MATH 496 Math Honor Seminar
Dr. Boersma
Spring 2013

Goals: We will learn a bit about the twisty theory of knots. Our approach will primarily be one of investigation and discovery, conjecture making and conjecture breaking, examples and counter-examples. Towards the end of the quarter we will read a paper which introduces takes a diagrammatic approach and introduces us to the bracket polynomial.

Office: Bouillon 107E, phone: 963-1395, email <u>boersmas@cwu.edu</u>. Office hours will be announced in class shortly. You may of course drop by anytime. If I'm not busy I'll be glad to talk with you.

Required
Materials

1. **Text:***Knots and Surfaces: A Guide to Discovering Mathematics*, by David W. Farmer and Theodore B. Stanford.
2. "New Invariants in the Theory of Knots", Louis H Kauffman, *American Mathematical Monthly*, March 1988.

Your Grade: Your final grade in this course will depend on attendance, class participation, and your overall involvement in the classroom discussions. Please come to class prepared and have a few ideas ready to share with others. If you miss a day, you may be required to hand in written "make-up" work. Each missed day that is not made up will result in your final grade being reduced by 1/6th of a letter grade.