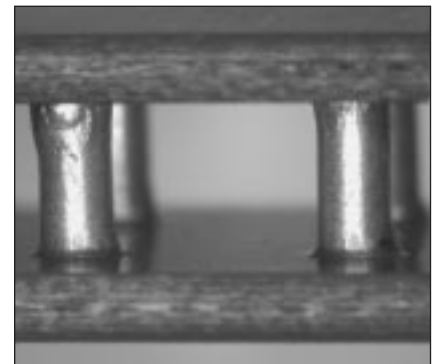


SMT Board Stacking Connector



Zierick's Board Stacking Connector allows for more PCB design flexibility and more room for additional components.

The Board Stacking Connector joins the mother and daughter board with surface mount technology on both boards.

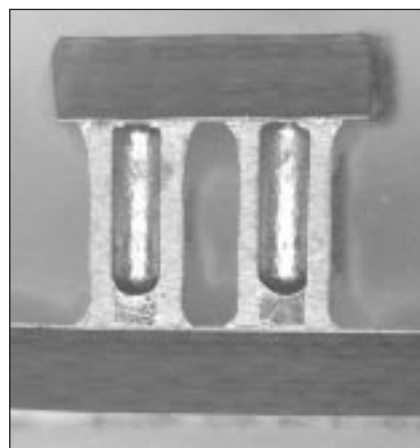


Zierick has applied the benefits of capillary action to our newest interconnect product — the Board Stacking Connector. This unique connector surface mounts to both the bottom and the top of a PCB, allowing for the connection of a mother and daughter board without through-hole pins. The result? Greater PCB design flexibility, more cost-efficiency and a higher quality connection.

Available in bulk, on pallets or on SMT tape, the Board Stacking Connectors use minimal real estate, allowing additional components to be placed on the PCB. They are self-centering and offer co-planarity within 0.001", virtually eliminating any alignment problems. Plus, they have low contact resistance and a high current rating to meet today's modular power requirements.

The Board Stacking Connector uses capillary action to provide superior

solder joint strength for a more reliable connection. The connectors are first surface-mounted to the mother board. After reflow, the PCB with the connectors are surface-mounted to the daughter board.



Board Stacking Connector cross section showing solder reflow and capillary action.

Benefits

Zierick's Board Stacking Connector:

Provides a cost-efficient board stacking solution.

- Surface-mounts to the bottom and top of a PCB for a stronger mother board-daughter board connection
- Uses existing placement machines; no need for new insertion systems

Increases PCB design flexibility.

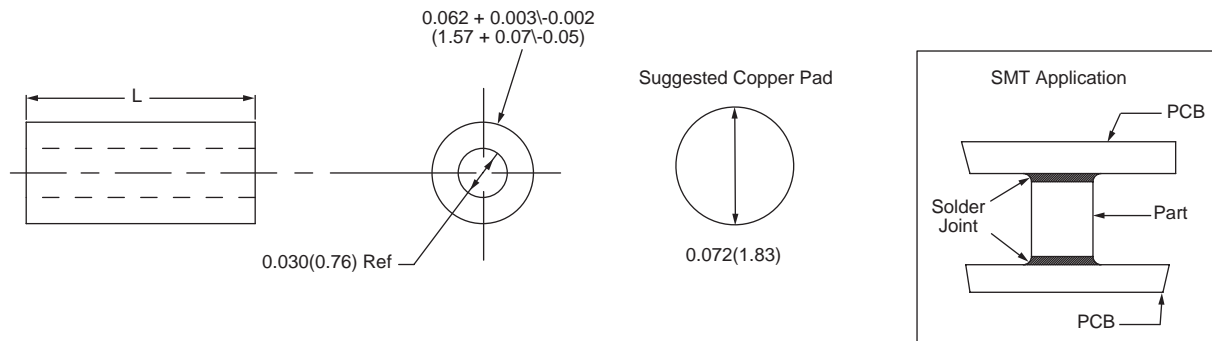
- Uses minimal real estate, allowing for more components to be placed on the PCB
- Eliminates the need for through-hole pins

Allows for a better connection.

- Provides low contact resistance, high current rating and co-planarity within 0.001"
- Uses capillary action for a stronger solder joint

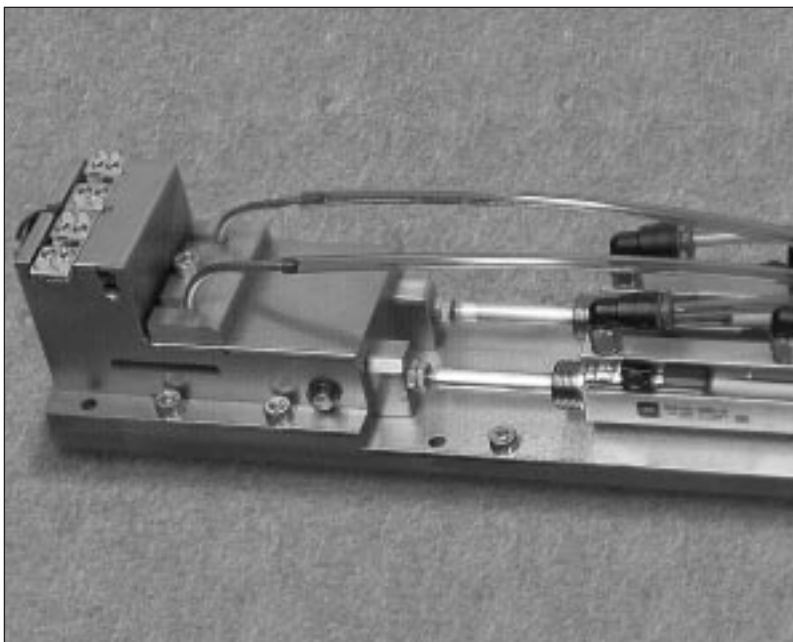
SMT Board Stacking Connector

Loose Part Number	1258 - xxx - 0
Dimension L	0.090" to 0.250" (Fill in xxx with desired length, Dimension L)
Finish Material	.000150" Min Matt Tin over .000100" Copper
Contact Material	C36000 Brass Cylinder
Termination Retention Force	3.5 lbs per terminal
Current Rating	10 Ampere



U.S. Pat. No. 5,816,868

Surf Shooter SMT™ Board Stacking Connector Feeder



The Surf Shooter SMT™ Board Stacking Connector Feeder is designed to mount to a flexible placement system (flex cell) and present the SMT component at feed rates greater than 3 connectors/second. Parts are fed into an escapement where compressed air pushes the board stacking connector into a reservoir that presents the component to the placement system vacuum nozzle.

The unit is compact, less than 4" wide, and easily mounts to the placement system feeder bay. The feeder itself is a self-contained unit, 110 V_{AC} /80 psi, typically requiring no electronic control interface with the placement machine.

The feeder is designed specifically to accommodate the new connectors. High speed feeders are available for most placement systems.