

Intuitionistic Fuzzy L-Ideals and Intuitionistic Fuzzy L-Filters in L -Group

Authors : Poonam Kumar Sharma

Abstract : In this paper, we study the concept of an intuitionistic fuzzy l-ideal and an intuitionistic fuzzy l-filter of an ordered group. We provide several characterizations for an intuitionistic fuzzy l-ideal and an intuitionistic fuzzy l-filter from different perspectives. We observe that for any intuitionistic fuzzy convex sub l-group, we can find an intuitionistic fuzzy l-ideal and an intuitionistic fuzzy l-filter containing it. Lastly, the intersection of some intuitionistic fuzzy l-ideals and an intuitionistic fuzzy l-filters containing it can be used to express any intuitionistic fuzzy convex sub l-group.

Keywords : intuitionistic L-fuzzy sub l-group, Intuitionistic L-fuzzy convex sub l-group, Intuitionistic L-fuzzy l-ideals, Intuitionistic L-fuzzy l-filters

Conference Title : ICCEEE 2025 : International Conference on Computing, Electrical and Electronic Engineering

Conference Location : Toronto, Canada

Conference Dates : June 19-20, 2025