MODULE 7: RDS

Sub-task 1 - Create RDS instance

Create an RDS instance in the private <ProjectName>-DbSubnet-RDS subnet created in [Module 6: VPC](https://epam-my.sharepoint.com/epmc-acm-public/aws-associate-training/-/blob/CloudX_Associate_AWS_Java_TShape_Developer_theory_impovements/courses/CloudX_Associate_AWS_Java_TShape_Developer/tasks/vpc/README.md). Choose creation method and engine type. **WARNING: Select a free-tier**

A screenshot of a computer program

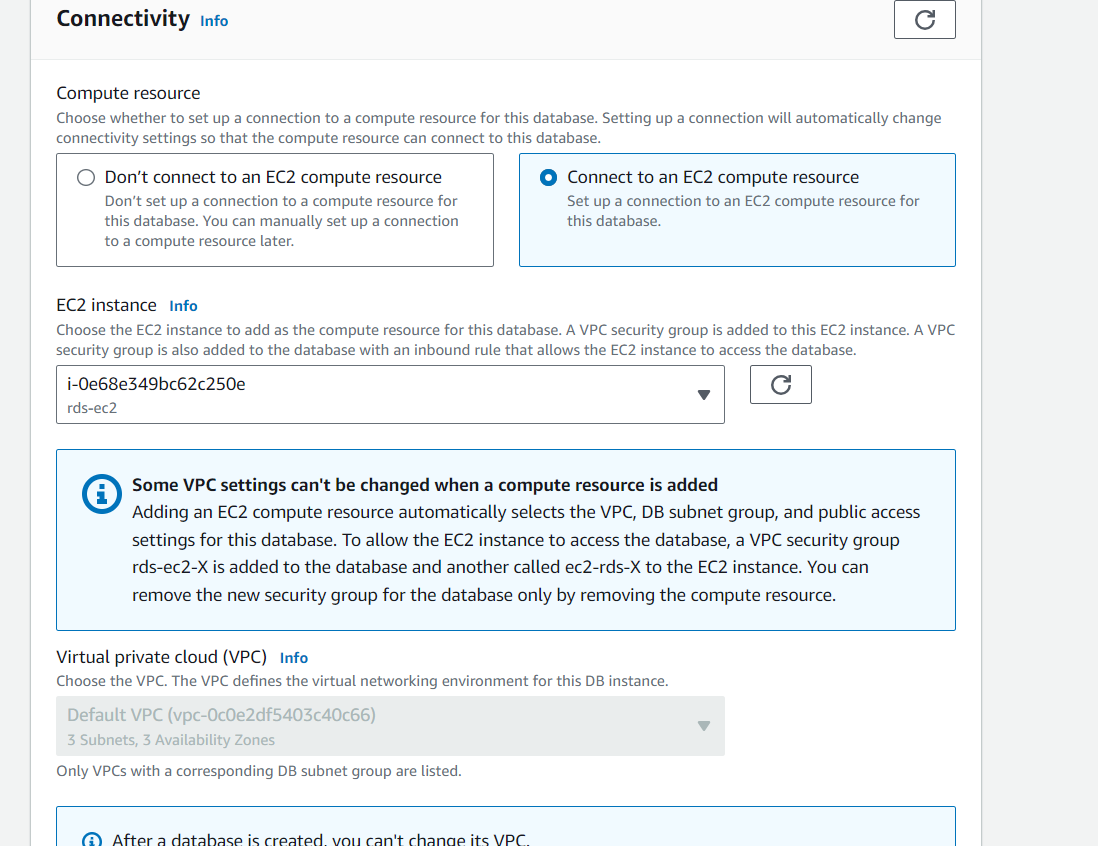
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3. Ensure ***Main microservice*** EC2 instance has correctly configured security group to access RDS.

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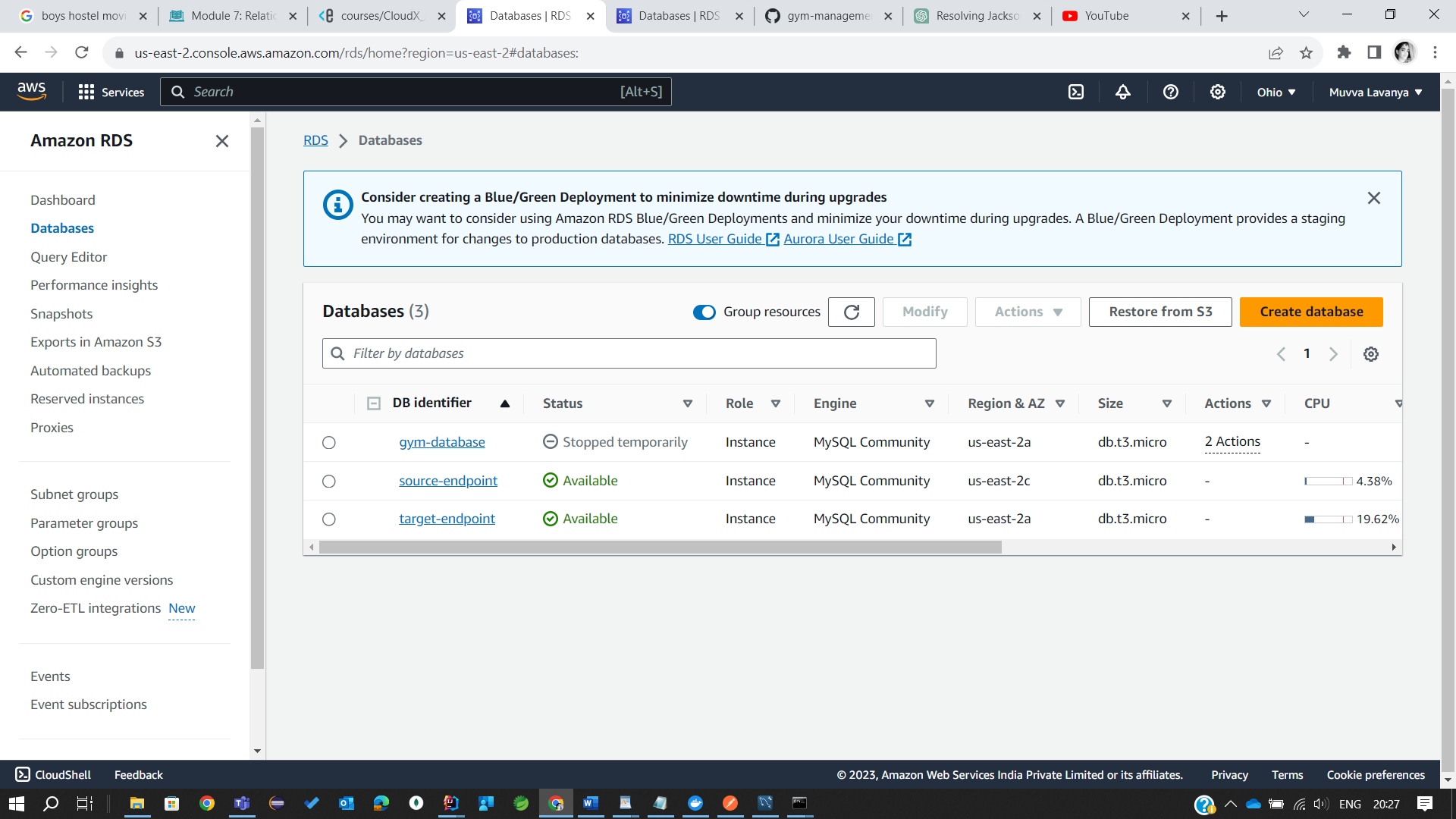
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4. Make sure, ***Main microservice*** EC2 instance has access to already created RDS instance. Make some SQL queries to the RDS instance bypassing the web application over SSH.

**Sub-task 2 - Migrate your on-premise DB schema to RDS**

Use AWS’s Database Migration Service.

1. Created 2 rds databases (source,target)



Established the connection locally

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Data in the source endpoint rds i.e to be exported to target end point database

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Before Migration in target end point rds

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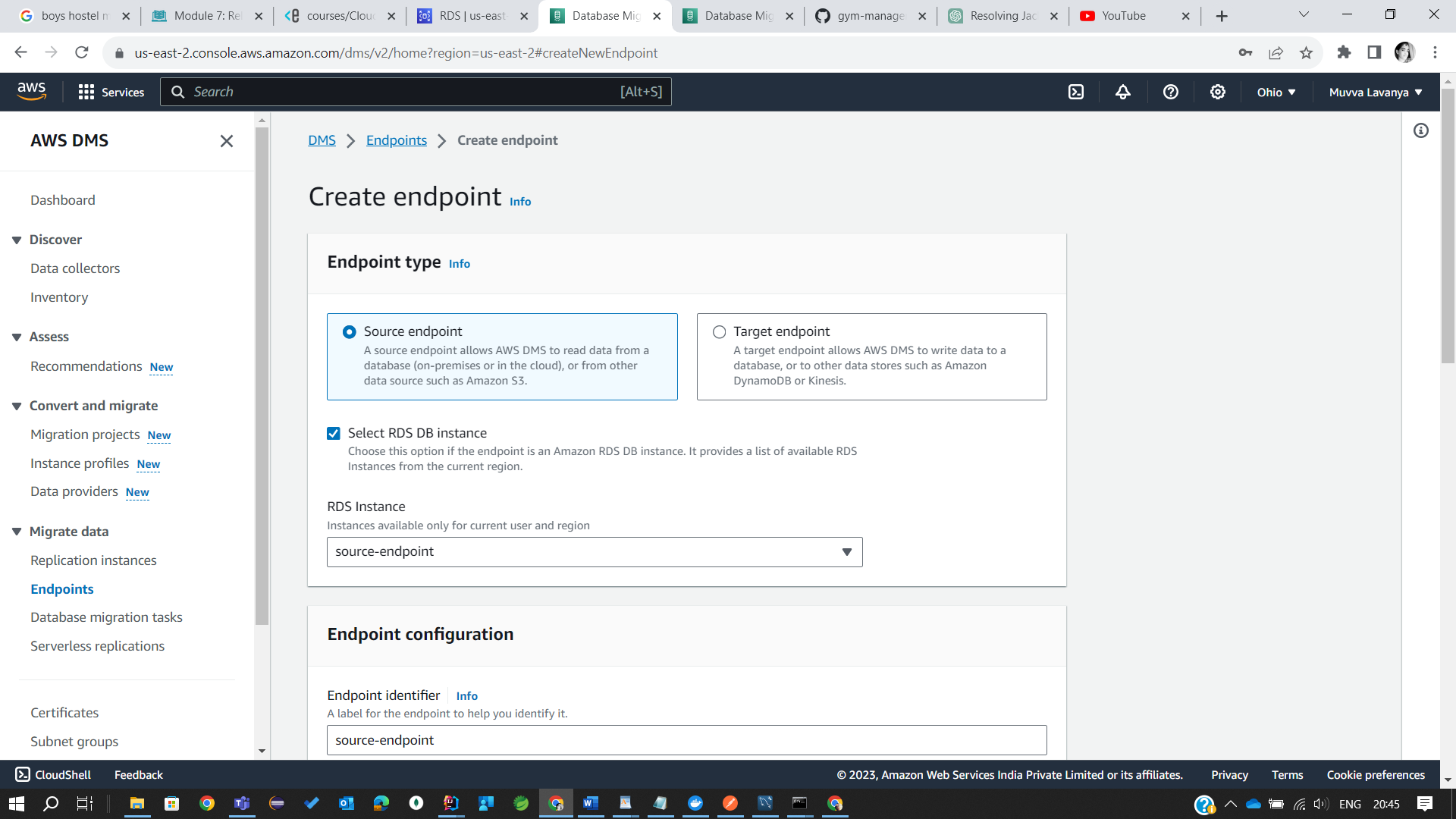
1. Set up Replication instance.

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3.Set Up Source and Target Endpoints.

Source Endpoint



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Target Endpoint

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1. Create new database migration task.

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5. Once you created the task, the migration should start. You can view the progress from the tasks tab in the console.

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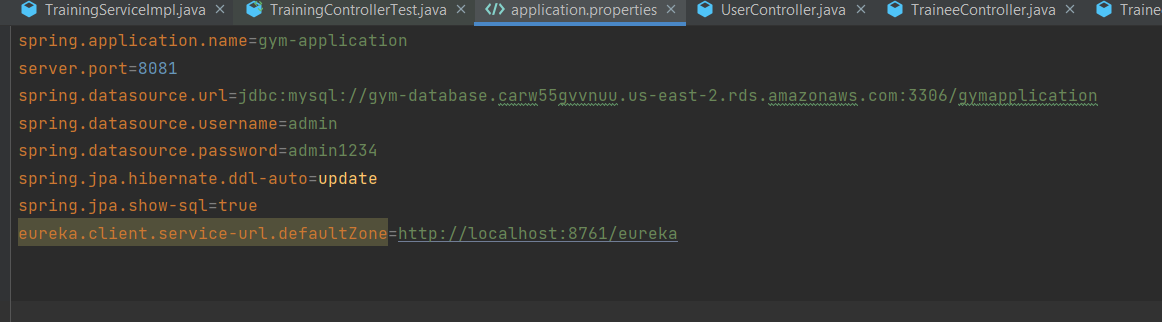
After successful migration to target-endpoint rds

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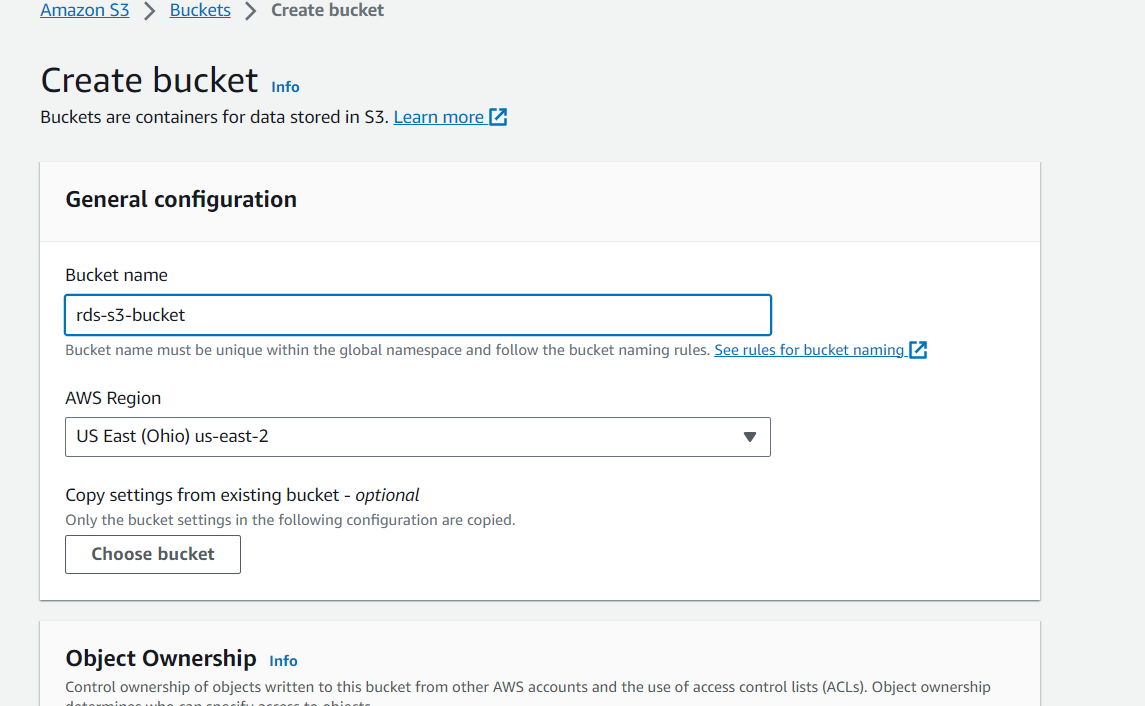
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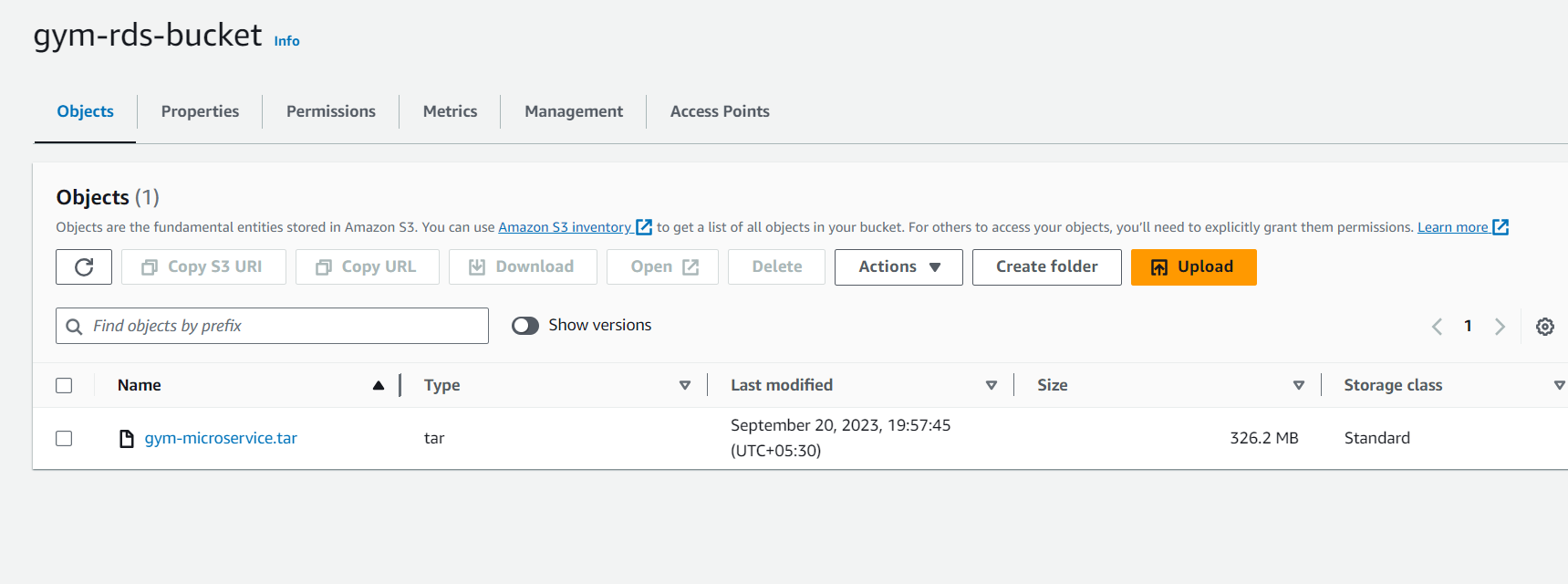
Sub-task 3 - Update your Main microservice

1. Update your Main microservice application configuration with the newly created RDS database instance property values.

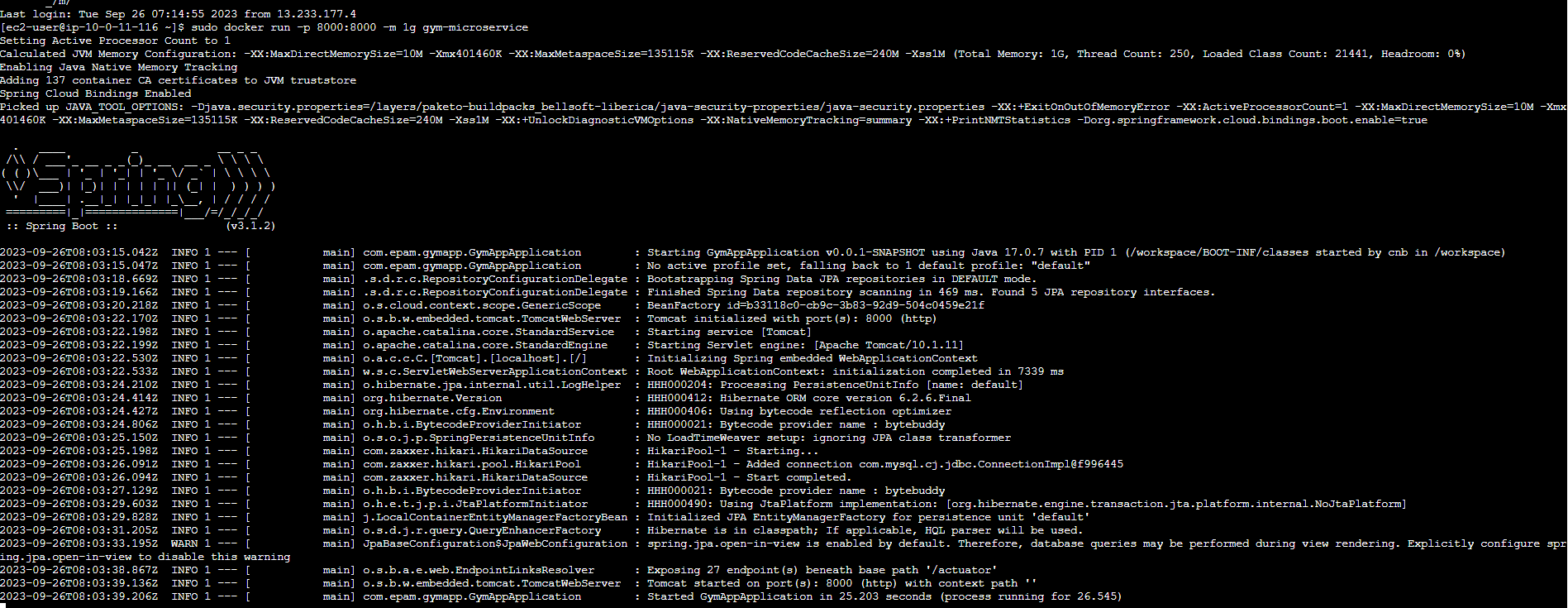


2. Replace .tar Docker image uploaded to S3 in [Module 5: EC2](https://epam-my.sharepoint.com/epmc-acm-public/aws-associate-training/-/blob/CloudX_Associate_AWS_Java_TShape_Developer_theory_impovements/courses/CloudX_Associate_AWS_Java_TShape_Developer/tasks/ec2/README.md) with the new one.





3.Run updated ***Main microservice*** EC2 instance. Verify that application is connected to RDS instance.



4.Make some calls to created in step 3 microservice instance. Verify that integration with RDS works as expected.

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