

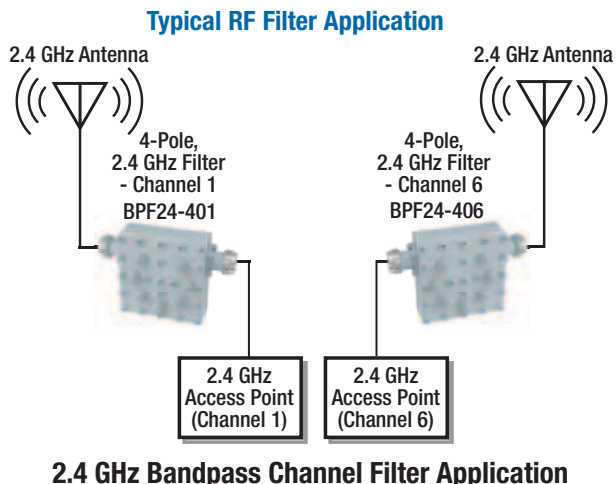
# RF Filters / Splitters

## RF Filters / Splitters Tutorial

### What are RF Filters?

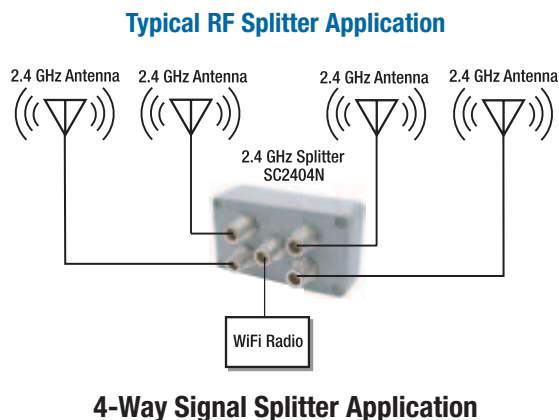
RF Filters reduce out of band interference and improve performance of co-located equipment. An RF Filter will only pass the frequency and channel you are transmitting or receiving and reduce the interference of signals outside your channel. Interference is usually caused by transmission sources near the channel you are transmitting on.

L-com's RF Filters are available in full band versions or fixed channel versions and provide excellent channel rejection. All filters feature rugged aluminum construction and are available for indoor or outdoor applications.



### What are RF Splitters/Combiners?

An RF Splitter/Combiner is a transmission component which divides or sums power between two or more ports. Typically they are used for connecting more than one antenna to a single radio and can also be used to connect multiple radios to a single antenna using the same frequency.



For more useful information go to...  
**L-com.com/Resources**

### What are RF Diplexers?

An RF Diplexer is a device that combines two signals onto a single transmission line. In general the two signals operate at different frequencies. L-com's Diplexers are designed to split 2.4 GHz and 5 GHz from a single radio feed to separate 2.4 GHz and 5 GHz antennas. Many dual-band 802.11a/b/g radios share a single antenna. These devices split these signals so that two separate 2.4 GHz and 5 GHz antennas can be used to improve performance. In addition, L-com Diplexers can also be used to combine 2.4 GHz or 5 GHz signals onto a single cable.

#### Typical RF Diplexer Applications

