Dylan Airey (dylan.airey@yahoo.com) and Bill Mance* (mance@unt.edu). The Hausdorff dimension of sets of numbers defined by their Q-Cantor series expansions.

Following in the footsteps of P. Erdős, A. Rényi, and T. Salát we compute the Hausdorff dimension of sets of numbers whose digits with respect to their Q-Cantor series expansions satisfy various statistical properties. In particular, we consider difference sets associated with various notions of normality and sets of numbers with a prescribed range of digits. (Received January 07, 2015)