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Leveling the playing field

Cloud modernization for regional banks



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Introduction

Regional banks play a vital role in the US financial ecosystem, but these days, they're playing from behind—at least when it comes to the state of their IT infrastructure. How should they address some of their constraints in order to leverage cloud capabilities that fuel innovation, build deeper customer relationships, and compete on the same level as industry heavyweights?

Regional banks are in a bind. They occupy a critical niche in the US financial system somewhere between the big banks and local credit unions and community banks, with a range of between \$10 billion and \$100 billion in assets. They are typically able to provide more products and services than a community bank or credit union, but lack the ability to provide the broader and more advanced and increasingly digital services of a large national or global bank. One key area that constrains them is technology Infrastructure.

The cloud infrastructure challenge

Developing and maintaining world class technology is an expensive undertaking. The largest banks spend billions of dollars annually on their technology, often with much of that going to just “keeping the lights on,” never mind the investment in innovation and change required to get and stay ahead. Huge data centers consuming gigawatts of power and housing thousands of computer servers and the armies of staff who design, build, and operate all that technology make modern IT infrastructure departments sizable businesses with significant budgets. And every dollar being spent on running all that infrastructure is a dollar not being spent on developing the software and services that attract and keep clients and grow revenue.

Economies of scale and standardization of commodity services are a key success factor in IT. The largest of firms with significant financial resources can drive scale efficiencies with their IT infrastructure. But these days, even the biggest of banks are turning to cloud service providers with even greater scale. This gap between the regionals and nationals was brutally exposed recently with the rollout of the federal Paycheck Protection Program. Many banks were challenged to meet the swell of incoming applications, but smaller regional banks fared worse, since many simply lack the modern technology infrastructure and staff to manage surges in demand.

If scale, critical mass, and standardization are key to tech efficiency, then regional banks have a number of built-in constraints that have resulted in the status quo.

Regional bank constraints

The regionals tend to have a higher number of less profitable small business loans and a smaller overall deposit base. This can constrain both their overall IT expenditure and the ratio of budget spent on run-versus-change investment. The result is aging software and hardware portfolios, slower adoption of emerging and more effective technology, and continued use of manual, paper-based processes.

Mergers and acquisitions are an important growth strategy in the regional banking market, and the space has recently undergone significant activity.

While great for growth and for building the needed economies of scale, integration or divestment can create technology issues. These include having a patchwork of many different systems, siloed and complex organizational structures, excess capacity and data center facilities, and distraction of management focus.

An outcome of all the above characteristics is that the regionals can have difficulty attracting and retaining the best IT talent, who want to focus on current and emerging technologies and services. This competition for scarce resources is exacerbated by maintaining IT operations outside of geographic talent hubs (such as New York City, Chicago, and Silicon Valley) and the relatively smaller compensation packages.

As if that weren't enough, there are a number of recent market forces bringing pressure to bear across the sector. Recent

rate reductions from the Federal Reserve have created more pressure on efficiency ratios, provoking a strong desire to reduce costs. The pandemic has driven rapid increases in the need for digital banking products such as mobile wallets, contactless payments, and mobile check deposits. And as remote and distant working becomes more widespread and entrenched, new strategies and technologies are needed to enhance and sustain the new distributed workforce.

Regionals should respond to these constraints and pressures by shifting from capital-intensive assets toward utility-based services, from patchworks to standards, and from spending dollars to keep the lights on to investing in tomorrow. In short, they should use someone else's scale instead of trying to create their own. Fortunately, there is a marketplace ready and waiting: cloud.

Benefits of cloud



Cloud service providers bring massive ready-to-use compute and storage capacity, prebuilt services, utility pricing models, built-in cyber features, and geographic diversity. As such, they enable strategic benefits around time to market, IT efficiency, security, and resilience. When choosing a service, activating compute power, and starting to develop takes moments instead of weeks or months, potential new business value is more rapidly realized. Despite the constraints discussed earlier, regional banks have some advantages; smaller can mean less decision-making overhead and an ability to execute faster changes of direction. This agility advantage can be supercharged when application developers can eliminate most of the infrastructure design and build time and rapidly try and prototype new ideas—bringing new revenue-generating products and services to market significantly faster.

The increased developer productivity is coupled with a decrease in providing and managing IT infrastructure. Together, these features optimize the cost base and reduce capital expenditure, freeing up spend for reductions or reinvestments in new services and helping shift the regional bank run-versus-change investment ratio. Cloud utility pricing based on unit consumption over time provides transparency of costs and cost drivers. This transparency improves alignment of IT costs to business services, helping better inform investment decisions—important inputs in enabling the regional banking M&A growth strategy.

The security and resilience of data and services are critical to regional bank reputational risk, as well as the legal and regulatory compliance requirements. Precertified solutions, automated control processes, security releases and updates, encryption, and the proactive threat detection delivered by cloud providers help to ensure the needed levels of cybersecurity. Redundancy and out-of-region recovery capabilities may prove valuable to smaller banks with fewer technology assets and less geographical dispersion.

Operational resiliency is increased where system availability is delivered via common configurations for multiple geographic regions. And remote working is enabled as well, via cloud's distributed access models and increased security.

With the challenge, constraints, and benefits clear, what sort of capabilities are there to take advantage of, and how does a regional banking player move to cloud? A range of ready-made banking services are already available from vendors and cloud service providers, and there are numerous prebuilt platform and technical services that assist and enable migration, development, integration, and ongoing operations.

Ready-made services

There are a growing number of cloud-based capabilities to serve processes across the bank—from anti-money laundering and know-your-customer services to payments, customer onboarding, risk analysis and simulation, regulatory reporting, and more.

Safe and secure ingestion of large data sets, rapid and scalable computing, compliant processes, and advanced analytics and insight are characteristics that allow banking IT functions to avoid cost-intensive requirements-gathering, process engineering, and application development or modification, not to mention avoiding the provisioning of compute and storage for peak loads.

For customer service and contact centers, there are virtual customer service agents with humanlike conversation capabilities, natural language processing with speech-to-text or text-to-speech services to leverage, and machine learning and AI algorithms that provide improved levels of data insight and analytics. These offerings can lower call handling times and contact churn, increase consumer satisfaction, lower employee turnover in the service center, and inform service offerings and revenue opportunities.

The major cloud providers also have prebuilt technical platform services on top of their compute and storage, such as data warehousing and analytics, event-driven computing services that scale-up compute only when required, and cybersecurity tools such as data loss prevention and authentication. To help integrate, secure, unify, and manage these applications, data, and services, there are open API platforms and management tools available.

All of these services, platforms, and tools unlock the power of the cloud. But that still won't solve the work required to initiate the journey, see it through, and sustain it over time. So what are some of the challenges and solutions to getting there?

Embarking on the journey

With most regional banks facing financial, regulatory, and operational headwinds, accelerating their cloud adoption journey is becoming critical to remain competitive.

However, there can be questions about how to embark on a cloud journey and how to ensure that the intended outcomes are realized and sustained over time. Some of the key aspects to consider at the outset include developing a target-state strategy,

effective transformation planning, and implementing a cloud enabled operating model.

Target-state strategy

Modern and current systems may be more straightforward to get to a cloud target. Older and outdated systems will inevitably be more difficult and take longer. Any manual processes may be ripe for moving straight to a straight to a software-as-a-service offering. With any diverse IT landscape, analysis is required to understand what can or must move sooner or later, what the appropriate target-state service should be, and what gaps need to be addressed in order to get there. It's also

helpful to have a view of the mix of vendors and services to leverage ensuring optimal scale and pricing, while at the same time ensuring a guard against concentration risk. Developing this target-state strategy and future-state portfolio up front ensures the organization is clear and aligned on the objectives and has a firm grasp of the work needed and budget required.

Effective transformation planning

The new target state might be to get everything onto the cloud and out of legacy data centers. However, many opt for a hybrid model of sorts, with a portfolio of cloud services and vendors and with some smaller retained data centers or colocation.



Either approach will likely include a mix of applications that move more or less as is and those that require more modification. After applications and data move, there will be redundant assets and facilities needing rightsizing or decommissioning. A robust transformation plan will consider not only application modification and data migration, but also optimization of the remaining IT infrastructure.

One proven approach to ensuring transformation success is to integrate the effort front-to-back. Establishing an end-to-end migration and decommission “factory” with integrated application readiness checks, controls, and a single source of truth can ensure dependencies are uncovered and sequencing understood, quality control is embedded throughout, migration events are managed, and controlled decommissioning and reclaim quickly follow. Operational stability can actually improve throughout a transformation and migration program, delivering the outcome at pace, safely.

Cloud operating model

The skills, processes, and organization that design, build, and operate in-house IT are not necessarily the most effective to select, integrate, and govern cloud services. Compute, system images, storage, and connectivity solutions aren't designed and built, but selected and configured. Hardware and facility capacity are no longer managed, but demand and service consumption are. Operations becomes less about managing the infrastructure and more about managing the applications and governing service levels. So talent may need to be reskilled, governance and control processes established, and organizational structures changed.

Given that people are so critical, banks need to develop strategies to hone talent with cloud skills. Although the size of the IT organization often remains flat (or perhaps contracts with greater automation), reskilling or upskilling current staff helps retain organizational knowledge at known compensation points. However, it's often

the case that there is not enough talent inhouse to fill the required roles, and a hiring strategy would be required. Such cloudskilled talent may come from larger banks, university partnerships, or talent alliances with cloud service providers.

With a target state to aim for, a transformation plan to get there, and an operating model to work within, the journey for regional banking to a cloud-based future can be successful. But how to sustain and build on that success and truly level the playing field?

Staying ahead

Having embarked on the cloud journey to level the playing field with the competition, staying there and getting ahead is the long-term goal. Some strategic considerations at this point include reinvesting the efficiencies, increasing the adoption of platforms and services, and embedding a cloud culture.

Having realized productivity gains and cost efficiencies, there is an opportunity for structural change in the run-versus-change budget over the long term. Tracking and maximizing that ratio, spending as much as possible on change activity for every run dollar required, enables continual advancement and innovation and avoids the requirement of overexpenditure to “keep the lights on.”

The target-state portfolio likely includes a mixture of infrastructure-as-a-service, some platform services, and some infrastructure-as-a-service (IaaS). Organizations can leverage the above efficiency gains to continue to move things “up the stack”—i.e. getting basic IaaS onto platforms and the platforms onto SaaS. Banks can then

have the freedom and flexibility to seek out opportunities for next-generation technologies, robotics, and AI to have a mix of emerging capabilities in the portfolio. Regional banks can then truly realize and leverage the agility their size affords to keep moving and keep ahead.

Finally, embed a cloud culture throughout the organization, one that embraces continual change, thrives on collaboration and rapid development, isn't afraid to fail, and attracts and retains new talent. Adoption of cloud-ready development and operating methodologies such as DevOps will help, as will continual assessment and management of change and communication.

Moving forward

Deloitte's approach to cloud in the banking sector melds technology with human capital, so we evaluate and address the entire spectrum—from cloud strategy to architecture, operating model, organization design, migration and implementation, and finally, managed services and workforce strategy—and provide an end-to-end framework for moving to public or hybrid cloud and enabling it as a driver of business value. We deploy a phased approach, with inherent accelerators to help fast-track your path to cloud in a regulation-compliant, secure, and safe manner. Our operating model diagnostics can highlight where capability gaps exist, as well as the most appropriate focus areas for improvement. Our workforce analytics can help make quicker, better talent decisions and fill gaps through retraining, hiring, or shifting roles in the organization.

Our value stream mapping process enables you to understand and plan the work to be done to eliminate waste and bring your cloud operating model to life.

We help you define the right cloud operating model for your organization and integrate it with your workforce strategy to enable you to scale cloud capabilities and achieve greater business value. Our services cover four overarching areas—operating model transformation, application modernization, cloud migration, and cloud managed services—to assist you with every leg of your cloud journey and help put you on the path to cloud success. Let's start a conversation.



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