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Increasing damage tolerance in composites using hierarchical brick-and-mortar microstructures

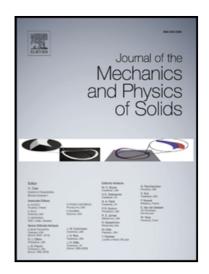
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Highlights

- Self-similarity cannot predict accurately the response of hierarchical composites
- Failure mechanisms involve interactions between the different hierarchical levels
- Hierarchical composites are more damage tolerant than conventional composites
- Hierarchical composites are less sensitive to manufacturing defects like ply-shifts



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