1077-20-2323 **Nic Koban** and **Peter Wong*** (pwong@bates.edu), Department of Mathematics, Bates College, Lewiston, ME 04240. Ω^n *invariants and twisted conjugacy classes.*

A group G is said to have property R_∞ if for every automorphism $\varphi \in \mathrm{Aut}(G)$, there are an infinite number of φ-twisted conjugacy classes. The interest in R_∞ originates from topological fixed point theory. We show that if the Ω^n invariant of G is finite and nonempty then it consists of one or two points. In the case of a singleton, G has property R_∞. If Ω^n consists of two points, then there is an index 2 subgroup Γ in $\mathrm{Aut}(G)$ such that there are an infinite number of φ-twisted conjugacy classes for every $\varphi \in \Gamma$. (Received September 22, 2011)