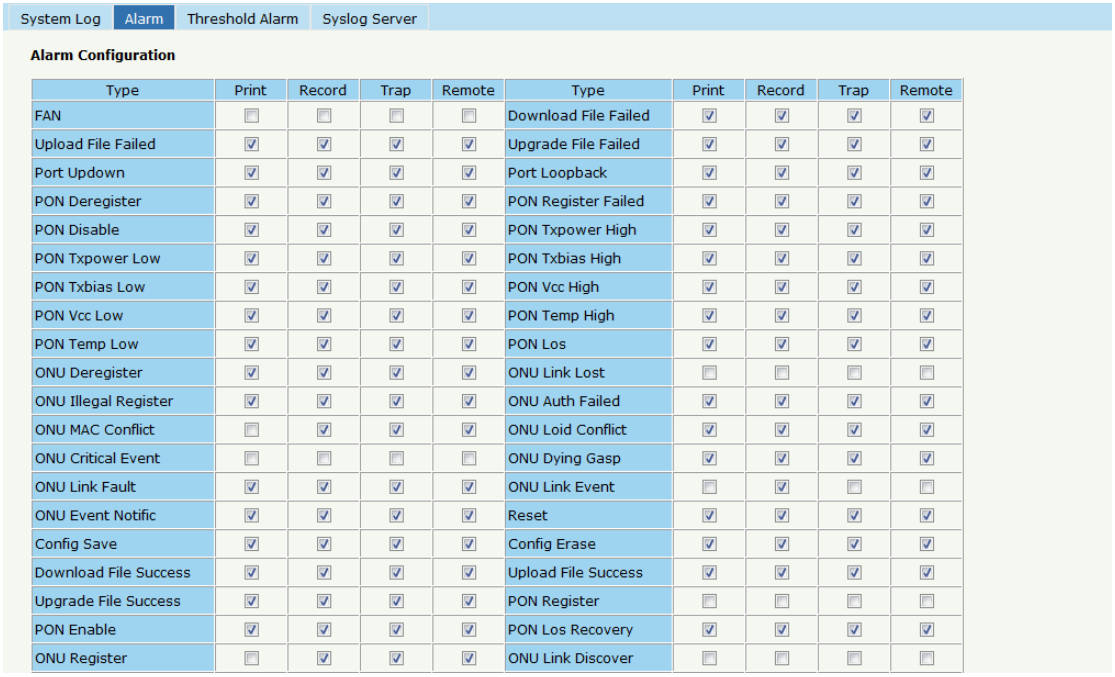


Figure 6-1 System Log

6.1.2 Alarm

System Configuration →System Log →Alarm.

It contains all the alarms of OLT. User can choose the different alarms to "**Print**", "**Record**", "**Trap**" and "**Remote**".



Type	Print	Record	Trap	Remote	Type	Print	Record	Trap	Remote
FAN	☐	☐	☐	☐	Download File Failed	☑	☑	☑	☑
Upload File Failed	☑	☑	☑	☑	Upgrade File Failed	☑	☑	☑	☑
Port Updown	☑	☑	☑	☑	Port Loopback	☑	☑	☑	☑
PON Deregister	☑	☑	☑	☑	PON Register Failed	☑	☑	☑	☑
PON Disable	☑	☑	☑	☑	PON Txpower High	☑	☑	☑	☑
PON Txpower Low	☑	☑	☑	☑	PON Txbias High	☑	☑	☑	☑
PON Txbias Low	☑	☑	☑	☑	PON Vcc High	☑	☑	☑	☑
PON Vcc Low	☑	☑	☑	☑	PON Temp High	☑	☑	☑	☑
PON Temp Low	☑	☑	☑	☑	PON Los	☑	☑	☑	☑
ONU Deregister	☑	☑	☑	☑	ONU Link Lost	☐	☐	☐	☐
ONU Illegal Register	☑	☑	☑	☑	ONU Auth Failed	☑	☑	☑	☑
ONU MAC Conflict	☐	☑	☑	☑	ONU Loid Conflict	☑	☑	☑	☑
ONU Critical Event	☐	☐	☐	☐	ONU Dying Gasp	☑	☑	☑	☑
ONU Link Fault	☑	☑	☑	☑	ONU Link Event	☐	☑	☐	☐
ONU Event Notific	☑	☑	☑	☑	Reset	☑	☑	☑	☑
Config Save	☑	☑	☑	☑	Config Erase	☑	☑	☑	☑
Download File Success	☑	☑	☑	☑	Upload File Success	☑	☑	☑	☑
Upgrade File Success	☑	☑	☑	☑	PON Register	☐	☐	☐	☐
PON Enable	☑	☑	☑	☑	PON Los Recovery	☑	☑	☑	☑
ONU Register	☐	☑	☑	☑	ONU Link Discover	☐	☐	☐	☐

Figure 6-2 Alarm

6.1.3 Threshold Alarm

Configure the temperature threshold, CPU-usage threshold and memory- usage threshold, PON optical threshold. Click **System Configuration →System Log →Threshold Alarm.**

Figure 6-3 Threshold Alarm

6.1.4 Syslog Server

Configure the server of OLT remote system logs. Click **System Configuration→System Log →Syslog Server.**

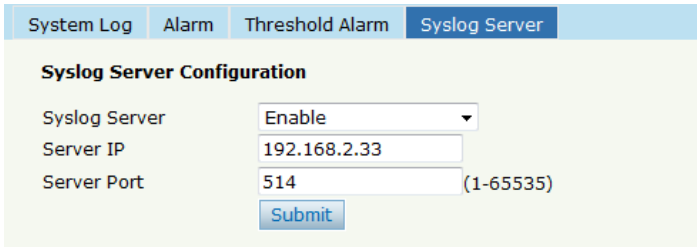


Figure 6-4 Syslog Server

6.2 Device Management

6.2.1 Firmware Upgrade

System Configuration→Device Management →Firmware Upgrade.

You can upgrade the OLT firmware by WEB, need to reboot the OLT after upgrade to take effect.

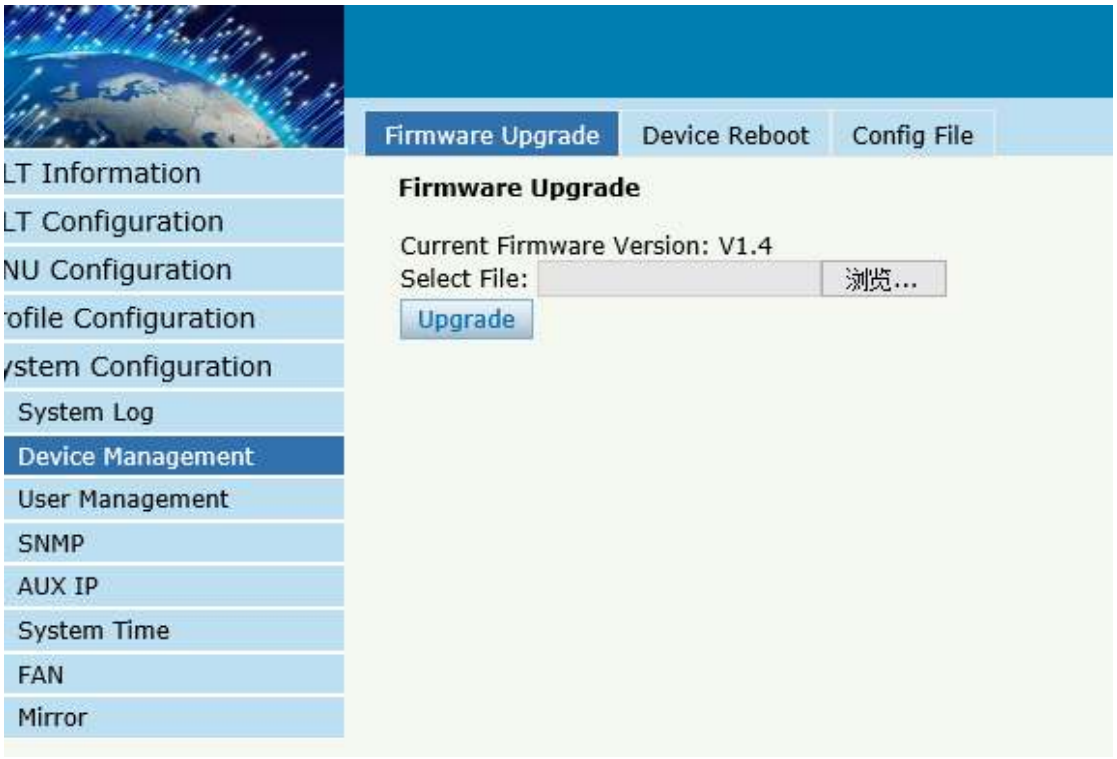


Figure 6-5 Firmware Upgrade

6.2.2 Device Reboot

System Configuration→Device Management →Device Reboot

It will reboot the entire system.(Please save the configuration first)

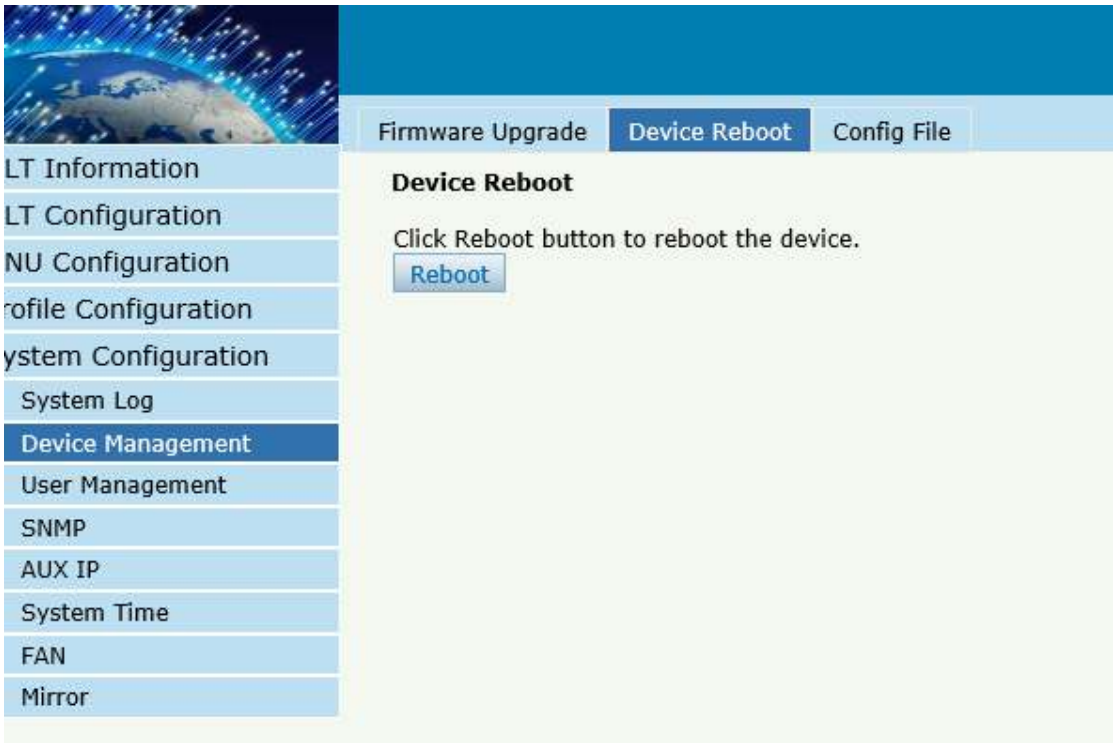


Figure 6-6 Device Reboot

6.2.3 Config File

System Configuration→Device Management →Config File,

You can backup configuration, restore configuration, restore factory defaults and save configuration.

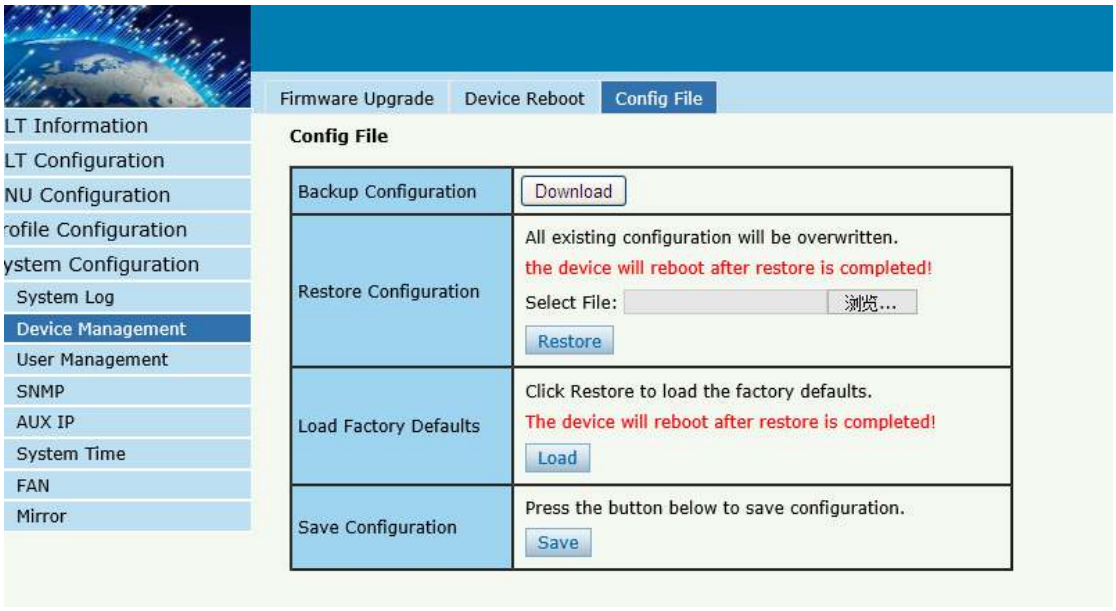


Figure 6-7 File Configuration

6.3 User Management

System Configuration→User manage

Two kinds of users have been defined, Normal and Admin. There are limitations to a normal user, and admin user has no limits . The default account member is **Admin** level.

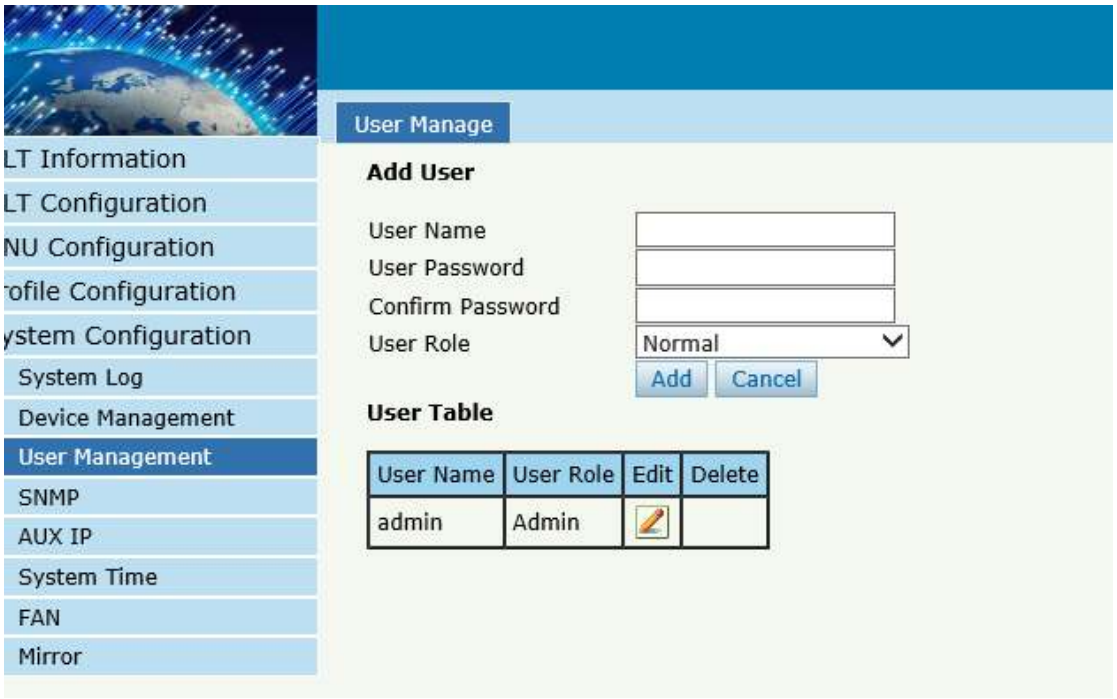


Figure6-8: User Manage

6.4 SNMP

6.4.1 SNMP V1/V2

System Configuration → SNMP →SNMP V1/V2

The OLT supports SNMP v1/v2,

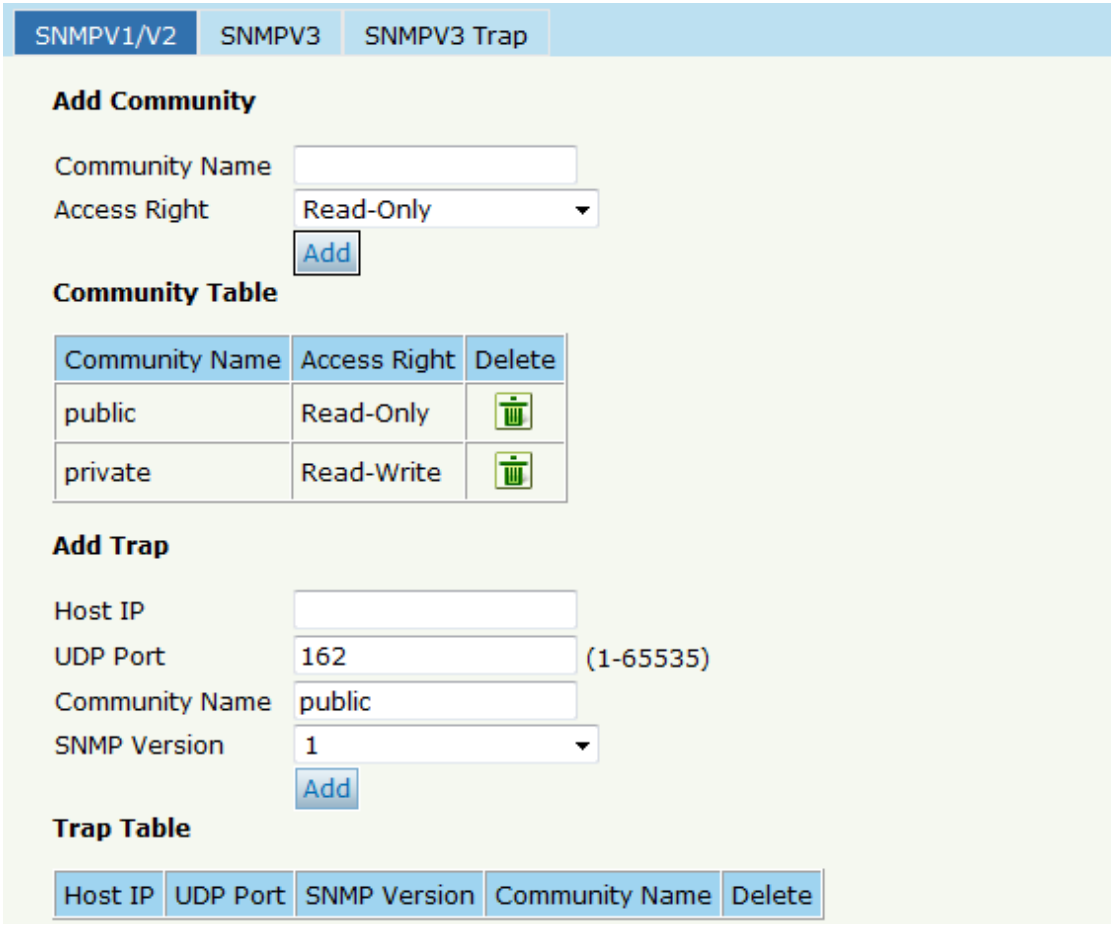


Figure6-9: SNMP V1/V2

6.4.2 SNMP V3

System Configuration → SNMP →SNMP V3

The OLT supports SNMP V3.

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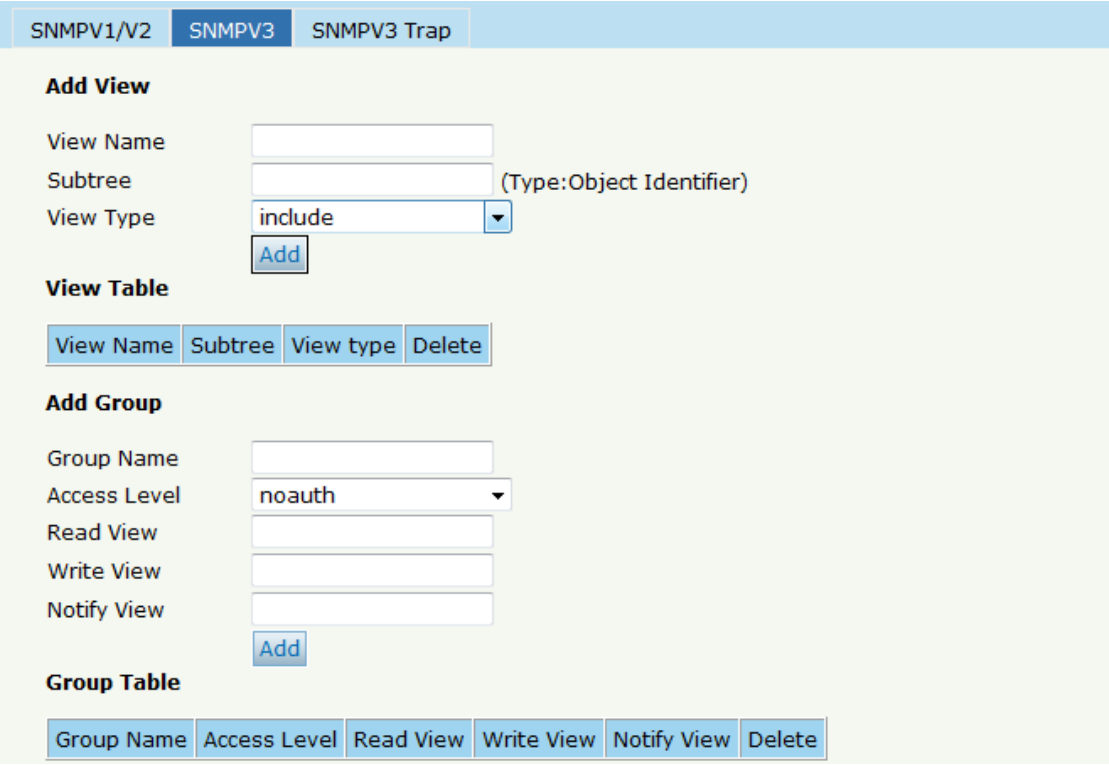

Figure6-10: SNMP V3

6.4.3 SMNP V3 Trap

System Configuration → SNMP →SNMP V3 Trap

Configure or remove the Trap messages of the target host IP address.

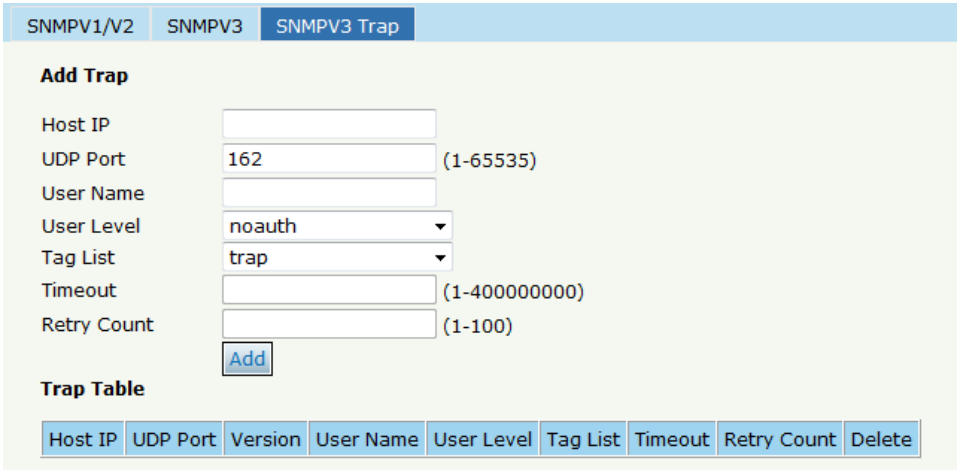

Figure 6-11: SNMP V3 Trap

6.5 AUX IP

System Configuration → AUX IP

AUX port is out band management port. The IP address is out band management IP, default IP address is 192.168.8.200.

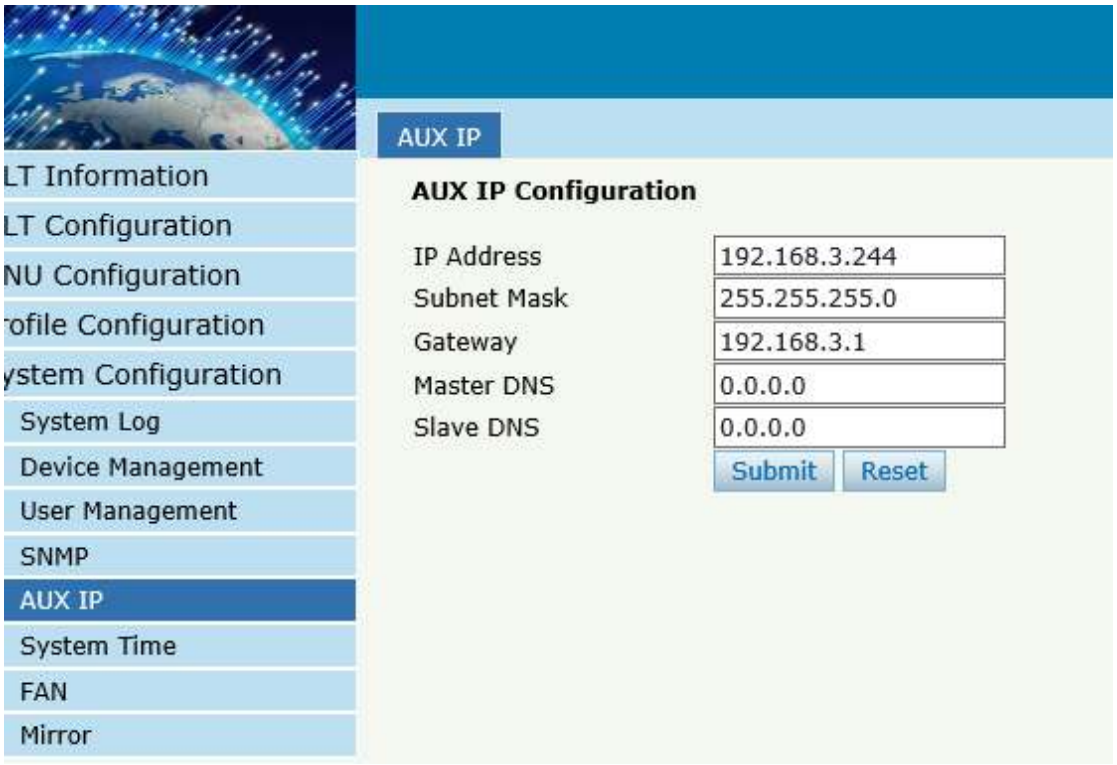

Figure 6-12: AUX IP

6.6 System Time

6.6.1 RTC

System Configuration → System Time→RTC .

The user can customize the OLT system time

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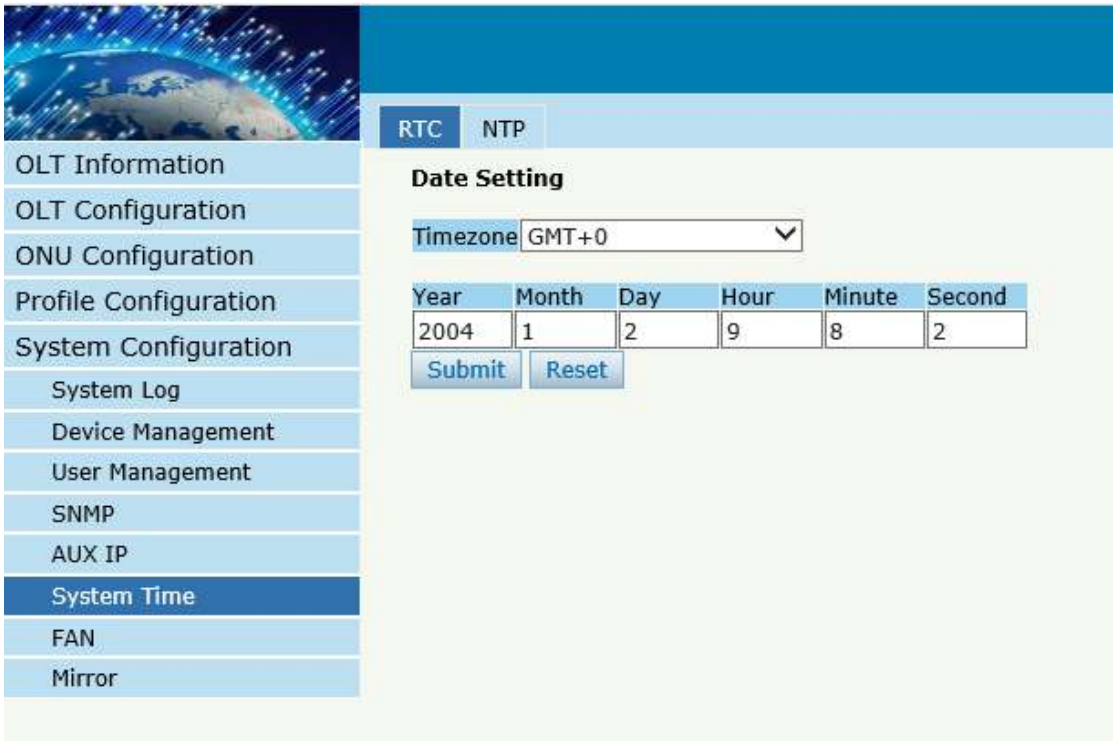

Figure 6-13: RTC Configuration

6.6.2 NTP

System Configuration → System Time→NTP

Synchronize the time to the NTP server.

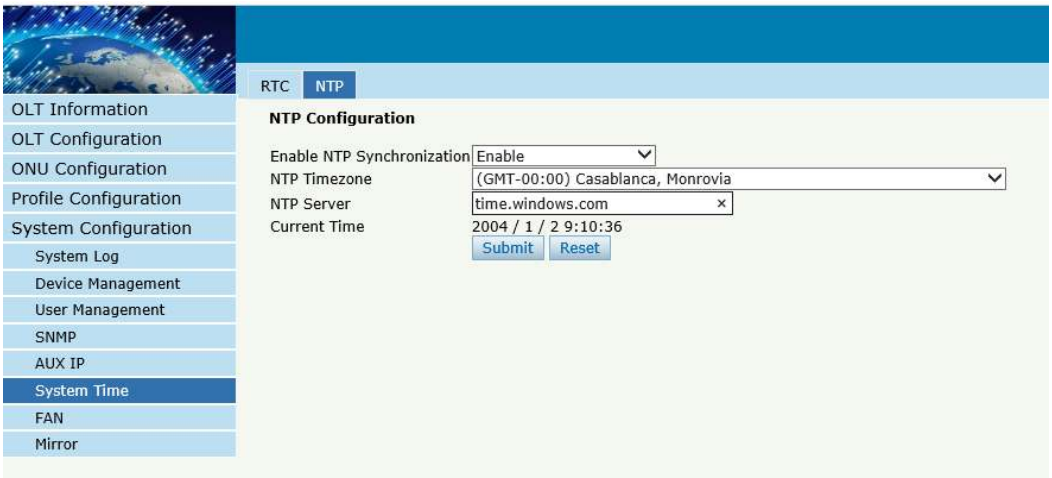

Figure 6-14: NTP Configuration

6.7 FAN

System Configuration → FAN.

The fans can be controlled to turn on/off, or turn on automatically.

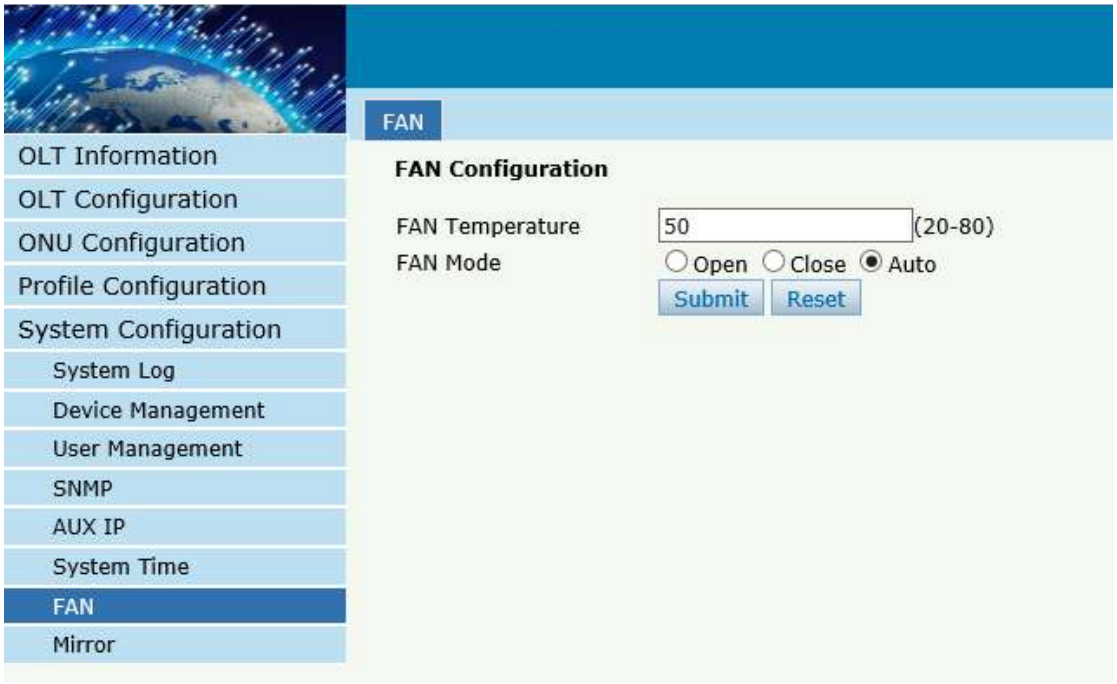

Figure 6-15: FAN Configuration

6.8 Mirror

System Configuration → Mirror.

Each monitor session can be set with one destination port and up to 8 source ports.

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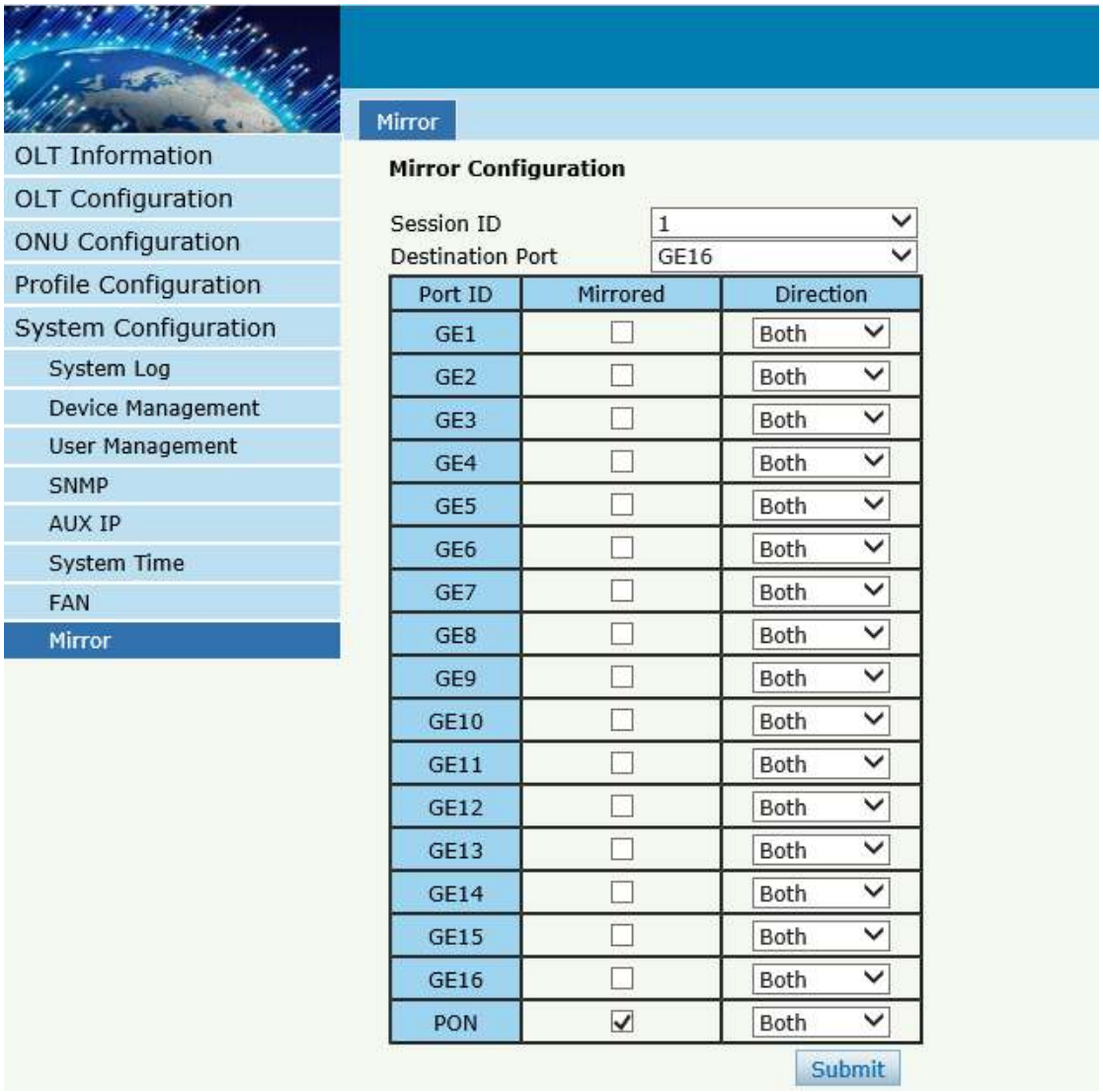

Figure 6-16: Mirror

This product comes with standard one year warranty. For further details about warranty policy and Product Registration, please visit support section of www.digisol.com

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