1046-11-1635 Robert Osburn* (robert.osburn@ucd.ie), School of Mathematical Sciences, University College Dublin, Belfield, Dublin, 4, Ireland. Gaussian hypergeometric functions.

In 1984, Greene introduced the notion of hypergeometric functions over finite fields. Special values of these functions are of interest as they are related to Fourier coefficients of modular forms. In this talk, we discuss these developments and new results. (Received September 16, 2008)