

## Overview

The Application PERSISTENT is a python based application that uses rest api developed using Flask micro Framework.

The application is responsible for checking any input string from the user and determining whether all alphabets are present in the string.

## Technology stack:

**Language:** Python  
**Framework:** Flask  
**Cloud:** AWS  
**Version Control** - Git  
**CICD** - Gitlab CICD

## Procedure:

We can deploy the application to EC2 instances using AWS Elastic Beanstalk service which is an easy-to-use service for deploying and scaling web applications and services developed with Python.

To deploy the application we can use the Gitlab CICD or deploy from the terminal as well.

Dependencies for Deployment:

AWSCLI

AWS EB CLI

Follow the below points for deployment from the **terminal**.

1. Install AWS EB CLI
2. Rename the application file as application.py
3. Make sure the IAM user role has been given the EB access
4. Use the command eb init to initialize the eb

```
eb init -p python-3.7 EB-FlaskApp-5 --profile default --region ap-south-1
eb use/create $DEV_ENVIRONMENT
eb deploy
```

You can easily see the logs from eb as eb provides the necessary dump of logs if requested. You can also use the Ec2 instance to view the application deployed and the logs

Finally, use the environment url provided by EB to see the application from the browser.

Follow the below points for deployment from the **GITLAB**.

If you are using the gitlab cicd then you would have to push into the repository of GITLab and then deploy from the repository.

In the gitlab yaml file , mention the stages you would want to use for example the pylint, build, test and deployment.

Once that is taken care of, the deployment stage is provided as below.

```
# deplyment_dev_job:
#   image: python3.7
#   stage: deploy
#   tags:
#     - firstebflask
#   only:
#     refs:
#       - developer
#   script:
#     - eb init -p python-3.7 EB-FlaskApp-5 --profile default --region ap-south-1
#     - eb use $DEV_ENVIRONMENT
#     - eb deploy
```

Open the browser and view the application from eb open command.