



# Open Banking

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A large step forward in banks' evolving digital journeys and business models



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## Open Banking

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### Overview

Open Banking initiatives are undoubtedly gathering momentum, particularly in markets where it is being underpinned by regulatory stimuli. Just recently, for example, Australia has started the process to introduce Open Banking regulation in 2019, built on standards being adopted in the UK, and which in turn were shaped by European Union (EU) directives.

Whilst the Open Banking objectives for different markets vary, all are seeking to encourage greater competition, transparency and product and service innovation by financial services institutions for the benefit of customers. A key lever in doing so involves allowing customer data to be shared securely with authorised third-party providers (TPPs), primarily through Application Programming Interfaces (APIs) as banking seeks to tap into the API economy and associated Software-as-a-Service (SaaS) models that have proved successful in other industries. This will drive a paradigm shift in banks' business and technology models: from today's closed banking models towards more collaborative open banking models through the creation of digital financial marketplaces and ecosystems.

Against this backdrop, should Open Banking, of itself, be considered a threat or an opportunity for banks? At Zafin, we are firmly in the opportunity camp. Technology innovation is providing the means to allow traditional banks, collaborating with the right Fintech partners and other TPPs, to excel in today's already digitally-oriented world.

However, for banks to successfully deliver market-leading digital propositions for Consumer and Business customers they will have to embark on a significant transformation journey, involving major decisions on developing or selecting the right technological building blocks as part of their digital architecture and adapting business models to ensure that it can be leveraged to maximum efficiency: this means both are aligned to deliver customer-centric, hyper-personalized yet transparent product and service propositions rather than the productcentric and opaque models that still proliferate today.

## Open Banking

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Open Banking will likely ensure that digital transformation investments are considered mandatory and so help banks to secure the budgets and the business focus required to truly transform their business models.

### **We see this as a major benefit of Open Banking.**

Not only that, but the options now available for implementing digital banking strategies offer greater capabilities and cost-efficiencies than ever before. The very Fintech community that Open Banking is seeking to encourage as participants in the new financial API economy are already playing a major role alongside the larger established players, including BigTechs, such as Microsoft. FinTechs offer a range of off-the-shelf platform, functional and infrastructure solutions leveraging the latest standards such as DevOps development models and Cloud deployment options. Together, these can provide an accelerated path for banks to put in place the key architectural building-blocks required to service their digital banking models in compliance with Open Banking.

In the case of Zafin, our product (product catalog), pricing, rate and offer management solutions are already being used by several leading banks to accelerate and differentiate their digital models.

## Open Banking

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### What is Open Banking?

Banking has traditionally operated under a closed model, in which financial institutions retain and control the information they collect concerning their customers, often under the guise of security and data protection legislation. This has, to an extent, protected traditional banks from wider market competition.

At its heart, Open Banking seeks to create an open banking model, in which authorised customer and product data can more easily but securely be accessed and used by different financial services providers. Access to this data is expected to create greater commercial opportunities for financial institutions and TPPs, including FinTechs, thereby driving competition and product innovation as part of an enlarged digital ecosystem. The 'opening up' and exchange of data will largely be done via APIs, which will be standardised in many markets, and which have already been used successfully in other industries.

Open Banking encompasses a range of different regulation and initiatives, which while varying in different markets, all have the objective of shaping and accelerating the digital banking models and e-commerce of the future. While the focus in most markets will initially be on Consumers and Small and Medium Businesses (SMBs), the anticipated direction of product and service innovation is also expected to result in enhanced propositions and significant benefits for Corporates.

### What are the primary objectives of Open Banking?

The focus of Open Banking, whether driven by formal regulation, technology innovation or customers may differ from market to market, but common drivers include ambitions to:

#### **INCREASE COMPETITION**

By making it easier for customers to compare products through transparent pricing and creating opportunities for new competitors

#### **ENCOURAGE INNOVATION**

Banks will have to improve their product innovation, either directly or through partnerships - if they do not, other providers will take advantage

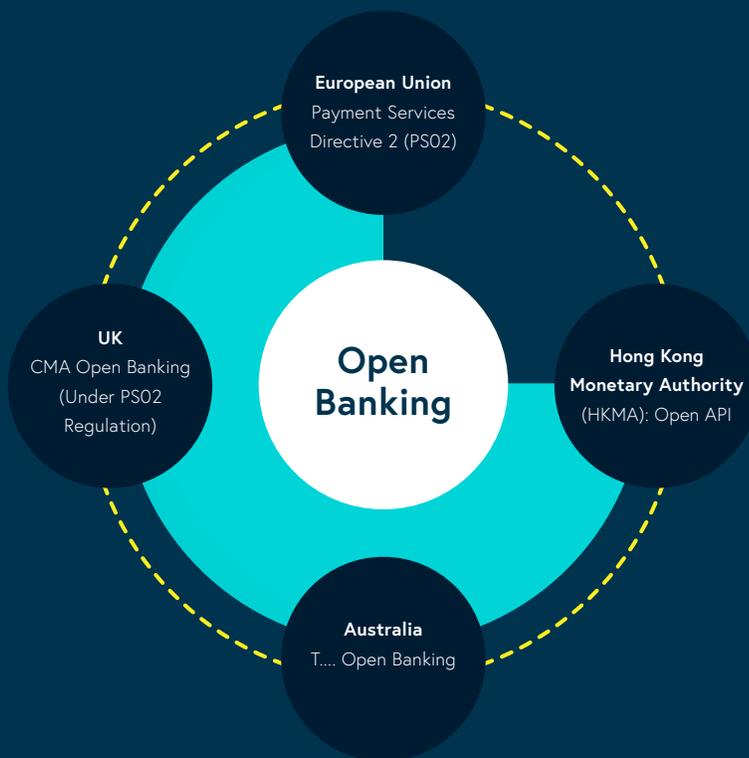
#### **ADDRESS CONSUMER RIGHTS**

Customers own their financial data and will have the right to share their data securely with other financial institutions and third-party providers

# Open Banking Agenda: A Worldwide Phenomenon

The Open Banking agenda was initially driven by Europe, through PSD2 for the European Union and Open Banking regulations in the UK. Increasing payments competition in a market dominated by a few big payment services providers (PSPs) and card schemes was a key objective of the EU.

### Gathering Global Momentum



- Opening banking initiatives are gathering momentum globally
- The EU, including the UK, and Hong Kong have already implemented Open Banking regulation during 2018
- Building on this, 2019 looks like being a key year for Open Banking as API developments begin to flow
- Other countries, across different markets are reviewing Open Banking initiatives so momentum is expected to increase during 2019 Banks, globally, need to be prepared.

Other markets are now using open banking as an accelerator for similar goals, including Australia, which is taking the UK's Open Banking model as a blueprint for key components of its own proposed regulation. Countries in other markets, including Canada, Mexico and Japan are reviewing Open Banking initiatives to gauge their own approaches.

# Open Banking

## Open Banking Landscape



## Application Programming Interfaces (APIs)

A recurring theme is the promotion of APIs as standard mechanisms for secure data availability and exchange. APIs allow third party providers (TPPs), e.g. other financial institutions and FinTechs, to access banks' digital assets and services from their own environments, making it possible to develop and offer their own services, which may be complementary to, or competing against, banks' own products and services. APIs have been used in technology, by the likes of Amazon and Alibaba, for example, to create open marketplace business models. Open Banking seeks to do the same for banking in general.

## The Future of Banking

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A paradigm-shift in banking is occurring: banks know they need to become more relevant and customer-centric. Open banking is an avenue that is driving banks not only to provide better services to consumers of financial services but forcing them to think and act differently: to fundamentally improve their way of doing business. Embracing Open banking could be a catalyst for very positive change.

There are three main areas that banks should focus on to improve their ability to deliver and become - and remain - competitive. We will explore each of these to see how banks can accelerate the internal change.

## Digital Banking

### **Driving customer expectations and experience**

Digitization is one of the biggest priorities for many financial institutions around the globe. Financial institutions are spending incredible amount of resources and funds in digitizing their processing, systems and customer experiences. One of the biggest drivers has been competition from end-consumer Fintech providers encroaching on their traditional space as well as threats by large technology companies such as Google, Amazon, Facebook, Alibaba and others.

Meanwhile, as banks grappled with these challenges, with mixed success it could be said, BigTech and other industries were beginning to shine a light on the importance and potential power of the digital channel. Take Amazon, for example, which has effectively created a single platform through which to sell products. Initially acting as a seller of 3rd party products, Amazon then moved on to developing their own, and have since moved on to provide a marketplace for 3rd parties to sell their products.

With or without Open Banking, it is clear, therefore, that market and customer expectations are ramping up the pressure on banks to transform their digital capabilities. Open Banking simply provides a framework, regulatory or informal, to help banks in the journeys they will, in any case, have to take.

## The Future of Banking

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In our view, a product catalog allied to dynamic, flexible service and event-driven rate and pricing capabilities, will be a key enabler allowing banks to offer differentiated, customercentric yet tailored - even optimised and hyper-personalised analytics-driven - product and service propositions. This is true regardless of channel but will be even more critical for banks to successfully navigate their digital journeys. Zafin's solutions, built around product catalogs, will help banks to accelerate execution of these journeys. Before we outline why, let's consider the form banks' digital journeys may take.

We believe that banks' digital models and ecosystems could develop along the lines of Amazon or Alibaba. Banks will need to determine whether they wish to take command and be at the epicentre of the opportunities that this will bring. UK-based Starling Bank and BBVA via its US operations, for example, are offering Banking-as-a-Service (BaaS) platforms, using APIs, to let other firms develop and offer financial products and services to their customers.

Equally, for those banks that limit their horizons, competition such as the likes of Mint, a longstanding financial services provider in the US, will be allowed to extend their reach through their single platform model. With Open Banking and increasingly standardised APIs, banks have the opportunity to do this at least as well, and potentially better. Banks' digital evolution will potentially only be limited by their own visions and execution capabilities not technology. We anticipate that continued technology innovation, already proven in execution, will allow banks to successfully navigate their digital journeys. And banks have some major advantages: banks still remain strong brands and trusted service providers in the eyes of customers; banks already have solid and secure infrastructure foundations and economies of scale; they also have access to significant customer data, not all of which will initially fall under the purview of Open Banking.

So, banks can be at the heart of the digital revolution if they leverage these assets well and capitalise on the technology innovation which has already been proven to successfully drive digitisation in other industries.

## The Future of Banking

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We see three distinct digital banking models evolving:

### BANK-CENTRIC API-DRIVEN OPEN BANKING MODEL

Banks meet the minimum requirements prescribed by Open Banking to develop their digital propositions, but effectively remain very traditional in their outlook, leaving opportunities to TPPs and other players

### BANK AS A FINANCIAL SERVICES MARKETPLACE

Banks seek to take greater ownership of the digital ecosystem through operating Bank-as-a-Service (BaaS) platforms, opening more of their APIs to selected TPPs, to develop additional products and services specifically for their customers

### SERVICES MARKETPLACE

Truly progressive banks can extend the Financial Services Marketplace to invite suppliers of non-financial products and services to join their digital ecosystem to provide a one-touch option for customers banking and other needs

## Bank-centric API-driven Open Banking Model

**For most, if not all, banks this is the logical first step in the journey.**

Digitization has been one of the biggest priorities for many financial institutions around the globe, driven by growing customer expectations and increasing competition to improve the way they design, create and offer products and services digitally (as well as other channels).

With the advent of Open Banking, not only do banks have to do this, but they have to open up their data to TPPs, including FinTechs, that will be able to use this to offer customers better alternatives, as well as additional products and services.

## The Future of Banking

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In general, there are three types of active or emerging FinTechs:

- 1 Competitor FinTechs - those that compete against banks to provide similar services to end consumers of financial products and services**
- 2 Collaborative FinTechs - those that provide technologies, products and services to enable banks in their abilities to service their consumers better, faster, cheaper**
- 3 Partner FinTechs - those that are, or will become, 3rd party providers via existing bank channels to provide those offerings either white-labelled or as 3rd party product offerings**

All three types of Fintech are likely to contribute in one way or another to improving customer experience, driving the creation of customer oriented hyper-personalised experiences with readily available transparent product, pricing and other information to help them make more informed decisions. This will be true whether the products and services are directly provided by the banks or by the FinTechs.

Banking-as-a-service (BaaS), for example, is an emerging Fintech trend, driven by changing consumer consumption towards online and app-based banking. FinTechs can offer banking services in easy-to-integrate components for banks to offer to their customers, more and more efficiently through open banking or API models.

The extent to which banks are able to build and manage their network of collaborative partner Fintech's, with the right capabilities, will influence the extent to which they will be able to enhance their digital models.

# Banking as a Platform

### Financial services market place

Digital-leading banks are starting to create a financial services market place where they can service their customers better with various options including providing direct and 3rd party financial products and services augmented by non-financial services.

This banking-as-a-platform (BaaP) model allows banks to keep "owning" their customers, while offering the best financial products possible, allowing FinTechs to focus on making their services faster, more precise while also broadening their scope. The creation of an end-to-end connected and continuous process that provides a complete holistic solution as a service offering.

### **In order to leapfrog time to market, open banking becomes integral to creating this marketplace.**

For example, Small Medium Business (SMB) customers are looking to be served better by their banks. Businesses are moving into a growth phase and various disruptive providers are entering the financial ecosystem to service them better, such as business lending. There is an expectation of personalized and flexible products, frictionless experiences and expedited cash flow.

Commercial banks need to become relevant to their customers and are expected to be more innovative and agile while reducing time-to-market to address their needs. Banks need to open up new channels while partnering with various organisations to meet the demands of their customers and create new revenue streams.

By introducing FinTechs, such as those with market-leading, proven specialist insurance underwriting (and service), risk scoring or logistics capabilities and leveraging infrastructure capabilities such as Cloud-based Internet-of-Things (IoT) a one-touch continuous and transparent customer experience can be created. Insurance providers, for example, are already using new data points, driven by IoT to provide differentiated and dynamic pricing.

## The Future of Banking

FinTechs such as those providing real-time risk scoring services are looking to work with banks to allow them to scale, grow their business and gain credibility. They bring valuable data as well as technologies to expedite the seamless experience banks are trying to offer. Banks will be able to form strategic partnerships to create more of these connected customer experiences as part of an overall digital ecosystem.

Open Banking, providing banks have the right capabilities, will help banks to leapfrog time-to-market of innovative, more-connected and relevant customer-centric models than ever before. If banks maintain an inward lens to Open Banking, they risk missing out on driving and influencing such opportunities.

## Bank as centre of a digital ecosystem

### Holistic services marketplace

In our opinion, banks can take the financial services market place – or banking-as-a-platform - to the next level and provide a "holistic services marketplace" where banks can provide financial and non-financial products and services.

With the advent of Open Banking, not only do banks have to do this, but they have to open up their data to TPPs, including FinTechs, that will be able to use this to offer customers better alternatives, as well as additional products and services.

## Open Banking

### Leapfrog time to market



## The Future of Banking

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### The ecosystem would include:

- Banks own financial product and service offerings
- Financial services and products from trusted 3rd party providers
- Non-financial products and services that incorporate a concept of lifestyle event-linked services that drive needs-based offerings

This will result in a more holistic service offering that is provided by banks as part of an ecosystem created and owned by them. Some organizations such as Alibaba and Ant Financial are pursuing such visions but they are originating from outside of traditional financial institutions.

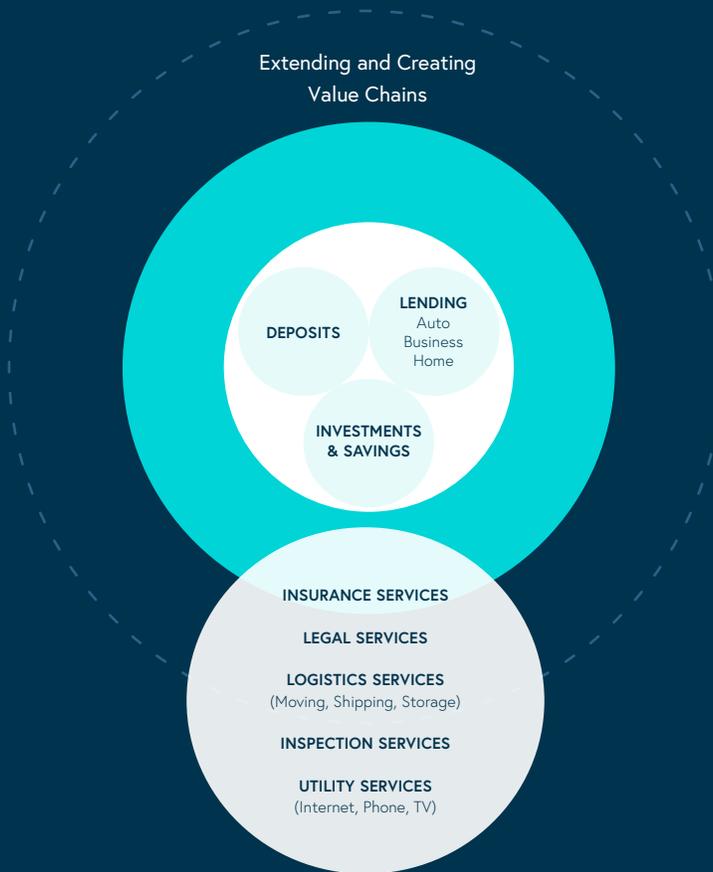
Take an example where a bank provides mortgages. Instead of limiting the view to the mortgage as a product only, and instead taking the view that the customer is undertaking a key lifestyle decision, which features a number of linked events and decisions, the bank can offer a potentially one-touch enhanced customer experience whereby the customer is able to make decisions and select products and services ranging from legal services and advice, home valuation and inspection services, logistics services for moving, home insurance and phone, cable and internet connection services.

Banks can go as far as setting up pre-authorized payments with these partners that generate one time or re-occurring charges processed either on banks' credit card, checking account or other payment mechanisms.

Banks then change the paradigm completely to counter the growing competitive treats encroaching on the financial services industry. The "Bank" becomes the first place for customers to go to because it is a trusted and secure partner, provides holistic service beyond financial products and has become more relevant to their needs.

This personalized service and seamless customer-centric experience will provide banks with a major competitive edge; the opportunities could be plentiful.

## Extending the Banking Ecosystem



### **BANK-CENTRIC API DRIVEN OPEN BANKING ECOSYSTEM**

Banks will operate their usual range of products and services which may be susceptible to competitor and Fintech innovation



### **BANK-OWNED FINANCIAL SERVICES MARKETPLACE ECOSYSTEM**

Banks will be able to extend their participation in the customer value chain by offering augmented and additional financial services in partnership with Fintechs.



### **BANK-OWNED HOLISTIC SERVICES MARKETPLACE**

Banks will be able to extend their participation in the customer value chain beyond financial products and services in partnership with Fintech and e-commerce partners improving customer experience and creating new revenues

## The Future of Banking

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Zafin's catalog can become banks' go-to-tool to manage financial and non-financial products and services, which can be offered through a single, connected bank marketplace, and which supported by analytics-driven insights will be used to provide – and anticipate the need for - more relevant, personalised and connected services significantly enhancing customers' experience.

## Monetising Bank APIs

Whatever model banks choose to adopt on their digital, and thus Open Banking journeys, they will likely have to make significant investments in the creation and extension of their API capabilities. Rather than simply seeing this as a cost management exercise, however, banks should give serious consideration to the new revenue streams that can be created from robust, well-designed API frameworks. If developed and structured effectively, not only will APIs drive efficiencies internally, and fuel digital propositions, they can be turned into consumable products and services. APIs, therefore, have the potential to create significant new revenue streams through productising and monetising financial services.

A large, traditional bank, for example, could take a more outward looking approach to cash flow tools it has developed for its Small and Medium Business customers. Instead of merely using these capabilities internally, they can expose them through APIs, so that other consumers in the market, be that customers generally or other banks (to augment their own services), can leverage them without the need for foundational development. It is conceivable that banks will be able to offer a mix of standard APIs (which may have to be provided free depending on local regulation) and premium APIs with enriched data and other services, that different consumers will be willing to pay for. Banks will have significant opportunities to capitalise on the development of APIs by generating new distribution channels and therefore new revenue streams.

While the path forward may not be straightforward, such statements are not merely theoretical. As has been highlighted, there is enough precedent from other industries that the use of API-driven open market models can fuel significant growth in revenue streams. Amazon and Alibaba have amply demonstrated this and provide further insights into how APIs can drive revenues.

## The Future of Banking

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Amazon started by selling books before becoming a general Etailer. It did this, in no small part, by using APIs to extend its provisioning, entitlement, enablement and fulfilment processes to other retailers and service providers. In a similar way, it is anticipated that digital-forward banks will distribute their services through APIs to the financial services community and beyond.

Similarly, as with Apps that leverage Google Maps services, such as Uber, companies - both existing and new - will be able to participate in a growing financial services market by leveraging bank APIs as the foundation on which to provide enhanced and additional services. This may, for example, pave the way for traditional banks to gain a greater foothold with the unbanked and underbanked populations, through the provision of augmented mobile financial services.

**As outlined earlier, it is anticipated that banks' API evolution will take the following path:**

- 1. Bank-oriented** - banks will develop APIs for their own development needs to facilitate Implementation and change management of digital and other applications
- 2. API marketplace** - banks will open their APIs to trusted third-party developers to facilitate product Innovation for their customers, which will drive consumer pay revenue models
- 3. API distributor** - in this model banks will list third-party financial service API offerings from partners and FinTechs as well their own, which will drive a range of revenue share models
- 4. API aggregator** - some service providers may decide to offer an aggregated API that orchestrates the services of multiple financial institutions

Opportunities to really drive revenue creation through APIs will begin at the API marketplace stage and beyond, and several different revenue models are likely to be adopted with consumption-based and subscription-based options expected to lead with other models playing a supporting role.

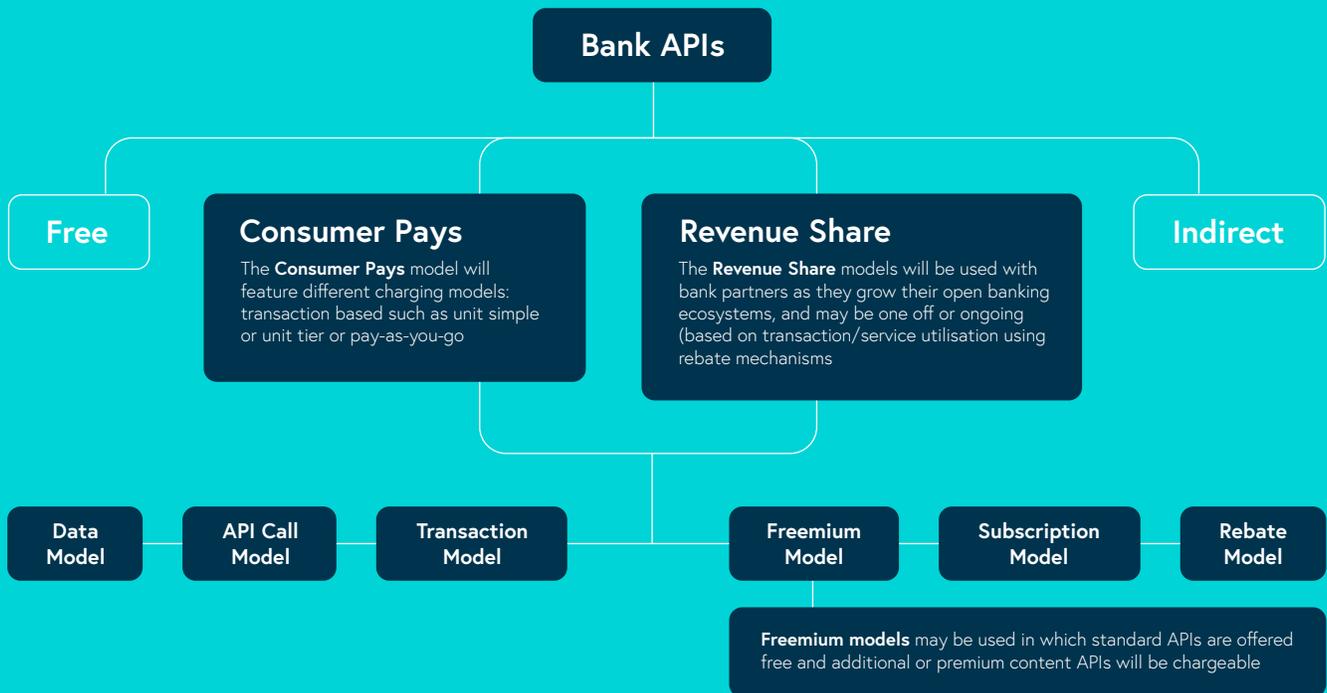
# The Future of Banking

It is one thing to recognise generally that API banking will, if executed well, create a multitude of new revenue opportunities, and also the different types of revenue model that will need to be supported, but it will be another entirely to consider how to capture these revenue streams. It is perhaps ironic, that one of the biggest challenges our banking clients face is the implementation of new charging capabilities as they roll-out new products and services. Even today, it is not uncommon for banks to market a product even before automated charging capabilities are fully developed - it is one of the fundamental reasons why banks want to work with Zafin and use our solutions.

## Monetising Banking APIs

### Revenue Models

Utility or helper type APIs, which facilitate services or reduced costs may be offered free. A range of indirect benefits should accrue ranging from improved ROI, augmented customer services, increased lead generation and availability of content (from other API providers, Fintechs, etc). Data and transaction APIs will form the bulk of revenue APIs.



## The Future of Banking

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Given the likely scale and impact of Open Banking, and the revenue opportunities available, for a similar scenario to play out would be both unfortunate and unnecessary. Zafin's product catalog solution, allied to In-built pricing and billing execution capabilities can be used by banks for the billing of API-related service consumption using a range of charging models, including the most common ones, as outlined above.

At Zafin, we believe it would be seriously remiss of banks not to consider the different charging models they will require in relation to consumption of their APIs and the capabilities that they will need to capture and bill these revenue streams automatically.

## Solution

### Product Catalogs

Open Banking is one of the drivers causing banks to change how they have traditionally thought about the products and services that they offer to customers. While many banks have already begun moving away from the siloed product management processes that have dominated the last few decades, Open Banking is a catalyst that will force them to rethink how they define, implement and operationalize products, with the need for far greater focus on customer experience and relevance, including additional features and competitive prices or rates.

Open Banking will also require banks to provide certain product information, such as standard prices and transaction histories to 3rd party providers. For banks to do this efficiently, they will likely need to standardise and enhance their product information and make this available via standard APIs; in the face of this greater transparency, enhanced product capability and design will be increasingly necessary for banks to be compliant and differentiate themselves.

## Solution

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In order to provide standardised interfaces to their products and services, banks first need to have a consistent enterprise-wide view of them. In effect, product and service attributes must be treated as Master Data for banks to allow for consistent and uniform access. For many banks with widely disparate back-end systems and highly heterogeneous product management practices this has been a significant challenge.

## Product Catalogs

### Unified Product Repository Facilitating Digital Enablement

The introduction of an Enterprise Product Catalog can help to solve this problem by providing a global unified repository of all product information. A Product Catalog not only provides a single source of truth for publishing Open Banking APIs to products and services, it can also provide a reusable library of product parameters and attributes that promotes consistency in product lifecycle management and can reduce the time required to launch and maintain products.

Enterprise product catalog based solutions, with integrated dynamic rate and fee management capabilities offer banks a way to transition from product-centric to more customer-centric or relationship driven models by abstracting and augmenting non-critical operational functionality into a separate enterprise-wide product management layer, which can be used to design and distribute products and product bundles through multiple distribution and service channels. It provides an ideal framework for digital enablement and innovation. Product catalog solutions can then help banks undertake these transitions towards digital models at a pace that suits them.

An Enterprise Product Catalog allows a bank to not only publish their own products and services but also allows a consistent mechanism to incorporate and offer 3rd party services to customers in a consistent manner. While a lot of commentary on Open Banking has viewed banks as merely a publisher of APIs emerging FinTechs, a Product Catalog can not only facilitate participation in an Open Banking marketplace, but also allow banks to host their own financial marketplaces in collaboration with selected partners, even extending banks' reach to include non-financial products and services providing a single, trusted one-stop shop for their customers' critical lifestyle needs.

## Solution

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Enhanced product catalog options featuring in-built reusable and dynamic rate management, fee plan management and conditional offers capabilities will allow banks to start offering more customer-centric, hyper-personalized product and service propositions, shaped by customer, product, transaction and other events; these propositions will increasingly include cross-product packages or bundles. By separating product, pricing and rate management within a single Product Catalog, the legacy product silos no longer inhibit the creation of the packages and bundles that will increasingly be required as product propositions become customer propositions and customer experiences in the digital world.

### TRADITIONAL

Product Centric

Limited product flexibility and innovation

Ineffective use of data

Poorly targeted customer interactions

### TRANSITION

Technology and organisation will be supported by product catalog solutions

These allow banks to rationalise and standardise their product design and distribution and break down product silos

New product development can be handled in the agile product catalog through in-built APIs leaving maintenance activities in the legacy systems

Banks can flexibly drive the pace of transition

### TARGET

Customer centric

Architecture and business models designed to deliver customer propositions

Faster, flexible and targeted product design and distribution

Ready availability and use of data for product evaluation and comparison via APIs

Enhanced customer engagement through event alerts - pre-emptive and predictive product offerings

## Solution

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# Infrastructure and Operations

The new products, services and bundles that will be enabled by the Open Banking ecosystem will have an enormous effect on existing IT architectures. Traditional banking infrastructure is based on well-known consumption patterns scaled for predictable peak loads. Open Banking not only changes these patterns but makes them much less predictable.

While many banks have started making use of cloud computing to realize cost savings Open Banking is likely to alter this value proposition. The need for on-demand scalability to handle large and irregular peak loads will hasten the adoption of Virtual Data centres, enabled by platforms such as Microsoft Azure.

Open Banking will also have a profound effect on IT operations at banks. Traditional waterfall driven product release cycles will be unable to keep up with the faster pace of change that Open Banking ecosystems will facilitate. As banks are driven to be more agile, old-fashioned Quality Assurance (QA) processes will be replaced by DevOps teams that focus on introducing incremental changes frequently, even daily, rather than major releases at the end of year long projects. New tools and processes to enable this agility will be a necessity.

## Zafin Solution Model

### Architecture and Deployment

Zafin's suite of products are offered as a Software as a Service (SaaS) solution, hosted on Microsoft Azure Cloud, with built-in industry-leading security features. Horizontal and vertical scalability is available on demand. The solution features well-designed, reusable, built-for-purpose APIs in conjunction with an extensive fixed data model which supports data connection with external systems such as customer information systems, core banking systems and other applications including digital service layers.

## Solution

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API-driven solutions are at the heart of digital transformation in many industries and our solution is designed specifically for the banking domain to allow banks to accelerate and enhance digital enablement. This API-led connectivity helps to accelerate the transition from on-premise to Cloud models. It also allows banks to experiment and innovate more quickly. For similar reasons, Zafin will be able to leverage Cloud and API infrastructure to quickly introduce product and feature enhancements for all our clients and more easily as part of scheduled product roadmap developments. A DevOps model is used to accelerate the roll-out of new features and the modular architecture (separation of concerns) allows for development of specific features without impacting all components, which in turn facilitates automated and accelerated testing.

APIs and micro-services are also used for supporting interoperability between the functional components within Zafin's product suite. This means, for example, that support for real-time rate calculation and execution and information exchange with digital channels is already available out-of-the-box.

In relation to data management, Zafin's products supports rollback operations and transaction logs to restore databases to their previous state prior to erroneous or incomplete updates. Our SaaS solution is being used successfully by many of our key clients, providing them with reduced infrastructure maintenance costs and access to enhanced product and rate capabilities, which will continue to evolve more quickly than alternative solutions.

## Aligning Technology and Business Models

It is increasingly clear that the traditional product-centric models, based on constrained technology models encompassing separate core banking systems and dedicated product platforms and payments engines, need to be transformed to deliver successful customercentric digital propositions that comply with Open Banking standards. But just as critically, so do the business models.

## Aligning Technology and Business Models

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As technology innovation allows banks to orient their architecture towards digital enabling capabilities, the need to align business models and processes comes increasingly under the microscope. It is entirely possible that the people agenda, in effect, banks' inherent culture will be harder to reorganise. Product catalogs, by enabling manageable transition pathways may also help here.

Let us consider a traditional product-oriented operating model as illustrated below. Under the traditional model, banks are struggling to create coherent, customer-centric product and pricing propositions. The organisational models are not effective in working collaboratively to design and execute customer propositions which encompass products supported by different systems and within different lines of business, let alone products and services that may be provided by 3rd party providers and other partners as envisaged by open banking and by forward-thinking digital banks.

## Traditional Organisational Model

Customer centric product and pricing propositions are restricted by technology architecture and the organisational models, which have evolved to support and even embed them. Any cross-product development including bundles creates product design and revenue allocation challenges.

### Customer Channels

Mobile Internet Branch ATM Other

Fragmented product organisations cannot easily create and maintain coherent customer-centric propositions

### Product Management

Casa Payments Cards Investments Insurance

Product design is restricted due to the system operational silos maintained to support different product systems

### Operations

Casa Payments Cards Investments Insurance

Products with intrinsically different characteristics are typically managed within dedicated and adapted systems

### Systems

Casa Payments Cards Investments Insurance

## Aligning Technology and Business Models

We have highlighted that technology innovations are providing solutions to help break down the traditional system and product silos, yet it is still proving hard for many banks to move towards more collaborative cross-product functional models to successfully leverage new capabilities.

This does not mean that all product management functionalities need to be migrated or converted to a single super-solution. Indeed, there are significant benefits from an operational and risk management perspective to maintaining the separate product systems, which have been optimised for operational efficiency, and which may not be achievable in aggregate within a single system. We envisage a transitional model in which new product innovation can be handled in the product catalog with the commensurate adjustments to the business organisation, which may look something like:

## Transitional Organisational Model

### Customer Channels

Mobile Internet Branch ATM Other

**Channels Team** – Govern delivery of a consistent channel proposition

### Product Management

Casa Payments Cards Investments Insurance

**Customer Proposition Team** – Govern customer pricing and revenue policies  
**Product Innovation Team** – Create team to design customer propositions

### Operations

Casa Payments Cards Investments Insurance

Operations adapted to support cross-product customer propositions

### Product Catalog

Product catalog solutions provide a product innovation layer to design cross-product propositions breaking down the traditional systems silos

### Systems

Casa Payments Cards Investments Insurance

The organisational model should start to be modified as shown in order to capitalise on, and more effectively manage, the available product and marketing opportunities from cross-product design. The transition can be managed over time based on empirical testing and data analysis.

These solutions are able to support the increasing digitalisation agendas for banks, whether specifically driven by Open Banking or not. Ultimately, if delivered successfully, in conjunction with the required changes to the supporting business and organisational models this should bring significant operational efficiencies and cost savings for banks.

## Aligning Technology and Business Models

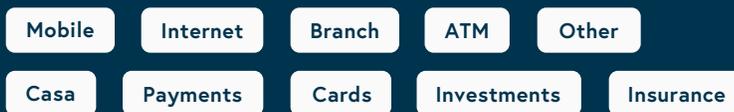
The business and organisational models will have to be realigned along similar lines to the IT architectural transformation for banks to capitalise on the opportunities that will become available. This will likely mean creating cross-functional or matrix-model product teams that will be considerably different to the siloed models that still largely exist today.

Advancing technological capabilities mean that banks can manage the transformation from product-centric models to customer-centric models and deliver on new Open Banking propositions in a way, and at a pace, that suits them. The transition model outlined highlights just one way; different banks can make some, or all, of these changes depending on their readiness for change towards an ultimate target state, which may look something like that outlined below.

The organisational model will need to further align with the need to offer customers holistic propositions and enhanced customer experience. The Product Management framework will need to become ever more customer-focused, with the silos between different lines of business and even product teams within the same business being eliminated. This will extend to the partner ecosystem that is likely to develop with Fintech's and other suppliers because of Open Banking and it becomes clear that products – not existing or even envisaged today – will eventually become part of the mainstream.

## Target Organisational Model

### Customer Channels & Product Management



**Channels Team** – Customer self select options will reduce traditional operations  
**Customer Proposition Team** – Propositions and policies evolve to mirror the way customers want to interact with banks through different channels  
**Product Innovation Team** – Extend designs towards self-select models

### Operations



Traditional operations models can be scaled back as customers are empowered to select their own products

### Product Catalog

Product catalog solutions provide a product innovation layer to design cross-product propositions breaking down the traditional systems silos

### Systems



Operations functions can be rationalised as customers select and design their own propositions. Product and Channel Management Teams will align more closely or even merge to focused on customers and less on individual products. Innovation Teams will increase focus on customer not product.

## Conclusion

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### **Open Banking should not be considered as an enemy by banks.**

The painful reality is that banks are facing unprecedented levels of change: competition from new entrants such as neo or digital only banks as well as traditional banks; customers demanding vastly improved experiences because they already get them elsewhere; Fintech's quickly developing a range of specialist solutions better adapted to certain parts of the value chain which has historically been the preserve of banks.

This was already happening before Open Banking. Banks, generally, constrained by both their legacy siloed technology and business models have struggled to frame these challenges into coherent and comprehensive future-looking digital ecosystems that are highly-adapted and flexible enough to meet their customers current and evolving needs.

That said, Fintech providers like us at Zafin, have for some time been able to offer banks off-the-shelf solutions already aligned with the direction of travel of Open Banking. Banks can use different combinations of these off-the-shelf solutions as the building blocks to accelerate implementation of successful digital capabilities. Indeed, we may be reaching a point where changing the business model and organisational culture will become a bigger change challenge than technology.

In the case of Zafin, we believe our solutions, built around a unified product catalog featuring dynamic, transaction and event-driven rate and price management capabilities will be a core building block for banks wishing to offer customer-centric, hyper-personalized products and services regardless of the channel, but especially digital. In our view, Open Banking will only accelerate such developments and increase the options available to banks.

Just as critically, Open Banking is likely to remove much of the uncertainty and doubts banks have faced in trying to work out the scope of, and how to implement and manage, their digital journeys. This has, perhaps, been a reason why, banks have been slow to capitalise on off-the-shelf solutions provided by FinTechs in the past.

Open Banking now provides a clearer pathway forward, and also provides a lens into the opportunities truly available for banks. The digital-leading banks of tomorrow are likely to be those that use the evolution and growth of global companies such as Amazon or Alibaba, built on API-driven product and service models as a blueprint for the future.

## Conclusion

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In this way, banks can evolve their digital models allowing them to offer digital financial marketplaces in which their own and other customers can participate. Those banks that choose to adopt Open APIs to provide single platforms through which customers can view all the financial products and services they maintain at different institutions, locally and even globally, will be able to extend the reach of 'own' customers significantly. By taking ownership of these financial marketplaces and the supporting ecosystem and its participants, banks can enhance their own financial products and make available 3rd party financial products and services extending their participation in the value chain even whilst offering a much improved and seamless customer experience. For banks that do this successfully, their marketplaces will become the single financial services platform of choice for their customers and enhance opportunities to attract customers from other financial institutions. Through the productisation of APIs, banks will be able to create new product and service streams, for which they will need to develop robust revenue models and billing capabilities to ensure they capitalise and fully realise the available opportunities.

We expect some banks will take the financial marketplace a step further towards a general marketplace in which they can offer financial and non-financial products and services across the entire value chain of customers' key lifecycle events, such as buying a home. Rather than simply offering a mortgage, banks will be able offer, and allow customers to select from, solutions for all the different events customers have to deal with when purchasing a home, such as home inspection, logistical services for moving and choosing utility providers.

Banks that wish to continue to survive and thrive must undertake these digital journeys. For those that do not, there will be plenty of players - existing and new - that will take up the challenge. And yes, it will be a challenge, but we believe Open Banking initiatives actually make it easier by providing a clearer framework for financial institutions to proceed. Technology innovation provided by FinTechs like us at Zafin is also providing a growing number of solutions and services to enable banks to move forward more quickly and more confidently.

## Open Banking

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### About Zafin

The Open Banking agenda was initially driven by Europe, through PSD2 for the European Union and Open Banking regulations in the UK. Increasing payments competition in a market dominated by a few big payment services providers (PSPs) and card schemes was a key objective of the EU. If you would like to know more about Zafin's product solutions please contact us at [zafin.com](http://zafin.com)

### About Microsoft

The Open Banking agenda was initially driven by Europe, through PSD2 for the European Union and Open Banking regulations in the UK. Increasing payments competition in a market dominated by a few big payment services providers (PSPs) and card schemes was a key objective of the EU. Learn more at [www.microsoft.com](http://www.microsoft.com)

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A Zafin Whitepaper in collaboration with Microsoft