Senior Technical Specialist take-home exercise

Overview

This exercise evaluates your ability to work with REST APIs, understand permission models, and communicate technical solutions to business stakeholders. You will create a Confluence Cloud site and use its API to programmatically set up users, groups, spaces, and content with specific permission configurations.

Time Expectation

This exercise should take approximately 2-3 hours to complete. Please don't spend more than 4 hours total on this exercise.

Instructions

1. Environment Setup

Set up a new Atlassian Cloud site specifically for this exercise:

- Create a free Atlassian Cloud account at https://www.atlassian.com/
- · Set up a new Confluence Cloud site
- Generate appropriate API credentials for programmatic access
- Important: Use a dedicated test site do not use an existing production environment

2. Technical Implementation

Using the programming language of your choice and any libraries you wish, complete the following tasks using the Confluence REST API:

2.1 User Management

- Create five user accounts:
 - 1 user with administrator privileges
 - 4 users with standard user privileges
- Use meaningful usernames (e.g., admin-user, user-1, user-2, etc.)

2.2 Group Management

- Create a new group (choose an appropriate name)
- Add all 4 "standard" users to this group
- Do not add the administrator to this group

2.3 Space Configuration

Create **two new spaces** with the following permission structures:

Space 1: "Collaborative Workspace"

- Grant space administrator privileges to one of the 4 standard users
- Grant read/write access to the remaining 3 standard users
- The site administrator should retain their default access

Space 2: "Restricted Workspace"

- Grant space administrator access only to the site administrator
- Grant read-only permissions to all other users (the 4 standard users)

2.4 Content Creation

In the first space ("Collaborative Workspace"):

- Create one new page with the following elements:
 - A meaningful headline
 - Body content (lorem ipsum is acceptable)
 - At least one embedded image
- Apply page-level restrictions so that only one specific user can access this page

3. Documentation Requirements

Your solution must include clear documentation that addresses:

3.1 Code Attribution

Clearly indicate within your solution:

- Which sections were authored entirely by you
- Which sections were generated by LLMs (ChatGPT, Claude, Copilot, etc.)
- · What modifications you made to any generated code to make it functional, and why
- Use comments, README sections, or separate documentation to make this attribution clear

Deliverables

Please be prepared to deliver:

- Source code with clear attribution comments (a link to a repository is acceptable)
- 2. **Documentation** (README, setup instructions)
- 3. **Presentation of the solution** during your panel interview, you'll walk a technical and a business stakeholder through the solution

Tools and Resources

You are encouraged to use:

- Search engines (Google, Stack Overflow, etc.)
- AI assistants (ChatGPT, Claude, GitHub Copilot, etc.)
- Atlassian documentation and community forums
- Any programming libraries or frameworks you prefer

Remember: Clearly document what tools you used and how they contributed to your solution.

Evaluation Criteria

Your submission will be evaluated on two dimensions:

Technical Review (60%)

- Code Quality: Clean, readable, well-structured code
- API Usage: Correct implementation of Confluence REST API calls
- Error Handling: Appropriate handling of API errors and edge cases
- Attribution: Clear identification of authored vs. generated code, fixes needed to generated code, if any
- Functionality: All requirements successfully implemented

Business Communication (40%)

- Presentation Skills: Ability to explain the solution clearly to non-technical stakeholders
- Problem Solving: How you approached challenges and trade-offs
- **Documentation**: Quality of written explanations and setup instructions

Interview Process

During the panel interview, you will be asked to:

- Walk business stakeholders through your solution and its outcomes
- Explain the permission model you implemented
- Discuss any challenges you encountered and how you solved them
- Demonstrate the working solution

Questions?

If you have clarifying questions about the requirements, please reach out to klenihan@oxalis.io. We prefer that you make reasonable assumptions and document them rather than getting blocked on ambiguous requirements.

Good luck! We're excited to see your approach to this challenge.