PERFORMANCE TESTING AND
SOFTWARE RELIABILITY

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Abstract

Software is being with us from morning alarm to put on good night lamp. As the software becomes more complex, software reliability factors contributes major role in solving software reliability problems. Software reliability reflects the design perfection rather than manufacturing perfection. Moreover credible software reliability is required to track underlying software failure processes recovered during testing for accurate reliability analysis and forecasting. Software reliability and testing are two proportional terms, if there is efficient testing methods are used then there is lesser number of failures means more reliable software. Software testing is to measure the test compression factor, which is defined as the ratio between the mean time between failures during operation and during testing. Reliability means that how the system is performing in the given constraints and Performance testing can ensure the reliability or performance of the systems when load increases. This experience report is about the software project designed with performance testing under different loads. This report focuses on how performance testing is carried out and give the results by means of response time, throughput and resource utilization to make the system more reliable.