

Abstract: A smart device that has seen more development is the Internet of Things (IoT). An IoT system implementation requires a device that can accept and handle various sorts of data. Fog Computing is a solution to the issue since the IoT demands a device that can provide Real-Time. Certainly, load balancing involves scheduling the IoT devices and data used. Because Cloud and Fog Computing models enable data growth management and deployment planning, which necessitate a quicker response from platforms and applications, processing power scheduling is essential. The purpose of this study is to evaluate the performance of effective scheduling algorithms that adhere to these computing models platform requirements. The scheduling algorithm that can produce the lowest Processing Time and the resulting Time Efficiency is more efficient can be called the best scheduling algorithm. In this research, the author analyzes the performance of scheduling algorithms in the form of Round Robin and Priority Scheduling on Fog Computing. In this research, testing was carried out by creating a scenario of the effect of increasing the number of Fog Nodes and Devices used. The average result of scenario testing obtained for processing time for Round Robin is lower, and the highest Time Efficiency for Round Robin over Priority Scheduling is 11%. With these test results, the Round Robin scheduling algorithm has a simpler level of complexity. So, it can be concluded that Round Robin belongs to the category of the best scheduling algorithm in this case.

Keywords: Fog Computing; Round Robin; Priority Scheduling; Processing Time; Time Efficiency