

Accepted Manuscript

Dynamic crushing response of an energy absorption connector with curved plate and aluminum foam as energy absorber

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PII: S0734-743X(18)30351-8
DOI: [10.1016/j.ijimpeng.2018.07.016](https://doi.org/10.1016/j.ijimpeng.2018.07.016)
Reference: IE 3141



To appear in: *International Journal of Impact Engineering*

Received date: 12 April 2018
Revised date: 31 May 2018
Accepted date: 26 July 2018

Please cite this article as: Yonghui Wang , Ximei Zhai , Wenjian Ying , Wei Wang , Dynamic crushing response of an energy absorption connector with curved plate and aluminum foam as energy absorber, *International Journal of Impact Engineering* (2018), doi: [10.1016/j.ijimpeng.2018.07.016](https://doi.org/10.1016/j.ijimpeng.2018.07.016)

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Highlights

- The energy absorption connectors were tested under drop-weight impact loading;
- The effects of aluminum foam, loading rate, curved plate thickness and radius were evaluated;
- Numerical model was established to simulate the connectors under impact loading;
- The analytical model considering strain rate effect was developed to predict the force-displacement response.

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