1135-VR-2121William J Franczak* (wjf212@lehigh.edu), 203 Van Buren Street, Bethlehem, PA 18015.
K-Triviality in General Settings. Preliminary report.

Abstract: The area of algorithmic randomness is primarily concerned with using the tools of computability theory to define and quantify notions of randomness formally, typically done in Cantor space. An important concept is that of K-triviality, describing the class of infinite binary strings which are as easy as possible to describe, and thus far from random. This class of K-trivial strings has many characterizations in the standard setting, affirming it's robustness as a notion, and Andre Nies has given a generalization of this class that preserves many of its nice properties in general computable metric spaces. We look at other possible characterizations for this notion, in particular in computable measure spaces, and investigate how they compare. (Received September 25, 2017)