

# A Smarter Way for Your Broadband Life

Huawei HG8120H, an intelligent routing-type ONT

Smart service

Smart  
interconnection



Smart O&M

## ○ Device Parameters

|                        |                                  |                           |                       |
|------------------------|----------------------------------|---------------------------|-----------------------|
| Dimensions (H x W x D) | 135 mm x 115 mm x 27 mm          | System power supply       | 11–14 V DC, 1 A       |
| Weight                 | < 500 g                          | Static power consumption  | 4 W                   |
| Operating temperature  | 0° C to +40° C                   | Maximum power consumption | 5.5 W                 |
| Operating humidity     | 5% RH to 95% RH (non-condensing) | Ports                     | 1POTS+1GE+1FE         |
| Power adapter input    | 100–240 V AC, 50–60 Hz           | Indicators                | POWER/PON/LOS/LAN/TEL |

## ○ Interface Parameters

| GPON Port                                                                                                                                                                                                                                                                                                                                                                              | Ethernet Port                                                                                                                                                                                                                                                        | POTS Port                                                                                                                                                                                                                  |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <ul style="list-style-type: none"> <li>Class B+</li> <li>Receiver sensitivity: -27dBm</li> <li>Wavelengths: US 1310nm, DS 1490nm</li> <li>Wavelength blocking filter (WBF)</li> <li>Flexible mapping between GEM Port and TCONT</li> <li>GPON: consistent with the SN or password authentication defined in G.984.3</li> <li>Bi-directional FEC</li> <li>SR-DBA and NSR-DBA</li> </ul> | <ul style="list-style-type: none"> <li>Ethernet port-based VLAN tags and tag removal</li> <li>1:1 VLAN, N:1 VLAN, or VLAN transparent transmission</li> <li>QinQ VLAN</li> <li>Limit on the number of learned MAC addresses</li> <li>MAC address learning</li> </ul> | <ul style="list-style-type: none"> <li>Maximum REN: 4</li> <li>G.711A/μ, G.729a/b, and G.722 encoding/decoding</li> <li>T.30/T.38/G.711 fax mode</li> <li>DTMF</li> <li>Emergency calls (with the SIP protocol)</li> </ul> |

## ○ Product Function

|                              |                                                                                                                                                                                                                                                                                                   |                         |                                                                                                                                                                                                                                                                                               |
|------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Smart interconnection</b> | <ul style="list-style-type: none"> <li>SIP/H.248 auto-negotiation</li> <li>Any port any service</li> <li>Parental control</li> </ul>                                                                                                                                                              | <b>QoS</b>              | <ul style="list-style-type: none"> <li>Ethernet port rate limitation</li> <li>802.1p priority</li> <li>SP/WRR/SP+WRR</li> <li>Broadcast packet rate limitation</li> </ul>                                                                                                                     |
| <b>Smart O&amp;M</b>         | <ul style="list-style-type: none"> <li>IPTV video quality diagnosis (V300R015C10)</li> <li>Variable-length OMCI messages</li> <li>Active/Passive rogue ONT detection and isolation</li> <li>PPPoE/DHCP simulation testing</li> <li>Call emulation, and circuit test and loop-line test</li> </ul> | <b>Layer 3 Features</b> | <ul style="list-style-type: none"> <li>PPPoE/Static IP/DHCP</li> <li>NAT/NAPT</li> <li>Port forwarding</li> <li>ALG, UPnP</li> <li>DDNS/DNS server/DNS client</li> <li>IPv6/IPv4 dual stack, and DS-Lite</li> <li>Static/Default routes</li> <li>Multiple services on one WAN port</li> </ul> |
| <b>Security</b>              | <ul style="list-style-type: none"> <li>SPI firewall</li> <li>Anti-DoS attack</li> <li>Filtering based on MAC/IP/URL addresses</li> </ul>                                                                                                                                                          | <b>Multicast</b>        | <ul style="list-style-type: none"> <li>IGMP v2/v3 snooping</li> <li>IGMP v2/v3 proxy</li> <li>MLD v1/v2 snooping</li> </ul>                                                                                                                                                                   |
| <b>Power Saving</b>          | <ul style="list-style-type: none"> <li>Dynamic power saving</li> <li>Indicator power saving</li> <li>COCv4</li> </ul>                                                                                                                                                                             | <b>Common O&amp;M</b>   | <ul style="list-style-type: none"> <li>OMCI/Web UI/TR069</li> <li>Dual-system software backup and rollback</li> </ul>                                                                                                                                                                         |