

**Undergraduate Math Club  
Winter 2006  
2<sup>nd</sup> floor Nesbitt Common Room  
March 16, 4:10-5:00pm  
(free pizza and pop, as always)**

**Prof. John Lott**

## **Three-dimensional spaces**

### **Abstract**

Until recently, one of the oldest unsolved problems in topology was the Poincare conjecture, which concerns how to recognize a 3-dimensional sphere among a wider class of 3-dimensional spaces. A far-reaching generalization of this conjecture is Thurston's Geometrization Conjecture. Very recently, Perelman has announced a proof of Thurston's conjecture (and so the Poincare conjecture as a corollary). This talk will present a non-technical introduction to the recent work of Perelman.