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Quadratic Spline Least Squares Method for Computing Absolutely Continuous Invariant Measures.

We present a numerical method for computing absolutely continuous invariant measures associated with a piecewise monotonic interval map by using quadratic spline approximations. Using a rigorous matrix analysis and the Lasota-Yorke inequality, we prove the norm convergence of the method. We also present numerical examples for the efficiency of the approach. (Received August 27, 2018)