Making the World Better

Your Reliable Optical Access Solution Provider

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PHYHOME

2023 PRODUCT BROCHURE

CATALOG

COMPANY PROFILE

FOCUS ON BRAND SERVE THE WORLD

PHYHOME was founded in 2003, with headquarters located in Shenzhen and a development center in Wuhan. The company operates production bases in Shenzhen and Dongguan. PHYHOME specializes in providing efficient and stable total solutions for optical network access worldwide, which helps operators to quickly and cost-effectively deploy FTTX networks.

PHYHOME has a skilled R&D team dedicated to in-depth research on core networks, access networks, and wireless products. We have accumulated nearly a hundred intellectual property rights, making us an excellent manufacturer and solution provider of comprehensive service products, including a complete set of optical access network products such as XGSPON/XGPON/GPON/EPON, 5GCPE, routers, switches, optical modules, and passive optical components. Our business segments include all-optical industrial networks and F5G, and we can provide mature solutions for all-optical campuses and all-optical data centers.

PHYHOME is dedicated to developing a strong brand presence through the creation of high-value products and services that benefit our customers. To achieve this, we have established a skilled team of professionals in R&D, production, sales, and technical support who can quickly provide customers with information about our products and solutions. Our products are widely used and recognized by operators, government entities, and enterprise customers in China, as well as in regions such as Latin America, Africa, Europe, and Southeast Asia. We are committed to continuously optimizing our products and services as we strive to become a leading provider of optical communication solutions on an international scale.

Years of Dedication Constant Breakthroughs

2003
· The company was founded.

2005
· Awarded as High-tech Enterprise of Shenzhen.

2006
· Launched optical transmission and switch data communication solutions.

2010
· Launched industrial-grade communication solutions.
· Awarded as National High-tech Enterprise.

2013
· Launched FTTx solutions.
· Awarded as Shenzhen Double Soft Enterprise.

2015
· Awarded as Shenzhen Top 100 Independent Innovation Enterprises.
· Reached a deep cooperation with operators.

2017
· Breakthrough growth in IIPR and overseas business.
· Launched wireless coverage solutions.

2019
· Self-research WiFi6,
· Layout POL

2021
· Self-research XGSPON Wi-Fi 6,
· Layout FTTr

2022
· Self-research XGSPON OLT,
· Layout F5G
· Self-research TSN industrial switch,
· Awarded as Specialized and Sophisticated SME of Shenzhen.

Layout Global Serve both Domestic and Overseas Customers

We provide services throughout China with service centers in every province/-municipality and cooperate with government and enterprise entities as well as major telecommunication operators (CMCC, CUCC, CTC, and China Broadcasting Network).

Our global market presence includes Asia, Africa, Europe, South America, and North America. We have a well-established agency model with nearly 50 agency networks worldwide.

BUSINESS ADVANTAGES

In the evolution of the global digital wave, the information network industry has become a new source of economic development that countries are competing to develop, and optical communications, as a key link in the overall information and communication network, is showing an upward trend in its development, with billion-dollar market potential at the touch of a button.

Policy Support Helps to Soar

With the support of the "14th Five-Year Plan" and new infrastructure construction and other policies, the ICT industry will stimulate the greatest energy. The “14th Five-Year Plan” for digital economy development indicates that the integration of ICT applications should be an important driving force in creating a digital economy, and the expansion and speed-up of fiber-optic networks should be promoted to accelerate the deployment of gigabit fiber-optic networks. Gigabit network policy will benefit WiFi6, making its application more widespread and higher penetration. Likewise, new fixed network technologies such as F5G will have more opportunities to perform in mobile bearer networks, broadband access networks, OTN metro networks, backbone networks, and government and enterprise cloud private lines, which will further develop in depth toward. In the next few years, the optical communication industry will follow the national strategic arrangement and usher in a new round of takeoff.

Digital Transformation Will Witness the Next Change

Big data, AI, IoT, and cloud computing, as the four major segments of today's information technology, are gradually being applied commonly, making the future pattern of the trendy industry ever clearer, and the transformation to digitalization has become an irreversible trend in all industries. On the path to industrial digitization, communication as a basic aid must be strong and reliable. Take the enterprise to the cloud as an example, the key to the digital transformation of enterprises is the cloud and optics integration. Research shows that 43.1% of enterprises believe that the network is a pain point for enterprises to go to the cloud. F5G all-optical chassis is a key technology for enhancing cloud network capabilities and is a key layout area for operators and equipment vendors in the future.

In the past, optical networks have strongly supported FTTH and 4/5G networks, enabling China's Internet and mobile Internet to see great development. In the future, optical networks will also witness the next change with their constantly upgraded powerful performance and high stability.

PRODUCTS

OLT

XG(S)PON OLT

Model: XL8	
PON Ports	8*XG(S)PON
Uplink Ports	4*10GE+2*100G SFP
Dimensions	440*300*44mm,1U
Power Supply	DC/AC
Power Consumption	⩽190W

Model: XL16	
PON Ports	16*XG(S)PON
Uplink Ports	4*10GE+2*100G SFP
Dimensions	440*300*44mm,1U
Power Supply	DC/AC
Power Consumption	⩽190W

GPON OLT

Model: L8	
PON Ports	8*GPON
Uplink Ports	4*GE+4*SFP+
Dimensions	440*300*44mm,1U
Power Supply	DC/AC
Power Consumption	⩽60W

Model: L16	
PON Ports	16*GPON
Uplink Ports	4*GE+4*SFP+
Dimensions	440*300*44mm,1U
Power Supply	DC/AC
Power Consumption	⩽60W

EPON OLT

Model: LE4	
PON Ports	4*EPON
Uplink Ports	4*GE+4*SFP/SFP+
Dimensions	440*300*44mm,1U
Power Supply	DC/AC
Power Consumption	⩽60W

Model: LE8	
PON Ports	8*EPON
Uplink Ports	4*GE+4*SFP+
Dimensions	440*300*44mm,1U
Power Supply	DC/AC
Power Consumption	⩽60W

Model: LE16	
PON Ports	16*EPON
Uplink Ports	4*GE+4*SFP+
Dimensions	440*300*44mm,1U
Power Supply	DC/AC
Power Consumption	⩽60W

ONT

Model: P3	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*GE
Dimensions	104*70*22mm
Power Supply	DC 12V 0.5A
Power Consumption	⩽6W

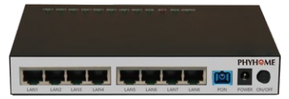
Model: P4	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*GE+1*CATV
Dimensions	104*70*22mm
Power Supply	DC 12V 0.5A
Power Consumption	⩽6W

Model: P5	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*GE+1*POTS
Dimensions	104*70*22mm
Power Supply	DC 12V 0.5A
Power Consumption	⩽6W

Model: P6	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*2.5G GE+1*GE
Dimensions	104*70*22mm
Power Supply	DC 12V 0.5A
Power Consumption	⩽6W

Model: P7	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*GE+1*FE+1*POTS
Dimensions	104*70*22mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P8	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*GE+3*FE(GE)
Dimensions	104*70*22mm
Power Supply	DC 12V 0.5A
Power Consumption	⩽6W



Model: P4M	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	4*GE(PoE Optional)
Dimensions	155*112*34mm
Power Supply	DC 12V 0.5A
Power Consumption	⩽6W

Model: P8M	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	8*GE(PoE Optional)
Dimensions	200*120*28mm
Power Supply	AC 100~240V 1A
Power Consumption	⩽12W

Model: P16M	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	16*GE(PoE Optional)
Dimensions	440*180*44mm
Power Supply	AC 100~240V 1A
Power Consumption	⩽12W

ONT

Model: P24M	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	24*GE(PoE Optional)
Dimensions	440*180*44mm
Power Supply	AC 100~240V 1A
Power Consumption	⩽12W

Model: P10	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*GE+1*FE+300M WiFi
Wireless Standard	802.11 b/g/n, 2.4GHz
Antennas	2*5dBi
Dimensions	126*85*26mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P11	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*GE+1*FE+300M WiFi+1*POTS
Wireless Standard	802.11 b/g/n, 2.4GHz
Antennas	2*5dBi
Dimensions	126*85*26mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P14N	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*GE+3*FE+300M WiFi
Wireless Standard	802.11 b/g/n, 2.4GHz
Antennas	2*5dBi
Dimensions	182*110*30mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P14UD	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*GE+3*FE+1*POTS+300M WiFi
Wireless Standard	802.11 b/g/n, 2.4GHz
Antennas	2*5dBi
Dimensions	155*116*35mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P17	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*GE+3*FE+300M WiFi+1*CATV
Wireless Standard	802.11 b/g/n, 2.4GHz
Antennas	2*5dBi
Dimensions	182*110*30mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

ONT

Model: P17D	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*GE+3*FE+1*POTS+300M WiFi+CATV
Wireless Standard	802.11 b/g/n, 2.4GHz
Antennas	2*5dBi
Dimensions	155*116*35mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P18	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*GE+1*FE+300M WiFi+1*CATV
Wireless Standard	802.11 b/g/n, 2.4GHz
Antennas	2*5dBi
Dimensions	126*85*26mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P19	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	1*GE+1*FE+1*POTS+300M WiFi+1*CATV
Wireless Standard	802.11 b/g/n, 2.4GHz
Antennas	2*5dBi
Dimensions	126*85*26mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P20	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	2*GE+1*POTS+1200M WiFi
Wireless Standard	802.11 ac/b/g/n, 2.4GHz & 5GHz
Antennas	4*6dBi
Dimensions	204*127*33mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P20UD	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	2*GE+1*POTS+1200M WiFi
Wireless Standard	802.11 ac/b/g/n, 2.4GHz & 5GHz
Antennas	2*6dBi
Dimensions	155*116*35mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P24	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	4*GE+1*POTS+1200M WiFi
Wireless Standard	802.11 ac/b/g/n, 2.4GHz & 5GHz
Antennas	4*6dBi
Dimensions	204*127*33mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

ONT

Model: P24UD	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	4*GE+1*POTS+1200M WiFi
Wireless Standard	802.11 ac/b/g/n, 2.4GHz & 5GHz
Antennas	2*6dBi
Dimensions	155*116*35mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P27 Pro	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	4*GE+1*POTS+1200M WiFi+1*CATV
Wireless Standard	802.11 ac/b/g/n, 2.4GHz & 5GHz
Antennas	4*6dBi
Dimensions	224*137*35mm
Power Supply	DC 12V 1.5A
Power Consumption	⩽18W

Model: P28	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	4*GE+2*POTS+1200M WiFi
Wireless Standard	802.11 ac/b/g/n, 2.4GHz & 5GHz
Antennas	4*6dBi
Dimensions	242*172*33mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

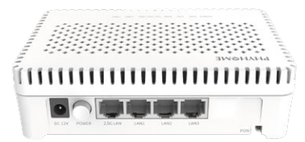
Model: P30 WiFi6	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	2*GE+1*POTS+1800M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	4*6dBi
Dimensions	204*127*33mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P34 WiFi6	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	4*GE+1*POTS+1800M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	4*6dBi
Dimensions	204*127*33mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P35 WiFi6	
PON Ports	1*xPON SC/UPC(SC/APC Optional)
User Ports	4*GE+1*POTS+3000M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	5*6dBi
Dimensions	224*137*35mm
Power Supply	DC 12V 1.5A
Power Consumption	⩽18W

XG(S) PON ONT

Model: P50	
PON Ports	1*XGSPON SC/UPC(SC/APC Optional)
User Ports	1*10GE
Dimensions	139*91*40mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W



Model: P44	
PON Ports	1*XGPON SC/UPC(SC/APC Optional)
User Ports	1*2.5G GE+3*GE
Dimensions	139*91*40mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: P46 WiFi6	
PON Ports	1*XGPON SC/UPC(SC/APC Optional)
User Ports	1*2.5GE+3*GE+1*POTS+3000M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	4*6dBi
Dimensions	225*139*42mm
Power Supply	DC 12V 1.5A
Power Consumption	⩽18W

Model: P55 WiFi6	
PON Ports	1*XGSPON SC/UPC(SC/APC Optional)
User Ports	1*10GE+3*GE+1*POTS+3000M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	4*6dBi
Dimensions	225*139*42mm
Power Supply	DC 12V 1.5A
Power Consumption	⩽18W

Model: P56 WiFi6	
PON Ports	1*XGSPON SC/UPC(SC/APC Optional)
User Ports	1*10GE+1*2.5G GE+2*GE+ 1*POTS+3000M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	4*6dBi
Dimensions	225*139*42mm
Power Supply	DC 12V 1.5A
Power Consumption	⩽18W

Model: P58 WiFi6	
PON Ports	1*XGSPON SC/UPC(SC/APC Optional)
User Ports	2*10GE+2*GE+1*POTS+6000M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	4*6dBi
Dimensions	225*139*42mm
Power Supply	DC 12V 1.5A
Power Consumption	⩽18W

ONT

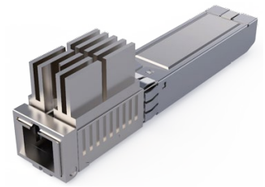
Wall-Mount ONT

Model: P2W	
PON Ports	1*GPON SC/UPC
User Ports	2*GE
Dimensions	110*85*54mm
Power Supply	AC 220V 50~60Hz
Power Consumption	⩽7W

Model: P2VW	
PON Ports	1*GPON SC/UPC
User Ports	2*GE+2*POTS
Dimensions	110*85*54mm
Power Supply	AC 220V 50~60Hz
Power Consumption	⩽7W

Model: P4W	
PON Ports	1*GPON SC/UPC
User Ports	4*GE
Dimensions	110*85*54mm
Power Supply	AC 220V 50~60Hz
Power Consumption	⩽7W

PON Stick ONT



Model: P1S	
PON Ports	1*GPON SC/UPC(SC/APC Optional)
Interfaces	SFP
Dimensions	72*14*12.6mm
Operating Temperature	-40~85°C
Power Consumption	⩽2.4W

Model: P1XS	
PON Ports	1*XGSPON SC/UPC(SC/APC Optional)
Interfaces	SFP+
Dimensions	72*14*21.6mm
Operating Temperature	-40~85°C
Power Consumption	⩽2.4W

Wireless Series

Router

Model: W2	
User Ports	1*GE WAN+3*GE LAN+1200M WiFi
Wireless Standard	802.11 ac/b/g/n, 2.4GHz & 5GHz
Antennas	4*6dBi
Dimensions	204*127*35mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: W3 WiFi6	
User Ports	1*GE WAN+3*GE LAN+1800M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	4*6dBi
Dimensions	204*127*35mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: W5 WiFi6	
User Ports	1*GE WAN+3*GE LAN+3000M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	5*6dBi
Dimensions	224*137*35mm
Power Supply	DC 12V 1.5A
Power Consumption	⩽12W

Mesh Router

Model: M2	
User Ports	1*GE WAN+2*GE LAN+1200M WiFi
Wireless Standard	802.11 ac/b/g/n, 2.4GHz & 5GHz
Antennas	2*5dBi
Dimensions	89*89*68.5mm
Power Supply	DC 12V 1A
Power Consumption	⩽7W

Model: M3 WiFi6	
User Ports	1*GE WAN+2*GE LAN+1800M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	2*5dBi
Dimensions	105*105*87mm
Power Supply	DC 12V 1A
Power Consumption	⩽12W

Model: M5 WiFi6	
User Ports	1*GE WAN+2*GE LAN+3000M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	4*5dBi
Dimensions	110*112*195mm
Power Supply	DC 12V 1.5A
Power Consumption	⩽18W

Wireless Series

Ceiling AP

Model: W1C	
User Ports	1*FE WAN+1*FE LAN+300M WiFi
Dimensions	Diameter 188*33mm
Power Supply	DC 12V 0.5A, PoE 48V 802.3af

Model: W2C	
User Ports	1*GE WAN+1*GE LAN+1200M WiFi
Dimensions	198*198*32mm
Power Supply	DC 12V 1.5A, PoE 48V 802.3at

Model: W3C WiFi6	
User Ports	1*GE WAN+1*GE LAN+1800M WiFi
Dimensions	188*188*35mm
Power Supply	DC 12V 1.5A, PoE 48V 802.3at

Wall-Mount AP

Model: W1W	
User Ports	1*FE WAN+1*FE LAN+300M WiFi
Dimensions	86*86*36mm
Power Supply	DC 12V 0.5A, PoE 48V 802.3af

Model: W2W	
User Ports	1*GE WAN+1*GE LAN+1*RJ11+1200M WiFi
Dimensions	86*86*32mm
Power Supply	DC 12V 1.5A, PoE 48V 802.3at

Model: W3W WiFi6	
User Ports	1*GE WAN+1*GE LAN+1800M WiFi
Dimensions	86*86*35mm
Power Supply	DC 12V 1.5A, PoE 48V 802.3at

Outdoor AP

Model: W1O	
User Ports	1*FE WAN+1*FE LAN+300M WiFi
Dimensions	262*88*58mm
Power Supply	DC 12V 1A, PoE 24V 802.3af

Model: W2O	
User Ports	1*GE WAN+1*GE LAN+1200M WiFi
Dimensions	315*145*80mm
Power Supply	DC 12V 2A, PoE 48V 802.3at

Model: W3O WiFi6	
User Ports	1*GE WAN+1*GE LAN+1800M WiFi
Dimensions	295*231*80mm
Power Supply	DC 12V 2A, PoE 48V 802.3at

Wireless Series

Indoor CPE

Model: W2L	
User Ports	1*GE WAN+2*GE LAN+1200M WiFi
Wireless Standard	802.11 ac/b/g/n, 2.4GHz & 5GHz
Antennas	2 * 4G , 2*WiFi Antennas
Cellular Specification	3G/4G
Dimensions	155*125*35mm
Power Supply	DC 12V 1.5A

Model: W3L WiFi6	
User Ports	1*GE WAN+2*GE LAN+1*RJ11+1800M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	2 * 5G , 2*WiFiAntennas
Cellular Specification	3G/4G/5G
Dimensions	110*112*195mm
Power Supply	DC 12V 1.5A

Model: W5L WiFi6	
User Ports	1*GE WAN+2*GE LAN+1*RJ11+3000M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	2 * 5G , 2*WiFiAntennas
Cellular Specification	3G/4G/5G
Dimensions	110*112*195mm
Power Supply	DC 12V 1.5A

Outdoor CPE

Model: W1LO	
User Ports	2*FE LAN+300M WiFi
Wireless Standard	802.11 b/g/n, 2.4GHz
Antennas	2* 4G , 2*WiFi Antennas
Cellular Specification	3G/4G
Dimensions	250*145*67.5mm
Power Supply	PoE 24V 802.3at

Model: W2LO	
User Ports	2*GE LAN+1200M WiFi
Wireless Standard	802.11 ac/b/g/n, 2.4GHz & 5GHz
Antennas	4 * 4G , 4*WiFi Antennas
Cellular Specification	3G/4G
Dimensions	250*145*67.5mm
Power Supply	PoE 24V 802.3at

Model: W3LO WiFi6	
User Ports	1*2.5G LAN+1800M WiFi
Wireless Standard	802.11 ax/ac/b/g/n, 2.4GHz & 5GHz
Antennas	4 * 5G , 4*WiFiAntennas
Cellular Specification	3G/4G/5G
Dimensions	250*145*67.5mm
Power Supply	PoE 24V 802.3at

Business Switch

Unmanaged Ethernet Switch

Unmanaged Ethernet switch series products provide various port application forms and network rate transmission modes, support dial-up VLAN, Extend link extension, loop alarm, QoS and other functions, support port lightning and static protection, adapt to wide-range operating temperature(-10°～+50°), pass CQC, FC, CE, ROHS and other industry standard certification, easy to use, safe and stable overall operation, widely adapted to security communications, network communications and other Ethernet access scenarios.

Model	Ports	Dimensions
FHS104A1	5*FE	100*70*26mm
FHS106A2	8*FE	137*77*25mm
FHS116	16*FE	270*180*45mm
FHS304C1	5*GE	100*70*26mm

Model	Ports	Dimensions
FHS306C2	8*GE	137*77*25mm
FHS314C2	16*GE	270*180*45mm
FHS324	24*GE	440*208*44.5mm
FHS324D2	24*GE+2*SFP	440*205*44mm

PoE Switch

PoE switch series products, in line with IEEE802.3af/at/bt concordance standards. Ports can be configured flexibly, providing 5, 6, 8, 10, 28 ports and other end application forms, as well as three speed port options including 100Mbps, 100Mbps/1000Mbps, all-1000Mbs. They receive the CQC, FCE, ROHS, and other multiple certifications. With professional appearance design, excellent internal structure, powerful and rich hardware, and software. They are easy to operate, stable and reliable overall operation, widely adapted to security communications, network communications and other Ethernet access scenarios.

Model	Ports	Dimensions
FHS104A1T	4*FE(PoE)+1*FE	200*120*45mm
FHS104A2T	4*FE(PoE)+2*FE	200*120*45mm
FHS108A2T	8*FE(PoE)+2*FE	200*118*44mm
FHS116C2D1T	16*FE(PoE)+2*GE+1*SFP	320*207*45mm
FHS124C2D1T	24*FE(PoE)+2*GE+1*SFP	320*207*45mm

Model	Ports	Dimensions
FHS308C2T	8*GE(PoE)+2*GE	222*163*40mm
FHS308D2T	8*GE(PoE)+2*SFP	270*180*45mm
FHS316D2T	16*GE(PoE)+2*SFP	200*118*44mm
FHS324D2T	24*GE(PoE)+2*SFP	440*205*45mm
FHS324C4D42T	24*GE(PoE)+4*GE+4*SFP	440*280*44mm

Business Switch

Managed Ethernet Switch

Business managed Ethernet/POE switches have powerful data exchange processing capability, support 1 Gigabit and 10 Gigabit network high-speed connection, support Layer 2/3 network management, support POE time management, POE watchdog, fast ring self-healing and other functions. They have perfect and reliable security control strategy and network protection mechanism and can be docked with customers and third parties to realize cloud management platform. They can be flexibly deployed according to the actual needs of users and are suitable for medium and large network convergence layer/core layer, helping to build a flexible, convenient, stable, and reliable data communication network with easy maintenance and management.

Model	Ports	Dimensions
FHS308D22	8*GE+2*SFP	270*180*45mm
FHS324D42	24*GE+4*SFP	440*205*44mm
FHS324F43	24*GE+4*SFP+	440*205*44mm
FHS348F43	48*GE+4*SFP+	440*280*44mm

Model	Ports	Dimensions
FHS308D22T	8*GE(PoE)+2*SFP	270*180*45mm
FHS316C2D22T	16*GE(PoE)+2*GE+2*SFP	440*205*44mm
FHS324C4D42T	24*GE(PoE)+4*GE+4*SFP	440*205*44mm
FHS348D43T	48*GE(PoE)+4*SFP	440*336*45mm

Fiber Optic Converter

Fiber optic transceiver serial products, support 100Mbps, 1000Mbps network rate, with 1 optical port and 1 electrical port, 1 optical port and multiple electrical ports, 2 optical ports and multiple electrical ports and other port forms, according to the need to choose different fiber optic modules. They are compact, simple to use, easy to maintain, stable and reliable, which can help users to realize Ethernet data exchange, convergence, and long-distance transmission. They are suitable for security monitoring, wireless coverage, intelligent transportation, safe city construction, and other fiber optic access scenarios, helping to set up an economical, efficient, and stable network.

Model	Ports	Dimensions
FHS101B1	1*FE+1*100M SFP	94*70*26mm
FHS104B1	4*FE+1*100M SFP	94*70*26mm
FHS301D1	1*GE+1*SFP	94*70*26mm
FHS304D1	4*GE+1*SFP	94*70*26mm

Industrial Switch

Industrial Ethernet/POE switches are designed with industrial-grade electronic components and high-standard industrialized structure. They meet IP40 with features such as anti-vibration, anti-electromagnetic interference, lightning protection, and anti-static. They provide BT90W high power, 2.5G optical port, ring redundancy self-healing, Bypass optical protection, etc. Supported with redundant power supply, wide-range operating temperature (-40°~+85), DIN-rail/wall-mounting types, they adapt to complex and harsh industrial communication environment, and can help industrial equipment to realize networking, data acquisition and transmission in an economical, efficient, stable, and reliable way.

Unmanaged Industrial Switch

Model	Ports	Dimensions
FHS104A1I	5*FE	100*76.5*30mm
FHS304C1I	5*GE	100*76.5*30mm
FHS108A2I	10*FE	160*135*44mm
FHS308D2I	8*GE+2*SFP	160*135*44mm

Industrial PoE Switch

Model	Ports	Dimensions
FHS104A1TI	4*FE(PoE)+1*FE	100*76.5*30mm
FHS304C1TI	4*GE(PoE)+1*GE	100*76.5*30mm
FHS108A2TI	8*FE(PoE)+2*FE	160*135*44mm
FHS308D2TI	8*GE(PoE)+2*SFP	160*135*44mm

Managed Industrial Switch

Model	Ports	Dimensions
FHS304C2I	4*GE+2*SFP	145*125*40mm
FHS308C2I	8*GE+2*SFP	165*130*65mm
FHS310C4I	10*GE+4*SFP	188*130*65mm
FHS308C6I	8*GE+6*SFP	188*130*65mm

Managed Industrial PoE Switch

Model	Ports	Dimensions
FHS304D22TI	4*GE(PoE)+2*SFP	145*125*40mm
FHS308D22TI	8*GE(PoE)+2*SFP	165*130*65mm
FHS310D42TI	8*GE(PoE)+2*GE+4*SFP	188*130*65mm
FHS308D62TI	8*GE(PoE)+6*SFP	188*130*65mm

Transmission Series

FTTH In-home Optical Receiver

The product is launched to cope with the FTTH network structure. With a compact shell, tight and reasonable internal circuit structure, this product has ultra-low power consumption, excellent performance. Kinds of models of different optical AGC range are available to satisfy different users.

FTTH WDM Optical Receiver

1.2 GHz optical receiver, of which received optical power can be as low as -18dBm, AGC range is between -15 and -5dBm, embedded with CWDM. Conventional G/EPON or 10G/EPON version are optional. Support +5V or +12V power adapter.

1550nm Optical Transmitter

1.2GHz optical transmitter, with high-performance DFB laser, built-in WDM wavelength division multiplexer and VOA electrically modulated optical attenuator, electric dispersion compensation distance of 50km, supports WEB and SNMP management.

1550nm EDFA (Erbium-Doped Fiber Amplifier)

The product adopts low-noise pump laser, imported high-performance erbium-doped fiber, and CWDM, provides optional optical switch, adjustable output optical power and RF detection with noise factor of or under 5dB.

1550nm High-power Fiber Amplifier

It is a high-performance erbium-ytterbium co-doped low-noise pump laser, equipped with double cladding fiber. The maximum total output power can reach +38dBm, supporting optional optical switch, CWDM, RF detection. It supports up to 64 output channels.

Optical Transceiver

200G QSFP56

Hot-pluggable QSFP56 package, compliant with QSFP-DD and SFP56 MSA, equipped with LC/MPO optical interfaces
Center wavelength: 850nm/CWDM/LWDM
Transmission distance: 100m/2km/10km/40km
Operating temperature: 0~70°C or-40~85°C (Industrial)

100G QSFP28

Hot-pluggable QSFP28 package, equipped with LC/MPO optical interfaces
Center wavelength: 850nm/1310nm/CWDM/LWDM
Transmission distance: 100m/2km/10km/20km/40km/80km
Operating temperature: 0~70 or -40~85°C (Industrial)

40G QSFP+

Hot-pluggable QSFP+ package, equipped with LC/MPO optical interfaces
Center wavelength: 850nm/1310nm/CWDM
Transmission distance: 550m/2km/10km/20km/40km/80km
Operating temperature: 0~70°Cor -40~85°C (Industrial)

25G SFP28

Hot-pluggable SFP28 package, dual-fiber LC/BIDI optional
Center wavelength: 850/1270/1310/1330/CWDM/LWDM
Transmission distance: 550m/2km/10km/20km/40km/80km
Operating temperature: 0~70 or -40~85° (Industrial)

10G SFP+

Hot-pluggable SFP+ package, dual-fiber LC/BIDI optional
Center wavelength: 850/1310/1550nm/CWDM/DWDM
Transmission distance: 300m/2km/10km/20km/40km/80km
Operating temperature: 0~70°C or -40~85° (Industrial)

1.25G SFP

Hot-pluggable SFP package, dual-fiber LC/BIDI optional
Center wavelength: 850/1310/1550nm/CWDM/DWDM
Transmission distance: 550m/2km/10km/20km/40km/80km
Operating temperature: 0~70°C or -40~85° (Industrial)

Optical Transceiver

155M SFP

Hot-pluggable SFP package, dual-fiber LC/BIDI optional
Center wavelength: 850/1310/1550nm/CWDM/DWDM
Transmission distance: 550m/2km/10km/20km/40km/80km
Operating temperature: 0~70°C or -40~85°C (Industrial)

Cooper SFP Transceiver

Hot-swappable SFP package, Gigabit / 10 Gigabit optional
Transmission distance: 30m
Operating temperature: 0~70°C or -40~85°C (Industrial)

PON

EPON:Px20+/Px20++/Px20+++
GPON:Class B+/C+/C++/D
The PON optical module is commonly used in FTTx and is a single-fiber bidirectional SFP with SC/PC interface. It supports DDM and provides diagnostic functions for power, temperature, transmitting and receiving status, and service life. It has a transmission distance of over 20km and can operate in a temperature range of 0 ~ 70°C or -40 ~ 85°C.

DAC

DAC can be either active or passive and is typically used in switches located in data center server rooms. We offer a complete line of DACs, including SFP+, QSFP+, SFP28, QSFP28, QSFP56, and more.

AOC

AOC (Active Optical Cable) is a high-speed transmission equipment consisting of integrated optoelectronic components. It's widely used to interconnect devices in data centers and high-performance computing systems, using optical cables for reliable data transmission. We offer a complete line of AOC products, including SFP+, QSFP+, SFP28, QSFP28, QSFP56, and CXP, with customizable options for length, operating temperature, and fiber jacket color.

Optical Passive

Fiber Adapter (Flange)

SC, FC, LC, ST and Various Interface Conversions

Optical fiber adapters, also known as fiber couplers or fiber flanges, are used to achieve precise connection between two optical fiber ends in a fiber network, enabling maximum transmission of light energy. They are applicable in telecommunications, cable TV networks, LANs, optical networks, FTTH, video transmission, testing instruments, etc. Main parameters include insertion loss, return loss, temperature stability, etc.

Fiber Optic Jumpers

SC, FC, LC, ST, and Various Interface Conversions

Optical fiber jumpers are cables with connectors on both ends that enable active optical connections between devices. The connectors come in different types, such as FC, SC, and ST, with different end face polishing types including PC, UPC, and APC. A single-mode fiber jumper with different connector types or end face polishing types on each end is called a single-mode adapter jumper.

Optical Splitter

PLC Splitter, Box Splitter, Plug-in Splitter, FBT Coupler Splitter

An optical splitter is a device that uses quartz substrate integrated waveguides to distribute optical power. It is small, has a wide operating wavelength range, high reliability, and good power splitting uniformity. It is particularly suitable for connecting end-user equipment in passive optical networks (EPON, GPON, XG/SPON) and distributing optical signals.

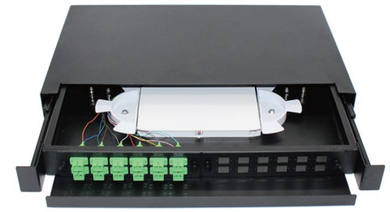
Optical Cables

Indoor optical cables have lower tensile strength and poorer protective layers but are more lightweight and cost-effective. They are mainly used for horizontal cabling subsystems and vertical backbone cabling subsystems.

Outdoor optical cables have higher tensile strength, thicker and heavier protective layers, and are usually armored. They are widely used in building cluster cabling subsystems, outdoor aerial, duct, direct buried and undersea applications, and remote network interconnections.

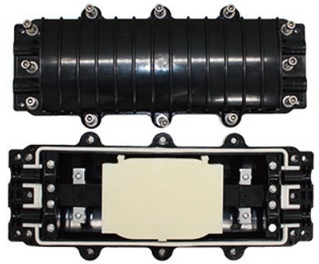
Optical Passive

Optical Distribution Frame



Fiber optic distribution frame (FODF) , also known as fiber optic terminal box, is mainly used for the splicing and storage between the fiber of the external cable and the equipment pigtail, can be wall-mounted and floor-mounted use. Wall mounted termination box, its function is to provide fiber to fiber splicing, fiber to pigtail splicing and optical connector handover, and to provide mechanical protection and environmental protection for the fiber and its components, allowing for proper inspection to maintain a high standard of fiber management.

Fiber Optic Splice Closure



Dome/Rack-mounted, 24/48/96/144 cores

Fiber optic joint closure is used to connect two or more fiber optic cables together and includes protective components. It is a necessary and important equipment in fiber optic network construction. The quality of the fiber optic joint closure directly affects the quality and lifespan of the fiber optic network.

Fiber Optic Desktop Box

1-core, 2-core, 4-core

This mini fiber optic socket panel is a fiber optic terminal box used for indoor fiber optic cable fusion and distribution between the fiber optic cable and equipment pigtail. It uses SC or LC duplex connectors and can be wall-mounted or placed on a desk. Made of plastic, it is easy to install at home or in the office. The outlet is designed to accommodate SC fiber optic patch adapters for use in a work area subsystem.

Fiber Optic Tools

Fusion Splicer, Power Meter, Fault Locator, Cleaver, OTDR

Fiber optic tools are crucial for testing, installing, and maintaining cables. Their compact and lightweight design enables their use in research, development, testing, production, and field maintenance.

SOLUTIONS

All-optical Campus Solution

Campus Network Requirements

High Bandwidth and High Reliability:

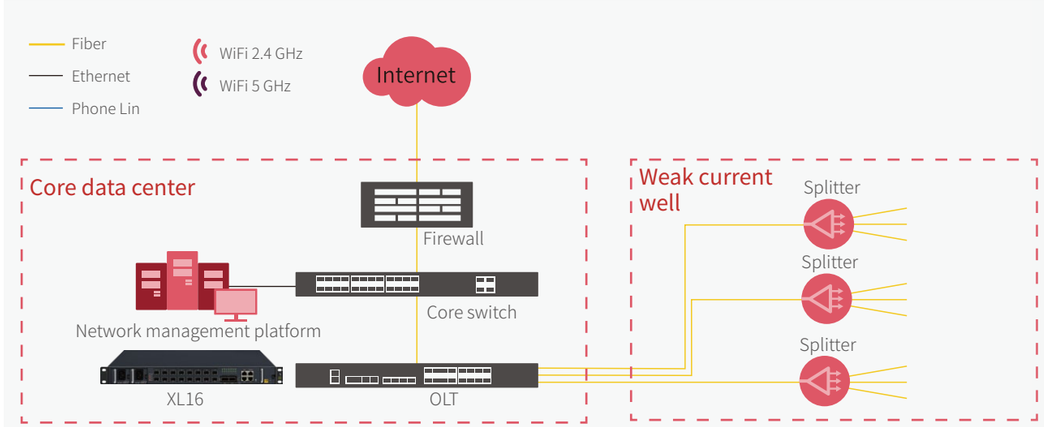
Nowadays, live streaming teaching and shared classrooms have high requirements for bandwidth. The campus network's bandwidth carrying capacity needs to be increased to over 1 gigabit.

Diversification:

With the frequent emergence of digital teaching-related products, the demand for various types of network access points is increasing.

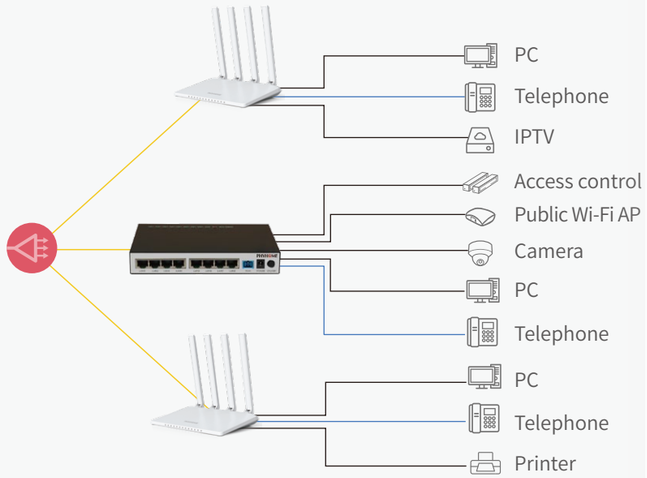
Efficient Management:

The distribution of buildings within the campus is complex, and there are many scenarios where networks are used, leading to difficulties in managing the campus network and low efficiency.



【Office/Dormitory】

Unified carrier of multiple services, simplifying network structure

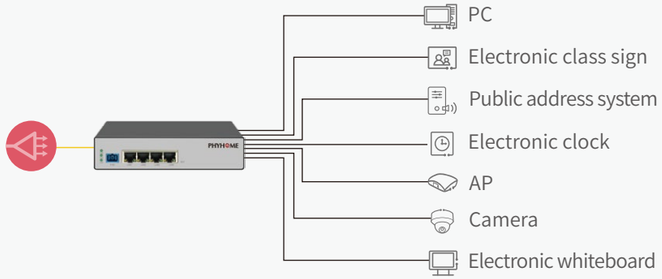


All-optical Campus Solution

【Smart Classroom】

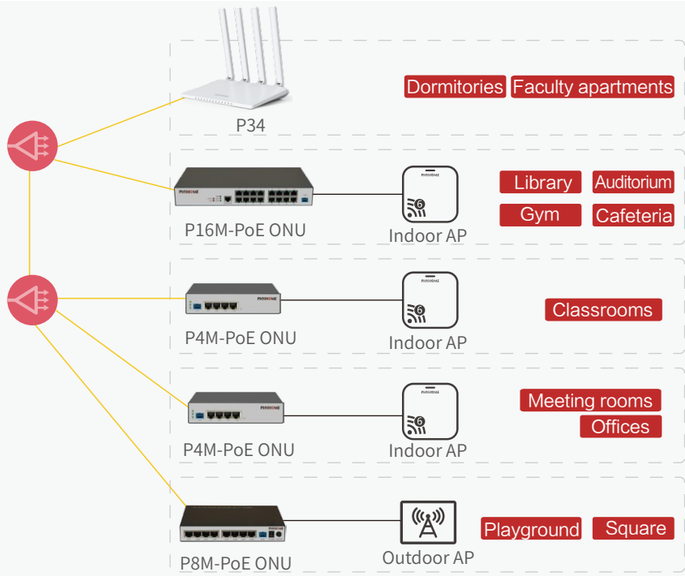
Fiber optic to classroom

Flexible bandwidth expansion



【Wireless network coverage in all scenarios】

Wi-Fi anywhere



Advantages of the Solution

① The all-optical network has a simple structure and involves no optoelectronic conversion or storage during transmission, leading to significant improvements in both transmission capacity and quality. Teachers and students can enjoy better digital classroom experiences.

② The all-optical network is more open and compatible with various signals. With just one optical fiber, it can support multiple types of business simultaneously, such as voice, data, and wireless communication.

③ The network is centrally managed, and ONU is plug-and-play, reducing management costs and easing operational pressure.

All-optical Park Solution

Park Network Requirements

Wide coverage area:

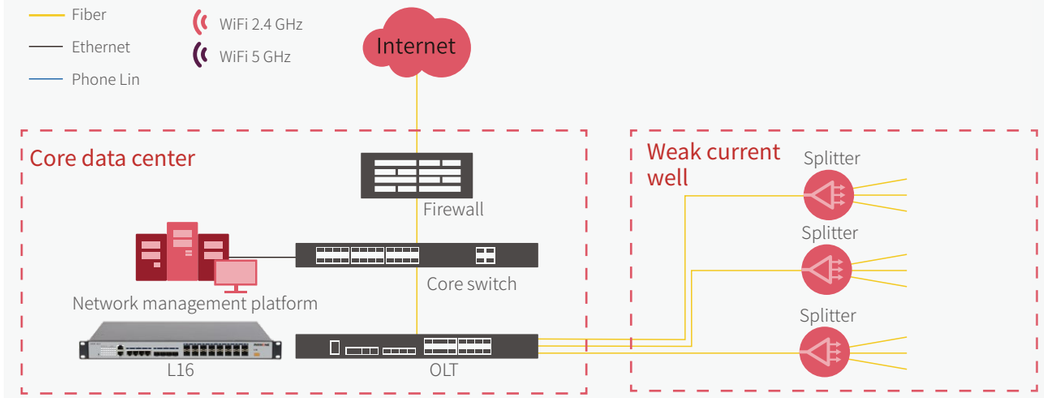
The business points within the park are widely dispersed, and traditional wiring is costly, which limits coverage throughout the park.

High bandwidth, low latency:

new office work models, such as video conferencing and cloud services, have high broadband requirements. The park needs to provide sufficient bandwidth to ensure low network latency and high stability.

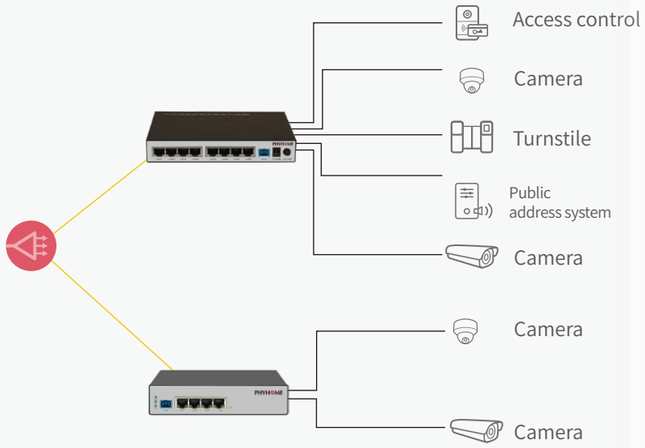
Simplified management and operation:

Multiple independent networks are used for different systems, and the number of devices is large, requiring a high level of technical proficiency from staff. This leads to greater difficulty in managing and operating the park network.



【Security Network】

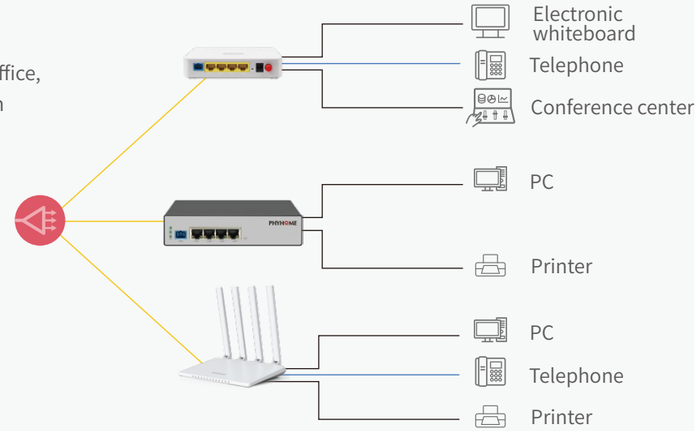
Unified carrier of multiple services, simplifying network structure



All-optical Park Solution

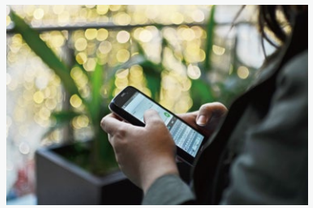
【Wired Network】

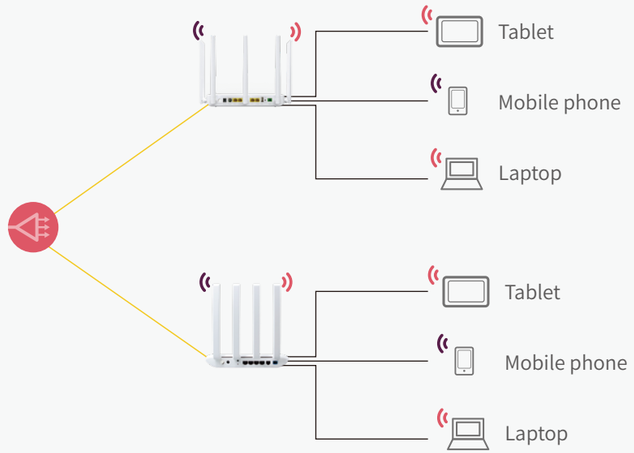
Fiber optic to property management office, with flexible bandwidth expansion



【Wireless Network】

Wi-Fi coverage throughout the park





Advantages of the Solution

① The direct scalability of the all-optical network solves the problem of having multiple nodes. At the same time, replacing copper wires with optical fibers lowers the cost of cabling and makes construction easier. The system supports long-distance transportation of up to 40km, making it easy to deploy a full-park network.

② The GPON/XGS-PON system extends gigabit fiber to every desktop and device, while F5G fixed network technology provides a high-quality network that meets the high-bandwidth requirements of new office formats, enabling efficient work.

③ The network management platform provides centralized management, proactive maintenance, and rapid fault location, saving operational costs for human resources.

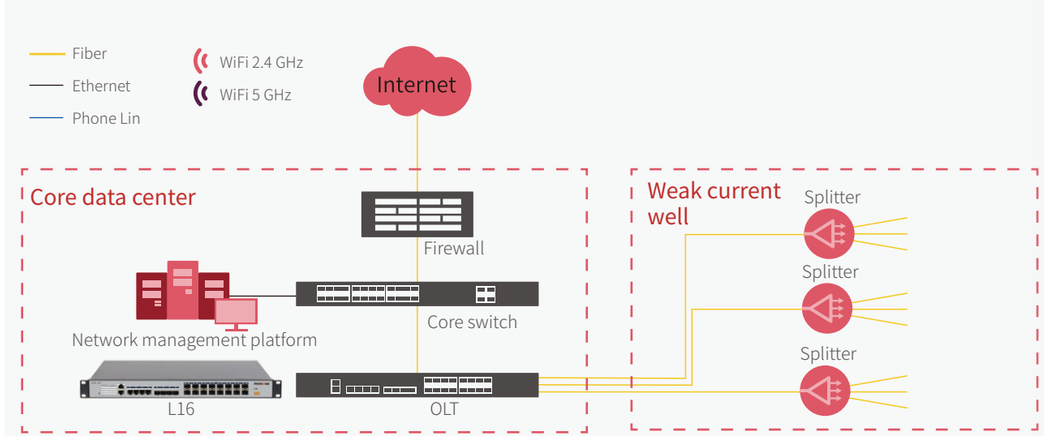
All-Optical Rail Transit

Network Requirements for Rail Transit:

High Bandwidth and High Speed: High-definition terminal devices are densely and widely distributed, with devices such as gates, electronic displays, and voice broadcasts running constantly, generating massive amounts of data. Therefore, the network needs to have high bandwidth and operating efficiency.

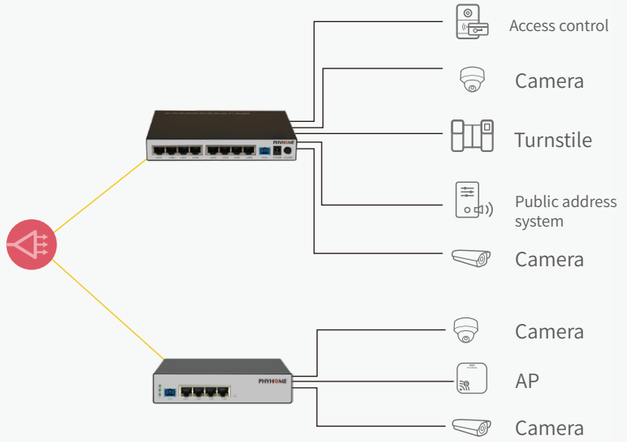
Low Latency and High Stability: The command center needs to monitor passenger flow in real-time and respond to emergencies, while passengers need to know train information in a timely manner. All of these require fast network response speed and 24/7 online availability.

Simple Deployment and Upgrade: The network should be adaptable to various business changes and able to simplify the process of building or expanding the network.



【Station Hall】

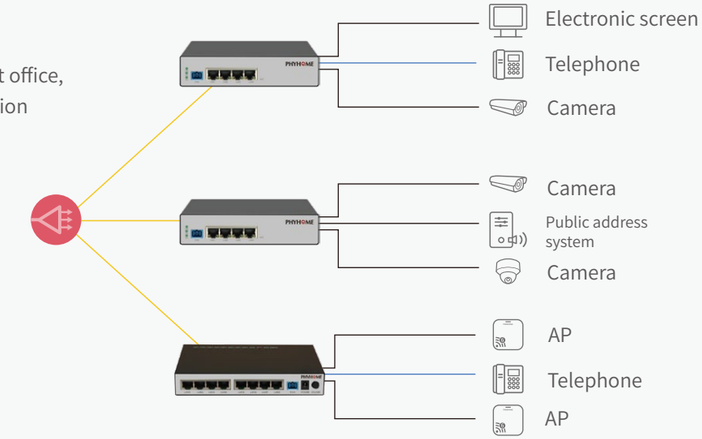
Unified carrying of multiple services, simplifying network structure



All-Optical Rail Transit

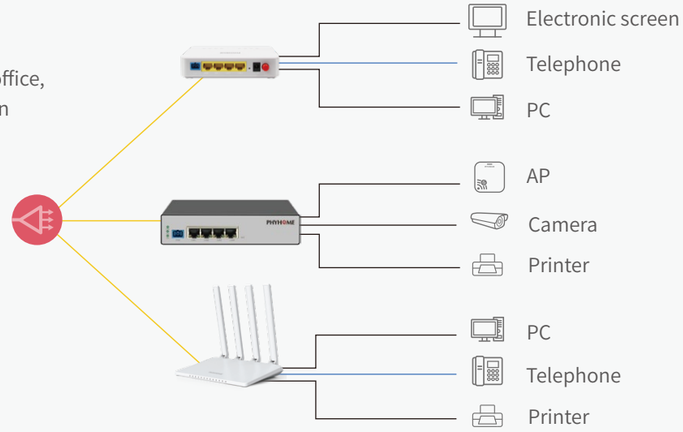
【Platform】

Fiber optic to property management office, with flexible broadband expansion



【Control Center】

Fiber optic to property management office, with flexible broadband expansion



Advantages of the Solution

① The full-link optical transmission can efficiently handle data, reduce latency, and alleviate electromagnetic interference, ensuring high-quality data transmission to ensure safer and more punctual rail transit operations.

② Various types of ONU terminals can adapt to changes in multiple business types. When upgrading or renovating the network, there is no need to re-wire, saving space and equipment costs. F5G fixed network technology creates a high-quality transmission channel, laying a foundation for the construction of smart rail transit.

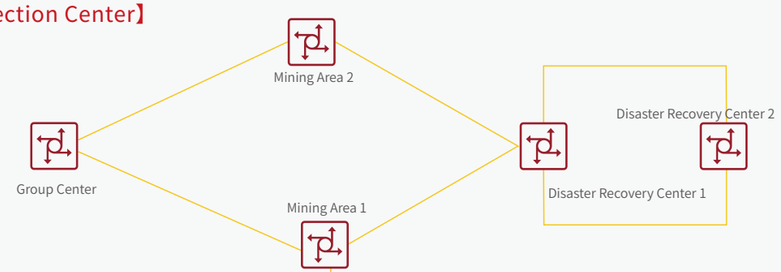
③ Optical fibers replace copper wires, reducing construction difficulty and shortening the project cycle.

All-optical Mine

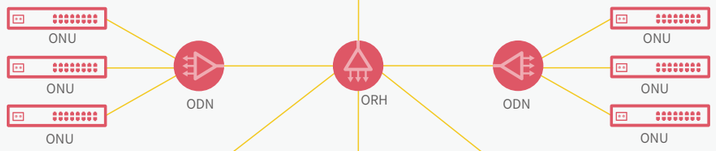
Currently, the intelligentization of coal mines is an inevitable trend. The National Development and Reform Commission, Energy Administration, Mine Safety Administration and the Ministry of Emergency Management, Industry and Information Technology, Finance, Science and Technology, Education of the People's Republic of China jointly issued the "Guiding Opinions on Accelerating the Development of Intelligent Coal Mines". Various provinces have also successively issued corresponding regulations, and the intelligentization of coal mines has become one of the key tasks in the coal mining industry.

As intelligent machines and safety monitoring equipment are deployed in coal mines, the network becomes larger and more complex. The F5G, as a new mining network infrastructure, provides a future-oriented information highway for coal mine intelligence. F5G's application in coal mines includes Optical Ring Head-end Equipment (ORH), Optical Ring End Equipment (ORE), and Passive Optical Ring Network Equipment (ORP). The end equipment, installed underground and explosion-proof, is connected to the ORH Equipment port through the Passive Optical Ring Network Equipment (splitter). It connects to downstream devices like cameras and sensors, and uploads data to the head-end equipment for instructions from the dispatch center to guide production.

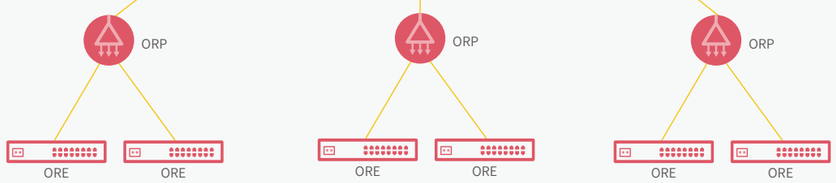
【Group Interconnection Center】



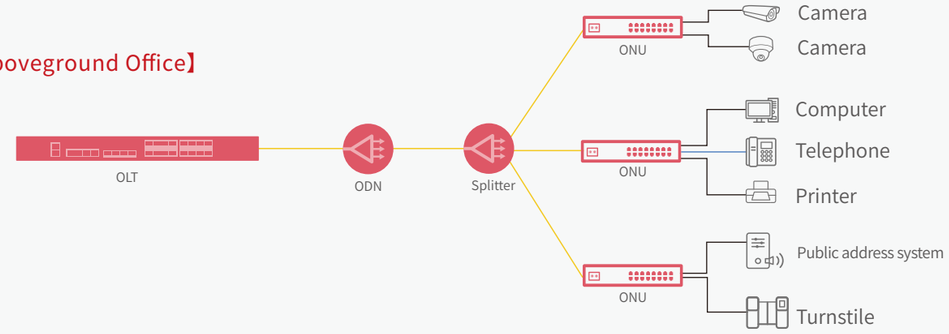
【Aboveground】



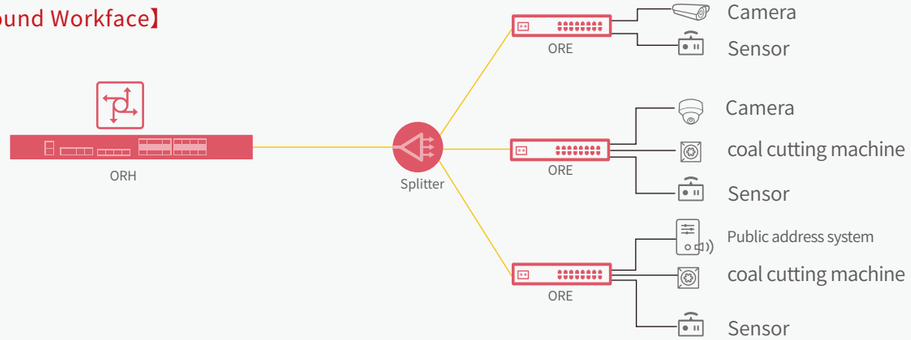
【Underground】



【Aboveground Office】



【Underground Workface】



Advantages of the Solution

① The all-optical network structure is simple, with no opto-electric conversion or storage during the process, resulting in significant improvements in transmission capacity and quality.

② Fiber protection extends to the end access devices, with network self-healing time of less than 30ms.

③ Centralized network management, plug-and-play ONU (Optical Network Unit), reducing costs and easing operational pressures.

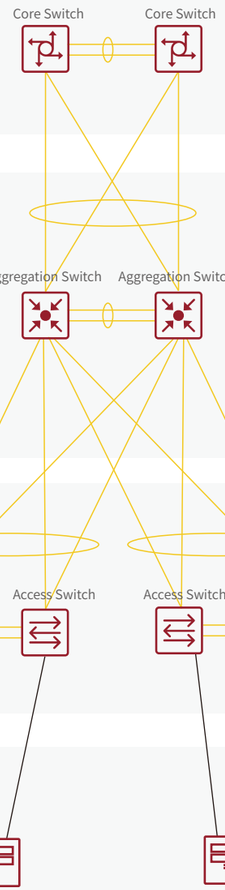
④ Visualized operation and maintenance for the entire network, intelligent management of optical fibers, enabling visual, precise, and proactive operation and maintenance.

Internet Data Center

A data center is a physical space where information is processed, stored, and managed, housing critical equipment such as computers, servers, networks, and storage devices. The establishment of data center infrastructure aims to optimize IT systems, ensure high manageability, availability, reliability, and scalability, and support smooth business operations and timely services.

With the gradual implementation of the strategic project that channels computing resources from the east to the west and the development of the new infrastructure construction, data centers are crucial for digital transformation and require robust network solutions. We focus on IDC data center network access needs and provide tailored solutions.

【Core Layer】



High reliability, redundant design, fast data exchange and routing convergence, high scalability, large capacity.

【Aggregation Layer】

Aggregates traffic from the Access Layer, executes policies, performs routing convergence and load balancing, provides fast network convergence and intelligent services such as security control, application optimization, load sharing, SSL offloading, etc.

【Access Layer】

Provides initial classification and intelligent services for servers, hosts, and storage facilities accessing the network, such as QoS (Quality of Service) and ACL (Access Control List).

【Access Devices】

Various servers and access devices, such as DNS, APPS, DB, etc.

Core Layer Design

Design Objectives

The core layer network is the data center's heart, connecting functional zones like internet access, services, and internal access, functioning as the data center's internal bus.

Design Requirements

- High-performance and fast forwarding, with high-density 10GE/40GE connections.
- High reliability/availability, supporting uninterrupted forwarding.
- High scalability to meet data center business expansion needs.
- Minimal convergence ratio.
- High stability.

Deployment Plan

The core layer consists of two high-performance switches, or four switches for higher reliability in a dual-plane configuration.

Aggregation Layer Design

Design Objectives

The Aggregation Layer connects the data center core network, handling east-west and north-south traffic forwarding. It serves as the business gateway and control point for business and security policies.

Design Requirements

- Strong forwarding capability with high-density ports.
- High reliability, such as NSF support for Layer 3 and Smartlink support for Layer 2.
- Rich Layer 2 and Layer 3 features to support multiple services, such as VRRP, OSPF, etc.

Deployment Plan

Consists of two or more high-performance switches.
Offers Intelligent network services, such as application optimization, load balancing, SSL offloading, etc.

Access Layer Design

Design Objectives:

The access layer connects servers, hosts, storage devices, and other equipment, uplinking to the aggregation switch to provide basic network services like ACL and QoS classification.

Design Requirements:

- Rich Layer 2 features: VLAN, IGMP Snooping, loop prevention.
- Security features: port security, DHCP Snooping, DAI, IP Source Guard, MAC Address Filtering.
- Reliability: system-level redundancy, LAG, iStack, etc.
- QoS for bandwidth management.
- High-density GE/10GE interfaces for large-scale deployment of access switches with easy management.

Deployment Plan:

Generally, dual uplinks to the aggregation layer, with some areas combining access and aggregation layers, and server access deployment can use EOR/TOR and other methods.

Advantages of the Solution

① Low latency: Effective data synchronization, quality assurance, improved transmission performance, and reduced network costs.
② Business agility: Flexible resource allocation in a virtual data center (VDC) based on business requirements, with visualized and one-click deployment for rapid business online. Differentiated service capabilities for different businesses and end-to-end business SLA.
③ Efficient management: Unified management of multiple data centers, physical and virtual resources, and heterogeneous resources, with unified operation and maintenance management, improving data center management efficiency.