Abstract

The study of theory of fuzzy sets was initiated by Zadeh in 1965. Since then many authors have extended and developed the theory of fuzzy sets in the fields of topology and analysis. The notion of fuzzy metric spaces has very important applications in quantum particle physics. As a result many authors have extended the Banach’s Contraction Principle to fuzzy metric spaces and proved fixed point and common fixed point theorems for fuzzy metric spaces. The aim of this paper is to introduce the new definition of R-fuzzy metric space and establish a fixed point theorem for fuzzy mappings in generalized R-fuzzy metric spaces.
Fixed Point Theorem for Fuzzy Mappings in Generalized R – Fuzzy Metric Spaces


Index Terms

Computer Science

Fuzzy Systems

Keywords

R-Fuzzy Contractive Mapping Complete R-fuzzy Metric Space Semi-Compatible Maps D-Metric Space Weak Compatibility
Common Fixed Point