

Background: Competitive Materials in the FY2022 NDAA

The House Armed Services Readiness mark of the FY2022 NDAA included a pilot program for the increased use of mass timber in military construction. Mass timber – a building system of engineered wood – can be used to building structures up to 18 stories. It is a competitor to steel, concrete and other building products in the open marketplace.

The aggregates, cement and concrete industries voiced their concern with taxpayer funded building programs being used to promote a competitor’s material. The final NDAA included material-neutral compromise language to promote the use of sustainable building materials – including both mass timber and concrete. The aggregates, cement and concrete industries support this materials-neutral policy.

DOD Review of Use of Innovative Wood Product Technology

As directed by the FY2021 NDAA, the DOD reviewed the use of mass timber in military construction. The review noted:

- There are no DOD policies or standards that would prevent the use of mass timber (p 1)
- DOD is a leader in mass timber adoption (p 2; cover letter)
- Choice of structural system is currently up to project’s team of design professionals (p 1)
- Mass timber cannot be certified sustainable according to DOD report (p 2)

Mass Timber, Concrete and Sustainability

Concrete construction resists the impacts of climate change and natural disasters, sequesters carbon over its lifecycle, and can be fully recycled – without ever releasing the stored carbon. In fact, the IPCC reported recently that concrete absorbs as much as 50% of the emissions associated with its manufacture.¹ While this may be an optimistic estimate, concrete holds the promise of net-zero and net-negative disaster resilient construction.

While much has been written about the sustainability of mass timber, significant doubts remain. In May 2020, more than 200 top climate scientists wrote to urge Congress to reject policies that promoted the use of wood products – specifically calling out mass timber.² The Sierra Club warns that the claimed benefit of mass timber construction is “highly misleading.”³ And researchers at Oregon State University and University of Idaho confirm that the wood products industry is the largest sector contributing to carbon pollution in Oregon.⁴

Support a Materials-Neutral Approach to Construction Programs

The aggregate, cement and concrete industry urges Congress to reject any material-specific building programs for the following reasons:

- The sustainable building materials program is ongoing and will report on environmental sustainability, infrastructure resilience, cost effectiveness and construction timeliness.
- Taxpayer funded building programs at DOD or elsewhere in the federal government should be materials neutral; they should not be used to mandate or promote the use of a specific building material.
- Decisions on which building materials to use be made by engineers and construction professionals; Congress should not pick winners and losers.

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¹ <https://www.dezeen.com/2021/08/24/concrete-construction-offsets-emissions-cement-industry-ipcc/>

² <https://96a.96e.myftpupload.com/wp-content/uploads/2020/05/200TopClimateScientistCongressProtectForestsForClimateChange13May20.pdf>

³ https://contentdev.sierraclub.org/sites/www.sierraclub.org/files/program/documents/Forests,%20Wood%20&%20Climate%20Report_Sierra%20Club_July%202019.pdf

⁴ <https://sustainable-economy.org/wp-content/uploads/2018/04/Law-et-al-2018.pdf>