1158-13-279   **Rebekah J Aduddell*** (`rebekah.aduddell@uta.edu`). *The Critical and Cocritical Degrees of a Totally Acyclic Complex.* Preliminary report.

Let $(Q, \mathfrak{m}, k)$ be a commutative local Noetherian ring, $f_1, \ldots, f_c$ a Q-regular sequence in $\mathfrak{m}$, and $R = Q/(f_1, \ldots, f_c)$. We present a generalization of critical degree for R-modules to the category of totally acyclic R-complexes, $\mathbf{K_{tac}}(R)$. In particular, this talk will discuss how the critical and cocritical degrees of an R-complex change under certain operations, such as the mapping cone and the pinched tensor product. (Received March 02, 2020)