***Group Project***

Group 1

Astha (8912446)

Anmol Singh ()

Panth Patel (8975227)

INFO2350 – Advanced Cloud Infrastructure Administration

Nikola Cedic

**Task-2**

A computer screen with a message

AI-generated content may be incorrect.

**VPC successfully created with CIDR block 10.0.0.0/16.**

A screenshot of a computer

AI-generated content may be incorrect.

**Two subnets created — one marked public and the other private.**

A screenshot of a computer

AI-generated content may be incorrect.

**Internet Gateway created and attached to the VPC.** A screenshot of a computer

AI-generated content may be incorrect.

**Public route table created and associated with public subnet.**

A screenshot of a computer

AI-generated content may be incorrect.

**NAT Gateway launched in public subnet for private subnet access.**

A screenshot of a computer

AI-generated content may be incorrect.

**DBServer security group configured to allow HTTP, MySQL, and SSH access only from specific IPs or security groups.**

A computer screen shot of a computer screen

AI-generated content may be incorrect.

**WebServer security group configured with inbound rules for MySQL, SSH, HTTP, and HTTPS access**.A computer screen with a message

AI-generated content may be incorrect.

**WebServer EC2 instance is running in the public subnet with an assigned public IP and DNS for internet access.**

A computer screen with a message

AI-generated content may be incorrect.

**Both EC2 instances (WebServer and DBServer) are running, with the DBServer placed in the private subnet without a public IP.**

A screenshot of a computer

AI-generated content may be incorrect.

**Web server tested successfully in browser using its public IP.Web server tested successfully in browser using its public IP.**

A screenshot of a computer

AI-generated content may be incorrect.

**Connected to the web server via SSH and accessed the MariaDB database from the private database server using MobaXterm.**

**Task-3**

A screenshot of a computer

AI-generated content may be incorrect.

**Successfully connected to the MariaDB server from web server EC2 using MobaXterm after initial login errors were corrected.**

A screenshot of a computer

AI-generated content may be incorrect.

**Web server successfully displays a custom HTML message in the browser, confirming deployment and connectivity.**

A computer screen shot of a computer screen

AI-generated content may be incorrect.

**CloudFormation stack successfully created all required AWS resources with status CREATE\_COMPLETE.**

A screenshot of a computer

AI-generated content may be incorrect.

**CloudFormation stack successfully created subnets, route tables, and associations for public and private networking.**

A screenshot of a computer

AI-generated content may be incorrect.

**CloudFormation stack completed creation of VPC, public subnet, EC2 web instance, and security group.**

A computer screen with a computer screen

AI-generated content may be incorrect.

**Custom VPC named “WebVPC1” is configured with public/private subnets, route tables, and both NAT and Internet gateways.**

A computer screen with a message

AI-generated content may be incorrect.

**WebAppInstance EC2 is running in the public subnet with public and private IPs, confirming successful deployment.**

A computer screen with a computer screen

AI-generated content may be incorrect.

**DBInstance EC2 is running in the private subnet with only a private IP, confirming secure backend setup.**