1096-37-960 **Ronnie Pavlov*** (rpavlov@du.edu). *A characterization of topologically completely positive entropy for shifts of finite type.*

Blanchard defined a topological dynamical system to have *topologically completely positive entropy* (or TCPE) if every one of its nontrivial factors has positive topological entropy. (Here, 'nontrivial' means not consisting of a single fixed point) Though TCPE is not easy to characterize in general, we give a simple condition which is equivalent to TCPE for shifts of finite type.

For this, we define a relation called exchangeability: patterns $w, w' \in A^S$ are said to be *exchangeable* in a shift space X if there exist $x, x' \in X$ such that $x(S) = w$, $x'(S) = w'$, and x, x' differ on only finitely many sites. Interestingly, the exchangeability relation is not necessarily transitive, and it is the transitive closure which is related to TCPE. (Received September 11, 2013)