## TOPICS IN MATHEMATICAL LOGIC – 80510-01 Fall 2014, Mathematics, Notre Dame.

<u>MWF 9.25 – 10.15</u>

ANAND PILLAY

Draft:

My current plan is to discuss the model theory of pseudofinite theories and structures, and connections with other parts of mathematics, including combinatorics. The course should be in principle accessible to students who know basics of first order logic and model theory.

References include the classical Chatzidakis, Macintyre, van den Dries paper: Definable sets over finite Fields, Crelle's Journal, vol 427 (1992), as well as Hrushovski's recent rather speculative paper: On pseudofinite dimensions, Notre Dame Journal of Formal Logic, vol 54, numbers 3-4, 2013.