

Designing and Application Considerations for Space Grade Ferrite Beads

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EMI and EMC are never easy problems to resolve. Furthermore, they always come into play in the last segments of testing. Deploying beads incorrectly can create more EMI/EMC issues than they create. We will review basic construction of these devices and how to utilize suppression both at the board and box level. We will discuss how to rate and derate ferrites for power and signal applications as well as compare the ferrite bead suppression vs using standard inductors. A focus area will be on hi-rel /space applications as these markets have an increasing low level signal content and higher board density than ever before.