

Abstract Submitted
for the TSF07 Meeting of
The American Physical Society

Pinning Enhancement of Tb Doped TFA-MOD YBCO Film¹ HUI FANG, GAN LIANG, Sam Houston State University, BRANDON HARRISON, PAUL BARNES, Air Force Research Laboratory — In this study, minute rare earth Tb doped YBCO films were prepared by using Trifluoroacetic acid metalorganic deposition (TFA-MOD) method. The precursor solution was deposited on LAO single crystal substrate by using spinning coating method. The epitaxial YBCO films were obtained via a two-step heat treatment. The characterizations of films including microstructure, T_c , field dependent J_c will be reported. The relationship between dopant amount, J_c -H behavior, and microstructure evolution will be discussed.

¹This work was supported by 2007 Faculty Research Grant of Sam Houston State University.

Hui Fang
Sam Houston State University

Date submitted: 05 Oct 2007

Electronic form version 1.4