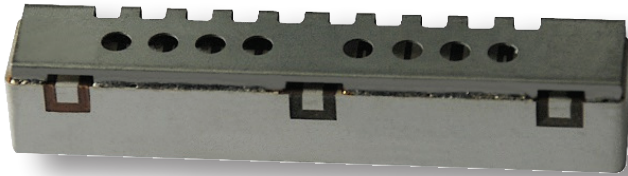


USD: Universal-footprint Small Cell Duplexers

Highest performance monoblock duplexers



CTS Electronic Components introduces the new high-reliability, surface-mounted ceramic filter that delivers the isolation and rejection required for $\leq 2W$ at Antenna small cells, remote radio heads, repeaters, and indoor DAS systems including applications needing multi-band co-location, linearized PAs, carrier-aggregation, and “whole-band” systems.

Product family offers versions for all of the major frequency bands while sharing a common PCB layout enabling a platform solution.

Model	Freq Band#	DL Freq Range [MHz]	UL Freq Range [MHz]
USD001A	1	2110 - 2170	1920 - 1980
USD002A	2	1930-1990	1850 - 1910
USD003A	3	1805 - 1880	1710 - 1785
USD004A	4	2110 - 2155	1710 - 1755
USD005A	5	869 - 894	824 - 849
USD007A	7	2620 - 2690	2500 - 2570
USD008A	8	925 - 960	880 - 915
USD010A	4 10	2110 - 2180	1710 - 1780
USD012A	12 17	728- 746	698 - 716
USD013A	13	746- 756	777 - 787
USD014A	14	758- 768	788 - 798
USD020A	20	791 - 821	832 - 862
USD025A	2 25	1930-1995	1850 - 1915
USD026A	5 26	859 - 894	814 - 849
USD027A	27	851 - 869	806 - 824
USD028A	28	758 - 803	703 - 748
USD030A	30	2350 -2360	2305-2315

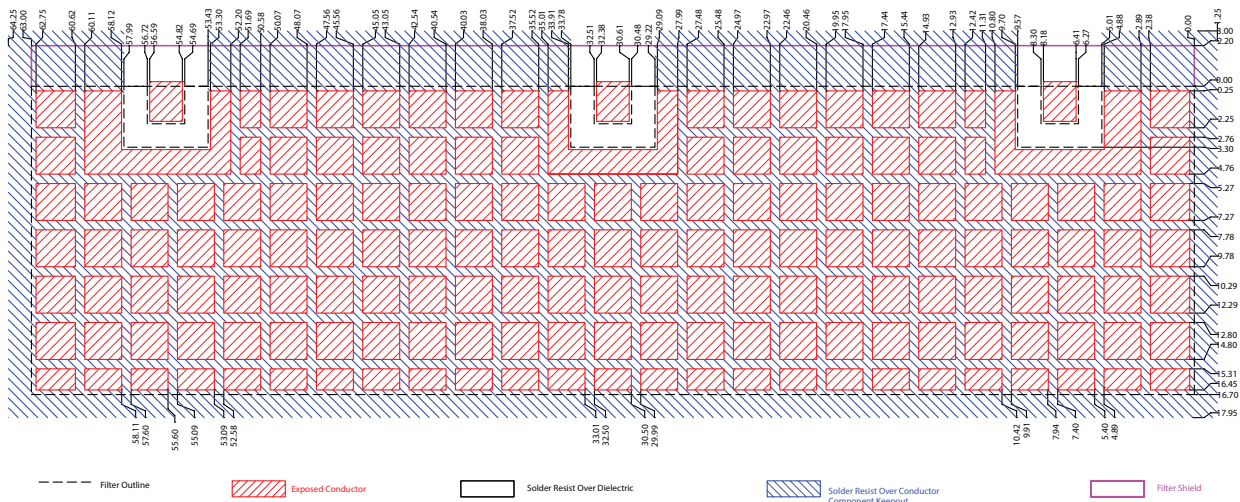
Insertion Loss (5MHz avg)	< 2.6 dB
Uplink Atten	73 dB typ 71 dB min
Downlink Atten	67 dB typ 65 dB min
Return Loss	> 12.0 dB
Input Power Rating	6.0W Avg 60W Peak
Size (L x W x H) (incl shield)	63.0 x <20.0 x 10.9 mm
Max Weight	<36 g
Temperature Range	-40°C to +85°C



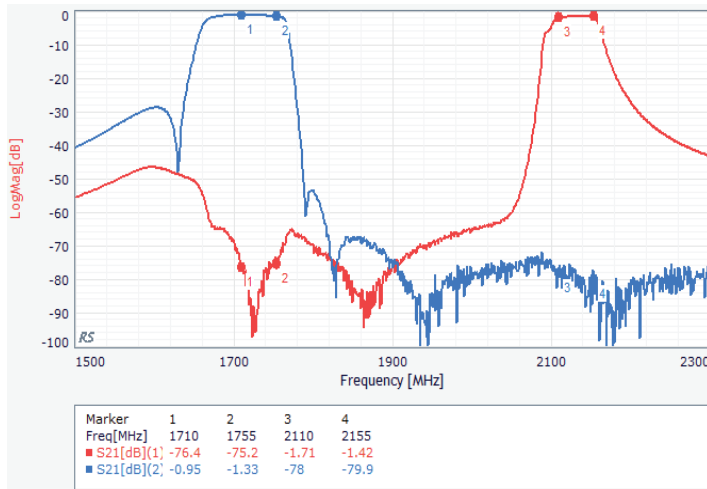
CTS®

Universal PCB Footprint for all USD frequency versions:

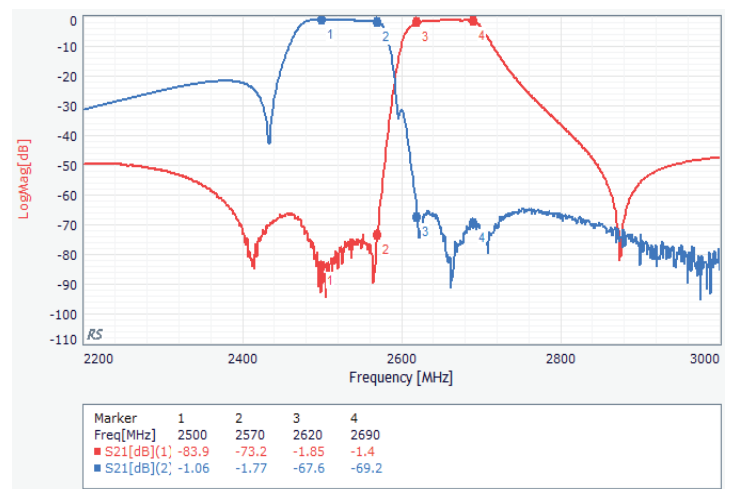
(a smaller universal footprint can be supported for frequencies >1.7GHz)



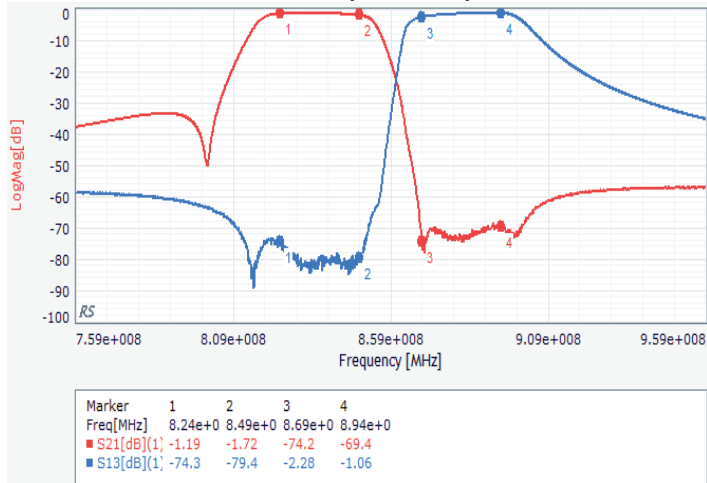
USD004A (measured)



USD007A (measured)



USD005A (measured)



USD020A (measured)

