Improved Max-Min Algorithm in Cloud Computing

Abstract

In this paper, a unique modification of Max-min algorithm is proposed. The algorithm is built based on comprehensive study of the impact of RASA algorithm in scheduling tasks and the atom concept of Max-min strategy. An Improved version of Max-min algorithm is proposed to outperform scheduling map at least similar to RASA map in total complete time for submitted jobs. Improved Max-min is based on the expected execution time instead of complete time as a selection basis. Experimental results show availability of load balance in small cloud computing environment and total small makespan in large-scale distributed system; cloud computing. In turn scheduling tasks within cloud computing using Improved Max-min demonstrates achieving schedules with comparable lower makespan rather than RASA and original Max-min.

References


A. Afzal, A. Stephen McGough, and J. Darlington, "Capacity planning and

\textbf{Index Terms}

\begin{tabular}{ll}
  Computer Science & Cloud Computing \\
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\textbf{Keywords}

\begin{tabular}{llllll}
  Cloud Computing & Meta Task Scheduling & RASA Algorithm & Max-min Algorithm & Min-min Algorithm \\
\end{tabular}

makespan