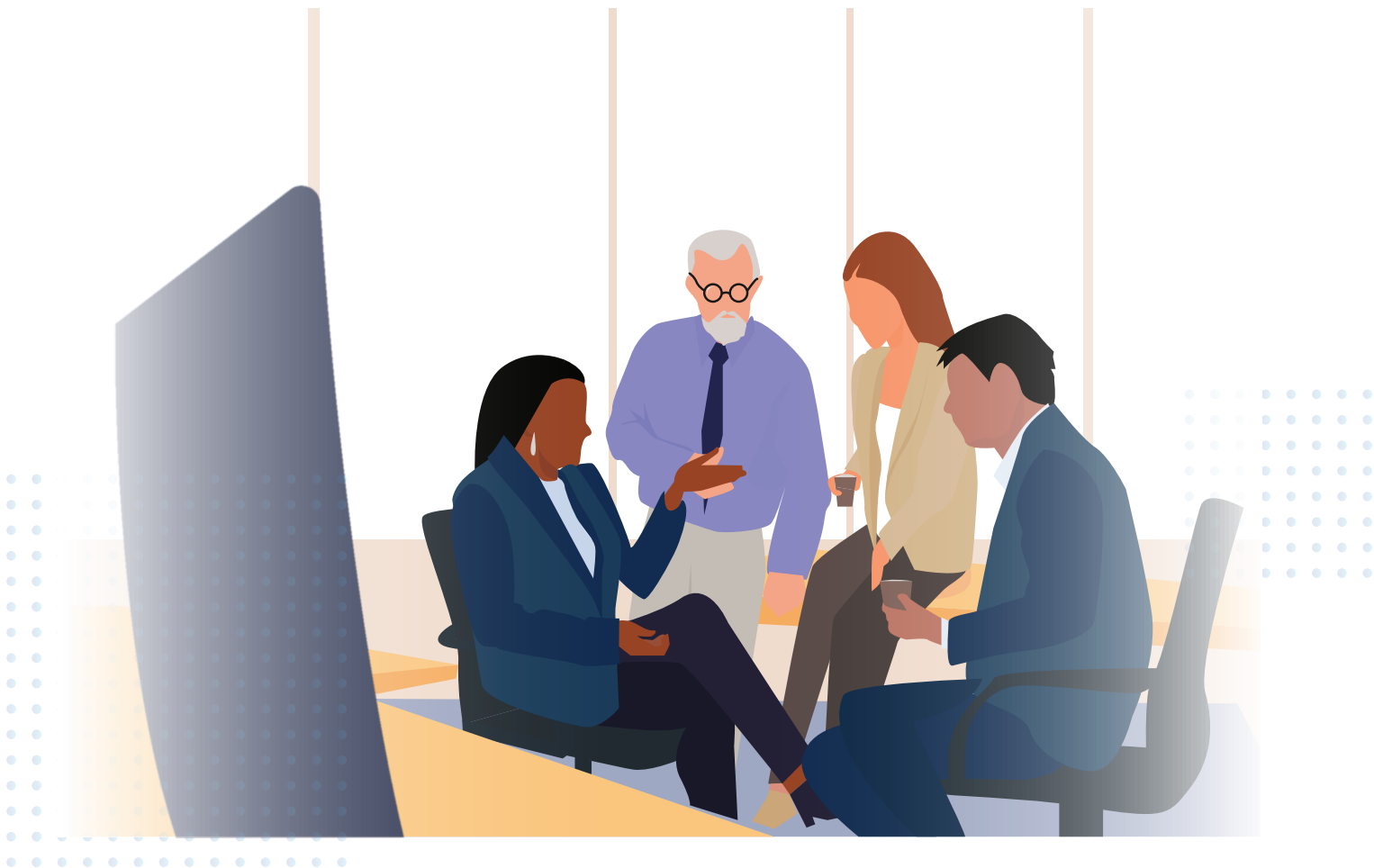


Streamlining Payroll Submissions in Singapore:

APEX's Solution for Efficient Government Reporting



APEX is a full-fledged API management solution that allows developers, product teams, agencies and businesses to manage APIs across various stages – from registration to publication to retirement. It was born out of the need to reduce the complexity of managing multiple APIs.

Businesses in Singapore are in the midst of digital transformation, with over 70% of businesses in Singapore having embarked on digital transformation initiatives since.

Amid the transformation, employers in Singapore are still required to manually send reports to various government agencies at different intervals in the year.

Problem

Every year, Singaporean-registered companies have to submit the salary data of their employees under the Auto-Inclusion Scheme (AIS) to the Inland Revenue Authority of Singapore (IRAS). Every quarter and every year, they also need to update the Ministry of Manpower (MOM) on changes to their workforce composition and complete a labour survey. Every month, the Central Provident Fund Board (CPF Board) requires employers to submit details of their contributions to their employees.



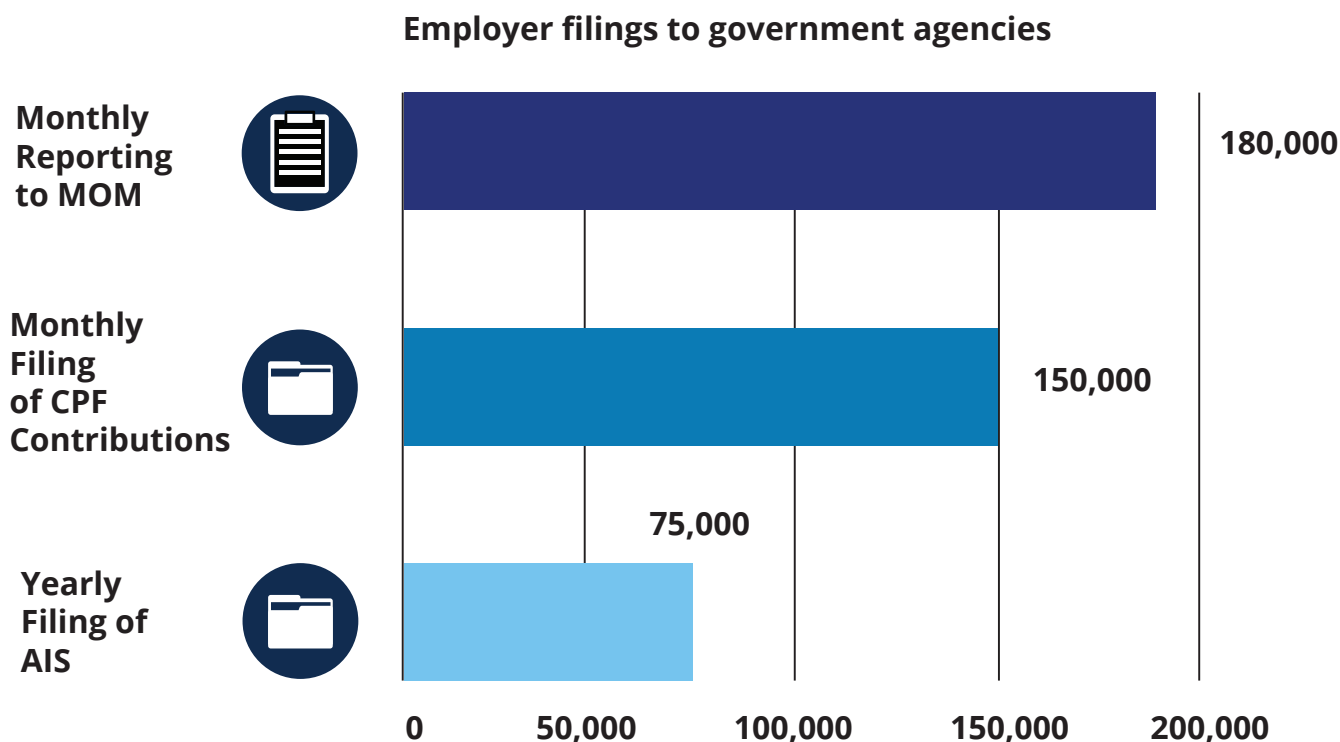


Fig 1.1 - Amount of time spent on manually gathering, organizing and uploading data

The data required for filing to the different government agencies are all stored in the companies' payroll or HR software. How might we integrate with the HR and payroll software so that the submission process can be streamlined, reducing the manual efforts and saving saving employers valuable time and resources?

Solution

Enter APEX, which could consolidate APIs from different agencies on its platform and facilitate secured access and integration by developers, including the HR and payroll software vendors. By housing all required APIs and submitting necessary information to the three agencies, APEX eliminates the need for manual submissions, reduces administrative workload, and promotes compliance with payroll-related regulatory obligations.

Development and implementation

To create the solution, a cross-agency team conducted in-depth interviews with payroll software developers. The team also interviewed employers, who are the end business users.

Through the engagements, the team found that some payroll software developers already had separate direct link-ups with IRAS, CPF and MOM. But both developers and employers would like a consolidated product that would enable them to make a one-time submission to satisfy their obligations to the three government bodies in a seamless manner.

The APEX team wanted to create a solution that would provide value to all the parties involved.

The main value proposition for employers is to fulfil a “tell-us-once” approach and provide a seamless, efficient, consistent one-government experience. They intend to co-create services around the businesses’ moments of life by integrating core filing obligations within natural systems. While the main value proposition for the agencies involved is to expand the reach and usage of integrated, seamless filing payroll products to employers and provide them with a wider range of integrated software options. This means employers would not need to engage separate e-services when filing their submissions.

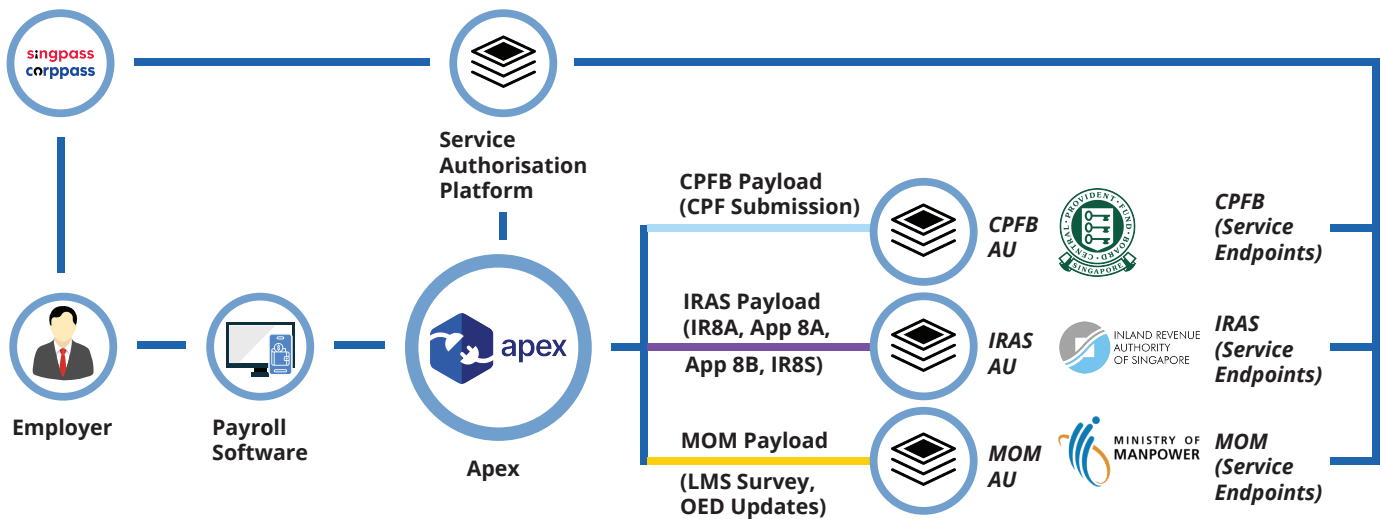


Fig 1.2 - Apex's role in the ecosystem

Design

The solution is designed so that CPFB, IRAS and MOM will each develop individual submission APIs for integration on GovTech’s APEX platform. Employers will be able to satisfy these core filing obligations with agencies seamlessly, from their payroll software.

The advantages of this design are that the software developers work with a single integration and with a single API gateway.

The pilot lasted from June 2022 to August 2022 and was officially completed at the end of December 2023.

The pilot was successful due to these factors:

- Well-documented API technical specifications, guides and data dictionary
- A dedicated team helped by keen assistance from the agencies
- Cooperation among the different agencies
- Easy integration process (after successful OAuth).

After the pilot, the agencies will focus on scaling up the initiative.

They will conduct a joint post-event review with the pilot software developers and end users to understand the issues and suggest future improvements.

The agencies will work together to come up with a joint communications and marketing plan to drive interest among the remaining software developers and other interested parties.

They will also work on possible strategies for scaling up their respective APIs, and create a comprehensive consolidated API Onboarding Guide for future software developers.

As of now, APEX has exited its pilot and is generally available since 1 April 2023.



Outcome and Learnings

The APEX team has learnt a few things from this initiative. One factor of their success is listening to their users, attempting to solve the right problems and thinking about win-win situations.

Building on their recent success, the APEX team is eager to see more agencies come forward and collaborate on initiatives for the public good. The more successes, the closer we get to realising the 'Tell Us Once'; approach, which promises a seamless, efficient, one-government experience for the public.

The 'Tell Us Once'; approach is a user-centric strategy that eliminates the need for users to repeatedly provide and verify the same personal information to government agencies when transacting online. A prime example is the use of MyInfo - once a user has authenticated their identity via SingPass, their basic personal details are automatically filled in online forms from participating agencies, streamlining each transaction.

This initiative also validates their idea of API as a product mindset, whereby APIs can be viewed not just as a backend technical implementation but as a product that can unlock and generate a lot of business value.

Currently, only API publishers have to pay to use APEX. For more information, refer to the Developer Portal product writeup for APEX.

