

Abstract

In late 1970s, Uhlenbeck initiated a program to study minimal immersions of closed surfaces into hyperbolic three-manifolds. Naturally bifurcation for the equations occurs and she described the first such diagram. In this project, joint with M. Lucia (CUNY) and G. Tarantello (Roma) we study in much depth on this bifurcation. In particular we will determine the full range of parameter where solutions exist and prove multiplicity results.