1135-05-1096 George E Andrews* (gea1@psu.edu). Partitions with even parts below odd parts and mock theta functions.

We begin considering all partitions in which each even part is smaller than each odd part. The full generating function is of only minor interest. However, of much greater interest is the subclass consisting of those partitions where in addition the largest even part is the only part that appears an odd number of times. There is a natural "crank" for these partitions and a nice Ramanujanesque congruence modulo 5. There is also a natural relation with the third order mock theta function nu(q). (Received September 19, 2017)