1057-34-350

Ovidiu Costin<sup>\*</sup> (costin@math.ohio-state.edu), 231 W 18th Ave, Columbus, OH 43210, and Rodica D Costin (rcostin@math.ohio-state.edu), 231 W 18th Ave, Columbus, OH 43210. Integrability of differential systems: connections with Borel summability.

The talk will focus on the behavior of solutions of ODEs in the complex domain. New approaches based on Borel summability provide detailed behavior about the singularity structure, and about the form of the constants of motion in integrable cases. (Received January 25, 2010)