

## ABSTRACT

More people is enjoying cable television (CATV). In the development of CATV network, the network is not only used for cable television service only, more communication services like telephony and internet included in this network. For supporting more services included in the network, network need to be broadband network. Fiber optic is a medium that has ability to offer more bandwidth with less attenuation. But for CATV network that every home passed must be connected to the network, the using of full fiber optic network is not efficient in cost.

To handle this problem, Hybrid network is made. This network is called Hybrid Fiber Coax.

Mimoza TV Kabel as growing cable television service provider hampered by network capacity. To fulfill new subscriber demand, new network design is needed. New network designed to fulfill new subscriber demand with more television channel as basic service. Besides cable television as basic service, this network offers more room for additional services like internet, telephony and digital television. HFC network is the solution for this network. The small size of the network and small number of home passed for HFC network become considering point that fiber optic is not needed. The new network design is full coaxial network that taking an idea from coaxial network of HFC network