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## Enumerative Geometry of Divisorial Families of Rational Curves

ZIV RAN

**Abstract.** We compute the number of irreducible rational curves of given degree with 1 tacnode in  $\mathbb{P}^2$  or 1 node in  $\mathbb{P}^3$  meeting an appropriate generic collection of points and lines. As a byproduct, we also compute the number of rational plane curves of degree  $d$  passing through  $3d - 2$  given points and tangent to a given line. The method is ‘classical’, free of Quantum Cohomology.

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