Azure DevOps Participant Assignment

Objective:

- 1. Break down a Banking Application into:
- -Epics
- -Features
- -User Stories
- -Tasks
- 2. Create a Git repository in Azure DevOps and check in a basic project structure.
- 3. Configure a basic CI/CD Pipeline to ensure successful build or run.

PART 1

EPIC 1: User Management

Feature 1: User Registration

User Story:

US1: As a new user, I want to register using email and password.

Tasks:

- Design the registration form (UI)
- Create API to handle user registration
- Save user data to the database

Feature 2: User Authentication

User Story:

US1: As a user, I want to log in using valid credentials.

Tasks:

- Design login form (UI)
- Verify credentials with backend API
- Display login success or failure message

Feature 3: Password Reset

User Story:

US1: As a user, I want to reset my password if I forget it.

Tasks:

- Design 'Forgot Password' form
- Send password reset link to email
- Allow password update after verification

EPIC 2: Account Services

Feature 1: Account Creation

User Story:

US1: As a user, I want to create a new bank account.

Tasks:

- Design account creation form
- Validate account details
- Save account to database

Feature 2: View Account Balance

User Story:

US1: As a user, I want to see my account balance after logging in.

Tasks:

- Create API to fetch balance
- Display balance on user dashboard
- Secure balance info with authentication

EPIC 3: Fund Transfer

Feature 1: Internal Fund Transfer

User Story:

US1: As a user, I want to transfer funds to another account in the same bank.

Tasks:

- Design transfer form
- Validate recipient and amount
- Update sender and receiver balances

Feature 2: External Fund Transfer

User Story:

US1: As a user, I want to transfer funds to an account in another bank.

Tasks:

- Enter IFSC and recipient details
- Call mock external bank API
- Show transfer confirmation

EPIC 4: Transaction History

Feature 1: View Transactions

User Story:

US1: As a user, I want to view my past transactions.

Tasks:

- Fetch transactions via API
- Display in table format
- Allow basic sorting by date

Feature 2: Export Transaction Statement

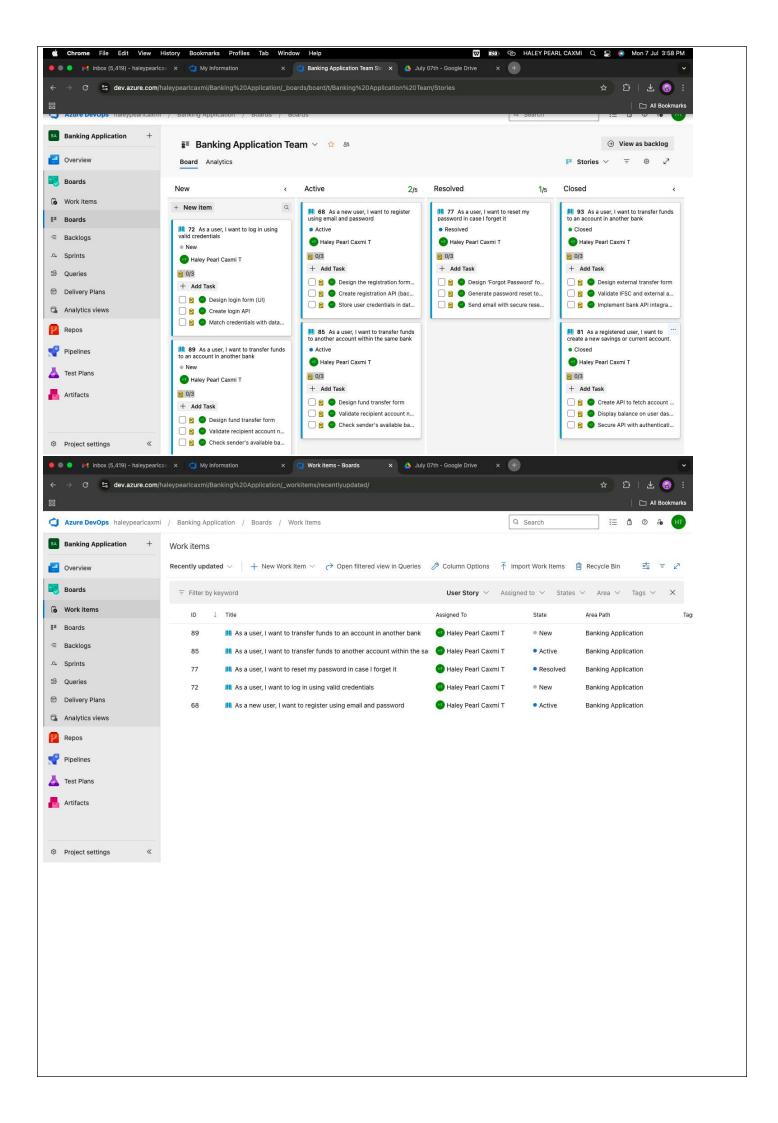
User Story:

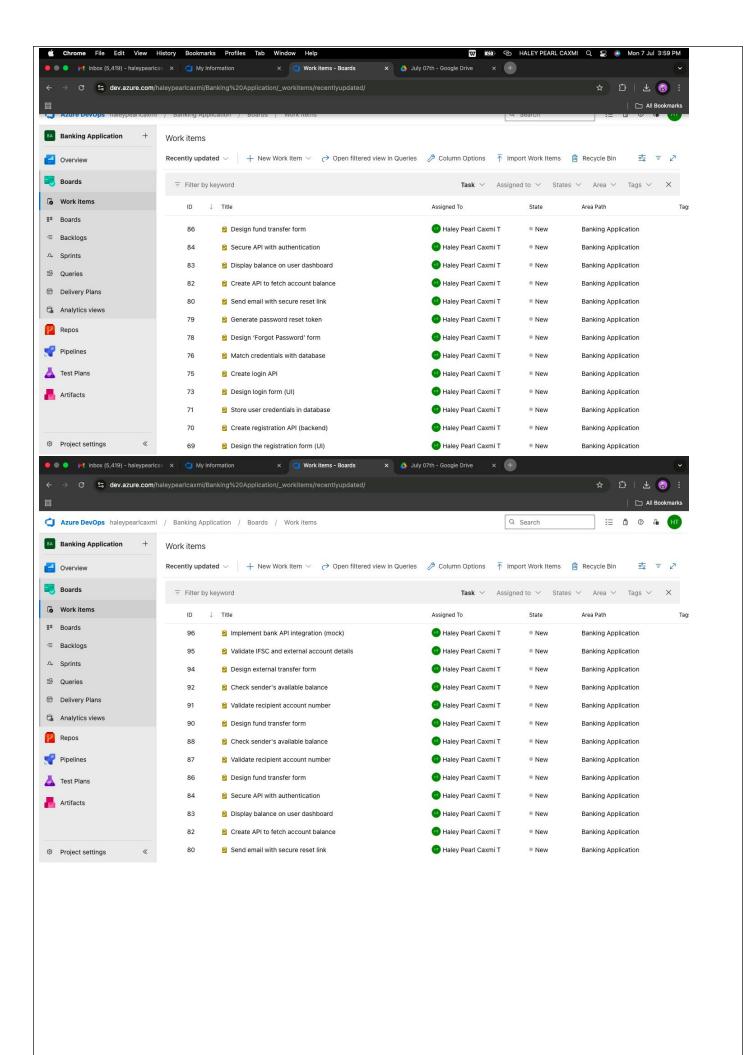
US1: As a user, I want to download my statement as PDF or Excel.

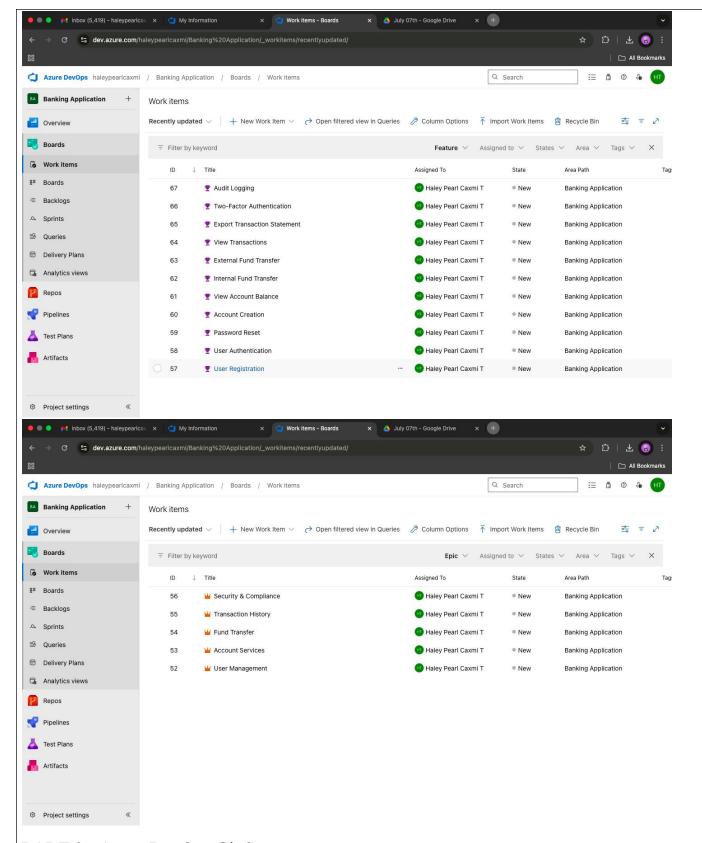
Tasks:

- Add download button
- Generate file in selected format
- Trigger file download

EPIC 5: Security & Compliance
Feature 1: Two-Factor Authentication (2FA)
User Story:
US1: As a user, I want to verify login using an OTP.
Tasks:
• Generate OTP at login
 Send OTP to email/SMS
 Validate OTP before access







PART 2 - Azure DevOps Git Setup

1. Create a Git Repo

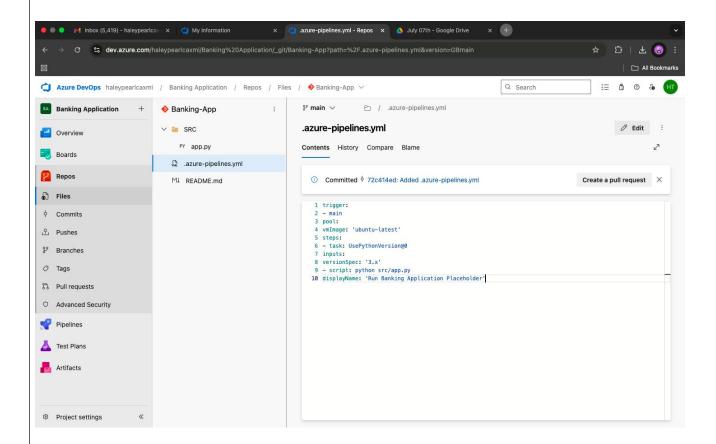
Azure DevOps → Repos → New Repository → Name it banking-app

Clone repo locally or use portal

Add a basic project structure:

banking-app/

README.md
Src/
app.py # Placeholder Python file
azure-pipelines.yml
app.py can simply contain:
print("Banking Application Placeholder")



PART 3 - Configure CI/CD Pipeline

1. Create Simple Pipeline

Example .azure-pipelines.yml:

trigger:

- main

pool:

vmImage: 'ubuntu-latest'

steps:

- task: UsePythonVersion@0
inputs:
versionSpec: '3.x'
- script: python src/app.py
displayName: 'Run Banking Application Placeholder'
Pipeline succeeds if the script runs without errors.

