## Documentation on Health check of servers

Tools:
1.git
2.Jenkins
3.Powershell
Purpose of each tool:
Git:
We are using this tool to store the source code and output file (I.e report)
Which was created during the pipeline execution job
Jenkins:
Jenkins tool is used to run the pipeline job
Powershell:
To execute Powershell script
Steps:
1.Create a repository in git hub
2.Clone the repository to local system
3.Create "Jenkinsfile" for Jenkinspipeline
4 Create a file for Powershell Script with name "serverhealth.ps1"
5 Create a file to list the server names/IP address with name "hostlist"
6.Environment Setup
1.Configure the git with jenkins
Install the following plugins
->git client
->git

- ->git server
- ->github
- ->git API
- ->github branch source
  - Create global Credentials for git
- ->with username and password
  - 2. Check whether, we are able to connect the servers through ssh without using any Credentials. If not then follow below steps
  - 3. Create SSH key in local by running the ssh-keygen command
  - 4.go to the specified path and copy the key
  - 5.connect to the server through cmd by using credentials
  - 6.paste the key in specific file and save
  - 7. Now check whether you are able to connect without credentials.
- 7. Once all setup is done run the jenkins pipeline

## Work-flow of Jenkins pipline

Stage1: cloning the Git repository to Jenkins workspace

Stage2: running the Powershell script

Stage3: updating the repository to github

## Powershell Script:

- First it removes the report file
- Then It collects the CPU, Memory, Disk details of server
- Next it collects the list of process which are using more CPU(I.e<=1)
- It collects the java and Docker service status
- It collects IITSSite status
- At last it displays and stores the data in report file