Cloud Connectivity for Digital Transformation.

Migrating data from on-prem to multicloud for digital transformation strategies in the hospitality and entertainment industry.





About the Company

A global leading hospitality and entertainment company, with 65,000 employees and \$5B in annual revenue, pursued a dedicated connectivity solution to undertake a fast and flexible digital transformation process. With a strong focus on customer loyalty and operational efficiencies, through digital transformation, the Company aimed to streamline their marketing processes, in order to increase their agility and speed to market, to create curated online experiences based on their customers' hospitality and entertainment preferences. In order to accomplish this, the company opted to migrate its existing two-petabyte (PB) on-premises Apache Hadoop platform to the cloud.

The Company undertook their customer-focused digital transformation project in two phases. Each phase had its own set of challenges – and solutions incorporating Megaport connectivity.

Case Study Snapshot

- Completed a two-phase digital transformation project on time and under budget.
- Migrated two-petabyte (2PB) on-premises Apache Hadoop platform to Microsoft Azure.
- Saved on time and costs by moving data over to Azure in 26 days, a 93% decrease in the typical time frame needed to complete a full migration over VPN.
- Established a multicloud network architecture with connectivity to Google Cloud Platform.

PHASE ONE: APACHE HADOOP MIGRATION TO MICROSOFT AZURE

Challenges

Speed to Market: The Company was focused on gaining valuable insights into their customers' preferences by implementing an improved data analytics system in the cloud. This would mean they'd be able to deliver increased capabilities to their marketing team in a shorter time frame than currently available – enabling a quicker go-to-market process and ensuring their products and services gained a competitive advantage within the hospitality and entertainment industry.

Future Cost Projection: The Company needed to minimise their data centre space and remove costly infrastructure to save on costs now and into the future. By decommissioning the existing on-premises infrastructure supporting the 2PB Apache Hadoop environment, composed of 246 servers spread out across 14 racks, this would give the organisation costly data centre space back. They would also avoid having to expand their footprint and spend on the additional infrastructure associated.

Connectivity Limitations: VPN throughput in to Microsoft Azure is limited to 1.25Gbps. With this restriction, it would take the Company 370+ days to migrate their entire 2PB. This would likely extend project estimations, negatively impact financial forecasts, and delay other efforts as part of the overall digital transformation initiative.

Solution and Benefits

The Company leveraged Megaport's high-performance Software Defined Network (SDN) to complete their Apache Hadoop migration to Azure. Establishing two 10Gb Ports with Virtual Cross Connects (VXCs) to Azure, they were able to provision fast, flexible, and direct access to the cloud and transfer the entire 2PB of data to Azure within 26 days.

They benefited from a 93% decrease in the time frame considering how long it would typically take to migrate the data over VPN. This allowed the company to decommission the 14 racks of equipment as originally planned and begin to build new features for their data analytics platform in Azure.



PHASE TWO: GOOGLE CLOUD INTEGRATION FOR MULTICLOUD

Challenges

Egress Costs for Incremental Data Transfer: During the Company's migration process from their onpremises Apache Hadoop platform, their project team discovered a separate entity within the organisation leveraging Google Cloud Platform to conduct marketing analytics. Incremental transfers of data were being copied from Apache Hadoop to Google Cloud as part of standard operations. As the Company's on-premises Apache Hadoop platform was now decommissioned, and was in Azure, the egress costs from data leaving Azure destined to Google Cloud Platform, over the Internet, exceeded the department's budget.

Solution and Benefits

Provisioning two additional 10Gb Ports through their self-serve Megaport account, the Company's networking team established private, high-speed, and dedicated connectivity to Google Cloud Platform. Their new VXC provided multicloud connectivity between Azure and Google, reducing costs and increasing efficiencies as data traversed cloud environments.



Future plans

The Company's next phase of operations will include migrating the their 1.4PB enterprise data warehouse (EDW) from their on-premises data centre into an Azure environment. This will allow for a more elastic expansion of EDW services without the need to invest in additional infrastructure, providing increased agility and reduced time-to-market. The Company plans to leverage Megaport-enabled cloud connectivity to migrate this data without impacting existing operations.

References

- Azure migrate on premise data to Azure
- Azure VPN gateway specifications

- ()



More information

We make connectivity easy

Megaport is the highly scaled Network as a Service (NaaS) organisation utilising 100 Gbps technology to deliver dedicated access to cloud services. The Company's Software Defined Network (SDN) enables the interconnection of enterprises and service providers across hundreds of data centre locations around the globe. Fast, flexible, and dynamic, Megaport's connectivity solution is transforming the way businesses reach leading cloud services from Microsoft, Google, Oracle, Amazon Web Services, Nutanix, IBM, Salesforce, and Alibaba.

megaport.com info@megaport.com Phone: +61 7 3088 5999 Fax: +61 7 3088 5998

Level 4, 825 Ann St, Fortitude Valley, 4006, AU.



ABN: 46 607 301 959

@megaportnetwork

in @megaport

#GETAMEGAPORT