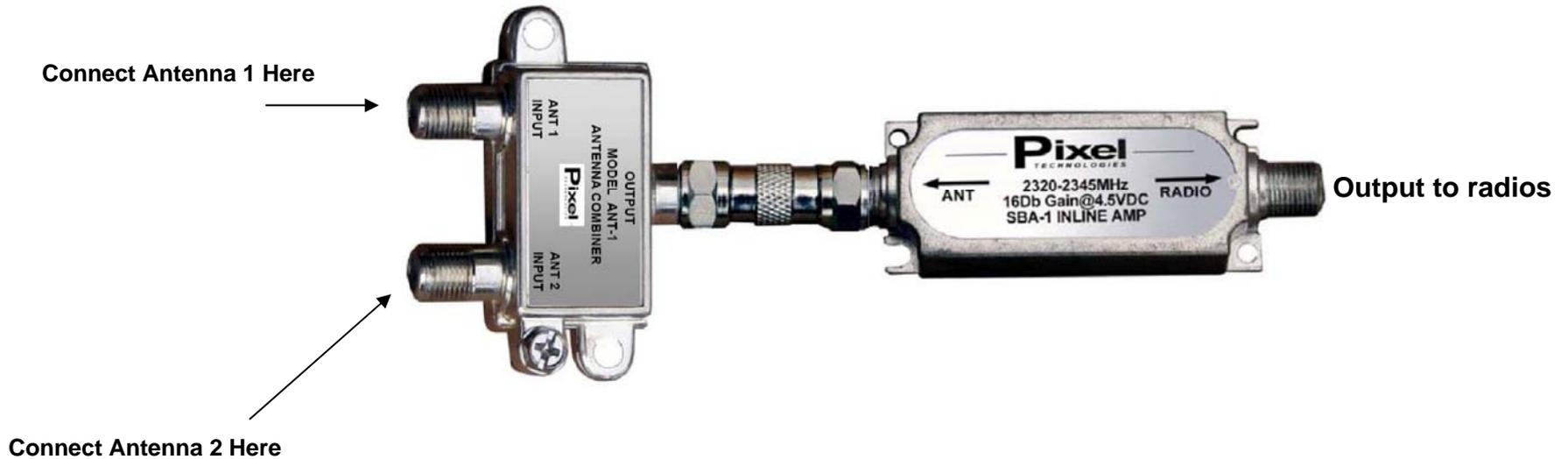
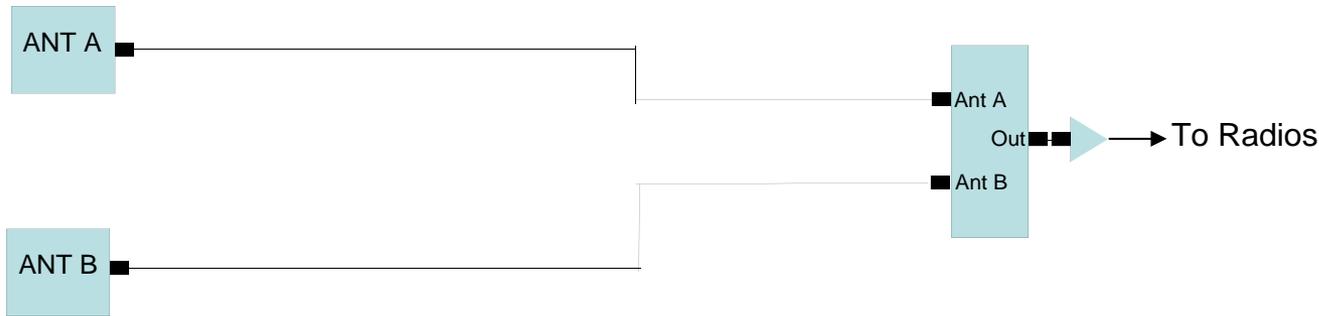


Model ANT-1 Antenna Combiner Kit

Combine the output of two different Model PRO-500 antennas for simultaneous reception of XM and Sirius satellite signals from each antenna onto a single feed cable





This device is designed to be used to combine the output of two antennas (Model PRO-500s) into a single feed that can be used with both XM and Sirius radios simultaneously. Since the satellites for XM and Sirius are in different parts of the sky, two antennas are required to receive the signals optimally which share contiguous portions of the same 25 MHz band located at 2.33 GHz. The antennas need to be positioned and pointed carefully so the XM and Sirius signals from each antenna combine in- phase rather than out-of-phase which will cause signal degradation to both. Since one wavelength at 2.33 GHz is about 5 inches, minor changes in each antenna's position, pointing and feed cable length to the combiner will have a major effect on received signal strength.

Antenna Alignment:

1. Start by connecting one of the antennas to the combiner and peaking it up one of the XM satellites for maximum signal strength on an XM radio connected to the output of the combiner. Make a note of this signal strength. Disconnect this antenna and repeat this same procedure with the other antenna also pointing at the same XM satellite and aligned for maximum signal on this same XM satellite.
2. Connect both of these antennas to the combiner at the same time and observe if the signal strength on the XM radio degrades. If so, move (displace) one of the antennas slightly (a few inches) until the best signal strength is obtained.
3. Connect a Sirius radio at the output of the combiner and re-point one of the antennas for maximum Sirius reception from its satellites.
4. Confirm that the XM signal is still good, as minor adjustments might be necessary to achieve the best tradeoff between the received XM and Sirius signals.