User Story

Linchen Xu

1. **Login via Google Account**: As a user, I want to log in using my Google account so that I can track my historical analysis records.

a. Tasks:

- i. Set up OAuth integration for Google login.
- ii. Create a login button on the frontend for users to click.
- iii. Implement backend support to store session information.
- iv. Allow tracking of historical analysis records after successful login.
- v. Add error handling for unsuccessful login attempts.

b. Acceptance Test:

- Given this is my first time using this website, when I click the 'Login' button, then I will be able to log in using my Google account and track my historical conversations.
- ii. Given I do not want to log in, when I start a conversation, then I will not be able to track my historical conversations.

c. Entities:

- i. User: Id, Email, Name, Access Token, Create Time
- ii. Analysis Record: Id, User ID, Analysis Content, Create Time
- Resume Upload and Feedback: As a job seeker, I want to upload my resume so that I
 can receive feedback on how well I match a specific job description and increase my
 chances of getting the job.

a. **Tasks**:

- i. Implement file upload functionality for resumes.
- ii. Set up a system to analyze the resume and job description.
- iii. Provide feedback based on the analysis results.
- iv. Add validation checks to ensure both the resume and job description are uploaded.
- v. Handle errors for incomplete uploads or invalid files.

b. Acceptance Tests:

- i. Given I want to analyze my resume, when I start the conversation, then I will be asked to upload my resume and job descriptions. After that, I can click the 'Analyze' button to start an analysis.
- ii. Given I want to analyze my resume, when I refuse to upload the resume or job description, then an error will be shown asking me to upload both of them.

c. Entities:

- i. Resume: Id, User ID, File Content, Create Time, Update Time
- ii. Analysis Record: Id, User ID, Analysis Content, Create Time
- iii. Job Description: Id, Record ID, Description, Create Time
- iv. Feedback: Id, Record ID, Analysis Result, Score, Suggestion, Create Time

Lin Ma

[User Story] Add CI pipeline

As a developer, I want a CI pipeline as raising a PR so that it can make sure my PR won't contain regressions.

Acceptance Tests

Test 1: Given a developer tries to raise a PR on Github, **When** they click "Create a PR" to the main branch and with changes under the "/fe_repo", **Then** the CI pipeline will be automatically triggered.

Test 2: Given a developer tries to raise a PR on Github, **When** they click the "Create a PR" button, but the target branch is not "Main" or there are no changes under "fe_repo/" folder, **Then** the CI pipeline won't be triggered.

[User Story] Integrate docker image

As a developer, I want to integrate docker as a deployment tool so that I can deploy my project by pushing and pulling docker images.

Acceptance Tests

Test 1: Given a developer tries to run docker's commands, **When** they input "docker compose build" and type "Enter", **Then** the docker can work as expected.

Test 2: Given a developer tries to automatically push docker images on CD pipeline, **When** they check in PRs to "releases/" branch, **Then** the CD pipeline will be triggered and push the latest docker image.

Zihan Zhou

[User Story] User login:

User Story: As a user, I want to log in using my Google account so that I can easily access and track my historical analysis records without needing to remember additional credentials.

Acceptance Test 1: Successful Login with Google Account

- **Given:** The user is on the login page.
- When: The user clicks the "Login with Google" button and successfully authenticates using valid Google credentials.
- Then: The system should log the user in and redirect them to their dashboard displaying their historical analysis records.

Acceptance Test 2: Failed Login with Invalid Google Credentials

- **Given:** The user is on the login page.
- When: The user attempts to log in with invalid Google credentials.
- Then: The system should display an error message indicating that the login attempt was unsuccessful.

[User Story] Resume Analysis

User Story: As a job seeker, I want to upload my resume and receive feedback on how well I match a specific job description, so that I can understand my strengths and areas for improvement to increase my chances of getting the job.

Acceptance Test 1: Successful Upload of Different Resume Formats

- Given: The user is on the resume upload page and has a resume in PDF format.
- When: The user selects the PDF file and clicks the "Upload" button.
- Then: The system should successfully upload the resume and display a confirmation message indicating the PDF file has been successfully uploaded.

Acceptance Test 2: Upload Unsupported Resume Format

- **Given:** The user is on the resume upload page and has a resume in an unsupported format (e.g., TXT).
- When: The user selects the TXT file and clicks the "Upload" button.
- **Then:** The system should reject the upload and display an error message indicating that the file format is not supported.

Zhen Cao

 Project Recommendation: As a job seeker, I want to get personalized recommendations for relevant projects or skills based on my resume and job preferences so that I can better match the job description and improve my chances of find a job.

a. Tasks:

- i. Job/Project description dataset collection.
- ii. Job description matching.
- iii. A button for users to click to start this service on the frontend.
- iv. Integrate RAG with LLM.

b. Acceptance Test:

i. Successful Upload of Different Resume Formats

Given the user is on the resume upload page and has a resume in PDF format., when the user selects the PDF file and clicks the "Upload" button, then the system should successfully upload the resume and display a confirmation message indicating the PDF file has been successfully uploaded.

ii. Unsupported File Format Handling

Given the user is on the resume upload page and has a resume in Excel format (an unsupported format), when the user selects the Excel file and clicks the "Upload" button, then the system should display an error message informing the user that the file format is not supported and suggesting the user upload a PDF, Word, or plain text format instead.

2. **Upload Resume in Various Formats**: As a job seeker, I want to upload my resume in various formats (PDF, Word, or plain text), so that I can easily submit my resume regardless of the file format I have.

a. Tasks:

- i. Resume parser in text format.
- ii. Resume format(PDF, DOC) check.
- iii. A button for users to click to start this service on the frontend.
- iv. Save resumes in MongoDB.

b. Acceptance Test:

i. Successful Upload of Different Resume Formats

Given the user is on the resume upload page and has a resume in PDF format, when the user selects the PDF file and clicks the "Upload" button, then the system should successfully upload the resume and display a

confirmation message indicating the PDF file has been successfully uploaded.

ii. Unsupported File Format Handling

Given the user is on the resume upload page and has a resume in Excel format (an unsupported format), when the user selects the Excel file and clicks the "Upload" button, then the system should display an error message informing the user that the file format is not supported and suggesting the user upload a PDF, Word, or plain text format instead.

Entities:

User:

1. user_id: unique identifier for each user

2. name: full name of the user

3. email: user's email address

Resume:

1. resume_id: unique identifier for each resume

2. job_preferences: job preference of user's resume

3. content: including skills, work experience, etc

4. user_id: foreign key linking the resume to user

Recommendation:

- recommendation_id: unique identifier for each recommendation
- 2. details: recommendation content
- 3. resume id: reference to the resume

Haochen Sun

[User Story] User login:

User Story: As a user, I want to log in using my Google account so that I can see my records and information without having to provide other credentials.

Acceptance Test 1: Login successfully with Google account

- **Given:** The user is on the login homepage
- When: The user clicks on "Login with Google" and the page jumps to login with Google account
- Then: User should be logged in and be redirected to his records and information page.

Acceptance Test 2: Can't login with Google account

- **Given:** The user is on the login page.
- When: The user tries to login with incorrect information.
- Then: The error message should show up on the screen.

[User Story] Resume Analysis:

User Story: As a job seeker, I want to upload my resume and get a feedback how well my resume fit the given job, so that I can know what improvement I can make to better fit the job.

Acceptance Test 1: upload the resume successfully

- **Given:** The user is on the resume upload page with his pdf resume.
- When: The user puts the file into the box and clicks upload.
- Then: A message saying that "file uploaded successfully" should appear on the screen .

Acceptance Test 2: fail to upload resume

- **Given:** The user is on the resume upload page with unsupported file type.
- When: The user puts this file into the box and clicks upload.
- **Then:** An error message should appear on the screen saying that "unsupported file type, please upload as pdf".