

Reimagine your business with confidence



Virtusa and Microsoft case study handbook

According to [Gartner](#), spending on public cloud services is forecast to grow approximately 21% in 2023, but business and IT leaders are under a lot of pressure to optimize investments.. They're being slowed by a lack of skills and resources, compliance, and security concerns. IT landscapes are laden with a mix of legacy and modern applications and emerging technologies.

To overcome these challenges, enterprises are turning to cloud experts, Virtusa and Microsoft. By tapping into our migration, modernization, monetization, and cloud-native expertise — and bringing new thinking to the most innovative cloud platform — enterprises are solving their most complex business challenges to maximize ROIs.

Across the following pages, you'll find a collection of useful case studies highlighting businesses that have capitalized on Virtusa and Microsoft's deep industry knowledge, cutting-edge technology, skills, and best practices to reimagine what's possible.

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A large global financial service company builds a cloud foundation

To keep pace with competition and move operations into the future, a large financial services company felt it was critical to build on the Azure Cloud Foundation. With security and scalability as a top priority, the company turned to Virtusa to accelerate migration, increase operational excellence, and drive business outcomes.



The challenge

Our client had serious security and compliance (SecOps) operating concerns and needed to ensure they built a foundation for a modern Application DevOps environment. They needed to migrate to a cloud operating model focused on FinOps.

The solution

They turned to an automated provisioning of Azure Landing zone with BluePrint-as-a-code and created policy as a code (IaC) using Terraform. By building easily deployable elements with low code, containers, and re-usable patterns, they leveraged Azure DevOps and Terraform and gained greater cost management with CCoE and Azure.

The benefits

With improved support processes, thanks to integrated business development, test, and operations teams, Virtusa and Microsoft simplified the deployment and release processes for multiple parallel release cycles. By automating the provisioning of services, and with no human intervention required with modularity in infra-provisioning, the financial services company realized quick benefits, including:

- 90% reduction in full-stack environment provisioning times
- + 90% defect identification during development
- 85% increase in stability
- Shift-left security model with restricted access via Azure AD
- Security policy templates, scripts, and codes
- AKS-hosted environments
- Quicker development and integration
- Detailed insight into cloud spending for effective cost management
- Mindset/behavior transformation towards consuming the cloud services, i.e., SaaS, PaaS, and IaaS
- Pre-defined RBAC

UK bank's replatforming and modernization gives rise to a modern workplace

When a leading UK bank was ready to build a digital workplace, they relied on Virtusa's cutting-edge technology, skills, and best practices to maximize results on the Microsoft Power Platform.

The challenge

To create a modern workplace, the bank needed to migrate 90,000 users, including staff, partners, vendors, and contractors, to Windows 10. Incomplete and inconsistent EUC data across all business divisions was creating complexity. No EUC technology inventory and functionality left the business with a risk that Microsoft MMD releases could negatively impact business. No strategy to ensure that consistent and resilient technical replacement solutions were developed, and issues with data quality, integrity, security, controls, and currency ensued. There was also wide use of Excel and access-based EUCs with VBA code, presenting a greater risk of EUCs breaking due to MMD releases.

The solution

By re-platforming using the Microsoft Power Platform, Virtusa streamlined and standardized the maintenance and management of EUCs across the bank's business units. Features of the solution included a "data gather" exercise across all business divisions, creating a single repository of EUCs across the organization with standardized templates. They also implemented a EUC Inventory Software that interrogates the network and collects information, including unreported EUCs on the network. With a centralized and standardized EUC inventory and processes on ServiceNow, they developed a framework for selecting and assessing EUCs based on business risk, impact on critical business process, SOX, and technical risks related to software used, data quality/integrity, security and controls, and future support considerations.

The benefits

Along with a reduction in the number of EUC applications and manual processes, the bank benefited from a decrease in infrastructure and maintenance costs and now had a high availability of applications. They now have robust application governance, controls, and improved security and reliability.



Leading Middle Eastern bank speeds migration to Azure and sees immediate results

A Dubai-based global bank was eager to accelerate its cloud transformation to offer better services while running more efficiently. They turned to Virtusa to speed up their cloud transformation by drawing from decades of experience and deep technical expertise.

The challenge

The bank embarked on a three-year digital transformation journey but was slowed by several challenges many enterprises face. Approximately 35% of the existing hardware needed to be refreshed and upgraded, and capital expenditures had grown out of control. With ever-changing security and compliance protocols, infrastructure had become hard to keep up with.

The solution

Adopting a cloud platform was one of the key components to achieving desired business outcomes. The bank chose Microsoft Azure as the preferred platform to cut down the cost of data centers and modernize infrastructure.

As a strategic partner, Virtusa crafted and implemented an enterprise-grade cloud foundation framework to deploy the Microsoft Azure platform. The implementation included N/W, Security, IAM and Policies, ExpressRoute, Azure Security Center, Billing, Subscriptions, RG, and Monitoring.

The benefits

In the first four months, using Microsoft Azure Site Recovery and Microsoft Azure Migrate, Virtusa successfully migrated 180+ apps running on a non-production environment from an on-premises datacenter to Azure Cloud. The bank quickly realized the following benefits:

- 40% cost savings on infrastructure maintenance and overheads
- The bank was able to harness innovation using cutting-edge technology services such as blockchain, MS, AI, ML, APIs, and data analytics



Professional organization future-proofs infrastructure and migrates to Azure with ease

A global professional services organization turned to the digital transformation experts to migrate applications to the cloud and plan for the future.

The challenge

The client needed to streamline its learning content and provide a more seamless experience for the professionals they serve. But they quickly encountered some major obstacles: They needed to re-architect the current applications and then migrate them to Azure to realize the full benefits of the cloud.

The solution

Virtusa proposed a solution to migrate applications and present learning content across multiple channels. A feasibility study was conducted as part of the engagement, and Azure Kubernetes was proposed as the solution. As part of re-architecting, Virtusa developed core services to be used across all the applications and achieve end-to-end automation. Virtusa provided a continuous integration and deployment pipeline for various application stacks such as .NET core, .NET Framework, PHP, and Sitecore using ARM templates, including resource provisioning, test automation, and code analysis.

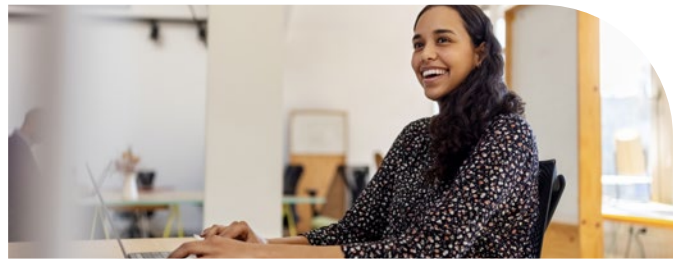
The benefits

By migrating to Azure, the organization has already seen a reduction in the maintenance of servers, faster time to market, improved disaster recovery, and improved code quality. The customer now has access to the latest technical solutions with various out-of-the-box services provided by Azure.



Healthcare leader approaches clinical data with an eye on the future

A leader in the healthcare industry was managing its clinical data using a complex platform with many drawbacks. Given the critical need to have reliable, timely, and organized clinical data, they partnered with Virtusa and Microsoft Azure to design a modern and agile platform for the future.



The challenge

The healthcare giant was faced with a range of challenges across its data platform landscape. It was complex, siloed, and inefficient, causing long development cycles. They needed a way to build a modern and agile data platform to serve various business units and departments better.

The company was under pressure because its Netezza implementation was scheduled for decommissioning, and with it, over 60 Cognos clinical reports needed to be moved out. Additionally, data transformations needed to be moved to Pyspark from the existing Ab Initio tool.

The solution

The healthcare leader sought the right partner to help build a clinical data mart on Microsoft Azure. They turned to Virtusa for our combination of healthcare industry expertise and deep knowledge of Azure.

Virtusa created a scalable modern data architecture on Azure to meet the client's unique requirements. To give users across the business better access to the data and reports they need, Virtusa built a raw data zone, transformed zone, and clinical data mart in Azure.

Virtusa integrated pre-built tools and accelerators for efficiency and automation — including PySpark Code Generators, DB Analyzer, Data Profiling, and Testing Frameworks. Virtusa also migrated the Cognos reports to the clinical data mart in Azure.

The benefits

By eliminating complexity and building a modern data platform on Azure, Virtusa helped the healthcare company ensure they remain an industry leader for years to come. Shortly after the migration, the organization was already seeing the impact. They now had a highly scalable, functional, fully managed Azure Cloud solution that unifies data engineering and data science and scalable and ephemeral compute usage.

Migrating applications to Azure PaaS to accelerate business outcomes

A U.S.-based electronics retailer was ready to turn the switch from manual, time-consuming systems to streamlined, automated processes with Microsoft Azure.

The challenge

Along with scattered data and antiquated reports, the retailer faced changing consumer behavior, new PCI and PII data legislation, high employee turnover, and customer churn rates.

The solution

By tapping into Azure's app service and modernization features, the retailer was able to quickly gain insights into data with inventory and plan management — an important step toward ensuring compliance. With Azure's Platform as Service (PaaS) capabilities, Virtusa could migrate large chunks of code and complicated business processors to low-code solutions using logic and function apps and connectors to add development functionalities without adding staff.



Additionally, the retailer implemented a backup and disaster recovery strategy using Azure ASR and Recovery Vault and deployed pre-built microservices to orchestrate business needs quickly.

The benefits

By transforming the technology stack to Azure PaaS, the retailer quickly realized the benefits of application modernization with a 30% reduction in infrastructure and maintenance costs and centralized application-related credential management with the introduction of Azure Key Vault. They converted the iterative development modal to a SCRUM model powered by Azure VSTS CI/CD to scale for business dynamics. They also implemented Azure APIM as an API layer, which grows as the business logic layer for the business, reducing the integration effort in future development.

A large global financial service company builds a cloud foundation

As a leader in customer experience, a leading HR and payroll company was ready to move beyond legacy infrastructure to drive growth and streamline services while lowering costs. Knowing Azure was the most innovative platform, they turned to Virtusa, the right-sized partner with the right tools, accelerators, and expertise to modernize their applications.

The challenge

The client was looking for a non-scalable report generation process to overcome challenges such as a costly and non-compliant Adobe PDF Software for report generation and a database that was significantly loaded and sporadically blocked further connections.

The solution

Along with migrating key applications and services (PowerBuilder) to take advantage of Azure functionality, app service, and modernization features, Virtusa helped re-architect with serverless Azure Process orchestration for parallel report generation with elastic scale.

Other processes included decoupling the paystub generation process to enhance the generation of printable reports and documents and creating high availability and resilience for all newly designed components. A comprehensive process document was introduced to capture data, and an iterative, pilot, and go-live migration strategy was developed for enhanced visibility.



The benefits

The client immediately saw some meaningful results by modernizing infrastructure and moving towards automated processes. With a 30-40% reduction in infrastructure maintenance cost by transforming the technology stack to Azure PaaS and a 30% decrease in overhead time required for report generation and distribution. By creating an elastic scaling for check stub and reporting generation to help triple growth, legacy and non-compliant software were eliminated, and insights are now available to organizational teams for better planning and forecasting.

Virtusa + Microsoft

A winning combination

Reimagine your business with trusted partners and a proven track record:

- Modernizing Infrastructure & Building Cloud Native
- Monetizing Data & AI
- Ensuring Security
- Supporting Business Applications
- Creating a Modern Workplace

Speak to an expert to get started.



Microsoft Azure

Microsoft Azure is an ever-expanding set of cloud computing services to help your organization meet its business challenges. With Azure, your business or organization has the freedom to build, manage, and deploy applications on a massive, global network using your preferred tools and frameworks.

Learn more at www.azure.com