

ON Γ -SEMIRING WITH IDENTITY

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Abstract

In this paper we study the properties of structures of the semigroup $(M, +)$ and the Γ -semigroup M of Γ -semiring M and regular Γ -semiring M satisfying the identity $a + a\alpha b = a$ or $a\alpha b + a = a$ or $a + a\alpha b + b = a$ or $a + 1 = 1$, for all $a \in M$, $\alpha \in \Gamma$. We also study the properties of Γ -semiring with unity 1 which is also an additive identity.

Keywords: Γ -semigroup, Γ -semiring, regular Γ -semiring.

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