

DEVOPS

ASSIGNMENT 1

Installation of Nginx.

Task Description:

This task involves creating a Jenkins Freestyle job that automates the installation of Nginx on an Ubuntu server using the command `sudo apt-get install -y nginx`. This automation ensures consistent server setup and can be easily repeated, making it ideal for automated environments.

Steps:

1. Update Package List:

- Run the following command to update the package list:
- `sudo apt update`

2. Install Nginx:

- Install Nginx using the following command:
- `sudo apt-get install -y nginx`

3. Verify Installation:

- Check if Nginx is running with the command:
- `systemctl status nginx`

4. Create Jenkins Freestyle Job:

- In Jenkins, click New Item and create a Freestyle project (e.g., Install_Nginx).

5. Configure Job:

- Add a build step of type Execute shell.
- In the shell command box, enter:
- `sudo apt update`
- `sudo apt-get install -y nginx`

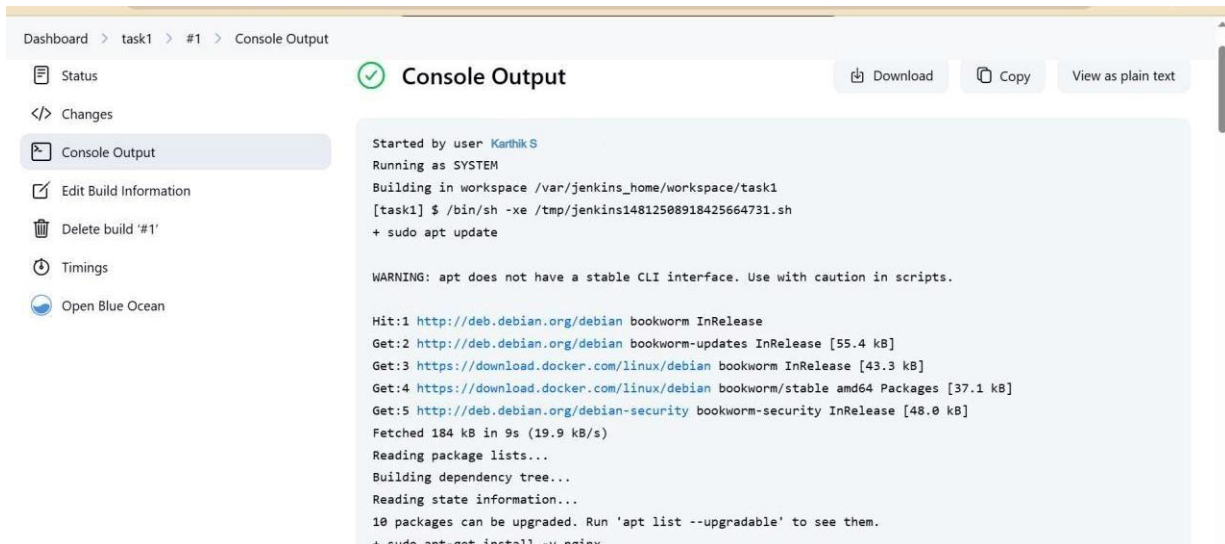
6. Save and Run Job:

- Save the job and click Build Now to run it.

7. Check Console Output:

- After the job completes, view the **Console Output** to confirm the successful installation of Nginx.

OUTPUT:



The screenshot shows the Jenkins web interface for a job named 'task1' with build number '#1'. The 'Console Output' tab is selected. The output shows the user 'Karthik S' running as 'SYSTEM' in the workspace '/var/jenkins_home/workspace/task1'. The command executed is '/bin/sh -xe /tmp/jenkins14812508918425664731.sh', which runs 'sudo apt update'. The output includes a warning about the apt CLI interface, followed by a list of packages to be upgraded: bookworm, bookworm-updates, bookworm-stable amd64 Packages, and bookworm-security. The output ends with '10 packages can be upgraded. Run 'apt list --upgradable' to see them.' and 'sudo apt-get install -v nginx'.

```
Started by user Karthik S
Running as SYSTEM
Building in workspace /var/jenkins_home/workspace/task1
[task1] $ /bin/sh -xe /tmp/jenkins14812508918425664731.sh
+ sudo apt update

WARNING: apt does not have a stable CLI interface. Use with caution in scripts.

Hit:1 http://deb.debian.org/debian bookworm InRelease
Get:2 http://deb.debian.org/debian bookworm-updates InRelease [55.4 kB]
Get:3 https://download.docker.com/linux/debian bookworm InRelease [43.3 kB]
Get:4 https://download.docker.com/linux/debian bookworm/stable amd64 Packages [37.1 kB]
Get:5 http://deb.debian.org/debian-security bookworm-security InRelease [48.0 kB]
Fetched 184 kB in 9s (19.9 kB/s)
Reading package lists...
Building dependency tree...
Reading state information...
10 packages can be upgraded. Run 'apt list --upgradable' to see them.
+ sudo apt-get install -v nginx
```



The screenshot shows the continuation of the Jenkins console output. It displays the output of 'sudo apt-get install -v nginx'. The output shows the installation of nginx (1.22.1-9+deb12u1) and the installation of libbpf1:amd64 (1:1.1.0-1), libtirpc3:amd64 (1.3.3+ds-1), and iproute2 (6.1.0-3). The output ends with 'Finished: SUCCESS'.

```
debconf: unable to initialize frontend: Readline
debconf: (This frontend requires a controlling tty.)
debconf: falling back to frontend: Teletype
Setting up libbpf1:amd64 (1:1.1.0-1) ...
Setting up libtirpc3:amd64 (1.3.3+ds-1) ...
Setting up iproute2 (6.1.0-3) ...
debconf: unable to initialize frontend: Dialog
debconf: (Dialog frontend will not work on a dumb terminal, an emacs shell buffer, or without a controlling terminal.)
debconf: falling back to frontend: Readline
debconf: unable to initialize frontend: Readline
debconf: (This frontend requires a controlling tty.)
debconf: falling back to frontend: Teletype
Setting up nginx (1.22.1-9+deb12u1) ...
invoke-rc.d: could not determine current runlevel
invoke-rc.d: policy-rc.d denied execution of start.
Processing triggers for libc-bin (2.36-9+deb12u9) ...
Finished: SUCCESS
```