City of Pittsburgh Moves to Google Cloud

Cloudbakers cloud experts facilitated the City of Pittsburgh's VM migration from on-premise hardware to Google Cloud; leveraging Google Cloud VMware Engine as a fully managed service. The City of Pittsburgh (CoP) Department of Innovation & Performance will transform and modernize its IT infrastructure onto Google Cloud.

The challenge

The CoP IT infrastructure had many constraints due to the capacity and age of the existing hardware. CoP had limited resources, not being able to scale and meet the demands of their employees and technical requirements. The IT staff did not have cloud experience to quickly deploy, migrate, and support the cloud infrastructure ongoing.

In order to remove these restraints, CoP needed to migrate their workloads to the cloud environment to expand their on-demand storage capacity, take advantage of dynamic compute capacity, and reduce their operating costs through gained efficiencies. The IT staff needed to quickly be onboarded to cloud services and understand Google Cloud Platform from the ground up.

The approach

- Core Organization Setup: Cloud Foundations to provision infrastructure as software; from network to compute resources through Terraform
- Partner Interconnect: ISP enabled connectivity from Co-Lo facilities to Google Cloud providing high bandwidth needs for live migrations
- Application Migration**:** Stratozone inventory & HCX VM migration tool deployment
- Google Cloud VMware Engine: VMware-based infrastructure migration to Google Cloud without changes to your apps, tools, or processes.
- Layer-2 Network Extension: IP based traffic extension between on-premise to Google Cloud for easy migrations
- Integrated Professional and Managed Services team: setup environment monitoring and alerting with Google Cloud Platform's operations suite for long-term support and continual improvement

The results

Over 100 VMware VMs were migrated to GCP with new IP addresses. The Technical Infrastructure Workshops for Google Cloud Platform Foundations, Google Cloud Platform Landing Zone, and Infrastructure as Code pipeline via Terraform ensures the new environment is sustainable long-term. This solution reduced infrastructure costs while increasing on-demand compute and storage.

> "Google Cloud removed the challenges we had identified early and laid a path with very few obstacles we would have to overcome."
> –PHIL SAVINO, Asst. Director of Operations

About City of Pittsburgh

The Department of Innovation & Performance supports software applications and hardware devices used by departments and employees, including enterprise applications, data engineering, computing, mobile devices, as well as Internet of Things (IoT) devices.

Industry: Government

Location: United States

About Cloudbakers

We bring the cloud down to Earth. The future of your business hinges on adopting and adapting to changing technology – that's what we're here to help with.

Products

- Google Cloud VMware Engine
- Google Compute Engine
- Cloud Operations
- Virtual Private Cloud
- Partner Interconnect
- Stratozone