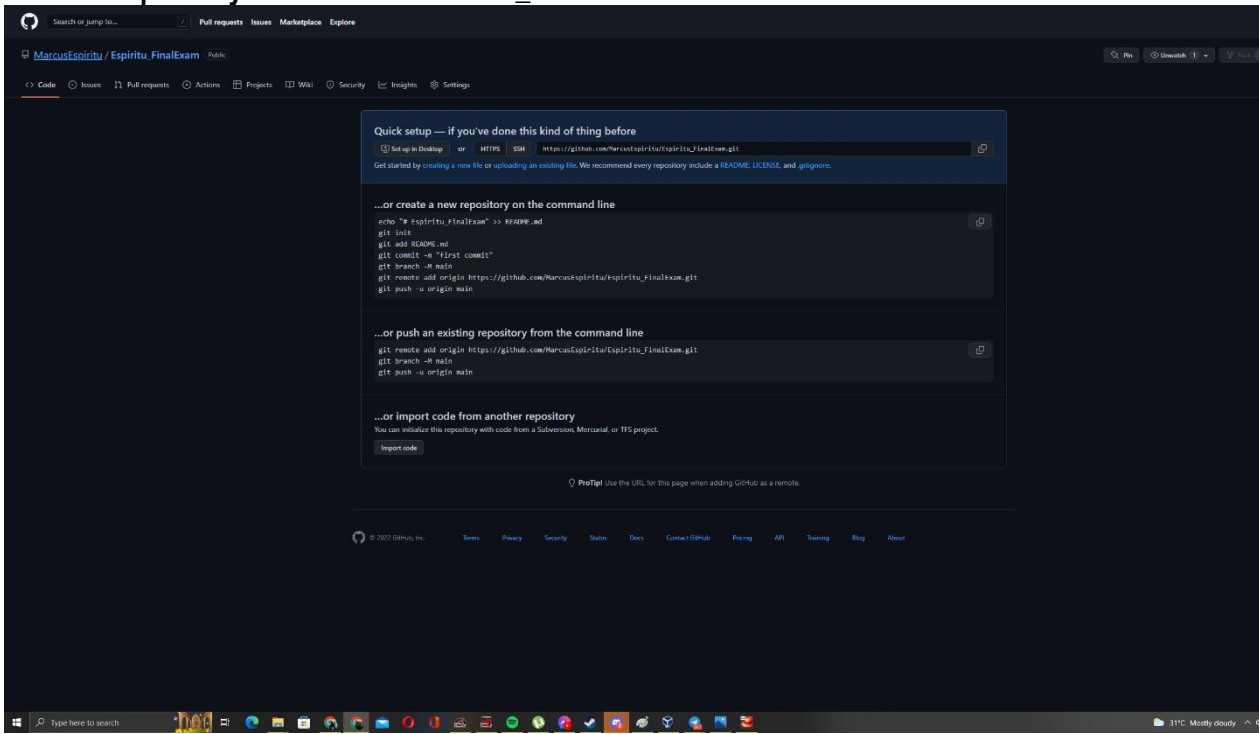


Hands-On	
Final Exam	
<b>Course Code:</b> CPE232	<b>Program:</b> CPE
<b>Course Title:</b> Managing Enterprise Services	<b>Date Performed:</b> 07/06/2022
<b>Section:</b> CPE31S7	<b>Date Submitted:</b> 09/06/2022
<b>Name:</b> Espiritu, Marcus Joshua D.C.	<b>Instructor:</b> Engr. Taylar
<b>1. Objective(s):</b>	
Create and design a workflow that installs, configure and manage enterprise monitoring tools using Ansible as an Infrastructure as Code (IaC) tool.	
<b>2. Intended Learning Outcomes (ILOs):</b>	
<p>The students should be able to:</p> <ol style="list-style-type: none"> <li>1. Create and design workflows to install, configure and manage for availability monitoring tools using Ansible to document and execution.</li> <li>2. Create and design workflows to install, configure and manage for performance monitoring tools using Ansible to document and execution.</li> <li>3. Create and design workflows to install, configure and manage for log monitoring tools using Ansible to document and execution..</li> </ol>	
<b>4. Resources:</b>	
Oracle VirtualBox (Hypervisor)	
1x Ubuntu VM with Git and Ansible installed	
1x CentOS VM	
<b>5. Procedure:</b>	
<ol style="list-style-type: none"> <li>1. <b>Create a repository and name it Surname_FinalExam.</b></li> </ol>	
	

## 2. Clone your new repository in your VM

```
root@debian:/home/marcus# git clone https://ghp_9VQKPhID9ZrN2t85AxZkxbiXxzBV
jrPt@github.com/MarcusEspiritu/Espiritu_FinalExam
Cloning into 'Espiritu_FinalExam'...
warning: You appear to have cloned an empty repository.
root@debian:/home/marcus# █
```

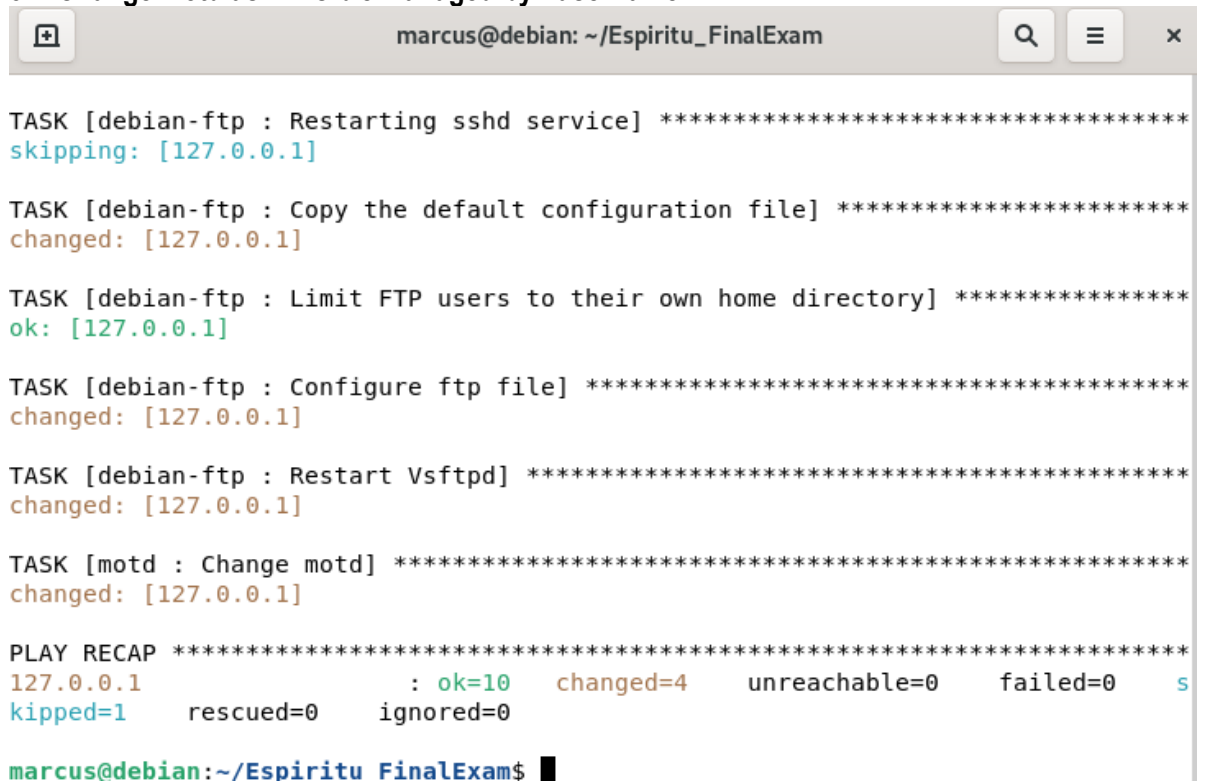
## 3. Create an Ansible playbook that does the following with an input of a config.yaml file and structure inventory file.

### 3.1 Clone your prelim exam repository

### 3.2 Install and configure one enterprise service that can be installed in Debian, Centos, and OpenSuse servers

### 3.3 Install and configure one monitoring tool that can be installed in Debian, Centos, and OpenSuse servers (if it is a stack there should be the option of a different host)

### 3.4 Change Motd as "Ansible Managed by <username>"

A terminal window titled 'marcus@debian: ~/Espiritu\_FinalExam' showing the output of an Ansible playbook. The output displays several tasks being executed on host 127.0.0.1, including restarting sshd, copying configuration files, limiting FTP users, configuring ftp, restarting Vsftpd, and changing the motd. A final 'PLAY RECAP' line summarizes the results: 10 OK, 4 changed, 0 unreachable, 0 failed, 1 skipped, 0 rescued, and 0 ignored. The prompt shows the user is now 'marcus@debian' in the directory '~/Espiritu\_FinalExam'.

```
marcus@debian: ~/Espiritu_FinalExam

TASK [debian-ftp : Restarting sshd service] *****
skipping: [127.0.0.1]

TASK [debian-ftp : Copy the default configuration file] *****
changed: [127.0.0.1]

TASK [debian-ftp : Limit FTP users to their own home directory] *****
ok: [127.0.0.1]

TASK [debian-ftp : Configure ftp file] *****
changed: [127.0.0.1]

TASK [debian-ftp : Restart Vsftpd] *****
changed: [127.0.0.1]

TASK [motd : Change motd] *****
changed: [127.0.0.1]

PLAY RECAP *****
127.0.0.1 : ok=10  changed=4  unreachable=0  failed=0  s
kipped=1  rescued=0  ignored=0

marcus@debian:~/Espiritu_FinalExam$ █
```

## 4. push and commit your final-exam branch in the VM

```

marcus@debian:~/Espiritu_FinalExam$ git add roles
marcus@debian:~/Espiritu_FinalExam$ git commit -m "Success"
[master 74a6d35] Success
Committer: marcus <marcus@debian.proto.com>
Your name and email address were configured automatically based
on your username and hostname. Please check that they are accurate.
You can suppress this message by setting them explicitly. Run the
following command and follow the instructions in your editor to edit
your configuration file:

    git config --global --edit

After doing this, you may fix the identity used for this commit with:

    git commit --amend --reset-author

80 files changed, 1640 insertions(+)
create mode 100644 roles/centos-ftp/README.md
create mode 100644 roles/centos-ftp/defaults/main.yml
create mode 100644 roles/centos-ftp/handlers/main.yml
create mode 100644 roles/centos-ftp/meta/main.yml
create mode 100644 roles/centos-ftp/tasks/main.yml
create mode 100644 roles/centos-ftp/tests/inventory
create mode 100644 roles/centos-ftp/tests/test.yml
create mode 100644 roles/centos-ftp/vars/main.yml
marcus@debian:~/Espiritu_FinalExam$ git add Espiritu_FinalExam.yml
marcus@debian:~/Espiritu_FinalExam$ git commit -m "Sucess"
[master 7ba8014] Sucess
Committer: marcus <marcus@debian.proto.com>
Your name and email address were configured automatically based
on your username and hostname. Please check that they are accurate.
You can suppress this message by setting them explicitly. Run the
following command and follow the instructions in your editor to edit
your configuration file:

    git config --global --edit

After doing this, you may fix the identity used for this commit with:

    git commit --amend --reset-author

1 file changed, 96 insertions(+)
create mode 100644 Espiritu_FinalExam.yml
marcus@debian:~/Espiritu_FinalExam$ git push
Enumerating objects: 4, done.
Counting objects: 100% (4/4), done.
Compressing objects: 100% (3/3), done.
Writing objects: 100% (3/3), 612 bytes | 612.00 KiB/s, done.
Total 3 (delta 0), reused 1 (delta 0), pack-reused 0
To https://github.com/MarcusEspiritu/Espiritu_FinalExam
52dc494..7ba8014 master -> master

```

```
marcus@debian: ~/Espiritu_FinalExam
6fdcc54..59e8cd4 master -> master
marcus@debian:~/Espiritu_FinalExam$ git add config.yaml
marcus@debian:~/Espiritu_FinalExam$ git commit -m "Good Job"
[master dc9a305] Good Job
Committer: marcus <marcus@debian.proto.com>
Your name and email address were configured automatically based
on your username and hostname. Please check that they are accurate.
You can suppress this message by setting them explicitly. Run the
following command and follow the instructions in your editor to edit
your configuration file:

    git config --global --edit

After doing this, you may fix the identity used for this commit with:

    git commit --amend --reset-author

1 file changed, 22 insertions(+)
create mode 100644 config.yaml
marcus@debian:~/Espiritu_FinalExam$ git push
Enumerating objects: 4, done.
Counting objects: 100% (4/4), done.
Compressing objects: 100% (3/3), done.
Writing objects: 100% (3/3), 713 bytes | 713.00 KiB/s, done.
Total 3 (delta 0), reused 0 (delta 0), pack-reused 0
To https://github.com/MarcusEspiritu/Espiritu_FinalExam
59e8cd4..dc9a305 master -> master
marcus@debian:~/Espiritu_FinalExam$ █
marcus@debian:~/Espiritu_FinalExam$ git add ansible.cfg
marcus@debian:~/Espiritu_FinalExam$ git commit -m "Success"
[master 59e8cd4] Success
Committer: marcus <marcus@debian.proto.com>
Your name and email address were configured automatically based
on your username and hostname. Please check that they are accurate.
You can suppress this message by setting them explicitly. Run the
following command and follow the instructions in your editor to edit
your configuration file:

    git config --global --edit

After doing this, you may fix the identity used for this commit with:

    git commit --amend --reset-author

1 file changed, 9 insertions(+)
create mode 100644 ansible.cfg
marcus@debian:~/Espiritu_FinalExam$ git push
Enumerating objects: 4, done.
Counting objects: 100% (4/4), done.
Compressing objects: 100% (3/3), done.
Writing objects: 100% (3/3), 422 bytes | 422.00 KiB/s, done.
Total 3 (delta 0), reused 0 (delta 0), pack-reused 0
To https://github.com/MarcusEspiritu/Espiritu_FinalExam
6fdcc54..59e8cd4 master -> master
marcus@debian:~/Espiritu_FinalExam$
```

```
marcus@debian:~/Espiritu_FinalExam$ git add inventory
marcus@debian:~/Espiritu_FinalExam$ git commit -m "Nice"
[master 6fdcc54] Nice
Committer: marcus <marcus@debian.proto.com>
Your name and email address were configured automatically based
on your username and hostname. Please check that they are accurate.
You can suppress this message by setting them explicitly. Run the
following command and follow the instructions in your editor to edit
your configuration file:
```

```
git config --global --edit
```

After doing this, you may fix the identity used for this commit with:

```
git commit --amend --reset-author
```

```
1 file changed, 8 insertions(+)
create mode 100644 inventory
```

5. request a pull request from that branch on GitHub
6. For your final exam to be counted, please paste your repository link as an answer in this exam.  
[https://github.com/MarcusEspiritu/Espiritu\\_FinalExam/compare](https://github.com/MarcusEspiritu/Espiritu_FinalExam/compare)
7. Send your PDF report into your GitHub repository.

**Note:** Extra points if you will implement the said services via containerization.

**6. Supplementary Activity**

N/A

**8. Assessment (Rubric for Laboratory Performance):**