1145-57-2329   **Adam S Sikora***, 244 Math Bldg, North Campus, SUNY Buffalo, Buffalo, NY 14260. *Toric Degenerations of SL(2)-character varieties of surfaces.* Preliminary report.

We explore the properties of SL(2)-character varieties of surfaces using the theory of pseudo-Anosov diffeomorphisms and of measured foliations. In particular, we introduce the notion of transversal homology of surface foliations and show that each measured foliation on a surface S defines a toric degeneration of the SL(2)-character variety of S to the group ring of its transversal homology. (That gives a novel proof of irreducibility and of reduceness of SL(2)-character varieties of surfaces.) (Received September 25, 2018)