1073-11-168   **John J Webb*** (`webbjj@wfu.edu`), PO Box 7388, 127 Manchester Hall, Winston-Salem, NC 27109. *The zoom rate of F-K-O partition congruences.*

In recent work, Folsom, Kent, and Ono show that for primes ≥ 5, values of the partition function are ℓ-adically self-similar. This arises from the fact that under alternate iteration of certain operators, the generating function for $p(n) \pmod{\ell^m}$ eventually lands in a finite-rank submodule which is stable under these operators. We improve the bound on the number of iterations (the "zoom rate") required for this process to stabilize. Calculations show that this bound is sharp for small ℓ and m. This is joint work with Matthew Boylan. (Received July 31, 2011)

1