

Abstract Submitted
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Jamming of 2D foams ALEXANDER SIEMENS, MARTIN VAN HECKE, University Leiden — We probe the jamming of 2D wet foams by lateral compression of a bidisperse foam monolayer sandwiched between a glass plate and a fluid surface. Boundaries and residual gravitational effects prevent the foam to be truly unjammed, obstructing the observation of a jammed/unjammed transition. Instead, we find a clear transition from a “gravity jammed” to a “boundary jammed” state, where the bulk modulus jumps from essentially zero to a finite value, in agreement with theory. In addition, we probe the nonaffine bubble motion, which becomes large near this transition.

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