sopra Ssteria

# The Al-enabled banking era

Digital Banking Experience Report 2023

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### Methodology

Sopra Steria commissioned Forrester Consulting to explore the priorities and challenges of banks, changes in their Digital Banking Readiness level, and new revenue opportunities. The survey was conducted between May and June 2023, and questioned 866 senior decision makers in the financial services, banking, and/or insurance industry across the world (Africa, Asia, the Americas, Europe, and the Middle East). In parallel, Sopra Steria also commissioned lpsos to evaluate consumer perspectives on their financial habits, attitudes towards their banks and digital satisfaction. The survey was conducted between June 12 and July 3, 2023, among 11,300 respondents in 9 countries: (Belgium, France, Germany, Italy, Luxembourg, the Netherlands, Spain, Sweden, and the United Kingdom) among a representative sample of the population aged 18 and over, with a bank account in a traditional and/or online bank.

### The AI Imperative

In the rapidly evolving world of banking, the urgency for change is deafening. Last year, we pointed to the crossroads at which banks found themselves, pressured by customers expecting more personalisation, security, and sustainability.

Today, these calls echo even louder, urging traditional banks to pivot towards digitisation with Artificial Intelligence (AI) at the helm.

Trust is the lynchpin of the banking industry, and this year's data reveals a full 80% of consumers trust their banks. However, this trust cannot be taken for granted. More than half of customers feel their bank is not interested in earning them money, and more than a quarter think their bank offers them unsuitable financial products.

In such an environment, trust can easily weaken. Especially when digital-first tech giant competitors are waiting in the wings.

Banks know the threat is real. That is why we are seeing this newfound determination to drive into digital and reap the rewards of the AI era.

As our report explores in detail, AI will allow banks to streamline their internal processes and achieve the collaboration and connectivity objectives to allow them to take advantage of the open finance era. It reinforces bank security, strengthening protection from AI-boosted cybercriminals, not to mention reinforcing fraud detection and transaction anomalies.

Al also offers the potential to respond to customers' hunger for personalisation by crunching the customer data to make sure advisors offer only products and services which align perfectly with client circumstances. Al will not replace employees. It will empower them with powerful insights. We call this the advent of the Augmented Advisor.

In this AI era, leveraging human talent, embracing technological innovation, and fostering trust are the essential ingredients for success.

Banks must wholeheartedly embrace AI's potential and adapt swiftly, for those who do not risk more than just losing their shirt - they risk losing their relevance and footing in the future of banking.

### **Eric Bierry**

**Group Chief Executive Financial Services** Sopra Steria Group





Customer demands for better, faster, smoother and more cost-effective financial services are becoming deafening, and artificial intelligence is emerging as a critical component allowing banks to both meet these expectations and dramatically improve bank performance and processes.

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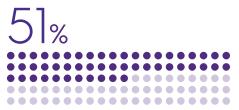
The much-talked about potential of digital transformation in the banking sector is beginning to bear fruit and digital adoption in Financial Services is likely to accelerate as AI tools have demonstrated to a mainstream audience the impact this labour-saving tech can have.

# AI has the potential to radically transform bank processes

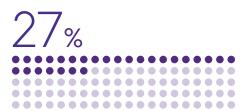
Traditional banks are taking advantage of their strong financial position to transform their operations and prepare for the future, with AI in particular, as a key element of this digital transformation.

Al has the potential to radically transform bank processes, offering significant improvements in a vast range of topics, from front-end enhanced customer service and boosted personalisation to more robust and efficient back-end internal bank processes, enhancing both bank performance and reducing costs.

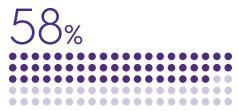
### **Key Numbers:**



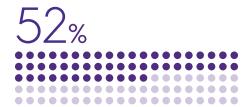
Customers feeling their bank is not interested in earning them money



Customers believing their bank offers them suitable financial services



Banks classing themselves among the top three levels of digital maturity highest ever



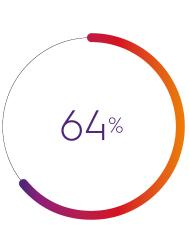
Banks viewing AI as offering highor critical-level revenue streams Regarding revenue generation and cost efficiency, AI is a key, provided it is deployed in an efficient way. From customer channel management, to automated financial advisory, customer aftercare and reinforced cyber security, there are multiple beneficial AI applications. AI, underpinned by robust data architecture, is also a tool to tackle another big challenge, the one of data management in the open finance era.

Banks require ever more computer power to securely process the vast quantities of data generated by the modern financial industry, while also upgrading their collaboration capacity to more easily work with ecosystem partners, a topic of increasing importance to banks, according our survey.

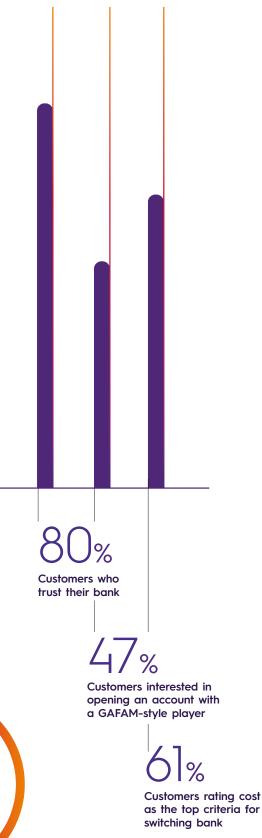
As the open finance phenomenon inundates us with a vast amount of data, artificial intelligence is emerging as a crucial enabler, promising increased effectiveness and efficiency in data management and delivering customer-centric services, underpinned by robust, modern data architecture.



Bank customers who have both digital and traditional bank accounts



Banks planning to leverage financial vulnerability analytics to better protect customers



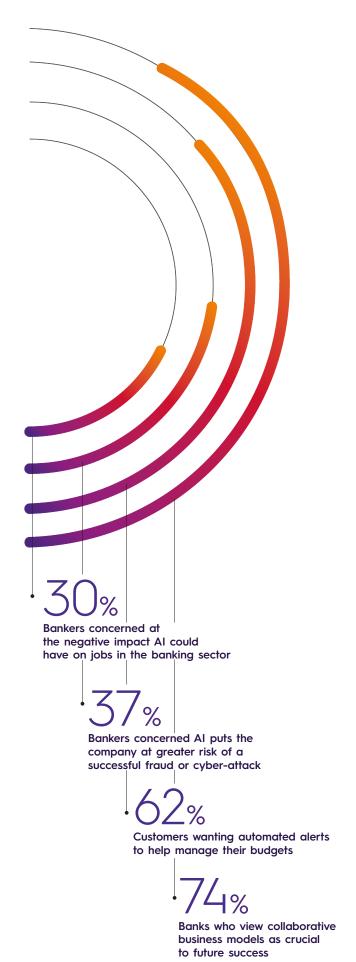
Cybersecurity, as ever, remains a critical priority for both customers and banks, with more than one in every five customers having been victim to a phishing or identity theft attempt, while 37% of bank executives fear that AI tech put their institutions at greater risk of a successful cyber-attack.

Meanwhile, the looming threat of competition from tech giants continues to weigh heavy on the minds of banks, with 36% evaluating competition from GAFAM-style rivals as "the greatest threat to our business." Our survey would seem to suggest this fear is well placed as 47% of customers saying they are interested in opening an account with a GAFAM-style player.

Sustainability rightly remains another key concern for both banks and customers alike, as financial institutions prepare for the roll out of Europe's Green Deal and in particular the EU Taxonomy regulation, that comes into full force in January 2024.

Despite the challenging economic climate, customers continue to put a premium on ESG topics with 51% reporting sustainability as an important criterion for determining investments, with 47% considering environmental impact more important that profitability. 47% also consider evaluating a bank's approach to sustainability is an important criterion in selecting a bank.

Digital transformation has begun and is evident in areas such as migration from on-premise to cloud applications, and infrastructure upgrading however new aspects such as AI deployment, data management and enhanced cyber security must urgently be addressed and require construction of both an overarching technological strategy and targeted deployment of such technologies in the long run.





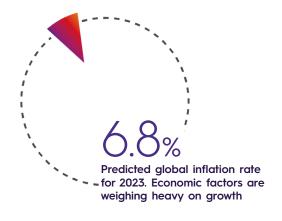
Global instability pushes inflationary trends, impacting bank customers

Consumers and banks both continue to weather tough economic times as a combination of macroeconomic volatility and geopolitical disruption in 2022 and 2023 brought to an end more than a decade of relative stability

Global growth is slowing from an estimated 3.5% in 2022 to 3% in both 2023 and 2024 (projected), meanwhile, the war in Ukraine and economic turbulence in China continue keep commodity prices high, with global inflation expected to stand at 6.8% in 2023.

Set against this gloomy backdrop, banks' profitability and margins have been higher than many observers expected in the post-Covid era, yet deep structural challenges weigh heavy on the industry and customer pressure for faster and more responsive digital services is mounting.

New market players continue to gain market share



Customer expectations around digitisation, an intensely competitive environment, and growing cyber-attacks continue to threaten the business model of traditional banks.

New market players such as digital-first challenger banks, not to mention Google, Apple, Meta (the parent company of Facebook), Amazon and Microsoft, collectively known as GAFAM, continue to gain market share with customers increasingly willing to set aside security and compliance considerations in exchange for cheap financial products.

# Consumers push for smoother, customer-centric digital banking experience

Customers want to spend less money and less time on banking, and seek out services to help them manage their finances; convenience is key. They have quickly become used to the convenience, hyper-personalisation and assured customer service offered by digital-first service providers and are disappointed with the level of service offered by traditional banks.

According to the findings of our survey, only 27% of bank customers felt their bank offered financial services that were suited to their personal and financial situation, 38% reported they were offered services that did not interest them and only 49% felt their bank was actually interested in earning them money.

Amid ongoing financial pressure on household budgets, what customers want are efficient payment methods, digital tools to monitor and control their spending, with this translating into a growing demand for spending dashboards, plus cash benefits via loyalty programs.

With these tools as standard for digital-first banks, we are entering a dual banking era, with increasing numbers of customers holding both digital and traditional accounts. 31% of all customers have both digital and traditional bank accounts, according to our findings, and we expect this tendency to grow.

In-person advisory services are also apt to change. Once a key differentiator, their value is diminishing in the eyes of digital-first, time-poor consumers used to video conferencing, particularly in the post-Covid era.

Only 48% of customers consider that their advisor knows them well and only 56% consider that he is providing a consistent follow-up in time and only 60% saying that they receive personalised offerings.

37% of consumers say that they have regular conversations with their advisor and 7 out of 10 customers are happy to rely on online services only, making the traditional model of customer value creation increasingly redundant.

48%

Less than half of bank customers feel their advisor knows them well

60%

Less than two-thirds of bank customers say they receive personalised offerings

### Banks recorded their highest level of digital maturity since we launched our annual survey

### Banks' digital maturity improves

The pessimism in the banking sector of 2022 has eased as have fears of recession, according to our research, with less than one-in-four banks (23%) saying they expected to be impacted by a severe economic recession, down from 33% last year.

transformation agenda.

Banks recorded their highest level of Banks reported a strong 7% increase digital maturity since we launched our in cross-functional, agile collaboration, annual survey, with 58% now classing with 6% reporting they had an existthemselves in the most advanced three ing culture of collaboration and 7% categories, Pioneer (13%), Intermedi- having a dedicated central senior ate-Specialists (31%) and Intermediate management team to determine Strategists (14%), up from 12%, 22% digital strategy, demonstrating and 11% respectively in 2022. (See our the priority now given to the complementary report carried out by ecosystem and collaborative Forrester for further details.)

This confidence is translating into a Banks' digital transformation across resurgence in investment in digital, regions and segments are beginning with the number of tech investments to bear fruit, with investment choices paused by banks down 17%, with AI demonstrating how banks are embracidentified as a lynchpin of this new ing collaboration and adapting to the new open finance phenomenon.

> business models that will define banking in the coming decade.

Less than a quarter of banks fear being impacted by a severe economic recession

The number of tech investments paused by banks dropped by more than a sixth

### Al as a revenue generator

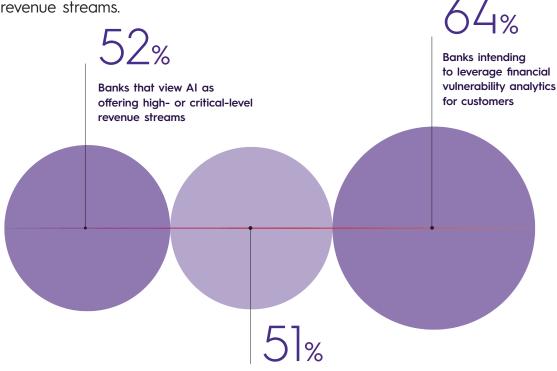
Almost 10% of banks reported integrating Banks have also put new focus on figy included service monetisation, open better protect customers with 63% seeking finance and partner integration.

This pressure to meet customer demands for digital advancement are clear. Not integrate sophisticated digital solutions, manage the volume of data generated, they recognise the revenue generating potential of the tech.

According to our findings, 52% of banks view artificial intelligence systems as offering high- or critical-level revenue streams for the future, with 47% identifying large language models in particular, as holding the potential for generating high or critical revenue streams.

Anything-as-a-Service (XaaS) capabilities nancial wellbeing services for customers to allow collaboration with third-party with 64% of banks reporting they wish to partners, while 8% said their API strate- leverage financial vulnerability analytics to to offer money management tools to help customers self-manage their finances and build resilience (63%).

only do banks recognise the need to Emphasizing consumer-centric wellbeing presents a chance to generate fresh such as those leveraging AI algorithms, to value, boost loyalty, enhance engagement, and ensure future revenue susand to meet customer requirements, but tainability, all while re-establishing trust. The study findings demonstrate that a bank's maturity and readiness for the future correlate with the priority placed on its customers' financial wellbeing.



More than half of customers felt their bank was not actually interested in earning them money

# The need for the Al-powered banking revolution

Why Traditional Banks need to radically upgrade their offering

Traditional banks face an intimidating array of challenges, and while AI is no silver bullet, financial institutions are increasingly switching on to its potential benefits, in terms of satisfying customer demands for personalisation, enhancing business processes and advancing with data management and collaboration challenges.

Digital-savvy customers expect the kind of responsive, consumer-centric and tech-led service in their dealings with banks that they are used to receiving from their other service providers. While digital banks excel here, traditional banks are struggling to keep pace with customer expectations.

More than 31% of banking customers have an account with purely digital banks, while still maintaining an account with a traditional bank, and this proportion continues to increase, leading to the rise of a dual-banking phenomena, of customers using digital banks for their day-to-day financial management but relying on traditional banks for more sophisticated services such as loans and mortgages.

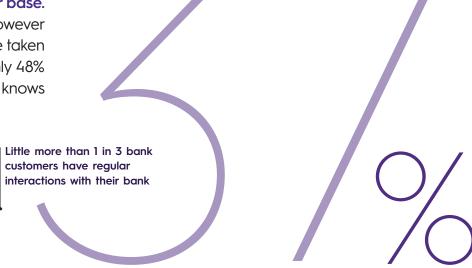
Traditional banks retain powerful trust capital with their customer base.

80% say they trust their bank, however this trust is fragile and cannot be taken for granted. Despite this trust, only 48% consider that their bank advisor knows

them well, and more than half, 51% of customers feel their bank is not trying to help them earn them money.

The profiles of traditional and digital bank customers are quite different. More than one-in-three (35%) customers who hold accounts only with traditional banks are aged over 60, while 41% of customer that only have a bank account with digital banks are over 50.

Traditional banks must reconnect with their customer base and artificial intelligence offers a key mechanism to strengthen this relationship. Currently only 48% of customers believe their advisor is aware of their needs and only 37% say that they have regular conversations with them.



### Leveraging the AI potential

Traditional banks have a huge volume of data about the financial and lifestyle landscape of their customers and tech enables a smoother, faster analysis of this information in order to provide better targeting of financial products to customers. The goal is not to replace human advisory with an Al chatbot, but to combine Al analysis to create the Augmented Advisor, a human counsellor aided by cutting-edge tech insight.

A customer-bank relationship that is supported by comprehensive and smooth digital journey helps customers and also bank advisors, not only to ensure they have access to digital tools to support customers at those key moments in their lives, but also to ensure they are professionally content. Employee wellbeing ranks as an important factor for customers too, with 66% considering it either essential or important that their advisors are happy at work.

Traditional banks need also to review the channels of communication preferred by customers. Customers also see increasingly less value in in-person advisory: 7 out of 10 customers are happy to rely on online services only, and 93% of all customers own a smartphone and use it as a key interface with their bank.

This represents a key opportunity for traditional banks, who can harness the power of customers' smartphones to elevate the personalisation of retail banking services. Through the development of intuitive mobile banking apps, customers can enjoy a tailored dashboard, preferred layouts, and personalised features, all while setting notification preferences to align with their needs.

By tapping into GPS and location data, banks can offer location-based services, delivering timely offers, nearby branch information, and real-time financial insights, especially when customers are on the move. Analysing smartphone usage patterns enables banks to provide individualised financial advice, highlighting spending trends, transaction histories, and engagement behaviours to empower customers in managing their finances better.

Lastly, with Al-driven virtual assistants, banks can engage customers in meaningful conversations, addressing queries, suggesting budgeting techniques, and offering investment recommendations, all contributing to an enhanced, modern banking experience tailored to each customer.



of bank customers have accounts with both digital and traditional banks



Less than half of customers believe their advisor is aware of their needs



of customers trust their bank

## Cost is the number one factor driving customers to change banks ""

### Facing up to the Big Tech threat

finds 47% of all customers saying of personalisation (29%). they are interested in opening an account with a GAFAM-style player.

believing that tech rivals represent "the greatest threat to our business."

sign. Specifically younger customers specific areas of business. are very attuned to that aspect, and expectations in this field are directly transposed to both digital and traditional banks.

So what factors do customers view culties in accessing relevant data as motivations to switch banking sets in legacy IT systems. provider? According to this year's survey, cost is the number one cri-

Another key factor driving banks terion, with 61% identifying it as a to embrace AI is the long-looming key element, followed by the quality threat of GAFAM entering the retail of advisory (39%), the variety of banking space. This year's data services offered (30%), and the level

How then to boost personalisation, reduce costs and increase efficiency Banks are all too aware of this dan- and customer service? The answer ger, with 36% of survey respondents for many financial institutions is AI.

Al can optimise revenue and reduce cost, and generate new rev-This movement adds another layer enue through a variety of use of complexity to the banking space: cases when applied to channel these players are tech native or customer service management. The highly tech savvy. In addition, es-key blocker to its deployment is pecially online retailers master the banks' lack of competent resources; customer journey to an extend that they are unaware of the technology traditional banks don't and lever- available and have yet to construct age their knowledge to translate it a comprehensive AI strategy to into highly efficient UX and UI de- be deployed both at scale and in

> Generative AI also remains in its early stages and is evolving quickly, meaning it can be challenging to integrate, not to mention the diffi-

of banks believe tech rivals represent "the greatest threat" to their business

of customers are interested in opening an account with a GAFAM-style player

# Banks' accelerating appetite for AI

In just six months, we have seen a 10-fold increase in interest from banks keen to leverage the power of artificial intelligence. The surge has been breathtaking. Discussion of Al's application breaks down into several use cases and I would like to illustrate three of them:

Al empowering employees: banks want Al to provide better, smoother and streamlined information to employees so they in turn can better support their clients. This can either be by simply providing easier-to-use information access for sales and support staff, or more advanced systems, where Al analyses customer circumstances and actively suggests solutions for bank staff to offer to clients.

Al against fraud: by analysing key fraud indicators, machine learning tools can better and more consistently flag up suspicious transactions and block payments. Take the example of interbank payments company Iberpay in Spain, where we recently developed an entirely new Al-powered solution to detect and categorise fraud risk for instant payments.

The solution analyses and ranks payment requests in real time providing robust actionable data for banks, plus it continually adds details about detected frauds to its database so the algorithm is always learning and improving.

Al for customer wellbeing: banks are determined to better support customers and Al emerging as a key mechanism to assess changes in customer financial circumstances and proactively suggest improvements, such as highlighting refinancing opportunities for mortgage holders when interest rates drop. This approach ensures that banks actively contribute to their clients' financial wellbeing and suggest personalised solutions to their clients.

Al offers huge potential to banks. Obviously, taking advantage of the Al potential is not without challenges, particularly around access to data and implementation, but banks are enjoying solid financial positions and many are recognising this is the moment to move to Al-powered solutions.

### Pierre Lahbabi

**Head of Offers and Innovation** Sopra Steria Financial Services



# Digital transformation in banking

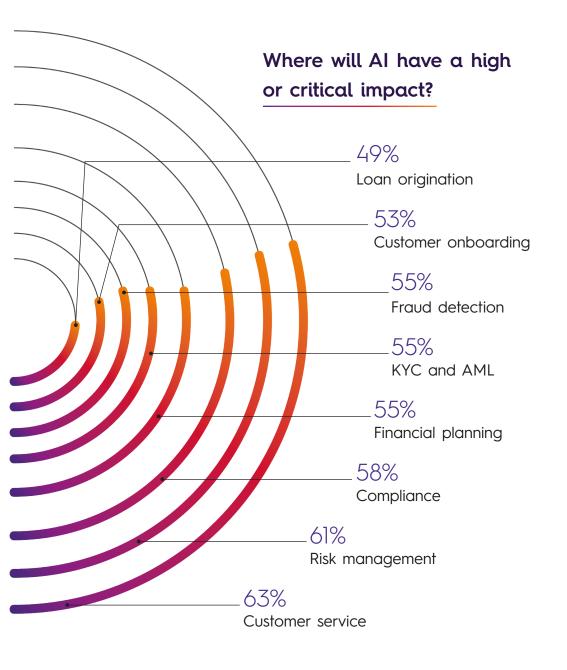
Bank modernisation: from legacy IT to end-to-end digital transformation

Some banks are heeding the market and driving investment into technology to dramatically upgrade their digital offering with almost one-in-two (47%) bank decision makers planning to integrate Generative AI or Large Language Models into their business, with 45% planning to invest in AI-enabled automation and workflow optimisation.

45% want to expand investment into emerging technologies, such as chatbots, augmented/virtual reality, Al-enabled digital assistants to engage

Some banks are heeding the market customers, while an additional 35% and driving investment into technology say they plan to maintain existing to dramatically upgrade their digital investment levels.

Al will have a powerful impact on almost all bank processes, both front and back office, according to our survey findings; from front office customer service and financial planning and investment to customer onboarding and loan origination to back office risk management compliance KYC & AML and fraud detection.



# Cloud is an unmissable starting point to improve banks' future readiness

Banks need to embrace new technology — including hybrid-cloud core technology stack and a digital-first business model — to move to a lower cost, more agile structure, improve cybersecurity, and identify new sources of revenue through data-powered services. In 2023, the vulnerabilities inherent to the banks' business model are becoming more threatening.

A shift in the competitive environment driven by the increasing popularity of digital-first banks and GAFAM demands an updated digital business

model at the same time as consumers demand more digital offerings and superior experiences, following a digital leap during the pandemic - 29% of all customers would choose a bank according to its digital offering, according to our new data.

To adapt to this new reality, Cloud is an unmissable starting point to improve bank's future readiness. This is already understood as demonstrated by our survey, with banks' readiness to integrate XaaS capabilities increasing by nearly 10% between 2022 in 2023. 29%

Nearly a third of customers select a bank based on its digital offering

:10%

The percentage increase in banks' readiness to integrate XaaS capabilities

### Overcoming the deployment challenge



of bankers are concerned Al puts the company at greater risk of successful cyber-attack



of banks are concerned Al could have a negative impact on jobs in the banking sector



Banks planning to invest in AI-enabled automation and workflow optimisation

SaaS carries lower infrastructure costs, is hence the future of customer service, security. Banks are also increasing their banking experience. API capabilities to better integrate partners and monetisation opportunities.

But moving away from legacy software concerns. 37% of bankers surveyed and infrastructure is not enough. Al is taking up an increasingly important space in discussion of digital transformation. However, deployment remains challenging. For example, chatbots and virtual assistants can provide 24/7 customer service but while 64% of respondents reported knowing about the tools, only 18% said they used them. Here, there is therefore enormous potential for more sophisticated Generative AI to improve performance and therefore uptake.

However, such a transformation would require banks to adapt their technology stack to handle significant variations in demand for streaming and processing capacity and ensure in their IT system. Chatbots, and user experience. more generally AI supported advisory,

allows products to be created, deliv- combining both human knowledge ered and changed faster, and offers and technology-enabled analysis and immense resilience, scalability and paving the way to a personalised

> However, while banks recognise the business value of AI, there are also said that they were concerned that Generative AI tools such as ChatGPT put the company at greater risk of successful fraud and/or cyber-attack, while 30% said that they were concerned at the negative impact AI could have on jobs in the banking sector.

### Reskilling and talent management will be necessary for banks to integrate AI into their workforce.

This is where a Digital Adoption Platforms can help. DAPs include an invisible algorithmic layer that can be applied to any digital system, making it easier to use by directing users through key tasks and providing information to helps user navigate the software. This is invaluable in terms of employee they can access the relevant data onboarding, training, and improving

# Al: the transformative force of our generation

Mention AI to someone on the street, and they will likely think chatbots or voicebots, relegating AI to simply a first-line customer service tool.

However, the truth is that AI represents the transformative force of our generation, one that will reshape the very essence of business operations.

In banking, AI has the potential to dramatically revolutionise processes, offering enhancements in customer service, personalisation, and internal operations.

The true potential of AI lies in its ability to enhance bank processes, encompassing everything from elevating front-end customer service and enhancing personalisation to optimising tortuous back-end operations. In so doing, AI has the power to augment bank performance while significantly curbing operational costs.

Open finance is already reshaping the banking landscape, emphasising collaboration and connectivity as top priorities. In this era, where data processing and analysis have become paramount, AI emerges as a pivotal player.

All is not merely a data analyst; it functions as a strategic advisor. Across marketing, product development, and financial planning, All offers indispensable insights that often surpass human intuition.

Is AI going to steal your job? No, AI isn't a jobs thief but an empowerment tool. It drives efficiency, fosters collaboration, and ensures optimal resource allocation, leading to a more productive and motivated workforce.

Al enhances employees' capabilities and in banking allows for the creation of the Augmented Advisor, human expertise with Al-powered insight at their fingertips for a better client

experience and more personalised bank offering.

Yes, AI poses implementation challenges, but putting your head in the sand is not an option.

The AI revolution is here, and it's not pausing for anyone. The clock is ticking, and the time to seize this undeniable future is now.

### Yves Nicolas

**Deputy Chief Technology Officer**Sopra Steria Group



### Smartphones: untapped digital potential

Smartphones today seem as integral a part of modern life as the car or the electric light, and so too in the world of banking. A total of 93% of all customers own a smartphone and use it as a key interface with their bank.

While almost 90% know about contactless payments, there is still some margin for growth in uptake with a little less than two-thirds (60%) saying they currently use such payment methods. Despite the margin for growth in use, smartphones offer colossal potential to respond to key pain points identified by customers.

Al-powered apps can dramatically elevate the personalisation of retail banking services. Through the development and enhancement of intuitive mobile banking apps, customers can enjoy a tailored dashboard, preferred layouts, and personalised features, all while setting notification preferences to align with their needs.

By tapping into GPS and location data, banks can offer location-based services, delivering timely news of special offers, nearby branch information, and real-time financial insights, when customers are on the move.



Analysing smartphone data enables banks to provide individualised financial advice

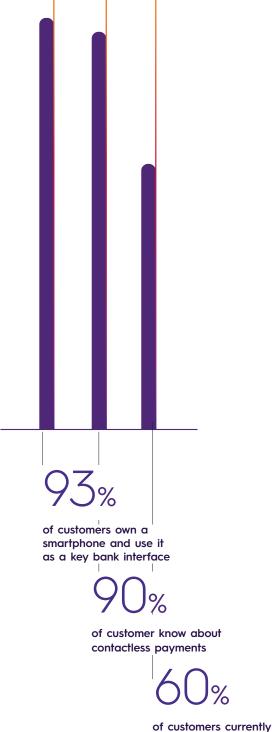
## Timely, location-specific customer advice

Analysing data gathered from smartphones enables banks to provide individualised financial advice, highlighting spending trends, transaction histories, and engagement behaviours to empower customers and help them more effectively manage their finances.

It provides key upselling opportunities, via products such as loans and insurance, by cross referencing GPS data with financial insight – think of a timely loan offer notification as you walk in the door of a car showroom.

Smartphones are almost always within reach, therefore offer a powerful communications channel to offer personalised, Al-enhanced human advisory and Al-driven virtual assistants for straightforward questions or problem resolution.

Facial recognition via mobile phone also offers a powerful tool to reinforce account security and one which customers are increasingly aware of and expect. Our research found that while 77% of customers knew of facial recognition on banking apps, only 26% regularly use it. If banks better educate and reassure customers on the value of such tech they can provide a smoother, more secure and therefore cost effective customer journey.



use contactless payments

### Neutralising cyberthreats through Al

\$10.5

The cost cyber crime is expected to reach by 2025



Almost 1 in 4 banks judge security to be a principle challenge

While the digitalisation of the banking experienced an identity theft attempt. It Security remains indeed banks' top priority, with 23% of banks stating it as a main challenge for 2023 according to our research.

tions and services is forecasted to breaches. They can manage vast be \$219 billion in 2023, an increase amount of historical data, learn from of 12.1% compared to 2022, with the banking industry expected to deliver their defence mechanisms, helping the largest investment.

Digital attacks risk costing banks dearly and they must strengthen their resilience and update their cybersecurity measures to counter the threat, and comply with regulations such as PCI DSS, DORA, NIS2 and GDPR.

Cybersecurity also continues to be a key concern for customers, according to our latest findings, with 22% of customers having been victim of a phishing attempt, and 20% having

space is ramping up, the cost of cyber- is important to note also that only onecrime is expected to reach \$8 trillion in-two customers who were subject to USD in 2023, and \$10.5 trillion by 2025. such attacks, said they felt their bank offered them appropriate support.

Al tools can identify and neutralise cyberthreats from malicious software such as Trojans, viruses, and Worldwide spending on security solu-rootkits, protecting sensitive data from each attack, continually enhancing organisations proactively prepare and protect their system.

> Al tools can also analyse huge quantities of financial data to detect abnormalities in network traffic, system access or user activities, identify potential threats, and automate their response. They can also deploy biometric behaviour analysis to detect fraud and phishing, preventing account takeover and identity theft.

### Smart cyber-attacks require smart cyber defences

in 2

Only half of customers felt their bank offered appropriate support after a cyber-attack



Customers believing cyber security is higher at digital banks than traditional banks



of customers have been victim of a phishing attempt

Those AI technologies also enable malware detection even if the malware While traditional banks are doing much is previously unseen. Al algorithms to reinforce security, they are failing can identify relationships between to effectively communicate this to and classify malware.

to spot vulnerabilities so companies improvements, cyber criminals exploit can patch or mitigate.

However promising, implementing AI for cybersecurity and risk management in banking is not without challenges, such as protecting data privacy and

For instance, in the case of phishing, security, ensuring the good quality of certain AI technologies can identify the data, and gaining customer trust the intent of the sender. They will alert and acceptance. Banks must commuteams to threats before they become nicate effectively tow demonstrate unmanageable, automatically sending the value of AI to their customers by alerts to stakeholders when a vulnera- showing how AI can enhance customer bility, abnormality, or threat is detected. service, provide personalised financial advice, or improve security.

files and their characteristics, such as customers with our survey finding 35% file size, file type and file behaviour, of customers believing accounts with and use this information to detect digital banks are more secure against cyber-attack than traditional banks.

Al can also help in vulnerability man- Banks often consider the digital endagement, by using AI algorithms to point (eg, phone, ATM) the weakest analyse code and system configuration link in security. Despite regulatory outdated app scripts.

> Banks must strengthen their cyber resilience and update their cybersecurity measures -

# The fight against fraud in the age of AI

In the ever-evolving landscape of digital transactions, the battle against fraud rages on. But in this high-stakes conflict, the newest ally to step onto the front lines is artificial intelligence.

Al algorithms, with their remarkable ability to process vast amounts of data, are proving to be a formidable weapon against payment fraud. We can break down the key roles for Al in combating fraud into three topics; anomaly detection, fraud prediction and text analysis.

Al algorithms are tuned to detect anomalies and unusual patterns in transaction data, from unusual transaction amounts or frequencies, detecting transactions in atypical geographical locations, or flagging transactions made at odd hours, Al doesn't miss a beat.

When new frauds are confirmed, this data can be fed into machine learning algorithms, creating a positive feedback loop where they are constantly learning from past experience and improving performance.

These models assess transactions as they happen, sounding the alarm if something doesn't add up. This proactive approach goes a long way in preventing fraud in real time.

Natural Language Processing and text analysis adds a new dimension to the fight against fraud by analysing transaction comments, emails, and communication related to payments.

It can identify suspicious language, extract insights, and even detect semantic anomalies and sentiment patterns in textual data. This tool is indispensable for tracking the subtle hints of fraud hidden within words.

In the realm of payment fraud, staying one step ahead is crucial. All algorithms, with their mastery in anomaly detection, predictive analysis, and text data examination, offer a robust line of defence.

As the fraudsters get smarter, our defences must be smarter still. Al's relentless vigilance ensures that the payments landscape becomes an increasingly hostile environment for would-be fraudsters, ultimately safeguarding the integrity of our digital transactions.

### Guillaume Yribarren

**Deputy Managing Director**Galitt Consulting





Push into customer-centric approach

Customers are hungry for banking services that match their needs and wants via the digital channels they use. They want personalised solutions and artificial intelligence algorithms offer banks a means to dig into their profound customer data and provide tailor made offers at scale.

This demand is clear from this year's survey results. 76% of customers would like to benefit from loyalty programs and 62% would like to receive automated spending alerts to help manage their budgets. They want - and demand - a tech-powered digital solution that streamlines their financial life. 61% want to be able to complete instant transfers regardless of the location, almost two-thirds (64%) want to group payments together in one single easy-to-use app, and 58% want mobile phone payments. 63% of respondents said they would be happy to speak to a bank advisor via digital channels.

This demand is clear from this year's This aligns with bank's focus on cussurvey results. 76% of customers would tomer financial welfare, with 64% of like to benefit from loyalty programs banks planning to integrate vulnerand 62% would like to receive autoability analytics and 63% planning mated spending alerts to help manage money management tools, all to better their budgets. They want - and demand support customers.

Clearly, customers are becoming increasingly tech-savvy. The interaction with bank advisors becomes a personalised, technology-enabled interaction. While most bank interactions are currently digital, there is a low level of personalisation. Enhancing personalised digital customer experience is critical, and AI is a key means to achieve this.

76%

More than three-quarters of customers want loyalty programmes

61%

More than 6 out of 10 customers want instant transfers regardless of location

The interaction with bank advisors becomes a personalised, technology-enabled interaction -



### The rise of the Augmented Advisor

sonalised responses to customer financial data and spending patinquiries 24/7. Employing an om-terns, creating highly individualised nichannel approach, it seamlessly financial advice and tailored inintegrates physical, social, and web vestment options. This data-driven engagement experience.

Al leverages advanced analytics to provide tailored financial recomtheir overall banking experience.

Al significantly elevates customer It can also help provide personal**experience in the banking sector.** ised financial planning and advisory It facilitates swift and precise per- services by analysing customer platforms for a cohesive customer approach ensures that recommendations align closely with the customer's unique financial circumstances and goals.

mendations by analysing customer AI is not a replacement for human preferences and transaction history. advisors, but a tool to enable Moreover, AI enables dynamic pric- them provide better counsel to ing strategies, ensuring flexible and customers through the concept optimised pricing models that cater of "augmented advisors." These to individual customer needs and human advisors are empowered preferences, ultimately enhancing by AI tools that provide automated investment strategies.

Tech also plays a pivotal role in These strategies take into acboosting customer service perfor- count a customer's risk tolerance, mance by leveraging sentiment financial objectives, and real-time analysis systems across diverse market conditions. By blending channels such as social media, human expertise with Al-driven surveys, and reviews to gauge insights, banks can offer a seamcustomer satisfaction and pinpoint less and customised advisory exareas for improvement. This da- perience, enhancing the quality ta-driven approach enables banks of financial advice and empowto optimise their services and ad- ering customers to make well-indress customer concerns effectively. formed decisions. This personalised approach not only improves customer satisfaction but also increases the likelihood of achieving long-



**Customers** wanting automated spending alerts to help manage budgets



of banks are integrating vulnerability analytics to support customers



Banks planning money management tools to empower customers

<sup>11</sup>Customers term financial success. want a tech-powered digital solution that streamlines their financial life

# Sustainability remains a priority

Sustainability is at the heart of considerations for both for banks and customers. European banks are subject to the Green Deal, including a regulatory framework built up over more than a decade. As part of the Green Deal, the EU Taxonomy regulation comes into full force in January 2024, requiring banks to evaluate the CO2 emissions of the projects and companies that they finance.

On the consumer side, amidst strong inflation and rising prices, the customer concern about sustainability remains stable. According to our data, 51% think that sustainability is an important criterion for determining investments, with 47% considering environmental impact more important that profitability. 47% also consider evaluating a bank's approach to sustainability is an important criterion in selecting a bank.

As for many topics, the main challenge is to establish what is sustainable and what is not. The framework for such evaluations is given by the European Union and many major economies have already pledged to follow the EU's example and framework.

The key to the heart of customers is transparency and that in return can only be reached with analysis of reliable data. There a many providers of sustainability data available on the market and banks have to make their choice on which provider they put their trust in.

Regardless of the choice they make,
the amount of data to collect and to
evaluate is tremendous. Al can help
not only to collect data but also to
analyse and process the data to
provide a reliable and transparent
analysis for sustainability criteria.

Almost half of
customers rate
environmental impact
as more important
than profitability

# Al + banking: what's in it for the customers?

In an era of unparalleled technological advancement, customers are no longer willing to settle for anything less than the best when it comes to customer experience in banking.

People are accustomed to seamless, personalised interactions throughout their lives, and they now demand nothing less from their banks.

Traditional banks realise they must provide a personalised service and customers who don't receive the service they expect, will vote with their feet and take their business elsewhere.

So how can banks provide this personalised customer experience when it comes to millions of people? Artificial intelligence, while no magic wand, does offer tremendous potential to banks, based on a deep knowledge of the customers. Achieving personalised customer experience expectations without it, will be impossible.

Combining skilled human advisors with AI-powered insight means customers can receive tailored financial advice, real-time updates on their accounts, and immediate responses to their queries. AI-driven chatbots are available around the clock, ensuring that customers are never left waiting.

Moreover, AI enables banks to proactively identify potential needs and provide solutions before customers even express need. By harnessing the predictive capabilities of AI, banks can offer timely advice, suggest investment opportunities, and assist customers in managing their finances effectively.

Traditional banks must seize this opportunity to leverage the full potential of AI. The integration of AI into their operations will not only meet but exceed customer expectations, by creating a one-to-one relationship.

The banking sector is on the brink of a revolution, and AI is the key to unlocking a future of unparalleled customer experience.

The time for banks to act is now.

### Laurence Niclosse

**Director of Customer Experience for Banks** Sopra Steria Next



# Open finance and collaboration

From Open Finance to AI - the challenge of data management

In the dynamic landscape of the past decade, the digital economy has continually reshaped value chains, exemplified by initiatives like PSD2 involving PSPs, TPPs, banks, and accountants. This transformation underscores the need for robust collaboration among stakeholders to deliver enhanced value to end-customers, whether individuals or businesses.

Central to this collaboration is the promising increased effectiveness and seamless flow of data, especially personal data, amongst these stakeholders, forming the bedrock for tailored and innovative customer experiences. And the regulators worldwide have already harnessed the opportunities of Open Finance (in particular with the open finance proposal of the European Commission, FIDA end-June 2023, and the CFPB in the US with their proposal to change the 1033 dodd frank act mid-October 2023) However, realising this potential necessitates addressing critical aspects: safeguarding personal data through robust identification, authentication, and authorization processes; defining clear liabilities and business models for data re-use across the value chain; and ensuring regulatory compliance in a level playing field.

As the open finance phenomenon is about to inundate us with a vast amount of data, artificial intelligence is emerging as a crucial enabler,

efficiency in data management and delivering customer-centric services.

This year's research clearly underlines banks' focus on enhancing collaboration connectivity capabilities to boost their ecosystem approach. 74% of banks see collaborative business models as crucial to succeed with their future business strategy, with almost one-in-two (48%) aiming to invest in improved APIs to connect more effectively with partners. 46% seek to build new digital platforms for customer-facing systems, while 45% say they are focused on improving monetisation of open banking, and leveraging their own marketplaces.

Banks expect a wide range of benefits from a digital ecosystem approach. More than a third of banks expect (37%) increased revenue growth, (34%) enhanced customer experience and (34%) loyalty from a digital ecosystem, according to our findings

Almost half of all bank respondents aim to build new customerfacing digital platforms

More than 4 out of 10 of banks are focused on improving monetisation of open banking

## Open finance as a catalyst for collaboration

Furthermore, banks increasingly rely on third parties to provide them with technological solutions. Their willingness to build their own solutions has indeed dropped by 45%. More and more banks declare themselves ready for Open Finance in 2023 (25% in comparison to 19% in 2022) and only a handful (14%) are yet to start their journey towards open finance initiatives, such as including better APIs to connect with external providers and advancing platforms to be able to connect to the ecosystem.

Open finance serves as a catalyst for improved accessibility and convenience, offering customers a seamless way to access their financial data and services from multiple banks through a unified platform. This not only simplifies the interaction for customers but also optimizes operational efficiency for banks. Customers now have the ability to view and manage their accounts, transactions, and financial data in real-time, providing a superior and more streamlined banking experience.

The advent of open banking has introduced a surge of competition, primarily from new fintech entrants. These new players leverage open banking frameworks to introduce innovative financial solutions, disrupting traditional banking models. Al, acting as a pivotal technology, empowers these fintech companies to innovate rapidly, delivering cutting-edge services that cater to evolving customer demands.

their performance and innovate in response to the dynamic market spurred by open banking. All is a driving force behind this transformation, empowering traditional banks to improve their services, optimize operational processes, and create innovative products. This wave of innovation ultimately benefits customers, who witness

To stay competitive and relevant, tradi-

tional banks are compelled to enhance

an array of enhanced offerings and improved customer service.

A quarter of banks say they are ready for Open Finance

of banks see collaborative business models as crucial to future business strategy

**Banks** investing in improved APIs to connect more effectively with partners



### Reinforcing regulatory frameworks

**erated innovation** and new product development within the open banking realm. AI facilitates this collaboration by enabling seamless integration and analysis of vast and diverse datasets. Banks and fintech companies join forces, leveraging AI's capabilities to co-create innovative financial products and services. This collaboration fosters a culture of continuous innovation, pushing the boundaries of what is possible in the financial landscape.

The amalgamation of open banking and AI brings a heightened focus on data security. With the interconnected network of banks and third-party providers sharing sensitive customer information, ensuring robust data security is paramount. Al contributes by fortifying security protocols, enabling advanced encryption techniques, proactive threat detection, and real-time monitoring. Through Al-powered security measures, the banking sector enhances its ability to safeguard customer data.

Collaboration is at the core of accel- Al also plays a vital role in establishing industry-wide data security standards and best practices. Collaboration among banks is essential to collectively define and adhere to these standards. Sharing insights and experiences enables the identification of potential security threats and vulnerabilities. By working together, banks can establish a secure open banking ecosystem that inspires trust and confidence among customers and stakeholders.

> Open banking necessitates collaboration not only within the industry but also with regulatory authorities to ensure banks follow existing rules such as General Data Protection Regulation (GDPR), the EU Data Act, Financial Data Access (FIDA), Digital Operational Resilience Act (DORA), while also compelling regulators to establish additional comprehensive compliance and regulatory frameworks that prioritise data privacy and governance. The integration of AI assists in automating compliance processes, ensuring adherence to evolving regulations and fostering a compliant open banking environment that safeguards customer interests and privacy.

Banks' willingness to build their own solutions has dropped by 45%

# Data sharing, Al and security in the open finance era

For more than a decade the banking industry has seen a dramatic transformation in the financial landscape with the digital economy catalysing distributed value chains.

This has had a dramatic and positive impact on banks' end-user customers, both businesses and individuals, recalibrating the expectations of bank clients.

Consumers are demanding a customer-centric, personalised, faster, smoother, omnichannel approach, which players can achieve only by comprehensively crunching consumers' individual data.

Therefore, collaboration becomes a critical business imperative, with this personal data used to fuel the ad-hoc applications which best address consumer needs in return.

However, tailoring offers to each specific consumer in real-time not only requires fresh data but also AI technology to leverage the variety and volume of data created by collaboration and open finance.

The benefits for banks are myriad. From better and faster recommendations enhancing the customer experience, to streamlining bank business operations, reducing redundancy, and cutting costs in areas such as risk assessment and fraud prevention.

However, challenges also exist, such as security concerns, including data breaches, cyber threats, and unauthorised access, and these all require diligent attention.

New global regulations on open finance strengthen personal data protection and reinforce end-user security, such as the General Data

Protection Regulation and the Data Act which target all industries, and finance-specific legislation such as the Financial Data Access framework and the Digital Operational Resilience Act.

Maintaining customer trust is key, and when collaboration is essential at the ecosystem level, market players must establish structures to clarify the responsibilities of each participant.

The challenges are real, but so too are the benefits, and banks which drag their feet risk losing market share.

### Bruno Cambounet

**Head of Research** Sopra Banking Software



# New data architecture for new collaborative banking

To thrive not just survive in the new banking era of collaboration and digitalisation, banks must radically rethink their data architecture to ensure it is fit for purpose.

Data architecture is now a pivotal enabler to effective collaboration with ecosystem partners facilitating the adoption of new, faster, and responsive automated solutions.

Banking is transitioning from a closed, process-oriented monolithic system secured by rigid infrastructure to a new, open system. This new system is characterised by a customer-centric approach, lower total cost of ownership, and sustainability, and reinforced by regulatory frameworks like the EU's Digital Operational Resilience Act.

In practice, this seismic shift demands a reevaluation of the data architecture, with a particular emphasis on monetisation and a focus on granular service offerings.

A modern architecture is required to support customer demands for hyper-personalisation, while also reducing time-to-market and maintaining a consistent omni-channel approach.

This new era is customer-centric, and to thrive in it, banks need an innovative data architecture. The objective is to create an environment that is dynamically scalable and inherently secure.

Architecture must be secure-by-design, with security measures integrated into the very core of banking systems and processes, rather than relying solely on infrastructure-level defences.

The key to success in the evolving banking landscape is clear: there is no data sharing without data architecture. It is the foundation upon which the collaborative future of banking is built, enabling us to adapt to changing landscapes, foster innovation, and provide the responsive and compliant services that customers expect in the digital age.

### Xavier REBEUF

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The banking industry is at a tipping point. Having lagged behind their customers' digital needs during the pandemic, they are facing increased competition and costs, high customers' expectations, sophisticated cyber security threats, and sustainability considerations.

The advancement of AI, together with opened access to personal information levelled by regulatory playing fields and collaborative technologies offer banks the potential to dramatically improve personalisation, add value and lower costs, whilst enhancing the trusted relationship they have with their customers.

Customer engagement via these new technologies is at the forefront of this Al-powered business model, creating new business opportunities, building upon the vast amount of data that banks have underexploited to this day.

To pivot from a financial product-orientation to a customer centric approach, banks will be required to leverage AI, Open Finance APIs, cybersecurity and analytics technology stacks, in order to exploit and secure customer data at scale. Increased customer engagement and improved security at lower costs will lead banks to higher margins, allowing for future-driven investments.

In an era of rapid technological innovation, catching up with technology is not enough; banks need to stay ahead of the curve to thrive, prevail over competitors and quash cyber threats before they occur.

The relevance of data management and AI becomes even more relevant with Open Finance initiatives, that exponentially increases data volumes.

Those open finance initiatives foster in return a positive customer experience, making banking user friendly and conveniently facilitate transitions from one financial service provider to another.

The new business model banks are required to implement is more customer centric, built upon a technology stack that includes the latest AI and open finance tools and leads the way to a virtuous circle of lower cyberthreats and costs, higher customer adoption and increased revenue, and future preparedness.

However the journey to implement this new model will pose key challenges, particularly in terms of managing legacy IT systems, and will require development of a stronger regulatory framework and robust, efficient data management infrastructure.

