

# **ZXHN H512A Product Introduction**







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## Passthrough 200Mbps Power Line – H512A

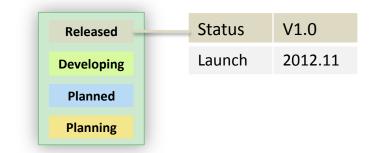
Wireless Router		Mini AP	PLC		
Cost Effective	High Performance		Wallmount	Passthrough	Hybrid PLC + Wi-Fi



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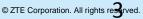


Physical Interface	1xPower plug 1xPower socket 1xFE
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### Features

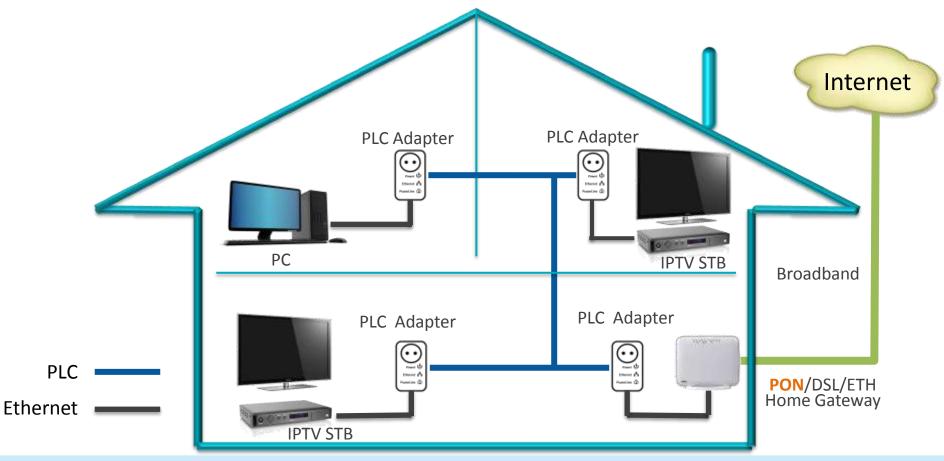
- Built-in filter and power socket, maximize power line communication performance
- Passthrough type with power voltage range of 100 to 240 VAC 50/60Hz
- HomePlug AV Compliant
- Up to 200 Mbps data rate on the power line
- Advanced security with 128-bit AES Link Encryption
- Dynamic channel adaptation and estimation
- Windowed OFDM with noise mitigation
- Enhanced QoS
- Supports IGMP managed multicast sessions
- Co-existence with HomePlug 1.0



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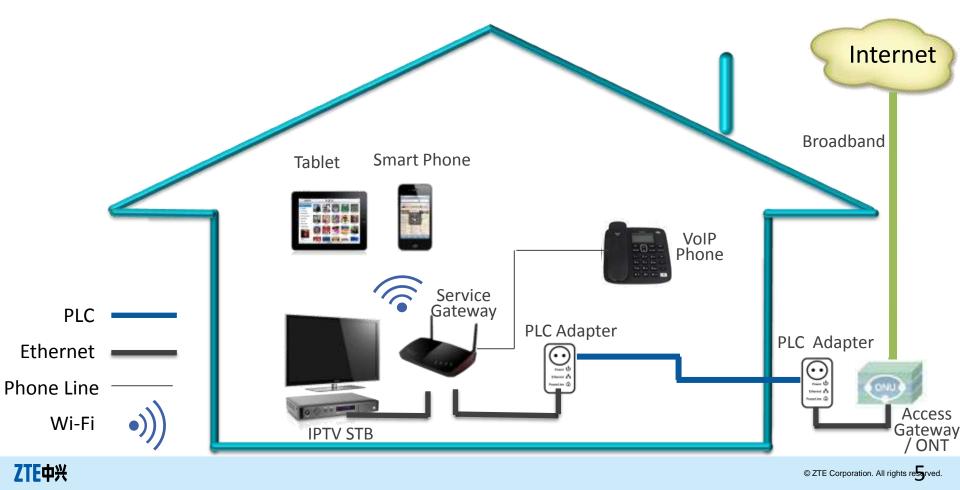
# H512A Application Scenario 1 – No New Wires Home Network

- No New Wires Saves wiring of Ethernet cables and home decoration
- Fit for video distribution like two or more STBs
- Support several HD Streams simultaneously without drops or resets



# H512A Application Scenario 2 – For 1+1 Deployment

- For homes with 1+1 Access Gateway + Service Gateway
- Especially in most FTTH deployments, a simple ONT and a Service gateway are deployed.



## ZXHN H512A Highlights

## Flexible Networking and Capex Saving

#### **Flexible Networking**

- No new wires needed and capex saving for customer for home networking
- PLC complies HomePlug AV, IEEE 1901
- Neighbor Network Isolation
- Supports IGMP managed multicast sessions

#### **Perfect QoS Support**

- Priority-based CSMA/CA channel access schemes maximize efficiency and throughput.
- QoS to guarantee delivery of videotraffic
- Class priority based on VLAN/TOS field and IP address/Port

#### **Best-in-class Performance**

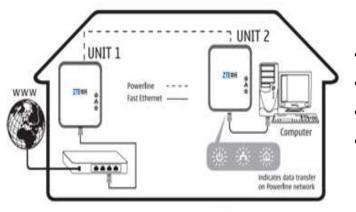
- Up to 200M bps data rate
- Optimized PSD to maximize performance
- Wide dynamic range and high sensitivity for best weak signal performance
- Automatic sleep mode to save power consumption
  - Low Power Mode Complies CoC

## Easy installation and Multiple Stream Support

#### **User Friendly Experience**

- Plug & Play without configuration for easy installation
- Dedicated led designing for data rate and diagnosis
- One-Press pairing network to join or leave network
- Pass through type with built-in filter saves power socket cost for better customer experience
- Small size for easy placement

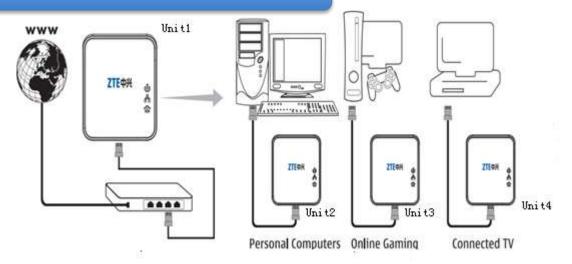
## Easy Installation of ZTE PLC Solution



- Insert unit 1 and unit2 to the power socket
- Connect Unit1 to routers
- Connect Unit2 to your PC
- After DATA led turns to solid green, H51X network is now ready.
  You can use your PC for Internet surfing.

## Plug & Play without Configuration

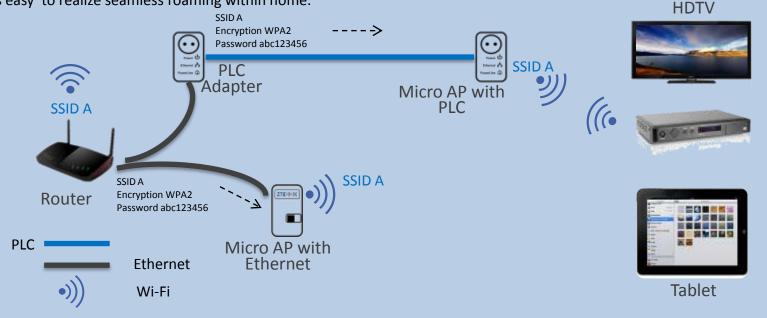
- Plug in the additional H51X UNIT3, the DATA led of UNIT3 will turn into solid green
- Wait until the POWER and the DATA leds of UNIT3 are solid green.
- The UNIT3 is now a member of the PLC local network.
- The Unit 4 is the same step for use.



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# NetSphere<sup>™</sup> for Zero-Touch Auto Configuration

- When Micro APs power up, they will download configuration files from the router and configure the parameters automatically.
- It's easy to realize seamless roaming within home.



Net Sphere<sup>™</sup> is a ZTE-unique function applied when multiple wireless routers and APs are deployed. Its features as below:

- Zero-touch configuration for plug and play convenience
- Seamless roaming without service interrupt ion
- Flexible networking & CAPEX reduction



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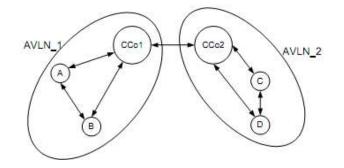
## Security of ZTE PLC Solution

## Security

- Based on a Pre-shared Network Membership Key
- Encryption based on 128-bit AES
- Peer-to-Peer communications within the network for high security and bandwidth

## Neighbor network

- Different AVLNs insulate Neighbors logically
- CCos may coordinate bandwidth between Neighbor network



## IGMP Support of ZTE PLC Solution

IGMP Snooping for multicast management Multicast to unicast mechanism

- If IGMP table is established, Node will transform multicast stream to unicast destination devices interested in the stream.
- The mechanism brings more reliability despite it costs more bandwidth.



# Thanks!

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