Seminário de sistemas dinâmicos e estocásticos

IMECC - UNICAMP

Título: Stochastic nonlinear partial differential equations: Well-posedness and asymptotic behavior of Besicovitch almost periodic solutions. .

Claudia Lorena Duarte Espitia UNICAMP <u>Resumo:</u>

In this talk we present some results about two stochastic partial differential equations generalizing some previous results to a more general class of oscillatory solutions. More specifically, we treat stochastic conservation laws and stochastic degenerate parabolic-hyperbolic equations considering a wider notion of periodic solutions. For these equations, we study the well-posedness and the long-time behavior of almost periodic solutions under the assumption of Lipschitz continuity of the flux and the viscosity functions, and some non-degeneracy conditions. As a main objective, for each equation, we show the existence and uniqueness of an invariant measure in a separable subspace of the space of Besicovitch almost periodic functions.