Abstract

Develop an efficient system is one of the main challenges for software developers, who has been concerned with reliability related issues as they build and deployed. This paper surveys various fault prediction techniques and measuring quality parameters in object oriented systems. The survey includes traditional techniques like Fault tree analysis, Information theoretic approach, coupling & cohesion measurement and conceptual cohesion and coupling. The utility of each technique based on structural and instructor information of class. Each technique deals with various parameters for predicting the software fault. The fault prediction improves the software reliability and quality.

References

- Amol S. Dange ,Prof. Dr. S. D. Joshi &quot; Fault Prediction in Object Oriented System Using the Coupling and Cohesion of Classes, &quot; IJCSMS International Journal of Computer Science and Management Studies, Vol. 11, Issue 02, pp 48-51, Aug 2011.
Survey of Fault Prediction Methods in Object Oriented Systems


- Basili, V. R., Briand, L. C., and Melo, W., "A validation of object-oriented design metrics as quality indicators," IEEE Transactions on Software Engineering,
- Briand, L. C., Daly, J. W., Porter, V., and Wu, "A Comprehensive Empirical
Survey of Fault Prediction Methods in Object Oriented Systems


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