Abstract

For sustaining in the era of globalization, frequent up-gradation in the software is demanded. In order to maintain the competitive edge firms come up with highly reliable versions. For providing high reliability firms have to test software rigorously that requires debugging the software in the testing as well as in the operational phase. Upgrading the software leads to the enlarged complexity in the system which often results in the increase number of faults content. In this paper, a framework for successive releases is modeled which incorporates the fault of the present release and faults from the just previous release informed by the users. The approach provides a more realistic perspective of fault evaluation by taking into consideration both; the faults from the testing of new releases and the reported faults from the operational phase of the preceding releases. We have examined the case when there exists two types of faults in the software; simple and hard faults during testing and operational phase. Further we have compared our proposition with the previous developed models in the field of multi up-gradation.


Fault Severity based Multi Up-gradation Modeling considering Testing and Operational Profile

Index Terms

Computer Science  Software Engineering

Keywords

Fault Severity, Multi Release, Operational Phase, Testing Phase.