1127-60-142 L Weakley* (llnguyen@iu.edu). Strictly stationary, N-tuplewise independent counterexamples to the Central Limit Theorem.

For an arbitrary integer $N \ge 2$, we construct a strictly stationary, N-tuplewise independent sequence of (nondegenerate bounded) random variables that is mixing in the ergodic-theoretic sense and such that the Central Limit Theorem fails to hold. This construction was given by L. Weakley [Ph.D. Dissertation, Indiana University, 2013]. It is an adaptation of a construction from a paper by Bradley and Pruss [Stochastic Processes and Their Applications, 119, 2009] of a strictly stationary, N-tuplewise independent, ergodic sequence of (nondegenerate bounded) random variables such that the Central Limit Theorem fails to hold. (Received February 03, 2017)