

Showcasing research from Montanuniversität Leoben (Austria) in collaboration with the Los Alamos National Laboratory (USA).

In situ transmission electron microscopy as a toolbox for the emerging science of nanometallurgy

This study unveils the parameters enabling nanoscale metallurgy through an innovative lab-on-a-chip approach. Experimental demonstrations showcase the feasibility of nanoalloying by manipulating diverse nanomaterial species within a MEMS chip. This paves the way for consolidating nanometallurgy as an emerging science. The introduced metallurgical toolbox serves as a nanoscale chemical reactor, propelling metallurgy into new geometric dimensions.



See Diego S. R. Coradini, Matheus A. Tunes *et al., Lab Chip*, 2023, **23**, 3186.



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