Algebra Seminar

Inductive Methods for Counting Number Fields

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Abstract: We propose general frameworks to inductively counting number fields. By applying these methods, we prove the asymptotic distribution for extensions with Galois groups in the form of direct product or wreath product. For both way of inductions, the key ingredients are uniform estimates on the number of number fields with certain conditions. By unifying the approaches, we extend the framework to a more general set up and prove results for more general type of products. This will involve my thesis and in progress work with Robert J. Lemke Oliver and Melanie Matchett Wood.

Tuesday, October 2, 2018, 4:00 pm Mathematics and Science Center: W301

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