**DECLARATION**

We hereby declare that all the work presented in the dissertation entitled “**SERVER MONITORING”** in the partial fulfillment of the requirement for the award of the degree of Bachelor of Technology in **Information Technology**, Guru Tegh Bahadur Institute of Technology affiliated to Guru Gobind Singh Indraprastha University, New Delhi, is an authentic record of our own work carried out under the valuable guidance of **Ms. Shalini**.

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## CERTIFICATE

This is to certify that dissertation entitled **“Server Monitoring”**,which is submitted by **Mr. Amanpreet Singh , Ms. Chitra Choudhary, Mr. Navdeep Singh** and **Ms. Pulkit Bindra** in partial fulfillment of the requirements for the award of the degree of Bachelor of Technology in Information Technology, Guru Tegh Bahadur Institute of Technology, New Delhi is an authentic record of the candidate’s own work carried out by them under our guidance. The matter embodied in this thesis is original and has not been submitted for the award of any other degree.

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**ABSTRACT**

The project “**Server Monitoring**” is aimed at developing an application that is able to test and verify different services of a server and ensure that all of them are being delivered to end user adequately. It is developed in order to help the businesses to ensure that their network is live and responding. Monitoring a server means that the server owner always knows if one or all of his services go down.

Server monitoring may be **internal**, i.e. web server software checks its status and notifies the owner if some services go down, and **external**, i.e. some web server monitoring companies check the services status with a certain frequency

**Server Monitoring** is composed of four modules:

1) Extensive Network Monitoring

2) Memory and Performance Management

3) System Snapshot

4) Flexible Alerting Engine

The module, **Extensive Network Monitoring** is aimed at developing an application that is able to test and verify whether the end users can interact with the website or web application.

**Memory and Performance Management** is the process of determining the network resources required to prevent a performance or availability impact on business-critical applications.

**System snapshot** is developed to provide facility to their end users i.e. employees of making a software request if required.

**Flexible Alerting engine** will be designed for real life alerting with maximum alerting types. Alerts will be sent to the end user through the **SMTP mail** through an authenticated procedure.

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