**Project 2**

Ample Technologies is a golden partner of AWS and utilizes most of the AWS services. Now, CTO is planning to set up database infrastructure on the AWS cloud and expecting that infrastructure would expand in the future. There can be multiple changes to infrastructure depending on the future requirements. Engineers should keep track of future changes and easily roll back to the previous version if new infrastructure changes fail.

Ample uses MySQL as a database engine and would like to create a database in the private subnets. You may use the below configurations to set up the complete infrastructure.

**Database Configuration**

|  |  |
| --- | --- |
| Storage Space | 20 GB |
| Database Instance Class | Db.t2.micro |
| Database name | Ampledb |
| Database Engine | MySQL |
| Engine Version | 8.0.23 |
| PubliclyAccessible | True |
| Username | awsuser |
| Password | Aws123456789 |
| Port | 3306 |
| AllowUpgradeVersion | False |
| BackUp Retension Period | 7 Days |

**VPC Configuration**

|  |  |
| --- | --- |
| CIDR Block | 192.168.0.0/16 |
| EnableDNSHostnames | False |
| EnableDNSSupport | False |
| No. of Private Subnets | 2 |
| Private Subnet 1 CIDR | 192.168.1.0/24 |
| Private Subnet 1 AZ | us-east-1a |
| Private Subnet 2 CIDR | 192.168.2.0/24 |
| Private Subnet 2 AZ | Us-east-1b |

**Security Group Configuration**

|  |  |
| --- | --- |
| SG Ingress CIDR | 0.0.0.0/0 |
| SG Ingress FromPort | 3306 |
| SG Ingress ToPort | 3306 |
| SG Ingress IPProtocol | TCP |
| SG Egress CIDR | 0.0.0.0/0 |
| SG Egress FromPort | 80 |
| SG Egress ToPort | 80 |
| SG Egress IPProtocol | TCP |

**To-Dos:**

* List down AWS services to be used?
* Suggest your approach.
* Design your plan
* Implement your plan
* Verify if the complete infrastructure is running

**Deliverables:**

* Setup Complete Infrastructure