



Development of source code repo migration for LTE and 5G components

Kaveri Patil^{*1}

Department of Electrical and Electronics Engineering
RV College of Engineering, Bengaluru, India
kaveripatil.epe21@rvce.edu.in

Mrs Sushmita Sarkar²

Professor, Department of Electrical and Electronics, Engineering
RV College of Engineering, Bengaluru, India

**Corresponding Author: Kaveri Patil
Email: kaveripatil.epe21@rvce.edu.in*

Abstract:

The most crucial elements of the software development life cycle are version control systems. It continuously keeps an eye on and keeps track of any system additions or deletions. A software component's source code is created by developers, who may also change the current source code as discussed in the distributed version control system (DVCS) tool, such as Git, in this study. Git is a free and open-source project management tool designed to handle all sizes of projects quickly and effectively. Git can copy or clone a repository to a developer's local repository, allowing them to update it and commit changes without any interference. To update their local repositories with fresh information from the central server, developers can use the "pull" command, and to update the main repository with local repository commits, they can use the "push" operation. Git keeps track of the modifications that developers make to files so that they have a record of what has been done. Any local repository can be used to quickly restore lost data if the central server crashes at any time. Subversion (svn) is not accessible locally; a network connection is required for all operations. Because svn is a centralized version control system (CVCS), switching to the feature branch when building a script is not possible in svn because if the server crashes or becomes corrupted, all project data will be lost. Shell scripts and groovy scripts are used in an organization's migration from svn to Gerrit to solve this issue.

Keywords:

Version control, Git, svn, Gerrit, Continuous Integration, Continuous Deployment, Jenkins.