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*Differential algebra and the  $j$ -invariant.*

We will discuss a generalization of Pila's modular Ax-Lindemann-Weierstrass theorem. Namely, we will show that the differential equation satisfied by the  $j$ -function is strongly minimal and geometrically trivial. Both of these model-theoretic notions and their importance will be explained. The proof uses results of Pila and Nishioka along with stability theory. If time permits, generalizations and Shimura varieties will also be discussed. (Received February 10, 2014)