

# On the Lyapunov Exponent of Certain $SL(2, \mathbb{R})$ -Valued Cocycles II

Roberta Fabbri, Russell Johnson, Luca Zampogni

## **Abstract**

We study the positivity of the Lyapunov exponent for a smooth  $SL(2, \mathbb{R})$ -valued cocycle defined over a flow from a class which includes the Kronecker flows and others as well. We also discuss the question of the density in the Hölder class of the set of  $SL(2, \mathbb{R})$ -cocycles exhibiting an exponential dichotomy when the base flow is of Kronecker type on a 2-torus.

Differential Equations and Dynamical Systems, vol. 18, n.1-2, (2010), pp.135-161