Title: Asymptotic Behavior of Compact Skew-product Semiflows on Hilbert
Spaces

Abstract:
We consider an infinite dimensional separable Hilbert space and its family of skewproduct compact semiflows over an ergodic flow $\varphi^t : M \to M$. Assuming that M is a compact Hausdorff space and φ^t preserves a Borel regular ergodic probability μ which is positive on non-empty open sets, we will prove that there is a τ-residual subset of skewproduct semiflows within which, for μ almost every x, either the Oseledets-Ruelle's decomposition along the orbit of x is uniformly hyperbolic (in the projective space) or else the Ruelle's limit operator over the orbit of x is the null operator. We prove also a L^p version of this dichotomy for cocycles with a L^p topology defined in infinitesimal generators set and that non-uniformly Anosov skew-products are C^0-dense in the family of partially hyperbolic cocycles with non-trivial unstable bundles.

Biographical note:
Glória Carvalho finished her degree in educational mathematics in 2008 at FCUP. She teachead in Cespu between 2008 and 2013 and started her PhD in Applied Mathematics in 2010 at FCUP under supervision of Mário Bessa and Jorge Rocha. Since then she has studied dynamical systems and Lyapunov exponents defined on infinite dimensional Hilbert spaces.