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Abstract

In this paper an energy usage estimation technique (LCEFCM) has been proposed which employs the Fuzzy C-Means clustering for creating clusters in the Wireless Sensor Networks. LCEFCM reduces the energy consumption considerably compared to other clustering methods like simulated annealing and K-Means clustering. It applies the dynamic clustering mechanism combined with balanced clustering method. LCEFCM outperforms LEACHC, LEACHC Estimate(LCE) and LCEKMeans for various performance measuring factors like network lifetime, data received, alive nodes etc.

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Index Terms

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Keywords

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