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**Tara S. Holm\***, Cornell University. *Act globally, compute locally: Localization in symplectic geometry.*

Localization is a technique that, for certain group actions on symplectic manifolds, allows us to make global equivariant computations in terms of local data at the fixed points. For example, we may compute a global integral by summing the integrals at all of the fixed points. This often turns topological questions into combinatorial ones and vice versa. After a brief introduction to symplectic geometry, I will showcase several instances of localization, with particular attention to examples. (Received November 15, 2006)