

Topology Optimization of Microstructures
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In this lecture the topology optimization of microstructures within the context of linearized elasticity will be addressed. Several examples will be presented and the case of finding the energy bounds for multiple load conditions will be considered. The computational approximation of these bounds will be made using topology optimization material models but restricting the number of microstructure levels to one. The computational formulation will be described, test results for a set of representative multiload conditions will be shown and the results will be discussed and compared with theoretical energy bounds obtained through ran-n laminates.