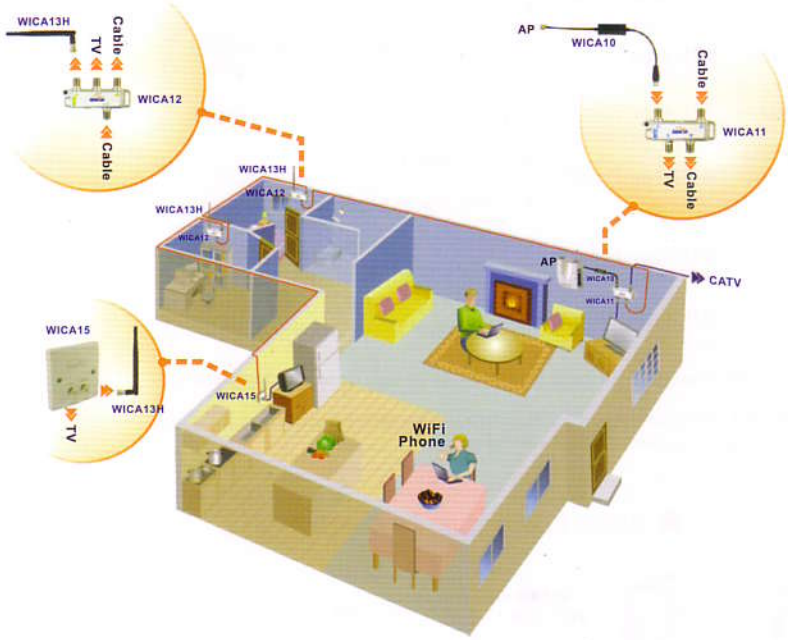
Patent Pending

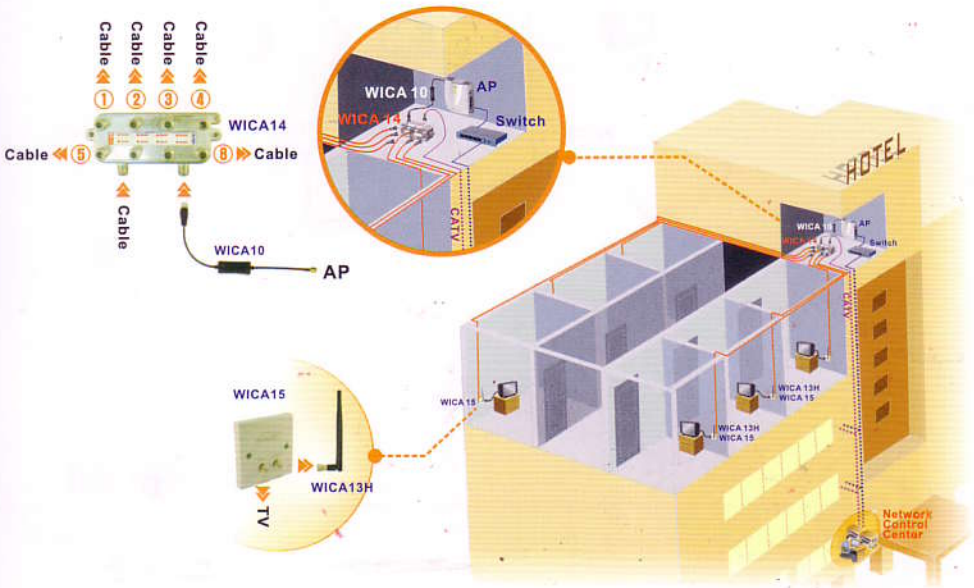
WICA Series

WiFi over CATV

The WICA series is a WiFi over CATV relay network solution. By taking the advantage of the existing CATV network in the buildings, WICA can provide a high performance and dead-spot free wireless environment. WICA series also enable an easy and flexible deployment in different CATV network structures found in houses, apartments and hotels. Using WICA, the AP signal can be integrated into CATV along with the TV signal without interference to each other. WiFi signal can be extended into each room and form a dead-spot free environment.



Scenario 1, WICA Series can be used as a chained linear network from room to room through CATV and WICA splitters.



Scenario 2, WICA series can be used to chained the network as Star topology by WICA 14 (8port splitter), to provide multiple areas with broadband wireless connection.

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Specifications

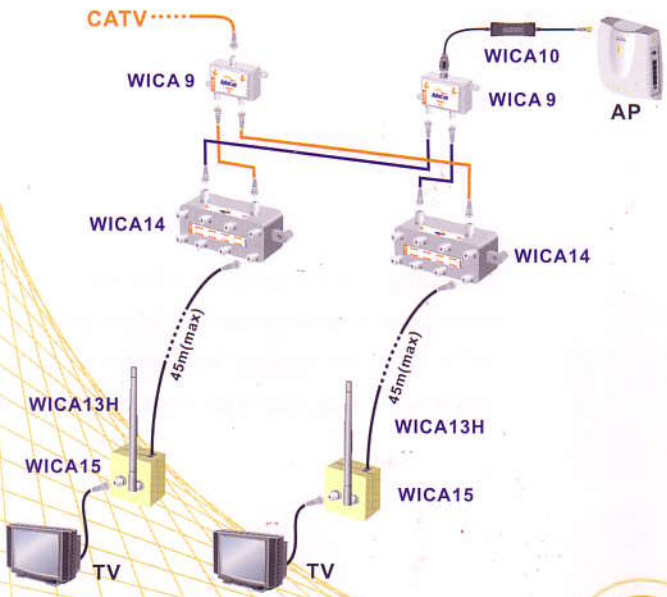
Part Name	Items	Frequency Range	Connector Port		Insertion Loss dB
WICA 9 	1Input--2 Output Full Band Splitter	5MHz~2.6GHz	1*F-type Female	WiFi Signal Input or CATV Signal Input	
			2*F-type Female	WiFi Signal Output or CATV Signal Output	6
WICA 10 	Impedance Conver	5MHz~2.6GHz	1*SMA Female	WiFi Signal Input	
			1*F-type male	WiFi Signal Output	1.5
WICA 11 	2 Input--2 Output	1.5GHz~2.6GHz 5MHz~1GHz	2*F-type Female	▪ WiFi Signal Input ▪ CATV Signal Input	
		5MHz~2.6GHz 5MHz~1GHz	2*F-type Female	▪ WiFi+CATV Signals Combine to WICA 12 ▪ CATV Signal Output	5
WICA 12 	1 Inputs--3 Output	5MHz~2.6GHz	1*F-type Female	WiFi+CATV Signals Combine Input	
		5MHz~2.6GHz	3*F-type Female	▪ WiFi+CATV Signals Pass to next WICA12	6
		1.5GHz~2.6GHz		▪ WiFi Signal Output	6
		5MHz~1GHz		▪ CATV Signal Output	5.5
WICA 13 	WiFi 3.5dBi High Gain Antenna	2.4GHz~2.5GHz	1*F-type Male	WiFi Signal Transfer & Receive	
WICA 14 	2 Input--8 Output	1.5GHz~2.6GHz 5MHz~1GHz	2*F-type Female	▪ WiFi Signal Input ▪ CATV Signal Input	
		5MHz~2.6GHz	8*F-type Female	WiFi+CATV Signals Combine then Output to WICA 15 (5MHz~1GHz)	13
				WiFi+CATV Signals Combine then Output to WICA 15 (1GHz~2.6GHz)	15
WICA 15U (Wall-USA) WICA 15E (Wall-EU/China) WICA 15T (Wall-Taiwan) 	1Input--2 Output High / Low Band Splitter	5MHz~2.6GHz	1*F-type Female	WiFi+CATV Signal Combine Input	
		1.5GHz~2.6GHz	2*F-type Female	▪ WiFi Signal Output	2
		5MHz~1GHz		▪ CATV Signal Output	2
WICA 16 	2 Input--6 Output	1.5GHz~2.6GHz 5MHz~1GHz	2*F-type Female	▪ WiFi Signal Input ▪ CATV Signal Input	
		5MHz~2.6GHz	6*F-type Female	WiFi+CATV Signals Combine then Output to WICA 15 (5MHz~1GHz)	11 *
				WiFi+CATV Signals Combine then Output to WICA 15 (1GHz~2.6GHz)	12

*Special Notice for WICA Series Installation : Any normal CATV cable splitter deployed in the system may block the WiFi signal. Strongly recommend to replace the original CATV splitter with WICA splitter.

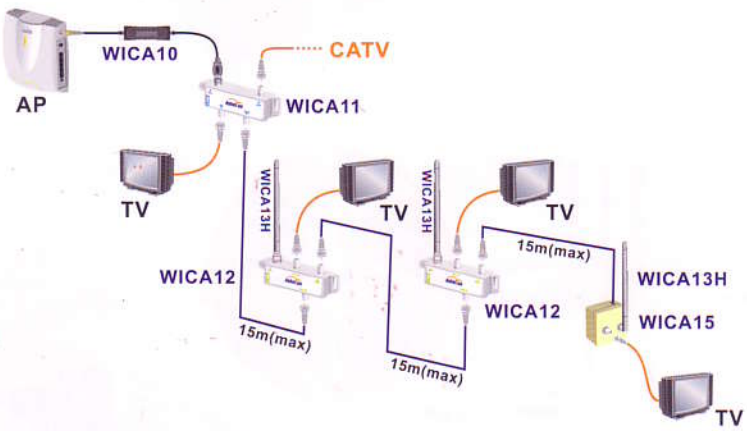
**The insertion loss needs to be kept at > -39dB for a satisfactory performance. 5C 75Ω coaxial cable loss at 2.4GHz is 0.6dB/m, this limits the cable length to < 45m.

***The maximum number of 6 WICA 12 in one line would be recommended. The unused port is suggested to have a splitter terminal.

Divergent Connecting Deployment



Chain Connecting Deployment



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