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并发实时系统的串行非实时仿真框架(PDF)

Title: Serial Non-realtime Simulation Framework of Concurrent Real-time System

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摘要: 为了解决并发实时系统在通用计算机上的仿真问题,文中分析了并发实时系统的一般特性,归纳了仿真验证的硬件架构选择,通过分离并发进程计算与运行顺序,按照时标调度进程,提出了一种将并发问题串行化的通用仿真框架,该框架适用于一般性的并发实时系统仿真,可以有效加快仿真程序开发,提高程序质量。

Abstract: For solving the simulating problem of concurrent real-time system on common computer, the general characteristics of concurrent real-time system were analyzed, two types of hardware architecture selection were concluded, and a framework was proposed for serializing concurrence through separating algorithm from execution order and scheduling process according to time-stamp. The framework is applicable to general simulation of concurrent real-time system. It can speed up development of simulation program effectively, and improve program's quality.

参考文献/REFERENCES

[1] Jane W S Liu.实时系统[M].北京:高等教育出版社,2002.
[2] 何江华.计算机仿真导论[M].北京:科学出版社,2001.
[3] 慕春隶.嵌入式系统的构建[M].北京:清华大学出版社,2004.
[4] George Coulouris,Jean Dollimore,Tim Kindberg.分布式系统概念与设计[M].金蓓弘,曹冬磊,译.北京:机械工业出版社,2008.

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工具/TOOLS

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