A Review of various Mutual Exclusion Algorithms in Distributed Environment

Abstract

In computer science, mutual exclusion (MUTEX) refers to a way of making sure that if one process is using shared modifiable data or resources then the other processes will be excluded from doing the same thing at the same time. A number of mutual exclusion algorithms are available in the literature, with different performance metrics and with different techniques. The Selection for a "good" mutual exclusion algorithm is a key point. These mutual exclusion algorithms can be broadly classified into token and non-token based algorithm. This paper surveys the algorithms which have been reported in the literature for Mutual exclusion in distributed systems and their comparison.

References

A Review of various Mutual Exclusion Algorithms in Distributed Environment


12. "Distributed Mutual exclusion" ppt. by Rajnitha Shivarudraiah


14. Randy Chow, Theodore Johnson “Distributed Operating system and algorithm analysis”.

15. Abhishek swaroop, Awadesh kumar singh "a STUDY BASED ALGORITHMS FOR Distributed mutual exclusion".


25. “Shared memory mutual exclusion exclusion”: Major Research trends since 1986 by
A Review of various Mutual Exclusion Algorithms in Distributed Environment

James H. Anderson and Yong-Jik Kim.


Index Terms

Computer Science Algorithms

Keywords

Mutual Exclusion (MUTEX), Critical Section (CS), Timestamp.