

The Impact of Technology on New Business Models in Banking

A Deep Dive into Banking-as-a-Service and Embedded Finance



Foreword

As the provider of bLink, the leading open banking platform in Switzerland, SIX operates a reliable infrastructure that enables seamless connectivity and collaboration between banks and fintechs. We have a proven track record in enabling Open Banking use cases. With this white paper, we wish to look ahead and better understand the next phase of innovation in this dynamic space.

This white paper reflects our commitment to staying at the forefront of industry trends and understanding the impact of emerging technologies, regulatory changes and evolving business models. It provides valuable insights into the transformative power of banking-as-a-service and embedded finance.

Our intention with this white paper is to initiate a meaningful conversation with our customers and partners as we explore together the potential and opportunities beyond open banking. We aim to develop a clear path forward and leverage the insights from these business models to create value for our stakeholders, end customers, and the Swiss Financial Center.

We sincerely thank the author and contributors who generously shared their expertise and perspectives to create this white paper. We invite readers to join us on this exciting journey as we navigate the question of how these evolving business models will shape our market. We firmly believe that it is only by working together that we will be able to fully realize the true potential of embedded finance and banking-as-a-service and revolutionize the way financial services are delivered and experienced.

Join us as we pave the way for a future of innovation and transformation in the financial industry.

Sven Siat

Co-Head Connectivity & Data & Product Lead bLink, SIX



	Exe	cutive Summary	
2		nitions and Concepts Evolution of Banking Value Chain Open Banking Banking-as-a-Service Embedded Finance	6 6 7 9 11
	Case	e Studies: BaaS Offerings	14
4	Impact on the Banking Industry		19
Appendix			

1 Executive Summary

Digitalization has fundamentally changed the way financial services operate today. For example, e-banking and m-banking have become the new norm, most banks have launched mobile apps, back-office banking processes have moved from paper to the cloud, and emerging neobanks in Europe and super apps in Asia have captured significant market share.

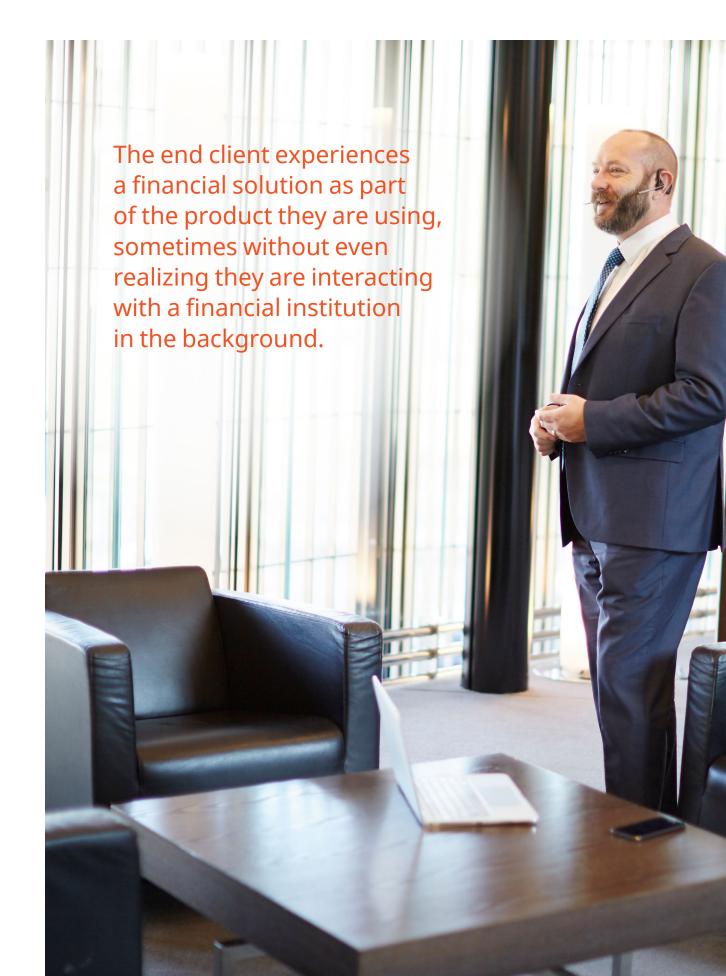
And while the digital transformation in finance is still a work in progress – for example, penetration in some sectors, such as SMEs, still lags significantly – digitalization across the financial industry is accelerating rapidly. The next phase is already here, with three major developments actively under way:

- First, over the past decade, we have seen a major transformation in financial infrastructure. Two fundamental drivers that have fueled this change are: (1) API connectivity and (2) better use of data, which have enabled a wide range of new data-driven applications, innovative business models and the rise of multi-party platforms. Most of these products and services would not have been possible to build without modern API technology that enables connectivity between banks and third parties. These processes are ongoing and will continue to shape the financial industry in the future.
- Second, building on the above changes and catalyzed by regulatory (e.g., PSD2 and similar regulations) and industry forces (e.g., disruption by fintechs), the formerly closed and integrated banking value chain is being transformed into components that can be sourced separately and combined with other financial and non-financial services. Selected banks have embraced the opportunities of a potentially new (financial) ecosystem. For example, some traditional financial institutions are willing to rethink their existing business models by offering their core capabilities to non-bank players. Similarly, some established tech companies, as well as emerging startups, have also recognized the potential and are starting to enter the financial space with brand new and legacy-free offerings, collaborating and sometimes competing with financial institutions.
- Finally, the line between financial and non-financial services is becoming blurred. Financial products and services can now be offered by non-financial brands and other third parties without their own banking license or

financial infrastructure and seamlessly integrated into any software. As a result, the end client experiences a financial solution as part of the product they are using, sometimes without even realizing they are interacting with a financial institution in the background. However, the regulatory responsibility remains with the financial institutions. This new setup presents both new opportunities and challenges for financial institutions, as it opens up new client channels, but also introduces new risks in terms of compliance, data security, etc.

In a very simplified manner, we will try to describe the three major developments mentioned above, namely open banking, Banking-as-a-Service (BaaS) and embedded finance. Much has been researched and reported on each of these, but sometimes, especially in the general press and in non-specialist circles, these terms are used interchangeably, often confused due to technical jargon or lack of clarity.

The purpose of this position paper is therefore to clarify these widely discussed terms, to define and explain their differences and similarities and to explain how they are interrelated. To better illustrate these trends, we present selected case studies that showcase a number of companies that have already built innovative business models around these trends. Most importantly, we attempt to explain the changes the banking industry is facing and draw lessons for the Swiss financial center to support its future competitiveness.

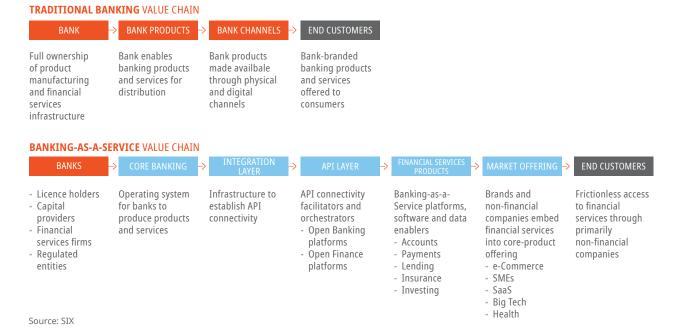


2 Definitions and Concepts

In this chapter, we will define all three concepts: open banking, Banking-as-a-Service and embedded finance, the driving forces behind them and explain the key benefits for clients.

2.1 Evolution of Banking Value Chain

Figure 1: Traditional banking value chain vs. BaaS value chain



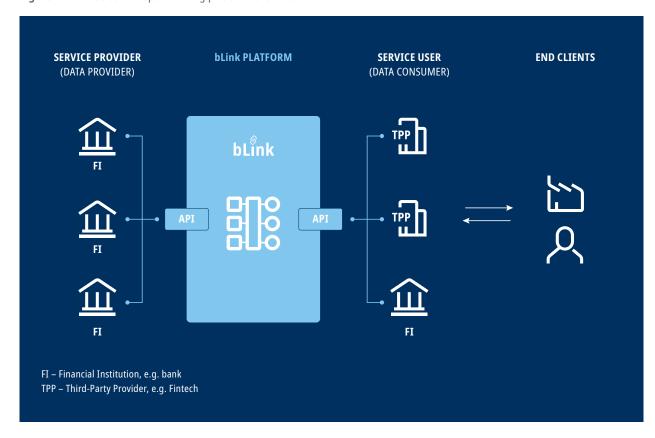
To understand the extent of the changes taking place in the banking industry, let us first look at the banking value chain. In the past, the banking value chain was fully integrated and closed to external parties. This means that banks developed their own software (or purchased it from vendors), did not share data and only rarely collaborated with third parties on banking-related initiatives. Client acquisition and the distribution of banking services were mainly driven by the bank itself.

The evolution that we are currently witnessing is fundamentally challenging this legacy setup. In the near future, the banking value chain will be transformed into a more open ecosystem where banks collaborate with third parties and distribute their services through new channels using innovative technologies. The end result will ultimately benefit end clients, as they will receive services with greater flexibility and potentially lower costs. This applies to corporate

clients (who can benefit from efficiencies such as the integration of multiple bank accounts into their accounting systems), private clients (who can benefit from attractive offers enabled by embedded finance such as buy now, pay later) and wealth clients (who can benefit from innovative fintech wealth services while keeping the custody of their assets with their trusted bank). Banks that adapt will gain reach and new revenue streams, while third parties will gain access to previously closed banking services that they can integrate into new offerings. On the other hand, the new banking value chain will be much more complex, both in terms of technology and counterparty interdependencies. As regulated entities, banks will need to ensure regulatory compliance and client data security, which will require new investments. As a result, state-of-the-art IT infrastructure, efficient banking processes and synergies within the value chain will continue to be indispensable in the future.

2.2 Open Banking

Figure 2: bLink as central open banking platform for Switzerland



Source: SIX

What is open banking?

Open banking is a practice that provides third-party service users with open access to client banking, transaction and other financial data from banks and non-bank financial institutions through the use of technology called application programming interfaces (APIs). APIs are standardized sets of instructions that link two pieces of software together to facilitate the exchange of messages or data.

In open banking, this technology acts as a gateway between companies, customers and banks. The banks and third parties establish the connection, but the consumer always decides what data to share and with whom. This newly established connectivity between different parties can act as a catalyst for innovation, with the potential to deliver better solutions to clients and reshape the banking industry, as we will demonstrate in the next chapter. The

complexity of this new setup is also increasing, making sound risk management, IT security and reliable compliance processes even more critical. New players, such as fintechs, need to meet the high standards of the banking industry and banks need to adapt to new risks as well.

Open banking is the first step in creating connectivity between banks and third parties. The concept naturally follows a path from banking to a wider range of financial services – towards open finance. Ultimately, this connectivity does not need to be limited to the financial sector and can go beyond it – towards open data between different industries.

What are the driving forces behind open banking?

In the EU, open banking has been clearly driven by regulation, which requires banks to open up their data to third

¹ Adapted from Investopedia's open banking definition

Open banking is democratizing financial services by placing consumers at the centre of where and how their data is used to provide the services they need."

- Jim Wadsworth

Senior Vice President for Open Banking, Mastercard²

parties (namely the EU's PSD2 directive which was introduced in 2018). In Switzerland, the approach has so far been industry-led: participation remains voluntary for the time being, although the regulator is determined to support the success of open banking through future intervention if necessary.³ SIX has created the API-based platform bLink in 2020 to drive open banking in Switzerland and aims to further facilitate collaboration between banks and third parties by providing a central, secure and reliable legal and technological framework.

What are the key benefits of open banking?

By enabling the sharing of customer data, open banking is creating a new era of flexibility and choice for consumers, but it is also increasing competition between providers. In the past, banking data was proprietary to each bank and rarely shared outside the bank or enhanced by the bank itself. Open banking now provides standardized data in automated processes and enables third parties to use this data to create new and attractive services for clients. One example is a multi-banking product that aggregates users' bank accounts through a single interface and allows users to act on this aggregated data through this single interface.

Banks can also benefit from open banking by changing their approach from being locked into customer data (which are often not used to their full potential) to being open to innovation through collaboration. For example, on the corporate side, a bank that already shares the account data of a corporate client with a corporate reporting firm could also draw digitalized financial statements from the same firm to offer liquidity management solutions to the joint corporate client (in which case the bank becomes a user of the open banking data). On the retail side, in another example, a bank could create asset-backed or collateral solutions that link third pillar assets from another financial institution.

² See Mastercard Open Banking Report

See www.sif.admin.ch/sif/en/home/documentation/press-releases/medienmitteilungen.msg-id-92275.html

2.3 Banking-as-a-Service

Banking-as-a-Service is a clear opportunity for financial institutions to capture new revenue growth at a low cost."

- Oliver Wyman Report, 20214

What is Banking-as-a-Service (BaaS)?

In simplified terms, if open banking provides access to data, then BaaS provides access to functionality. BaaS represents a suite of financial services that can be integrated and delivered as a service to customers. There are three to four critical parties in the BaaS ecosystem⁵:

- The BaaS provider (e.g., a bank such as Solarisbank) is a regulated entity that operates the financial services and makes them available to third parties via APIs. BaaS providers are banks themselves.
- The BaaS partner (optional) (e.g., a fintech platform such as Stripe) is a client of the BaaS provider and acts as a distributor that integrates the financial services into its own platform. BaaS partners are often fintech companies that have the required technology but lack the regulatory licenses of a bank. A BaaS partner is an optional party, as this function can also be performed by a BaaS provider itself if it has the required technology at its disposal.
- The BaaS user (e.g., a non-financial company such as Samsung) is a brand that uses the BaaS partner to integrate the financial services into its core product. The brand's end clients may or may not be aware that they are using a financial service as a BaaS product. Both the BaaS User (direct relationship with the end client) and the BaaS Provider (regulatory requirement for the banking relationship) have access to the end-client data.
- The End client of the BaaS user (e.g., a Samsung customer) is the ultimate end client who that consumes the BaaS user's core services (e.g., a mobile phone with pre-installed Samsung Pay) and can now take advantage of the financial services enabled by BaaS without leaving the BaaS user interface.

This integration of financial services enables any eligible company, from a fintech startup to an established platform, to embed the financial services traditionally offered by a bank – such as bank accounts, debit and credit cards, and loans – directly into an existing software product. End clients can hold funds, pay bills, manage cash flow and access financing directly via the non-banking platform they have first come to know and trust for other services.⁶

A non-financial company can thus distribute financial products under its own brand, so that the customer has the

⁴ A quote from Oliver Wyman's article: The Rise of Banking As A Service

⁵ Adapted from Goldman Sachs' article: The Embedded Finance Journey

⁶ Stripe's BaaS product guide: Introduction to Banking-as-a-Service for software platforms

seamless experience of buying a product from that brand, but the financial product is actually provided by a financial institution in the background. As a result, the end-client relationship becomes twofold: on the one hand, directly with the BaaS user (which governs commercial issues such as end-client pricing) and on the other, with the BaaS provider's financial institution in the background (which governs regulatory aspects such as bank account management). In difficult situations, such as during a financial crisis, the soundness of the BaaS provider is of critical importance, as this is where the client's assets are ultimately held. For this reason, end clients might wish to carefully review the terms and conditions of their embedded financial service and be aware of who their BaaS provider is.

What are the driving forces behind the rise of BaaS?

The efficient delivery of banking services through digital channels to non-bank third parties would not be possible without the appropriate technology and the acceptance of a new regulatory framework. We can therefore identify technological innovation and a favorable regulatory environment as two key enabling factors that together have contributed to the rise of BaaS.

On the technology side, the shift began with software providers moving to Software-as-a-Service (SaaS). This was made possible by the availability of broadband Internet with higher network performance, coupled with the development of modern API technology and the proliferation of cloud computing. SaaS enabled the creation of new business models and changed the way in which IT solutions are developed and marketed. Companies were able to focus their resources on their comparative advantages while consuming best-in-class building blocks from other providers in the form of SaaS (for example, Uber was able to source map data and route calculations from Google via API and focus on building its ride processing engine and booking user interface). The same "Lego brick" approach is now being used in BaaS, but instead of pieces of software, BaaS provides access to entire parts of the banking services value chain.8

On the regulatory side, the 2008 financial crisis prompted governments to level the playing field and create an arena for new innovative companies to participate in the financial services industry. Open banking regulations, such as the EU's PSD2 directive, mandated the opening up of access to banking data. A fintech could now build its own interfaces and solutions while sourcing data from different banks.

However, with BaaS, even a company without such fintech capabilities can now offer financial services to its clients, significantly lowering the barriers to entry for providing banking services to end clients. Importantly, with BaaS, the know-your-customer (KYC) and banking fiduciary obligations remain with the BaaS provider – thus the regulated entity is the same as if the BaaS provider offered banking services directly. It would be inconsistent for regulators to, on the one hand, mandate the opening of banking interfaces while prohibiting banks from providing BaaS services.

With the technology available and a favorable regulatory environment granted, new business models emerged. New players were given the opportunity to offer financial services via BaaS without having to build their own financial infrastructure and obtain a banking license, both of which are costly and complex to implement and maintain.

What are the key benefits of BaaS? Why are fintechs and banks attracted to it?

As BaaS providers, banks can benefit in two main ways. First, they create new revenue sources by directly monetizing their platform and services as a BaaS provider. At the same time, they also benefit from increased reach through new distribution channels of their BaaS user partners (traditional customer acquisition is rather expensive for banks). This expansion can also include new segments and geographies if the BaaS provider is licensed accordingly. This creates a win-win situation for the participating banks.

Fintechs or other BaaS partners gain access to banking functionality without having to develop or operate it themselves. The total cost of ownership of the systems and processes required for banking products would be prohibitively expensive for these companies if they had to develop them in-house. BaaS solves this problem for them. In addition, the BaaS provider handles the compliance issues associated with a banking license while the fintech company can focus on managing the front-end software layer, customer acquisition and servicing. The value that BaaS providers offer their clients in the area of compliance cannot be underestimated – if managed on their own, BaaS users would have to maintain an entire compliance infrastructure, be subject to regulatory scrutiny, a recurring licensing process and bear the financial and other risks of potential breaches.

As a result, BaaS is expanding rapidly – in the U.S., there are already more than 90 banks acting as BaaS providers.⁹

⁷ Oliver Wyman: The Rise of Banking As A Service

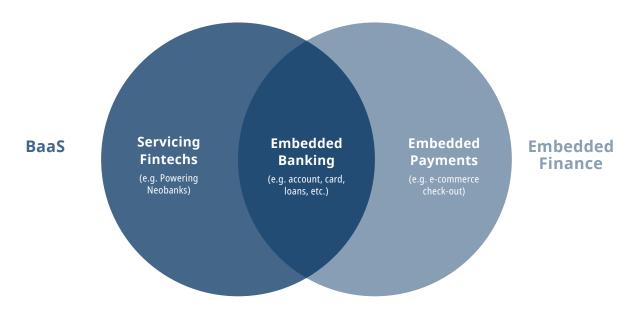
⁸ Goldman Sachs's article: The Embedded Finance Journey

⁹ a16z articles: Partner Bank Compliance and the Impact on Fintech / The Partner Bank Boom | Future

They enable banking services for many prominent BaaS users such as Uber, Shopify, Google Pay, etc. In Switzerland, BaaS has not yet been embraced by banks, with the notable exception of Hypothekarbank Lenzburg. As we will demonstrate in the following case study, this bank has seized the opportunity and entered the space by offering a fully developed BaaS suite. For example, it powers the rapidly growing Swiss neobank, neon, and an investment app called Findependent. Although it started out as a smaller regional bank, thanks to BaaS, Hypothekarbank Lenzburg has managed to acquire many new clients outside of its traditional reach (e.g., from other regions and different demographics, such as millennials) through its BaaS users.

2.4 Embedded Finance

Figure 3: Simplified illustration of BaaS and embedded finance



Source: SIX

What is embedded finance?

Embedded finance is a term used to describe the offering of financial services to customers by a non-financial service provider – for example, bank accounts, lending, buy now, pay later, insurance, investments, payment processing, and more. While BaaS can be viewed as the "how" – the infrastructure that enables a company to offer financial services without having own financial technology or regulatory licenses – embedded finance is the "what" – the financial offering that brands can use in addition to their core products.

As shown in the figure above, there is an intersection between BaaS and embedded finance. We can distinguish between use cases where BaaS users act as banks themselves (e.g., neobanks) and other use cases where BaaS features are not required (e.g., e-commerce payment processing as provided by Stripe's payments business without using BaaS). For banks, the most relevant area of embedded finance is at this intersection with BaaS – for example, for embedded bank accounts, loans, etc. (e.g., a use case where Uber offers debit accounts and loans to drivers).

Any company that wants to invest in user loyalty and user experience should focus on financial services integration."

Roland Folz
 CEO Solarisbank¹⁰

Embedded finance is designed to streamline the end-client experience by making it easier for them to access a range of financial services they need when they need them. Without having to leave an app or a service, the customer can take advantage of embedded financial features, sometimes without even realizing that they are also indirectly interacting with a financial institution. As mentioned above, the relationship between the end client and the BaaS provider's financial institution becomes indirect but is still of great importance due to regulatory and liability reasons (e.g., deposit security).

What are the driving forces behind embedded finance?

Although some financial services have already been sold to customers by third parties for years through white-label solutions and strategic partnerships with banks (e.g., airlines selling insurance, card dealers selling loans, retailers selling credit cards, etc.), it has now become possible for virtually any company to do so. This trend, which we refer to as "embedded finance", has a number of characteristics that distinguish it from the old way of "embedding" financial services.

- Firstly, on the demand side, changing consumer behaviors and preferences have fueled the growth of digitalization and e-commerce. Customers are increasingly moving online for convenience and superior experiences, and the pandemic has only accelerated this trend. Brands are incentivizing customers by offering a smooth customer journey and multiple payment options in order to achieve higher sales conversion (e.g., Klarna's pitch to merchants is the increase in both sales and order value thanks to the integrated installment option).¹¹ At the same time, the rise of tech companies with their slick user interfaces has accustomed us to the availability of world-class digital products and services. However, in the traditional banking world, the customer experience still largely lags behind consumer expectations.
- Until a few years ago, integrating third-party financial services required significant investments in resources, time, and technology development. Today, modern API technology facilitates the connectivity between different pieces of software in an easy plug-and-play fashion. This has dramatically lowered the barriers to entry, and open banking can be seen as a precursor to this trend.
- Thirdly, building on API technology, BaaS has emerged on the supply side to bring comprehensive financial services to the customer journey and offer new business

¹⁰ BBVA article: What Is Embedded Finance & How Is It Revolutionizing Financial Services

¹¹ For more details, please see www.klarna.com

models for banks and other BaaS partners. This is creating a new market for accessible B2B (business-to-business) financial infrastructure. Fintechs or other BaaS users can now access these services to provide embedded finance solutions to their end clients.

What are the key benefits of embedded finance?
Why are brands attracted to it?

End clients (as clients of non-financial companies): The key selling point of embedded finance for the end clients is convenience. For instance, in the case of e-commerce, customers have a frictionless, faster and easier shopping experience when banking transactions are available when and where they need them. As another example, whereas in the past consumers had to go to a physical bank branch to apply for a loan in order to make a large purchase, with embedded finance they can make a purchase and obtain a loan all in one place, i.e., at the point of sale (see, for example, Amazon's point-of-sale lending or Klarna's buy now, pay later solutions 12).

Brands (as embedded finance users): Now let's look at how embedded finance helps brands boost their top line by encouraging customers to use *more* of their product, or to have them use it for a longer period of time. Consider a modern SaaS company that has a solid product and is outperforming existing competitors. The company needs to continue to grow and expand. In addition to investing more in the development of its original product, the next opportunity, which is rather novel, is to add financial services to its offering.¹³

Companies that embed financial services such as payment processing, accounts, branded credit or debit cards, loans and more, create a convenient one-stop shop for consumers with an uninterrupted customer journey. Consumers no longer have to go elsewhere for financial services and they are tied to the brand. This in turn strengthens brand loyalty, drives incremental sales and increases the likelihood that brands will be able to reduce their customer churn rate.

By adding financial services, non-financial companies can create entirely new revenue streams. For example, Stripe estimates that SaaS companies can increase their revenue by two to five times with embedded finance (due to high margins from reselling financial products and opening up new addressable markets).¹⁴ Embedded finance can

also increase customer satisfaction, as consumers will no longer have to deal with the lengthy and cumbersome experiences offered by traditional banks and financial institutions, which are well-known for being difficult to access, inconvenient and costly.¹⁵

While wallets, payments and lending are common examples of embedded finance, the possibilities for innovation in the broader financial ecosystem are endless. For example, payments and investing can be combined in the same process (an interesting example is provided by a Swiss startup, Kaspar&, which offers to automatically invest round-up values from card payments in selected ETF portfolios). ¹⁶

¹² Forbes article: Embedded Finance: What It Is And How To Get It Right

¹³ Goldman Sachs article: The Embedded Finance Journey: Innovation That Differentiates the Customer Experience

¹⁴ Stripe guide: Introduction to Banking-as-a-Service

¹⁵ Future a16z article: Fintech Scales Vertical SaaS

¹⁶ For further details, please see: www.kasparund.ch

3 Case Studies: BaaS Offerings

There are many players in the BaaS ecosystem. Emerging BaaS providers such as Solarisbank are now enabling businesses to enter the financial services market with easy access to the global financial infrastructure. In addition, established fintech companies like Stripe are also seizing the opportunity by complementing their fintech product suite with the launch of BaaS offerings. There is no doubt that the market is moving very fast. There are also several examples of incumbent banks, such as Goldman Sachs, entering the space alongside their core business. The players in the open banking space, such as API providers like Tink and Plaid, are equally well equipped to find a place within this evolving value chain. Needless to say, the sector has become one of the favorite segments for VC (venture capital) investments (doubling in 2021 to USD 6.7 billion from 2020 for Europe and North America), 17 and the funding support is expected to continue, albeit with more scrutiny and higher requirements than in the past.

In this chapter, we examine three specific case studies that describe how different types of institutions are seizing this opportunity (with some additional examples included in the appendix):

CASE 1: Emerging bank with modern infrastructure using BaaS as core business

CASE 2: Traditional bank introducing BaaS to diversify its core business

CASE 3: Established fintech offering BaaS in addition to its core business

¹⁷ Source: www.finchcapital.com/post/the-rise-of-embedded-finance

CASE 1

SOLARISBANK

Emerging bank with modern infrastructure leveraging BaaS as core business

Company overview. Solarisbank is a German technology company with a full banking license. Solarisbank is a true BaaS company with its core offering being a BaaS platform. Solarisbank was launched in 2015 as part of finleap, a fintech startup builder, and officially founded in March 2016 by Andreas Bittner and Marko Wenthin. Over the past six years, Solarisbank has grown tremendously, serving 50 clients covering two million retail accounts. They have raised approximately EUR 385 million from investors including UniCredit Group, SoftBank, SBI Group, BBVA, Visa and ABN ARMO. The company reached unicorn status in 2021 and was valued at EUR 1.2 billion during its Series D funding round. It is headquartered in Berlin and has 750 employees located across Europe and India.



BAAS OFFERING

Solarisbank's BaaS platform enables brands to embed a variety of fully licensed financial products and services into their core value proposition. The platform is a suite of fully customizable and modular APIs with over 450 API endpoints. Solarisbank's BaaS platform is divided into four product areas: Digital Banking and Cards, Lending, Know Your Customer (KYC) and Digital Assets. Solarisbank's partners can choose which APIs to connect to based on their specific needs.



VALUE PROPOSITION – BANKING TECH REIMAGINED

Firstly, Solarisbank's BaaS platforms are built on cutting-edge technology. It has some of the most advanced APIs in the European market which are designed for scalability and international expansion. Secondly, its entire banking infrastructure is *cloudbased*. This allows Solarisbank to create an exceptional banking experience for its customers. Thirdly, through Solaris's APIs, brands can easily manage their customers' user data in real time throughout the entire customer lifecycle: from onboarding to long-term support. Fourth, the platform features a state-of-the-art data mesh architecture to leverage critical data for decision making, planning, forecasting and regulatory compliance. ¹⁸



Customer stories. Here, we present an example of Solarisbank's clients using its BaaS platform. The first example is Vivid Money, a digital banking company headquartered in Berlin, Germany. Vivid Money is one of the most dynamic challenger banks in Europe. The platform was launched in 2020 and now serves 500,000 banking customers in Germany, France, Spain, and Italy. Vivid Money's banking platform was built on top of Solarisbank's Banking-as-a-Service platform and utilizes APIs such as the Digital Banking API, the Cards API and various lending APIs. Vivid Money does not have its own banking license and relies on Solarisbank's banking license (which manages the regulatory aspects such as KYC). Through Solarisbank's BaaS APIs, Vivid Money can offer its customers banking features such as digital bank accounts with overdraft, instant payments, credit, and debit cards and buy now, pay later options.¹⁹

¹⁸ Source: Solarisbank.com

¹⁹ Source: www.vivid.money/en-eu/about

CASE 2

HYPOTHEKARBANK LENZBURG

Traditional bank introducing BaaS to diversify its core business

Company overview. Hypothekarbank Lenzburg ("Hypi") has its roots in the Lenzburg region, Canton of Aargau, Switzerland. What originally started out as a bank aimed at providing mortgages for the Lenzburg region has evolved into what is today a regionally active universal bank with more than 300 employees and a significant BaaS business. Outside of its regional home market, Hypi is probably best known for its Banking-as-a-Service platform, Finstar Open Platform ("Finstar").²⁰ The bank's growth led to it going public on the Swiss Stock Exchange in 1995, where it is currently traded as part of the Swiss Performance Index. Being a smaller-sized bank creating a new market serving fintech players that have yet to become profitable, Hypi's share price does not reflect these developments (its share price has underperformed the SPI since 2017).

FINSTAR PLATFORM

Finstar's roots date back to 2003, when Hypi began developing its own core banking system, which over time evolved into today's BaaS offering. From the beginning, Finstar was intended to be offered to third parties, a move likely intended to counteract the limited growth potential in Hypi's home market (in 2000, Lenzburg had a population of around 7,500). By 2008, four banks had already signed on to Finstar, a number that had grown to more than a dozen at the time of this writing.²¹ In 2017, Hypi introduced its Open API layer, transforming Finstar from just another core banking system into Switzerland's first BaaS platform. Hypi achieved this in four months by leveraging the platform of German fintech and open finance specialist NDGIT and connecting it to its own core banking software. This combination of a modular banking IT platform and APIs allows Hypi to offer a comprehensive set of BaaS features.²²



Finstar consists of three layers: financial kernel,
Finstar features and open banking API layer. The financial kernel is
responsible for all activities related to the operation of a financial
institution (accounting, controlling, client data, regulation, etc.).
The Finstar features layer provides modules for payments, financing, and investments. The open banking API layer then allows third
parties to easily connect and integrate with the other layers via
APIs. These APIs cover a range of functions from digital onboarding,
card management, personal finance management and payment
initiation to account access features, among others.²³



Clients. Several Swiss fintechs such as neon, Kaspar& and Yokoy have already chosen Finstar as their preferred platform. The most prominent client is neon. Neon outsources almost the entire banking value chain to Hypi and Finstar. It does not have a banking or fintech license and its customers are in fact Hypi banking customers. Neon, in turn, focuses on developing the app-based front end and sourcing solutions for an ecosystem ranging from insurance to e-commerce. Since neon covers all customer touch points, its customers hardly ever interact directly with Hypi. The collaboration is generally considered a win-win as neon has approximately 150,000 users and thus Hypi generates more account openings from neon customers than from direct, local Hypi clients.²⁴ Commercially, part of Hypi's business is tied to the success of its BaaS user customers who have yet to prove that they can create sustainable business models. In any case, Hypi has already succeeded in diversifying its business with even more upside potential.

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 $^{20 \}quad Source: www.hbl.ch/media/2xecpmi3/2022_gb_lagebericht_geschaeftspolitik_nachhaltigkeit.pdf$

²¹ www.finstar.ch

²² Source: https://ndgit.com/en/ndgit-neon-cooperation-account-app-api-technology

²³ Source: www.finstar.ch/en/products

²⁴ Source: https://ndgit.com/en/ndgit-neon-cooperation-account-app-api-technology/; SIX research

CASE 3 STRIPE

Established Fintech offering BaaS in addition to their core business

Company overview. Stripe is a privately held financial services SaaS company with dual headquarters in San Francisco and Dublin. The company was founded in 2009 by two brothers, John, and Patrick Collison. Their original goal was to create an alternative to PayPal. They wanted to create an online payment platform that would improve the efficiency and connectivity between e-commerce stores and payment processors. They seem to have succeeded, as Stripe has become a giant in online payments with the company processing over USD 600 billion p.a. through its payments infrastructure. Stripe is considered one of the world's most valuable private fintechs, and at the end of the first quarter 2023, the company was valued at USD 50 billion, despite a sharp drop in valuation. Stripe has categorized its products into three distinct product areas: a global payments platform, a revenue and financial management platform, and a Banking-as-a-Service platform. Currently, Stripe has 8,000 employees in 25 offices around the world and offers its services in 45 countries. Currently, Stripe has 8,000 employees in 25 offices around the world and offers



EXPANDING INTO BAAS

In recent years, Stripe has begun to diversify and expand its product offerings by developing products that enable embedded finance through its new BaaS platform "Stripe Treasury". It launched the platform in 2020 by partnering with banks such as Goldman Sachs, Evolve Bank & Trust, Citibank N.A. and Barclays (as Stripe is not a bank and does not hold a banking license). These partnerships provide new and existing Stripe customers with standardized access via APIs to the financial services and banking products offered by Stripe's network of banking partners. Stripe built the BaaS API in house, and the platform facilitates the connection between Stripe's BaaS customers and the BaaS infrastructure and banking products provided by their banking partners.²⁷



PRODUCT OFFERING

Currently, Stripe offers four products within its BaaS product area, ranging from payment solutions for platforms and marketplaces, business financing, interest-earning bank accounts to debit and credit cards. Because the APIs are customizable, Stripe's customers are able to build financial and banking products that are tailored to their consumer bases. These partnerships are mutually beneficial – the underlying banks have the potential to generate new revenue streams and acquire new customers at a surprisingly low acquisition cost. For example, an estimated 2.5 million merchants in the U.S. use Shopify Balance, which is powered by Stripe Treasury. This partnership between Stripe and Shopify²⁸ gives Spotify's banking partner, Evolve Bank & Trust, access to 2.5 million potential new banking customers.²⁹



BAAS Partner. If we compare Stripe's role in the BaaS value chain to Solarisbank and Hypi, we can clearly see that Stripe is taking on the role of a BaaS partner. While Solarisbank and Hypi are licensed banks and have developed or sourced all of their banking capabilities in house, Stripe relies on external banking partners to complement its BaaS offering (based on its technology and payment processing assets) with certain banking services (e.g., related to the provision of bank accounts etc.).

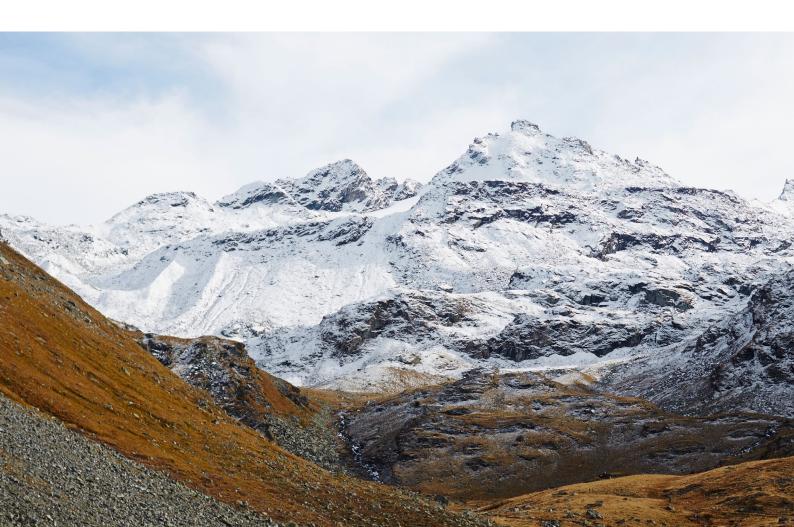
- 25 Source: www.reuters.com/technology/fintech-stripe-valued-50-bln-after-65-bln-fundraise-2023-03-15
- 26 Source: https://stripe.com/en-ch
- 27 Adapted from TechCrunch article on Stripe Treasury
- 28 Please refer to the appendix for more details on Stripe powering Shopify.
- 29 Stripe Treasury powers Shopify Balance

OTHERS

OPEN BANKING PROVIDERS

Fintechs operating in the open banking space may expand into BaaS

Following the implementation of PSD2 in Europe, open banking gives bank customers the right to access their bank accounts and initiate payments through third-party providers such as Tink, Plaid and others. Over the past few years, these players have been building connectivity capabilities to open up access to financial data (as well as additional services). They are well positioned to capitalize on the embedded finance trend and continue to build their capabilities to expand their role along the value chain and connect data with services in the future.



4 Impact on the Banking Industry

BaaS users can diversify their products or services and create new monetization channels that are well aligned with customer journeys. For example, B2B software companies can leverage their real-time customer data and offer relevant financial features even before the customer knows they need them (e.g., a recruiting software can detect a significant increase in headcount in the customer's organization and offer a compensation-related product). And it's not just software companies – there are growth opportunities for many companies. Many businesses are under pressure to go digital and are looking for new ways to generate revenue. Offering embedded payments can help improve the customer experience, sales conversion, and thus overall revenue.

The role of incumbent financial institutions may not seem as clear, but there are several reasons why banks should consider strategic moves into this space. Firstly, the expected market size for embedded finance products is estimated to grow rapidly and could reach USD 7 trillion by 2030³⁰.

In Europe, it is expected to account for 15% of the future financial services revenue pool, according to PwC estimates³¹. Secondly, as banks' bottom lines come under increasing competitive and regulatory pressure, embedded finance offers an attractive opportunity to attract new clients and create new revenue sources.

What are the implications for banking business models?

Embedded finance and related trends can be seen as both an opportunity and a threat to incumbent banks. Ultimately, it is clear that solutions that deliver the most value to end clients will prevail. Maintaining a closed, integrated banking model is not a viable medium-term strategy for any bank. Open banking is already a reality, and its adoption will grow over time as the number of open banking products and their end-user benefits continue to grow, which in turn will attract more bank customers (in other words, through network effects). The same applies to BaaS and embedded finance. Incumbent banks will need to adapt to this reality.³²

Changes in the banking industry are very dynamic and difficult to predict accurately. However, we can still attempt to outline some principles that will shape the banking business models of the future:

- The first principle is the increasing openness of the banking business. As indicated at the very beginning of this paper (Figure 1), the future banking value chain will be more open and shaped by more parties than just banks. More openness brings more opportunities, but also risks. For example, if a bank decides to become a BaaS provider, it will reach new customers which will open up new revenue sources. These opportunities will multiply when the bank's services are offered to a larger number of partners, for example through a marketplace. This is shown on the vertical axis of Figure 4 (next page).
- The second principle is the nature of this openness.
 Collaboration between banks and third parties usually starts with data, because data is also the foundation of



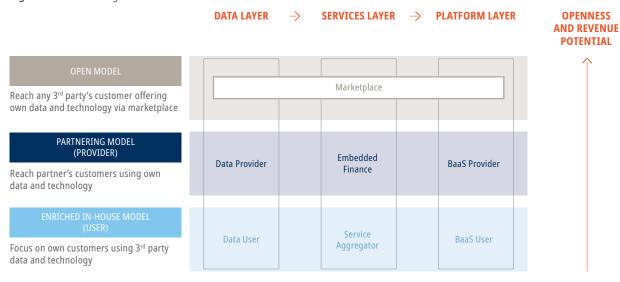
³⁰ PYMNTS article "Embedded Finance Will Reach a \$7T Value Globally in the Next 10 Years"

³¹ Strategy& article "2022 Retail Banking Monitor: Repositioning for embedded finance"

³² For additional thoughts on open banking strategies, please see an article by Matthias Biel API Strategies for Banks and FinTechs in an Open Banking World - APIscene and a blogpost by Tink Emerging open banking strategies | Tink blog

all services. Data sharing is also reciprocal – it is hard to imagine requesting data from a third party and at the same time refusing to share data with that third party. A bank that is already exchanging data with a third party will of course have the opportunity to cooperate in terms of services. This can go both ways: a bank can integrate services from fintechs and other third parties into its own offering, or it can venture into becoming an embedded financial services provider. The most advanced open model is the sharing of the full range of services as a full BaaS platform provider. This is shown on the horizontal axis of Figure 4 below.

Figure 4: New banking business models



Source: SIX

Based on these principles, we can identify three distinct business models:

- In an enriched in-house model, banks that wish to focus on better serving existing customers can become users of third-party data and services. They would position themselves in the user role, using technology provided by others. The degree of openness begins with the sourcing of data (e.g., enriched transaction data) and continues with the use of services (e.g., analytics or specialized services such as investments). At the extreme, a bank could decide to outsource its banking technology completely and become a BaaS user focused solely on advising customers.
- In a partnering model, banks that have a more advanced technology platform can share their technology with third parties, become their partners, and thus reach new clients. They become a banking technology provider. The degree of openness can start with data (e.g., with

premium, paid APIs) and continue through modular financial offerings in embedded finance to a full BaaS provider. Ultimately, due to competitive forces, only a small number of BaaS providers will succeed due to the effects of economies of scale.

- In an open model, banks may wish to distribute their services not only through selected partners, but also offer them to a broader set of potential clients, for example through a marketplace. In this case, the relationship with B2B clients would shift from direct (as seen in the partnering model) to indirect through the marketplace. This model could potentially have the greatest impact, depending on the reach of the marketplace. It also presents new challenges, such as the influence and bargaining power of such a marketplace. Similar to BaaS providers, only the most successful players would succeed in such a model, as the level of competition and transparency in such a setup is extremely high.

Every bank should ask itself a number of questions, such as: What type of business model is the right fit for us and our end clients? Can we use our existing technology, or do we need to completely rethink it? Do we want to work with partners and how far do we want to go? Do we have the capabilities to do embedded finance? How do we manage new risks? etc.

For some banks, these changes in their business model will mean a transformation from a closed, integrated ecosystem to a software business with a banking license. Such a big step requires organizational transformation, strong software development capabilities and an entrepreneurial spirit – qualities that have so far been more commonly associated with tech companies rather than with banks. In addition, incumbents must accomplish this transformation while still wearing a very tight regulatory corset, a disadvantage often not shared by nimbler Fintechs and TechFins.

The core value proposition of banking, such as the provision of bank accounts and loans, remains essential. However, service quality and the ability to deliver these services efficiently will gain importance. For example, in a BaaS world, any BaaS user can theoretically indirectly offer bank accounts and other banking services. To compete, banks will need to improve quality, offer unique selling propositions and/or become BaaS providers themselves. In order to do this, they may need to collaborate with external parties and/or create new economies of scale, for example in the form of shared central infrastructure elements (in compliance with applicable competition law).

How will this affect the Swiss banking industry?

As we have seen, technology will play an even more important role in banking in the medium term than it does today. A small number of Swiss banks with either significant resources and/or a well-designed platform will be able to expand their offering to become BaaS providers (as mentioned, there is currently only one Swiss BaaS provider - Hypi Lenzburg). For the rest, a variation of the enriched in-house model could help improve their offering and competitiveness. However, for a large number of banks, the question of maintaining their technology platform will eventually have to be considered from a new angle, i.e., becoming a user of BaaS technology. Most Swiss banks are already quite dependent on their IT technology providers (and often also on outsourcing providers such as service bureaus) and de facto no longer run their banking platforms themselves. Further transformation is likely in this area as the demand for modular service platforms and interoperability changes the overall dynamics.

From the perspective of the Swiss financial center, SIX, as the central infrastructure provider, is well positioned to support Swiss banks in this transformation. Starting with the data layer, bLink is perfectly suited to act as a centralized data exchange platform. In the future, this exchange of data can be extended to a marketplace for services. A precedent exists in Luxembourg, where the local open banking platform has already launched such a marketplace. A locally operated and Swiss-regulated marketplace offers many advantages for all participants and would benefit the Swiss financial center.

Finally, also the question of the technological efficiency of Swiss banking will also have to be answered by the industry and its participants. SIX already provides certain key services (such as the interbank clearing and settlement platform SIC), but the overall value chain remains highly fragmented. SIX looks forward to partnering with banks and other players to improve the competitiveness of the Swiss financial center and may offer new and enhanced services in the future to further support this endeavor.

Appendix

In the Appendix, we provide selected examples of how different players use the concepts presented to offer concrete commercial solutions for customers. With Shopify, we look at an example of embedded finance and with Samsung Pay at BaaS from the perspective of a BaaS user. Deutsche Bank's premium API model is a good example of how a bank can turn regulatory developments into a commercial opportunity. The transformation of Goldman Sachs' transaction banking division into a BaaS provider shows how a large bank can build on its existing assets and adapt to changing market dynamics. Finally, we revisit the New Banking Business Models and provide real-world examples to better illustrate the concept.



Shopify *Example of Embedded Finance*

Shopify is a first mover and a great example of how a brand can embrace fintech by adding financial capabilities to enhance its core product, an e-commerce platform. The company first began using embedded finance in 2016, when it launched Shopify Capital, a business financing solution for Shopify merchants. The loans are made available to merchants through Shopify on behalf of its banking partner, WebBank. Later in 2020, Shopify further expanded its embedded financing offering with the launch of two products powered by BaaS technology, Shopify Balance and Shop Pay Instalments. Shopify Balance is Shopify's business bank account solution for Shopify merchants. The bank accounts have the same functionality as an account at a traditional bank, but also

feature tailor-made solutions for Shopify merchants, with features such as zero fees, early payout requests and branded debit cards with various cash-back incentives. Shopify Balance is powered by Stripe and bank accounts are provided by Stripe's banking partners, Evolve Bank & Trust, and Celtic Bank. Shop Pay Instalments is Shopify's buy now, pay later payment solution that merchants can enable for their e-commerce stores in partnership with Affirm. These products create new opportunities for Shopify to generate additional revenue from its merchants. To illustrate, in 2021, Shopify reported a 62% increase in merchant solutions revenue compared to 2020 (total revenue from this segment was USD 3.2 billion).³³



Samsung Pay

Example of Solarisbank's BaaS User

In 2020, Samsung faced significant challenges in launching Samsung Pay in Germany. Prior to its expansion into Germany, Samsung Pay was already operating in 26 countries, which was made possible by working with a large number of banks in each market. The main challenges Samsung faced in Germany were a highly fragmented banking market, an overly optimistic goal of becoming part of the payment/card product value chain, and the lack of credit card usage in the German market. Samsung sought alternative solutions and ultimately decided to work with both Solarisbank and Visa to develop a solution for the German market.³⁴ Using Solarisbank's Cards and BankIdent APIs, Samsung was

able to create a virtual debit card that resides within the Samsung Pay app and can be linked to almost any German bank account. Samsung was now able to bring the mobile payment experience to German customers. Samsung relies on Solarisbank to operate the payment infrastructure behind the scenes and to enable the connections between the app and the consumers' banks. Samsung also uses Solarisbank's BankIdent API to verify the identity of Samsung's customers and also uses the Splitpay API to enable installment payments. The Splitpay API allows Samsung Pay customers to convert payments over EUR 100 into installments, which are to be repaid over a period of up to 24 months.

³³ Source: Shopify's 2021 financial results

³⁴ Source: www.solarisgroup.com/de/case-studies/samsung



Deutsche Bank

Evolving from Premium Open Banking APIs to BaaS Provider

Company overview. Deutsche Bank (DB) is a global universal bank. While it is also Germany's largest retail bank by total assets, DB is best known as a major player in global investment banking, which accounted for nearly half of its revenues in 2021 (corporate banking: <20%).³⁵ In its home market of Germany, DB has been active in open banking for several years now and made headlines in 2016 when it launched its open API program.³⁶

API program. DB believes that to be successful in open banking, banks need to go beyond PSD2 APIs and offer premium APIs, a good partner experience (development and co-marketing) to deliver a great customer experience.³⁷ Accordingly, DB's open API platform offers a comprehensive developer portal with access to over 40 services, such as account opening or solvency checks for individuals, as well as securities settlement status or income checks. With this platform, DB has positioned itself as a leader in open finance, going well beyond the legal requirements of the EU's revised Payment Services Directive (PSD2). Ahead of its time (PSD2 was implemented into German law in 2018), DB held several hackathons to tap into the wisdom of the (developer) crowd to understand how these APIs could be translated into client offerings. One of the most prominent examples of this is the German fintech Finanzguru, which uses transaction data to identify contracts and subscriptions (such as insurance or data plans) and offer users better or cheaper alternatives, earning a commission on the

transaction. This service is used by more than 500,000 customers.³⁸ DB takes a freemium approach, allowing clients to try the APIs, but charging an (undisclosed) fee to use live data (for non-PSD2 "premium" APIs).³⁹

BaaS. Despite this success, DB realized that its original API platform and approach was too developer-centric. At times, this resulted in products with high technical capabilities and little real-world problem solving. As a result, DB decided to launch an embedded finance offering aimed at decision makers in a wide range of businesses. DB shows what is possible without requiring too much technical knowledge or skill. To this end, DB has recently begun bundling its APIs into cohesive product suites, which together enable non-financial service providers to offer and integrate Deutsche Bank services into their own products under their own brand. The current offering includes savings accounts, securities accounts, and a white-label wallet. DB sells its embedded finance offering to brands with the pitch to create new revenue sources, increase customer satisfaction, strengthen their own brand, and gain new financial insights into customer behavior. For its part, DB gains new distributors from other industries with new client segments (and potentially geographies). An interesting example of this is the launch of mainpay, an account+card offering by the German soccer club and DB sponsor Eintracht Frankfurt. The offering is seamlessly integrated into the sports club's fan app.40

³⁵ Source: Deutsche Bank Annual Report 2021

³⁶ Source: www.deutsche-bank.de/dam/deutschebank/de/shared/pdf/dbAPI_Whitepaper-EN.pdf

³⁷ Source: www.geldinstitute.de/business/2020/was-macht-erfolgreiches-open-banking-aus-.html

³⁸ Source: https://finanzguru.de/presse.html

³⁹ Source: https://developer.db.com/faq

⁴⁰ Source: www.deutsche-bank.de/pk/lp/db-api/embeddedfinance-de.html



Goldman Sachs

Transforming Transaction Banking into a BaaS Provider Entity

Company overview. As one of the world's largest and best-known investment banks, it doesn't need a standard introduction, but its recently launched Transaction Banking (TxB) platform, which includes a BaaS offering, deserves one. It is a cloud-based banking platform that enables clients to automate corporate treasury and integrate business banking products with their core products. The platform was launched in the U.S. in June 2020, in the U.K. in June 2021, and in Germany in September 2022, with plans to expand to other European countries and Japan in the near future. Goldman Sachs currently has 500 full-time employees working on the platform and expects this number to grow to 700 by the end of 2022.

TxB platform. The TxB platform offers three core products: Payments, Treasury Automation and Banking-as-a-Service. It also provides escrow services and data analytics. The platform is fully digital, cloud-based and built from scratch in house. Goldman Sachs announced in June 2018 that it was building a "digital transaction bank". After two years of design and rigorous testing, it was ready to launch the platform, which went live in June 2020. The capabilities of the core platform were originally designed to meet Goldman Sachs' transaction

banking needs. The next step was to develop the product strategy and create features such as virtual accounts, payments, deposits, and Banking-as-a-Service functions. Four years later, in 2022, the TxB platform continues to grow. With more than 45 API endpoints, it generated USD 225 million in revenue for Goldman Sachs in 2021, served more than 400 clients, accepted USD 65 billion in deposits, and processed trillions of dollars through the platform.

Use cases. The TxB developer documentation lists two main use cases for the TxB APIs. 41 One use case is for direct users and the other use case is for payments and BaaS clients. Direct treasury clients can "build their own treasury of the future" using TxB's modern cloud-based APIs. The APIs are capable of automating payment execution and recognition, liquidity tracking and forecasting, and foreign exchange risk management. Payments and BaaS clients can use the TxB APIs to embed Goldman Sachs' financial infrastructure into their own client-facing applications. For example, by connecting to the TxB APIs, a company could offer its clients access to financial services such as payments, business bank accounts and foreign exchange rate tracking within its own platforms.

⁴¹ Source: www.goldmansachs.com/what-we-do/transaction-banking/insights/baas.pdf

OPENNESS AND REVENUE POTENTIAL

New Banking Business Models: Real-Life Examples

In order to better illustrate the concepts introduced in Chapter 4, we present a number of real-world business application examples.

Marketplace 7 Reach any 3rd party's customer offering own data and technology via marketplace PARTNERING MODEL 4 6 5 (PROVIDER) Embedded Data Provider **BaaS Provider** Finance Reach partner's customers using own data and technology 3 Service Data User BaaS User Aggregator Focus on own customers using 3rd party data and technology

DATA LAYER

SERVICES LAYER

- Data User & Data Provider: An example that best illustrates the reciprocal relationship is the multi-banking use case. The main motivation is to enable end clients to consolidate their payments and assets across multiple accounts and financial institutions. This means that the participating banks allow the sharing of client data (always with the consent of the end client) with a third party that provides a consolidated view to the end client. This third party may be a fintech, but such a service could also be offered by banks. In Switzerland, such a use case is currently being prepared by SIX with bLink serving as the central platform.
- 2 Service Aggregator: Some banks are already integrating third-party services to enhance their own offerings. A good example is the use of a third-party white-label solution for personal financial management that the bank integrates directly into its e-banking. Contovista, for example, offers such a service in Switzerland.⁴²

BaaS User: The most prominent example in Switzerland is the fintech neon. Neon is not a bank, but a fintech that provides a mobile banking app using the Hypi Lenzburg BaaS platform mentioned above. Neon also works with other third parties to provide competitive solutions to clients without having to develop them in house (e.g., using Wise for FX transfers). 43

PLATFORM LAYER

Data Provider: Unlike Switzerland, the EU's PSD2 directive mandates the opening up of certain banking data. This regulation has been in works for a long time, and Deutsche Bank has been proactive in responding to the trend. As early as 2016, DB launched its API program to streamline its API offering. Currently, DB offers the APIs required by the regulation for free, as well as paid premium APIs through a single internal API marketplace (the DB Developer Portal). In doing so, it has not only created efficiencies in the provision of the mandatory APIs, but also prepared the ground for the distribution of paid data and services. 44

⁴² Source: www.contovista.com/en/products/personal-finance-manager

⁴³ Source: www.neon-free.ch

⁴⁴ Source: https://developer.db.com/about

- Embedded Finance: There are many embedded financial solutions already live, such as those powered by Stripe. A somewhat unorthodox example exists in Switzerland in the form of another financial app, Yuh. Yuh was created as a joint effort between Post-Finance and Swissquote, the leading online bank specializing in investments. In this case, instead of developing its own app-ready investment offering, PostFinance decided to embed Swissquote's services to power the app. Swissquote, in turn, gains access to a larger user base of PostFinance's retail clients who will use the app. If Yuh becomes a success story, its success will be shared by both parties.⁴⁵
- BaaS Provider: Hypi Lenzburg is currently the only BaaS provider in Switzerland. As discussed in Chapter 2, the strategy of becoming a BaaS provider has boosted the bank's business and opened up entirely new opportunities, transforming it from a small regional bank into a leading innovator.
- Marketplace: An exciting marketplace concept already exists in Luxembourg. The open banking platform Luxhub owned by the local banks provides an API-based marketplace. Not surprisingly, most of the APIs currently offered are PSD2-based regulatory APIs. However, some premium APIs are already available, such as a mortgage insurance API from Swiss insurance company, Baloise. This API enables client banks to embed real-time mortgage insurance quotes into their core banking systems.⁴⁶

The integration effort takes place in the marketplace and is standardized by the marketplace. This means that, once a participant is onboarded to the marketplace, it is easy to procure and offer new APIs.

Another interesting use case has been developed by the startup Raisin, which has created a cross-border marketplace for savings and deposit in Europe. Its goal is to match banks looking for a reliable deposit source of funding and savers looking for higher interest rates on their savings.⁴⁷

⁴⁵ Source: www.yuh.com/de/about-us

⁴⁶ Source: https://marketplace.luxhub.com/products/B%C3%A2loise/Mortgage%20Insurance%20API/details

⁴⁷ Source: www.raisin.com

Note to the Reader

Author

The views expressed in this paper are those of the author and do not necessarily reflect those of SIX or the contributors. For more information about this report, please contact the author.

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