Tax Compliance Automation and Analytics Engine for KPMG
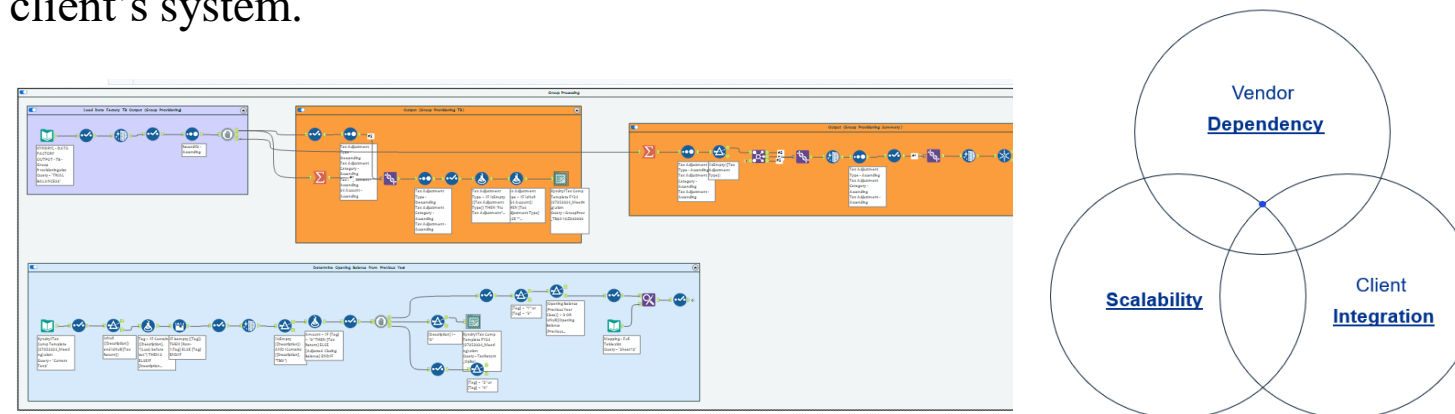
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KPMG

Introduction

Every year, **multinational corporations** around the globe navigate a daunting array of **tax challenges**. To ensure compliance with tax laws, companies are required to submit a series of **income tax returns**. Given the **manual and repetitive nature** of the computation process, KPMG relies on low-code automation tools such as Alteryx. However, they are **vendor-dependent**, utilize **expensive** licenses and **difficult to integrate** to the client's system.
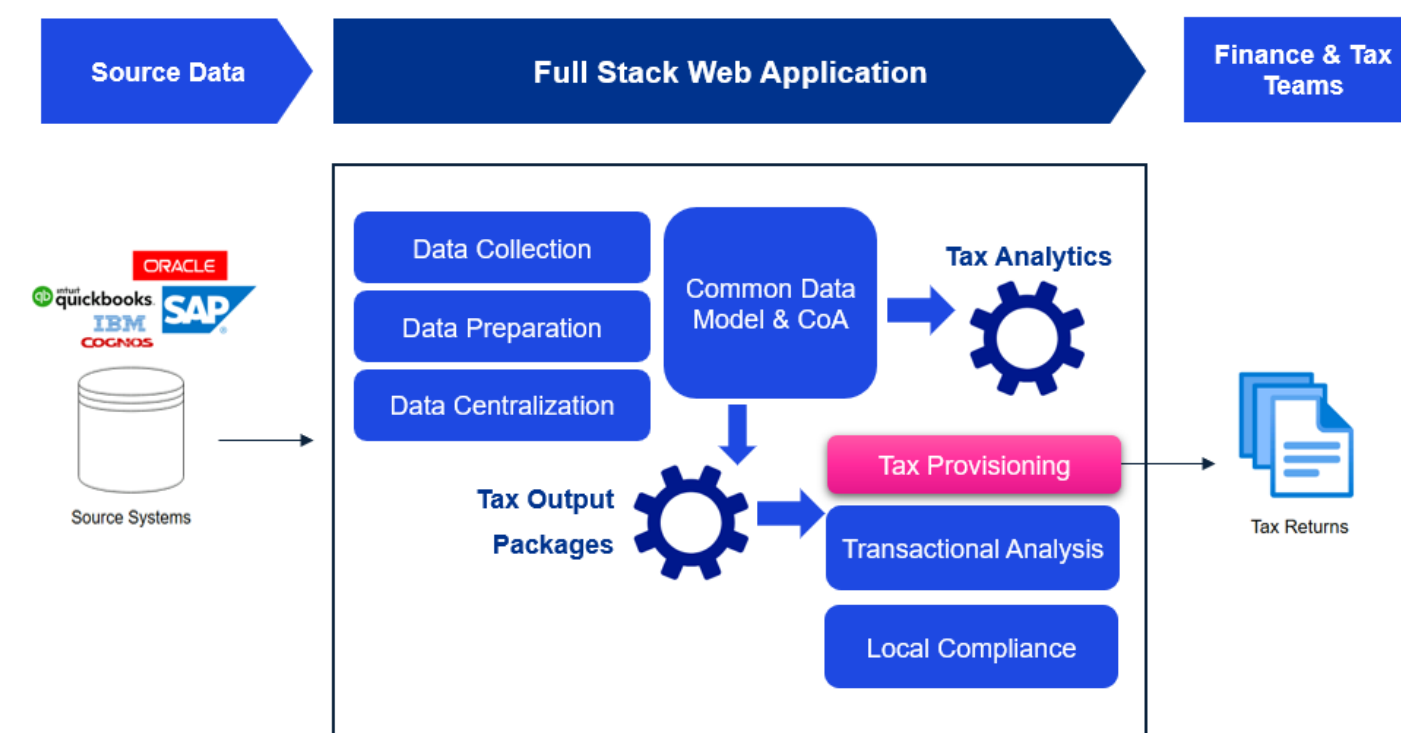

Existing Solution: Alteryx and Limitations

This project aims to address this issue by developing an in-house **Web Application** as an alternative solution to <u>automate</u> the generation of a <u>**Tax Provisioning Report**</u>, which is a supporting resource that allow companies to streamline their income tax return filing process.
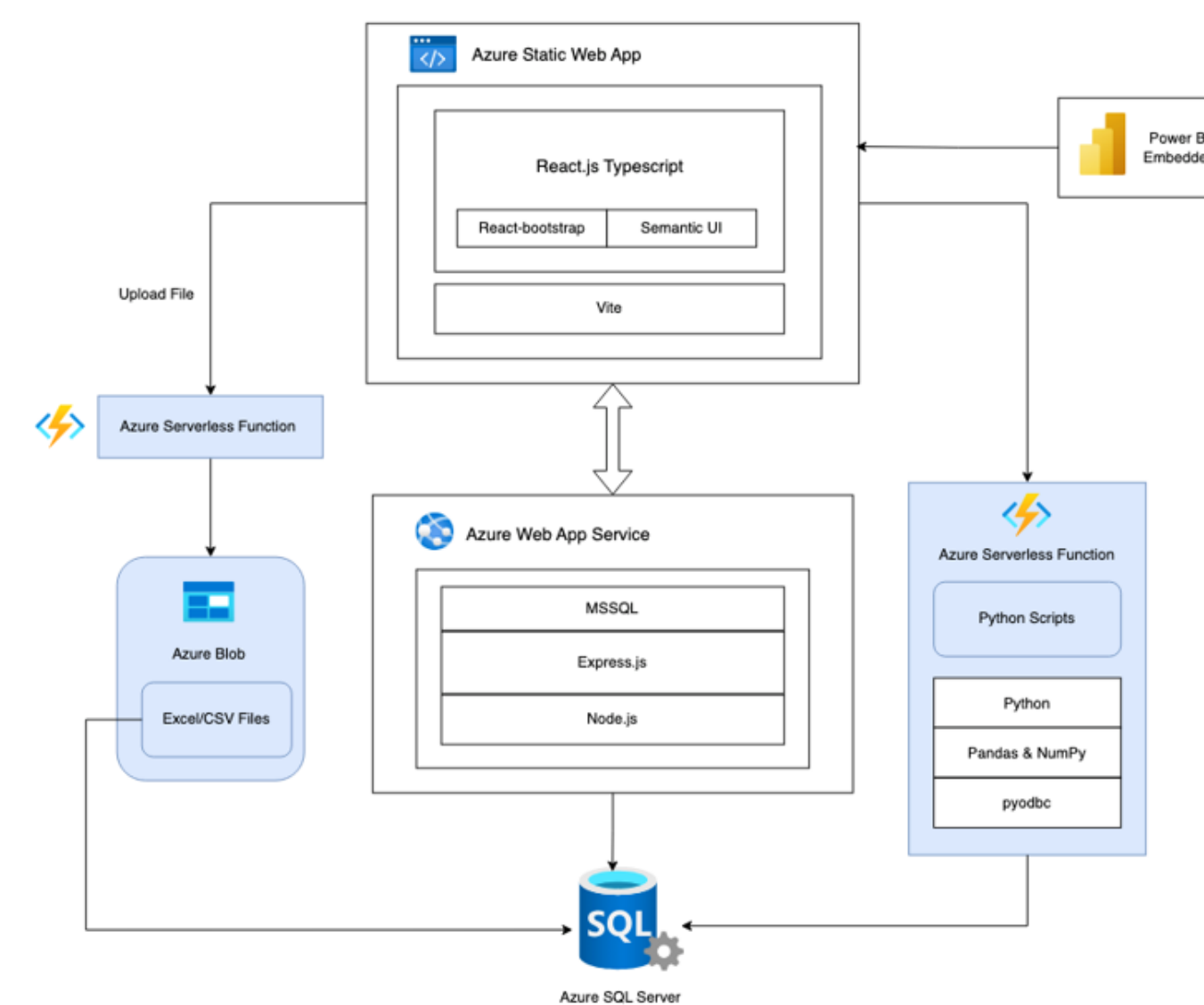
Technical Objectives

- User-friendly interface **to view, create and recompute** a **Tax Provisioning Report**.
- **Data Factory** and **Data Processing** to compute Tax Computations
- **REST API** backend app to run the Data Engines and a Scalable Database
- Generate automated **report and analytics** in the front-end
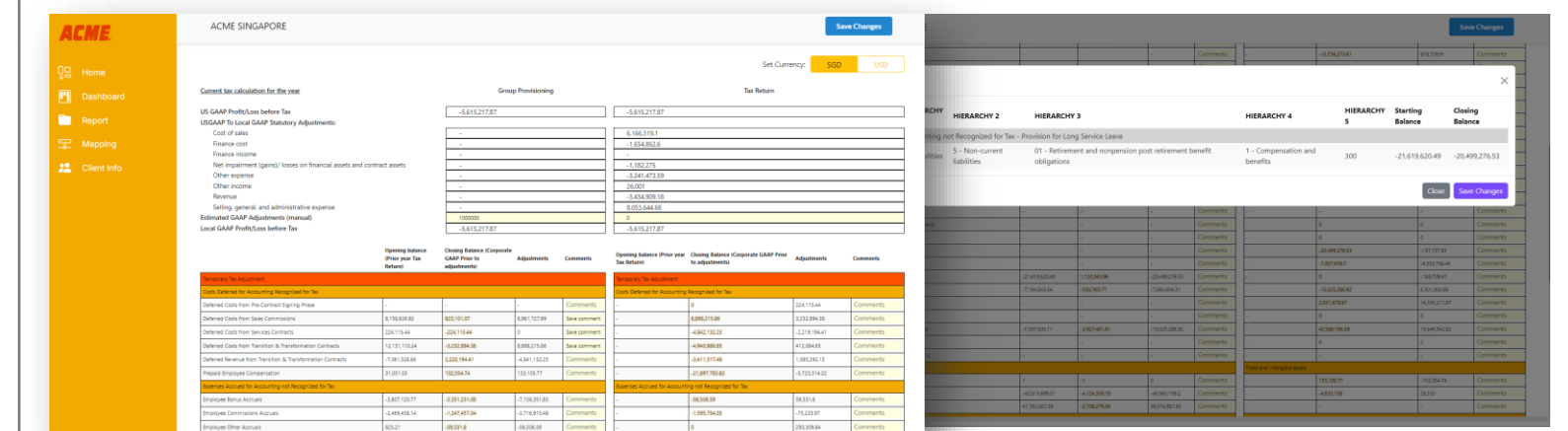- Create a **CI/CD pipeline** and configure automated deployment to Azure
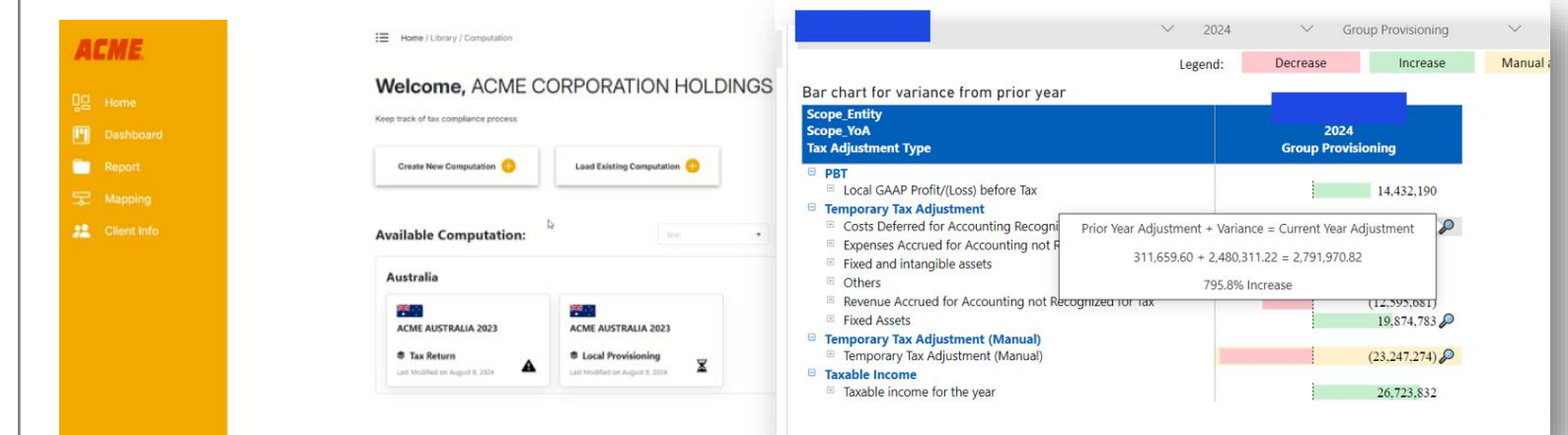
Design

Implementation

Result

Interactive tax provisioning report with dual view for comparison.

Trial Balance Popup View to see transactional breakdowns

Home Page Interface to Create/View/Load Computation

Tax Dashboard Analytics with Power BI Embedded in React

| **600+** hours saved | **80%** reduction in time spent for manual work |

Conclusion

This project is a Full-Stack Web Application developed for KPMG to automate the Corporate Income Tax Compliance process. This application provides an interface to submit transactional data, automate adjustments, and generate a Tax Provisioning Report. Furthermore, clients can add manual adjustments, recompute, and also view automated tax analytics.