1145-54-215 Soumyadip Acharyya* (acharyys@erau.edu), Sudip Kumar Acharyya, Sagarmoy Bag and Joshua Sack. Topologies on the Rings of Measurable functions.

Let (X, \mathcal{A}) stand for a nonempty set X equipped with a σ -algebra \mathcal{A} over X. The set of all real-valued \mathcal{A} -measurable functions on X forms a commutative lattice ordered ring with unity if the relevant operations are defined pointwise. My talk will focus on the so-called *m*-topology on this ring $\mathcal{M}(X, \mathcal{A})$ and its measure-theoretic generalization. Important topological properties including first countability and connectedness will be discussed. (Received August 20, 2018)