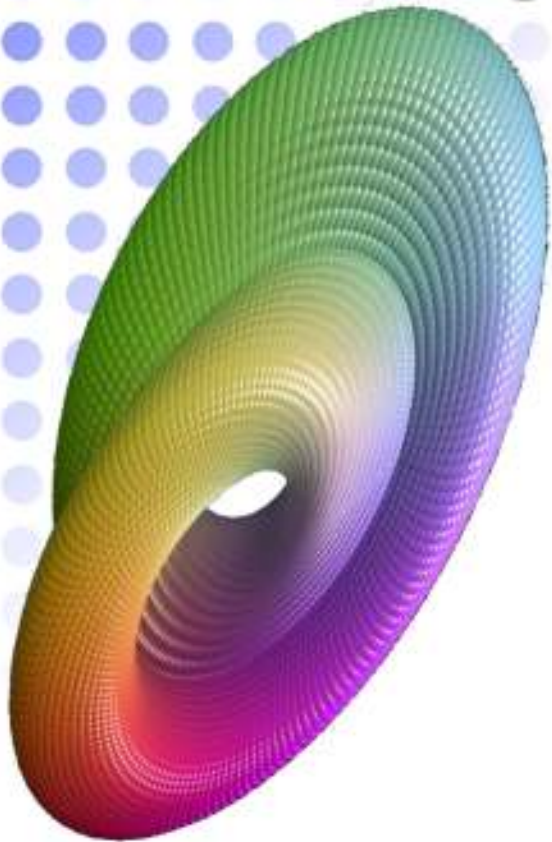# Michigan Math Club

Thursday at 4pm in the Commons
Free Pizza and Pop

The Skolem-Mahler-Lech Theorem

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Abstract for 26 February 2015

In 1933 Skolem described the possible zero sets of sequences of integers defined by an integral linear recurrence relation. This result was extended to number fields by Mahler, and then to arbitrary fields of characteristic zero by Lech. In this talk we will discuss Skolem's result and its proof, which involves p-adic analysis. No prior knowledge of these topics will be assumed, and the p-adics only enter the picture at the tail end of the proof.