

Queen's Algebraic Geometry — Seminar —

FREE RESOLUTIONS AND
REPRESENTATIONS WITH FINITELY MANY ORBITS

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Abstract

The representations of reductive groups with finitely many orbits are parametrized by graded simple Lie algebras. For the exceptional Lie algebras, Kraskiewicz and Weyman exhibit the expected minimal free resolutions for the coordinate ring of the normalization of the orbit closures. I will present an interactive method to verify their conjectures using the software *Macaulay2*, and construct explicitly the free resolutions of the coordinate rings and related modules.

Monday 9 September 2013
16:30 – 17:30
319 Jeffery Hall