



A study of topological structures on equi-continuous mappings

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Abstract:

Function space topologies are developed for $EC(Y, Z)$, the class of equi-continuous mappings from a topological space Y to a uniform space Z . Properties such as splittingness, admissibility etc. are defined for such spaces. The net theoretic investigations are carried out to provide characterizations of splittingness and admissibility of function spaces on $EC(Y, Z)$. The open-entourage topology and pointtransitive-entourage topology are shown to be admissible and splitting respectively. Dual topologies are defined. A topology on $EC(Y, Z)$ is found to be admissible (resp. splitting) if and only if its dual is so.

Keywords: Topology; Uniform space; Function spaces; Equi-continuous mappings; Net convergence.

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