

Digital Lifestyle Banking on Cloud

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Table of contents

Disclaimer	
NEW ENTRANTS LEVERAGE CLOUD TECHNOLOGY TO RESHAPE	
BANKING	4
Innovate at Scale	4
Personalize Offerings	4
The shift in technology spending from CAPEX to OPEX	5
INCUMBENT BANKS CAN CHANGE THE GAME BY ADOPTING	
CLOUD	6
How can traditional banks compete with the new entrants?	6
Accelerate Business through Digital Corporate Banking with Oracle Embed Banking into a Customer's Daily Routine	7 8
CREATING VALUE WITH DIGITAL BANKING ON CLOUD	10
Advantages of a cloud-based solution for digital banking	10
Cloud service models	11
Conclusion	12
Sources and References	12
List of images	
Redefining Experiences by Empowering Customers and Bankers	5

NEW ENTRANTS LEVERAGE CLOUD TECHNOLOGY TO RESHAPE BANKING

As our everyday interactions and experiences become more and more personalized, so do our expectations on "how we want to bank". Consumerization of services sets high expectations from banking.

New technologies such as the cloud have dramatically reduced costs and barriers to entry, giving rise to a new breed of competitors. *FinTechs* are building ecosystems that give banking customers enhanced digital experiences, while *BigTechs* who helped unbundle banking are now looking at taking their market share. According to a report on "Adaptive Banking" by Oracle, for every account opened in a traditional bank, two more are opened with digital banks.

Innovate at Scale

Most traditional banks now feel the urgent need to automate manual tasks and become more responsive and resilient. Moving to the cloud is essential for most financial institutions to speed up their time to market and develop new services.

Banks realize that modernizing technology platforms is a slow process in a risk-averse domain. The *unrelenting competition and increased customer demands* are driving banks to become more digital as a strategic response. Every bank today is reimagining the "*experience of banking*" across both consumer and corporate segments.

Banks are no longer limited by on-premise systems to test and simulate innovative offerings; the cloud provides them a secure, flexible, and highly scalable environment to experiment with innovations without disturbing their existing ecosystem. Once ready for market, banks can democratize their innovation to achieve economies of scale by delivering innovative banking technology to their customers and beyond with the advent of cloud-based open banking.

To innovate at scale and increase revenues, banks can utilize cloud technology to modernize their proposition and serve large client segments efficiently. Cloud technology equips banks to adopt proprietary digital banking products from other banks and FinTechs to create customized offerings for their customer base as well as embed collaborative sales models.

Personalize Offerings

Banks have now become 24x7 digital businesses, which provide *personalized engagements to customers* round the clock. Digitalization served well during unprecedented times and the demand for digital banking increased manifold leading to increased load on existing systems. Customers now expect a reimagined digital banking experience to be delivered optimally. 41% of global banks are looking for ways for KYC automation to ease the onboarding and product origination processes for clients.

Gen Z, millennial customers, and even baby boomers today prefer banking on the go and in the moment; they prefer contextualized and personalized financial services. Progressive banks have realized these needs and designed branchless models that align digitization and ecosystem strategies – allowing them to bring in new value-added services for their customers. By automating processes and with the use of Artificial Intelligence and Machine Learning, banks offer quick and easy services to their customers. Branchless banks can identify gaps, problems, or pain points of

A McKinsey report states that "Traditional banks spend roughly US \$300 per customer acquisition on average, while digital attackers pay the US \$5"

Customers are now getting used to the bank as an App rather than a building (branch):

Report by Boston Consulting Group traditional offerings and engineer products and services that fill these gaps. For example, people can open accounts, apply for loans, or originate investment and banking products on the channel of their choice at their convenience, with no tedious paperwork or long banking queues. Chatbots and voice-enabled assistants can help customers resolve queries quickly and provide contextual alerts, without relying on any human interference/interaction.



According to an EY report on "How can banks stay relevant, as customer expectations change": 73% of banking customers agree that banks should create and use emerging technologies to make doing business with them easier.

Redefining Experiences by Empowering Customers and Bankers

The shift in technology spending from CAPEX to OPEX

The new entrants have a significant focus on disrupting existing processes to create cost-effective and client-focused services. By establishing trust through seamless, cross-channel experiences, the new entrants are plugging gaps observed in offerings from traditional banking players. FinTechs and BigTechs take advantage of cloud elasticity to drive the total functional costs down and become more cost-effective for the end consumer. A <u>recent report</u> by Mckinsey stated that digital banks (FinTechs) have been able to <u>reduce costs of customer acquisition to US\$ 5</u> per customer, while traditional banks typically spend US\$ 300 per customer.

During periods of unprecedented market volatility and high customer demand such as in the year 2020, bank CIOs and CTOs were tasked with reducing inefficiencies caused by siloed data and legacy platforms.

The ongoing commoditization of existing technologies and the accelerated introduction of new technologies is perhaps the single largest force reshaping financial services – and with the industry's massive reliance on technology, it is sure to consume a larger portion of their budgets.

Digital technology adoption helps in the optimization of cost allocation, automation, and standardization. For cost-cutting, banks continue to shift their expenses from CapEx to OpEx. Cloud services prove to be a welcome change here, as they are more cost-effective. Cloud services require no upfront investments and are typically expensed based on consumption as operational expenses that are spread over time.

Bank and capital markets leaders now recognize that *cloud services* can positively augment human productivity, providing insights that can positively impact both front-office and back-office transformation. By choosing cloud applications, a bank no longer needs to worry about maintaining a data center, or hardware, or operating systems, or a database, or a network, or all the security. A bank doesn't need to worry

about scaling up or scaling down as the business changes, the cloud partner takes care of this.

Oracle has made significant changes to its own business to become **cloud-first** and make banks successful as they move on cloud and beyond. Oracle is the only technology vendor that offers both an integrated suite of enterprise cloud applications and the cloud infrastructure platform designed for what's next. There are unique capabilities at both the applications layer and the infrastructure layer of the cloud. As a result, Oracle Banking products, allow banks, to implement process changes faster and build and extend applications better.

Oracle Cloud Applications run on our next-generation cloud infrastructure, which was designed for the most mission-critical, high-performance applications for global banks with stringent security needs.

In Portugal, 60% of retail banking customers would consider digital channels to open an account, and 50% of customers would use digital channels to apply for a personal consumer finance loan.

-McKinsey report on "Customer led retail banking distribution in Portugal"

INCUMBENT BANKS CAN CHANGE THE GAME BY ADOPTING CLOUD

Whether a bank is serving individuals or corporates, efficient and enduring customer-centricity involves addressing customer needs quickly and seamlessly. Banks should aspire to offer products that become *indispensable* in a customer's life. This would mean that the bank's platform should anticipate and serve a customer's need and focus on serving customers across channels.

Large traditional banks have the capital, brand connect, resources, and expertise to turn the tables on new entrants and launch their range of future-ready specialist services.

How can traditional banks compete with the new entrants?

- Build a digital experience platform, which is ready for business: The bank's
 digital platform should be ready to provide a full spectrum of services across
 retail and corporate banking segments.
- Adopt intelligent hybrid systems: The bank's platform should provide a perfect blend of physical and digital experiences to customers. Traditional banks should aim to become branchless and respond to customer queries and execute transactions with very little or no human intervention. The user experience layer should ensure consistency across different channels and interfaces with engagement tools like voice-enabled assistants, video banking, and chatbots to provide a simplified human-like approach to banking transactions. Hybrid engagements via video banking, screen share, and service helpdesk ensure that a bank representative is always available face-to-face without the requirement of actual branch visits.
- Invest in Cloud Technology: Traditional banks should avoid investing heavily
 in trying to build all banking technology in-house. Cloud technology should
 be leveraged for access to better capabilities cost-effectively. The bank's
 cloud-based platform should be extensively modular, always available, highly
 secure, and scalable.
- Become a Lifestyle for the Customer: Artificial Intelligence can enhance personalized interactions and decisions based on personal traits derived from customers' banking activities and lifestyles. Traditional banks should use artificial intelligence and machine learning to provide offers and messages to customers that are tailor-made to their needs.

According to <u>Oracle</u>
<u>Research</u> on New
<u>Digital Demand</u>,
"Convenience" is the
top factor for
customers to choose
a financial institution.

Quick on-the-go portfolio snapshots and finance management tools to help customers plan finances and track expenditure anytime anywhere could serve as options to improve the bank's relationship with the customer.

<u>Oracle Banking Digital Experience along with Oracle Banking APIs</u>, helps banks become Ready for Business from the word go. The platform allows banks to collaborate with FinTechs and third-party platforms to provide specialized value-added services to their customers. This forms a key element in the digital transformation of a bank.

Accelerate Business through Digital Corporate Banking with Oracle

The last two years have been a bumpy ride for most corporates. Huge currency fluctuations, escalation of trade wars, political tensions, rapidly emerging FinTech developments, commodity price shifts, and regulatory uncertainties have affected businesses across the world. Keeping tabs on cash flows, currency movements, risk management, and payments has been very difficult.

With the rise of digital commerce, corporates are continuously looking to reinvent their banking experience models. Intelligent digital experiences through instant payments, mobile payments, and request-to-pay have taken a prominent position in the collections tool kit.

For banks to strengthen relationships with corporate customers, they need to provide need-based segmentation, differentiated omnichannel coverage, and industry-specific value propositions. Bankers too need to be empowered with new skills and focused information to provide a higher level of service to their high-value customers. Traditional banks can increase customer satisfaction and reduce costs by building digital customer-centric journeys, embedding innovative technologies along the value chain, and redefining operating models. A recent report by Trade Finance Global stated that banks can save more than US\$ 2.5 Billion by adopting integrated digital solutions for trade finance.

Today, corporate treasurers and finance managers are managing multiple tasks such as tracking of aging accounts payables and receivables, overdue or outstanding finances, reconciliation of cash flows, account maintenance for top customers, cash flow forecasting and limits to be drawn, visibility and planning of trade, and reduction in overall costs.

Oracle's Digital Banking platforms empower bankers to deliver actionable insights such as a global view of the cash and liquidity positions, impact of FX movements, supply chain finance, and regulatory changes, that – when managed effectively and actively- can have a positive effect on a corporate's bottom line. Corporate Treasurers and Finance managers can analyze information faster for better cash flow forecasting and trade forecasting, which leads to informed decision-making, improved efficiency, cost savings, and business growth.

The digital platform also provides powerful self-service capabilities to corporate clients, increasing convenience and transparency.

Traditional banks can leverage the power of Artificial Intelligence and Machine learning to automate account payables and receivables through digital invoice management. Corporates can use the bank's platform to present, collect, reconcile, and report invoice data and to digitize their receivables solutions. The insights that corporates can mine from digitizing invoices can help improve cash forecasting, credit control, efficiency, and decision-making for all corporates.

70% of Global banks are reviewing their core banking platforms. Banks are concerned about the limitations of their core architecture and their relatively slow pace of change.

-Report by McKinsey on "Next Generation Core Banking" Oracle Banking Digital experience provides <u>comprehensive business coverage across retail</u>, <u>SME</u>, and <u>corporate banking segments</u>. Artificial intelligence-enabled onboarding, extensive corporate banking functions, smart payments framework, and low code no code personalization make it an Agile Digital Banking solution. Banks get business flexibility as the corporate banking components can be offered to small, midsize, and large businesses to support trade finance, supply chain finance, cash management, liquidity management, virtual account management, corporate loan originations, credit facilities requests, foreign exchange, bulk file upload, invoice management, pre-shipment finance, overdue widgets, counter-party management, Trade 360, corporate payments, and merchant payments.

Embed Banking into a Customer's Daily Routine

With the growing digital economy and changed working conditions since the year 2020, banks are now *remotely* servicing huge volumes of transactions for clients around the clock and creating powerful digital experiences to keep the customer engaged with the bank.

To effectively *service existing customers and grow their customer base*, banks should empower customers with digital tools to connect with their bank via video or voice calls through the in-built multi-modal assisted banking feature on their mobile or internet banking platform. On the call, the bank executives can view the customer's screen, annotate on the customer's screen, access email and phone information, as well as view the customer's location and device detail.

With the adoption of conversational artificial intelligence (AI), *customer on-boarding* can be made fully automated, resulting in a smoother experience for customers and faster time-to-revenue for businesses. According to a report, in Portugal, <u>61% of retail banking customers</u> would consider a digital channel to open an account. Customers also enjoy the empowering self-service experience, which can be used anytime, anywhere, on the channel of their choice. The customers can complete the KYC (Know your customer) processes through a video KYC with the banker or a self KYC, in which the customer uploads documents for verification. Google maps integration can be used for address mapping, and QR code scans can be used for increased security and to allow the customer to save the application and complete it later at his convenience. This allows the customer to stay engaged with the bank throughout the onboarding journey and new customers or prospects can completely avoid visiting a branch to start a relationship with the bank.

For investment products, loan products, and personal financial planning, customers can also reach out to bank officials during the initial product research and the origination journey using video chat, voice chat, or chatbot. The bank's platform can also provide a product catalog to the customer to select the product of his choice and help him sign digitally to complete the application process and for instant account opening. Customers can navigate to the application tracker or product showcase based on their past interactions with the bank. Personal finance management tools help customers plan finances and track expenditure. This offering helps the bank's customers conduct a thorough spending analysis, set and track financial goals, and manage budgets.

The peer-to-peer payments module allows retail banking customers to send and receive funds using various channels like Siri, Alexa, iMessage, Twitter, Facebook contact, an email, mobile number, and pay merchants using QR codes. The solution offers a secure digital wallet that enables stress-free registration, wallet funding from external sources as well as accounts within the bank, peer-to-peer funds transfer, bill payment, and request fund capabilities.

McKinsey report on "Accelerating banking cloud adoption for banking and securities" states the following benefits for Cloud adoption for Digital Banking:

- 90% improvement in time to market
- 95% lesser time taken for adding new digital features
- 5-10% labor improvements
- 80% outage reduction
- 10-15% savings from capacity utilization

Engage Bank Users to Enhance Customer Experience through Cloud-Based Digital Banking

Digital banking has made banking less visible and embedded it in the everyday activities of customers. FinTechs create truly frictionless processes for customers while banks still rely on lengthy processes. To digitize key processes and improve the customer experience for clients, traditional banks need to empower their Bank Admin managers with the right tools that can be used in a configurable manner.

The bank's digital platform should be intuitive and flexible to match the requirements of a bank admin user. An admin dashboard to enable bank users to define fine-grained user and system settings to be in complete control of the bank's digital environment through centralized user management, limits management, identity management, touch-point management, multi-entity management, dashboard configuration, and the ability to manage multiple banking brands from a single instance. Experiences for modules, products, origination framework, customer actions, alerts, and mailers should be bank user-configurable tasks.

Benefits of Digital Banking on the Cloud

FUNCTIONALITY/CAPABILITY	BENEFITS
Real-time intuitive data updates and on the go banking	Through digital banking, customers can have access to real-time data anytime anywhere, acquiring key information across segments and product lines for strategic decision making
Reduction in transaction costs of banks	Adoption of self-service channels and accelerated business processes by bankers and customers help banks reduce operational costs and lead to significant cost savings
Automation of business processes	Paper-heavy business processes in trade, supply chain, and accounting can be digitized for faster processing. Real-time visibility into transactions and straight-through processing ensure higher customer satisfaction.
Convenience	Seamless experience across channels and self- service capabilities helps customers to transact anytime anywhere
Improved reach	Through the adoption of digital banking, banks can build scale and embark on a geographic expansion. Digital banking enables banks to access real-time data across different locations allowing communication and collaboration across geographies in an effectively
Faster time to market	With the adoption of cloud services, banks can ensure faster <i>implementation</i> of the solution, which can be reduced from a couple of months to minutes.
High availability and automated scaling	Cloud infrastructure offers high availability and exceptional security ensuring that banks meet the dynamic needs of customers with continuous feature enhancements. Cloud elasticity automatically adjusts to match demand, letting the bank run its technology on autopilot.

Digital banking helps banks keep pace with market developments and enables them to give an end-to-end experience to their clients. It helps drive better visibility, agility, and business outcomes.

CREATING VALUE WITH DIGITAL BANKING ON CLOUD

When a bank chooses to "move to cloud", it means that the IT infrastructure is stored offsite at a data center that is maintained by the cloud computing partner. The cloud provider has the responsibility of maintaining the bank's IT Infrastructure. The cloud provider will integrate applications and develop new functionalities and capabilities to keep pace with market demands.

Costs, revenues, and future profit potential are at the center of any decision-making process of banks. The rewards for banks that move to the cloud include operational agility, reduced infrastructure maintenance costs, and significant IT savings because of zero upfront costs. Cloud technology helps banks stay nimble and proactive by allowing them to innovate faster by providing them ongoing access to fresh latest technological capabilities.

Advantages of a cloud-based solution for digital banking

- Automated scaling to immediately meet demand: Cloud elasticity automatically adjusts to match the demand letting the bank run its technology on autopilot. Autoscaling works by defining specific milestones that will automatically trigger the creation of a new instance or expansion of any existing one, removing the need to constantly monitor traffic and resources used by every application. Cloud load balancers offer automatic scaling up by distributing workloads across various nodes. When dealing with periods of peak users or resource consumption, such as the beginning of a month when there is high demand for payment-related services or month-end when there are future-option maturities, the load balancers balance workloads among all available nodes.
- Reduce IT management burden: In a SAAS delivery model, the cloud provider hosts the customer's applications at the cloud provider's location. The bank operations can access those applications over the internet. Rather than paying for and maintaining their computing infrastructure, SaaS customers take advantage of subscriptions to the service on a pay-as-you-go basis. Data and advanced analytics combined enable users to work faster and better. Cloud-based solutions offer automatic upgrades and continuous updates to the latest technology, reducing the bank IT team's burden, allowing them to focus on innovation. A McKinsey report states that cloud technology can improve labor outputs by 5-10%.
- Faster time to market through configurable implementations. Banks gain from a
 near-instant implementation of the solution, which can be reduced from a couple of
 months to minutes. Banks benefit from automatically having the latest technology
 built into their systems. The cloud provider takes on the job of developing new
 capabilities and features. A report by McKinsey states that the use of cloud
 technology can lead to a 95% reduction in time for adding new digital features.
- Cost-effectiveness: Cloud solutions come with zero upfront costs and subscription-based pricing that's flexible and scalable for growth. Banks can preserve their existing investments with familiar tools and don't need to rewrite code to migrate software assets to the cloud. Elastic capacity via "cloud bursting" gives the capacity needed without having to oversubscribe. The biggest savings comes from eliminating capital expenses by lifting and shifting entire workloads to the cloud and retiring data center assets. A recently <u>published report</u> mentioned that capacity utilization reduces by 10-15% with the use of cloud technology.
- Cloud technology connects business processes: For banks who suffer from
 disconnected business processes and data silos, cloud technology offers a way to
 transform business operations. Cloud application suites are not modular but
 connected. They eliminate data silos, enable integration and intelligent business
 decisions. With an integrated cloud solution, organizations would be better



equipped to access and manage the costs and benefits of different technology projects.

- Business continuity and reduced disaster recovery switchover time: Cloud-based solutions protect data and systems by ensuring that backed-up data is available in a secure safe location. Data centers are geographically separated and have component ad power redundancy with backup generators in case of any impacting event. Cross-region block volume backup copies make it easier to rebuild applications in the destination region if a region-wise disaster happens in the source region.
- Collaboration Efficiency and easier integration: Collaboration in a cloud environment gives banks the ability to communicate and share easily outside traditional methods.
 Banks can easily integrate with outside applications to improve experiences for customers.
- Flexibility of work environments and reduction in energy consumption costs: Cloud technology allows banks to be more flexible in their working practices. Employees can have access to virtual offices and access data from the cloud anytime anywhere.

Cloud service models

The key to the success of digital banking on the cloud lies in selecting the right service model to suit the bank's needs. The following models are categorized based on operations and deployment:

- Software-as-a-Service (SAAS): The cloud service provider houses the business software and related data, which users can access via their web browser. This model can deliver many bank functions in a cost-effective way
- 2. Infrastructure-as-a-Service (IAAS): Banks who would like to retain their existing applications and technology software but want to take advantage of a cloud environment can choose to migrate their existing landscape to the cloud in an Infrastructure as a Service model. The cloud service provider allows banks to buy required resources like servers, data center space, etc. as a fully outsourced service. It helps banks reduce maintenance costs of onpremise data centers and enable their manpower to focus on the business. IAAS model helps banks bypass the cost of buying and managing physical servers and datacenter infrastructure.
- 3. Platform-as-a-Service (PAAS): The cloud service provider offers a platform for application, database development, tools for building apps, servers, interface, testing, and storage. PaaS model allows automation of back-end processes and customization of banking applications, along with the addition of new functionality on the cloud. A PaaS model provides banks complete control over their banking application to customize existing features and add new custom functionality. The cloud provider takes care of all remaining requirements including database, security, and infrastructure. This model is ideal for banks who want more from an application where a SaaS model may not allow any customizations.

There are different ways in which cloud service providers can deploy cloud services: Public cloud, Private Cloud, Hybrid cloud, and Multi-cloud models.



Conclusion

According to a <u>research by Global Market Insights</u>, the digital banking market size will grow to USD 12 Trillion by the year 2026. Traditional banks need to make fundamental changes to their business models, reimagine physical distribution, rapidly scale up remote channels, and digitize services and sales to stay relevant and flourish in the digital era.

By adopting cloud-based solutions for digital banking, banks can ensure greater revenues, greater agility, improved innovation, reduced security risks, increased customer insights, and improved efficiency. The cloud-ready digital banking platform will be a secure and scalable business model offering in-depth functionality to customers, allowing traditional banks to become dynamic and resilient.



Sources and References:

McKinsey reports

- Accelerating cloud adoption in banking and securities | McKinsey
- The 2020 McKinsey Global Payments Report
- The opportunity for customer-led retail banking distribution in Portugal | McKinsey & Company
- Al in banking: Can banks meet the challenge? | McKinsey



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