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Bug Tracking System

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I.ABSTRACT

The Bug Tracking System is ideal solution to track the bugs of a product, solution or an application. Bug Tracking System allows individual or group of developers to keep track of outstanding bugs present in the product. Bug Tracking System can increase the productivity and accountability of individual employees by providing documented workflow and good positive feedback of good performance. Our Bug Tracking System is much simpler than already proposed system in context of tracking bugs. There are basically two main components in our Bug Tracking System. One of the component is developer and second is user or can say tester.
The developers maintains whole details of the bugs existing in various other system with the help of a database. Database will store almost all the information regarding the bugs. It will maintain details regarding bugs by maintaining bug id, bug types, bug descriptions, bug severity, bug status and details of users. The developers can know information regarding the bug tracking status of users. While on the other hand tester or user can detect bug in the system and add those new bugs in database maintained by developer.

II.INTRODUCTION

Bug Tracking System is an integral part of most of the system. The main objective of this system is to develop bugless system or help user to develop such system. In todays world there are lot of applications floating around which consists lots of information in them. Larger the applications more the bugs found in them. The another main objectives of bug tracking system is to report and identify all bugs present in project and make project more user friendly.
There are certain bug tracking systems that work along with distributed revision control software. Such kind of systems enable users to read bug reports conveniently and also add it to the database of developer even while developer is offline. Now a days most of commercial bug tracking systems have started to integrate with such distributed systems, example for such system is Fog Bugz. It enables its functionality via source-control method. This system able to manage document as well as code in an distributed manner. But there is certain drawback of such systems as they are less user-friendly compared to non-distributed bug tracking systems. This system is such that it has access to real time information from anywhere in the world, 24 hours a day and 365 days of a year.

III.EXISTING SYSTEM

In software developments bugs are hard to avoid , and are inevitable. Let it be any project or application,bug arise at any phase of development. One has to take great care of handling and maintaining bugs. In the existing systems bugs are not properly maintained and they simply relied on shared list and email to monitor bug.
The problems found in such systems were related to whole project maintenance, user maintenance and their assignment had to be maintain manually. In this

system it becomes difficult to track bug. If a bug goes overlook then it cause more problems in further phases of development. In such systems , one has to search whole database for the details of particular bug which might have occurred earlier. It is both time consuming and error prone. It is difficult to share information related to bug among several users as there is no proper maintenance of bugs.

Bug Tracking System is also called as "Defect Tracking System" . It is also called as set of scripts which are used to maintain databases of bugs. Bug tracking system track the bugs and helps to manage software quality assurance.

V.SOFTWARE AND HARDWARE REQUIREMENTS

There are basically two types of requirements for this system. 1) Software requirements and 2)Hardware requirements.

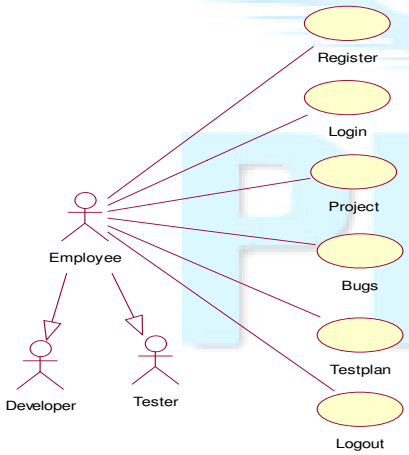
1)Software requirements :A set of operations associated with programmes is called software. Software is a device which enables user to interact with several physical devices. The minimum software rquirements are:

Frontend : JSP/PHP
Backend : MySQL
Scripting : Javascript.

2) Hardware requirements: The collection of electronic circuit and external physical devices. The minimum hardware requirements are:
Processor : Pentium IV
RAM : 512 MB RAM

VI.MODULES OF THE SYSTEM

1.EMPLOYEES MODULE:



employe is the person who take care of all registration status, acceptance of new bugs, and other various tasks. Employee can perfom some tasks on behalf of administrator. The administrator also adds the user and assign them certain task of responsibility. The administrator has authority to update and alter details of security levels, status level and various other aspects of project.

IV.PROPOSED SYSTEM

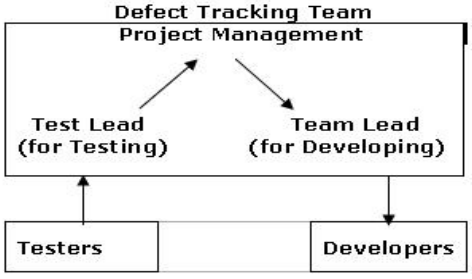
This is maintain the product and bug history, and it stores the bug history. It maintain the users bug. In system searching is based on status of the user. The bug history provides the relationship between the user and the system. The main advantage of the system is it stores the long history and provides information about the user and the bug.

2. DEVELOPER MODULE:

There are basically two main roles of Employee. One of them is developer and other is tester. The role of developers is to lead team by developing a program and correspondingly add bugs to the database.

3. TESTER MODULE:

Testers role in bug(Defect) tracking system is vital and plays a crucial role in managing applications.



VII. WORKFLOW OF BUG TRACKER:

An error, fault, failure, mistake, flaw can be called as "bug" with respect to software development. According to bugs in software development is a term which may cause system to fail. Bugs in the system or projects are unavoidable.It basically means that software will not be able to meet the requirements and expectations of software clients.A product is said to be quality product when it meets the functional requirements specified by clients. Hence it is necessary to remove bugs.

There are various phases to remove bugs and bug tracker has its own life cycle. We need to configure different roles to list number of bugs. For example a quality assurance analyst and tester may need track of all bugs for testing. While developer might see the list of open bugs. As bugs in any system may cause system to behave or act incorrectly, it is not advisable to keep bug database for long period of time.

VIII.BENEFITS

User is provided the option of monitoring the records he entered earlier. He can see the desired records with the variety of options provided by him.
Data storage and retrieval will become faster and easier to maintain because data is stored in a systematic manner and in a single database.
Easier and faster data transfer through latest technology associated with the computer and communication. Through these features it will increase the efficiency, accuracy.

IX.LIMITATIONS

The size of the database increases day-by-day, increasing the load on the database back up and data maintenance activity.
Training for simple computer operations is necessary for the users working on the system.

X.OBSERVATION

Web Enabled Defect Tracking System provides knowledge about the latest technology used in developing web enabled application and client server technology that will be great demand in future. This will provide better opportunities and guidance in future in developing projects independently.

XI.CONCLUSION

The bug tracking system is the fundamental part of software lifecycle. User comes to search and make query, typically by giving words. Software Development Lifecycle is can never be completed without encountering Bugs. Bug tracking needs necessary information to search a bug and resolve the bud faster. We proposed a framework with four directions that helps to improve the system. They are tool oriented, information oriented, process oriented and user oriented in nature. This four directions are help to improve the tracking system.
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