1021-30-190 Adam Epstein, Vladimir Markovic and Dragomir Saric* (saric@math.sunysb.edu), 3726 Connecticut Ave., NW, Washington, DC 20008. Teichmuller-type extremal maps for the universal hyperbolic solenoid.

A point in the Teichmuller space of the universal hyperbolic solenoid is an equivalence class of Beltrami coefficients on the solenoid. A Beltrami coefficient in the form of the quotient of the absolute value of a holomorphic quadratic differential to the holomorphic differential multiplied by a constant between 0 and 1 is called a Teichmuller-type Beltrami coefficients. Teichmuller-type Beltrami coefficients are uniquelly extremal in their equivalence classes, i.e. their essential supremum norm is the uniquelly smallest in the class. We establish that generic points in the Teichmuller space of the solenoid do not have a Teichmuller-type representatives. This is in sharp contrast with Teichmuller spaces of Riemann surfaces where either all points have Teichmuller-type extremal representatives, or at least generic points do. We also establish a sufficient criterion for the existence of Teichmuller-type representatives. Joint with A. Epstein and V. Markovic. (Received September 05, 2006)