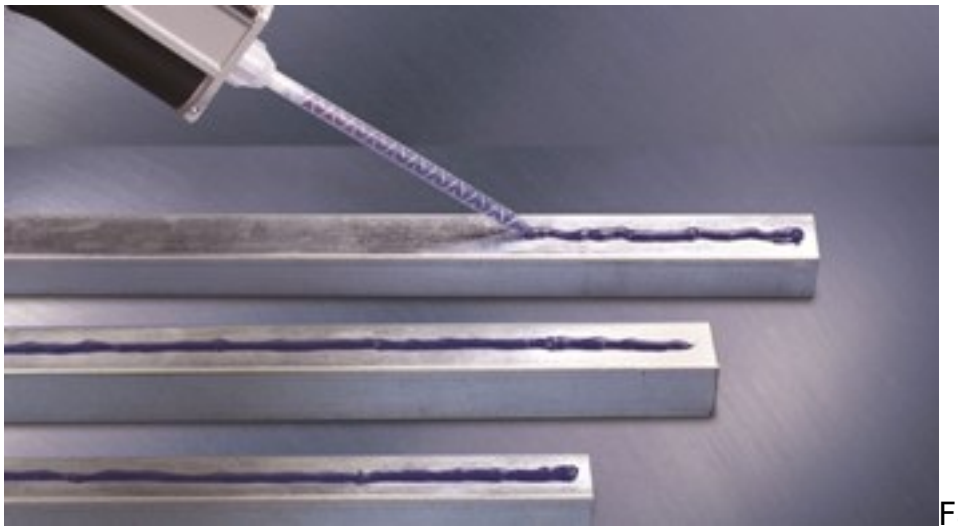
Structural Adhesives as Alternative to Mechanical Fasteners

MDT Staff



Fabrico, the leader in design and manufacturing services for flexible materials and advanced assembly solutions, offers structural adhesives in both liquid and tape format to meet the evolving assembly needs of industries including aerospace, medical, and transportation.

As a replacement for heavier, less flexible metal fasteners and welding, design engineers are turning to structural adhesives as a cost-effective solution for bonding and joining applications. Structural adhesives are generally defined as load-bearing adhesives that can withstand heavy loads to 4,000 psi or even higher.

Structural adhesives offer several advantages over traditional welds, screws, and nuts and bolts, including:

- Weight reduction
- Ability to join dissimilar materials such as plastics, composites, and new metal alloys
- Aesthetically pleasing
- More adaptable to automated processes

Perhaps the most significant advantage of structural adhesives over mechanical fasteners is that they are often less labor intensive and offer a significant cost reduction across the entire assembly process.

There are many considerations when designing with structural adhesives, and a converter like Fabrico can help determine the best type of structural adhesive for your application. When recommending structural adhesives, Fabrico takes into consideration factors like shear, tensile, and peel strength; cure time; temperature

resistance; and dielectric requirements.

For more information, visit www.fabrico.com/bonding-joining-sealing-structural-adhesives.htm [1].

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