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Hamiltonian local models for symplectic derived stacks

We show that a derived stack with symplectic form of negative degree can be locally described in terms of generalised Darboux coordinates and a Hamiltonian cohomological vector field. As a consequence we see that the classical moduli stack of vector bundles on a Calabi-Yau threefold admits an atlas consisting of critical loci of regular functions on smooth varieties. If time permits, we discuss applications to the categorification of Donaldson-Thomas theory. This is joint work with subsets of Ben-Bassat, Bussi, Dupont, Joyce, and Szendroi.