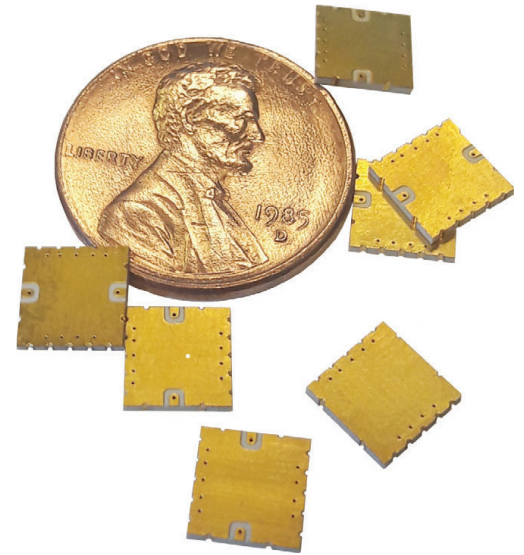


Benchmark Lark Technology offers fully customizable Liquid Crystal Polymer (LCP) broadband bandpass filters ranging from 5 GHz to 40GHz. LCP is a high performance thermoplastic material with excellent electrical and mechanical properties such as stable dielectric constant and low dissipation factor up to 110 GHz, low moisture absorption, low coefficient of thermal expansion, among other advantages. Our LCP-STL Series is ideal for commercial and military applications demanding broadband and very small footprint SMT band pass filters.



Features:

- Small size and light weight
- Easily stacked and surface mounted
- Radiation-tolerant
- Low dissipation factor
- Low moisture absorption and low thermal expansion coefficient

Specifications

- Topology: Interdigital
- Frequency Range: 5GHz to 40 GHz*
- Impedance: 50 Ohms
- Number of sections: 5 to 11
- % BW: 10% - 25%
- Connectors: SMT
- Substrate: LCP (Er=2.9 and Loss Tangent = 0.002)
- Size: Depends on number of poles and frequency of operation

We are continuously improving the performance of our filters. Please feel free to contact our Engineering Department for more information about this series or the new series (LCP-FH and LCP-SS) that we are currently developing for 28 GHz and 39 GHz 5G bands.

* We can also offer solutions for applications demanding higher frequencies up to 110 GHz.

The filter shown in the picture is a good example of our capabilities. This is a 9 poles SMT BP filter, centered at 8.7 GHz, BW of 2.12 GHz (24 %), and return loss greater than 10 dB. This filter offers a spurious rejection of more than 35 dB. Size (L x W x H): 0.25" x 0.25" x 0.033".

