Symplectic *G*-capacities and integrable systems

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Abstract. For any Lie group G, we construct a G-equivariant analogue of symplectic capacities and give examples when $G = \mathbb{T}^k \times \mathbb{R}^{d-k}$, in which case the capacity is an invariant of integrable systems. Then we study the continuity of these capacities, using the natural topologies on the symplectic G-categories on which they are defined.

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