



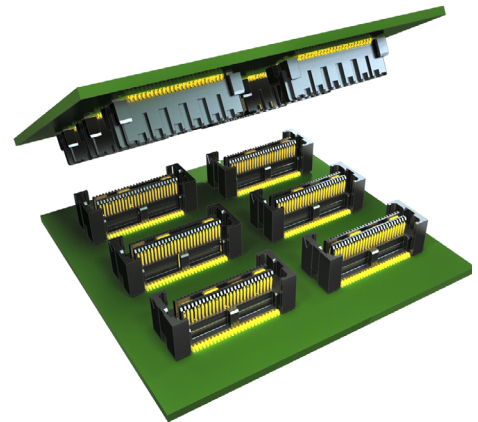
## Multiple Connector Applications

### Application Overview

Samtec's vertical board-to-board connectors are capable of being used in applications where multiple connectors are placed on a single board and mated simultaneously. When using multiple connectors per board, there is a higher potential for misalignment; however, following the recommendations in this document should mitigate this issue.

When using multiple connectors per board, Samtec recommends:

- Closely following the Samtec recommended footprint and stencil designs
- Ensuring a good solder print
- Machine placing the components
- Holding the surface mount pad location and size tolerances as tightly as possible



Avoiding the use of the alignment pin option (typically shown as "-A" in the part call out), to minimize the impact on the

- alignment tolerance analysis. When machine placement is used, alignment pins are not usually necessary.

Note: In the rare case a connector is not available without alignment pins, the drill holes should be .010" (0.25mm) larger than the recommended hole on the footprint specification to provide clearance between the pins and holes.

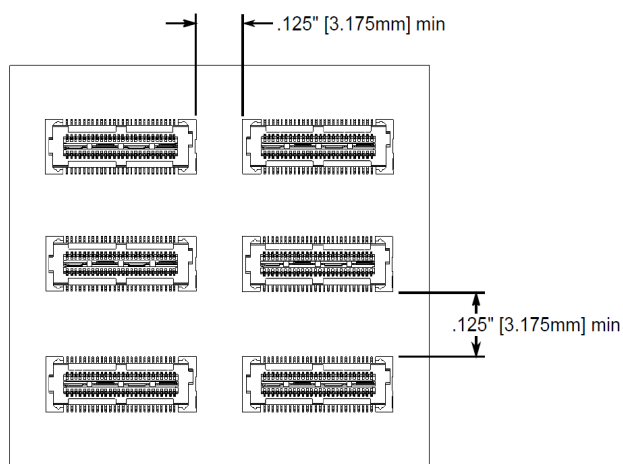
Each connector series has a unique maximum recommended misalignment in the X and Y directions to ensure a good mate. Some of Samtec's finer pitch (i.e. .4mm, .5mm) products have very limited allowable misalignment. For the maximum X and Y misalignment of a specific series, please reference its product specification which is available on the Samtec website.

These guidelines should not be considered design requirements for all applications. Samtec recommends testing interconnects on your boards in your process to guarantee optimum results.



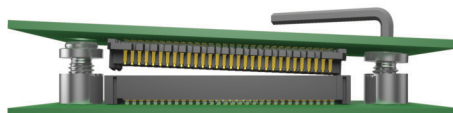
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For rework considerations, Samtec recommends a minimum spacing of .125" between adjacent components.



**Note:**

To aid in the unmating of boards which have multiple connectors or high unmating forces, or which require parallel unmating, Samtec offers the Jackscrew Standoffs (JSO).



[www.samtec.com/products/jso](http://www.samtec.com/products/jso)

For more information, please contact the Samtec Interconnect Processing Group at [ipg@samtec.com](mailto:ipg@samtec.com).

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