



Network modernization

Optimize cloud networking

Optimize networking in, to and across hybrid cloud environments

Introduction

The network is crucial and is often the defining factor determining success or failure in cloud initiatives. From creating private clouds to enabling public cloud transformation, or a hybrid approach covering both, our cloud networking solutions and services bring cloud to life. We connect and automate modern hybrid and software-defined infrastructures to ensure peak application performance and security, all while delivering the best user experience, with operational and cost efficiencies that help deliver the promise of cloud through an agile network infrastructure that meets your evolving business needs.

A critical first step on the Basildon Borough Council's transformation program was improving their existing technology infrastructure. Working together, we upgraded their network for enhanced connectivity and linked their data center services to our managed service. **By taking care of their IT infrastructure, we can not only reduce cost and improve security, but dramatically enhance the end-user experience for their 1,000 employees.**

Solution approach

For the modern organization there is increasing pressure from both customers and employees to adapt quickly to changing demands and to use technology as an accelerator. Cloud solutions have emerged as one of IT's biggest enablers. However, the myriad of public cloud, private cloud and on-premises platforms hosting internal and external applications and data can be extremely challenging to access at speed, to connect to one another and manage as a cohesive whole.

As digital transformation continues at speed, applications – and the data they create – are the greatest contributors to an organization's value and their ability to sustain growth. The same can also be said for the infrastructure that supports applications, enables them to scale and perform, so they can be consumed by users and stakeholders wherever they are.

For cloud transformation to continue at an accelerated pace, it's critical that network architectures stay ahead of the shift in users, devices and applications.

As our 2021 Global Hybrid Cloud Report shows, **network performance and availability is the second biggest barrier to hybrid cloud adoption**. For a hybrid cloud strategy to be fully effective, it's vital the network is well architected to meet the needs of modern-day infrastructure, particularly if it was designed and deployed precloud. Older networks simply won't cope with the new requirements brought about by a cloud operating environment. Modern network architectures make use of software-defined networking technology, network virtualization and consistent service insertion across on-premises and cloud platforms. It brings the network from the hardware world into the software world, enabling greater automation and provisioning network resources on-demand, similar to the way cloud resources are provisioned.

Reimagine your network in the cloud era

Cloud isn't just an execution venue for your applications, it's an operating model. Network technology, management techniques and financial models have evolved dramatically since the advent of cloud.

This provides an opportunity for organizations to improve how their networks underpin business objectives. The use of software-defined approaches, new automated and AIOps enabled operating models and easy-to-consume and flexible network services, together with capex, opex, subscription or perpetual licensing and as-a-service models have forever changed the networking landscape.

'Technology is key to the outstanding services we want everyone to access. It can transform the relationships we have with our **communities, enabling them to help themselves, each other and us to together make the places we live and work in be the best they can be.**

Basildon Borough Council | UK and Ireland

Services overview

We provide applications and data with the best possible network foundation and connectivity, irrespective of which public, private or hybrid cloud they're located on.

- **Global network infrastructure:** Globally available IP Transit, MPLS, SD-WAN and cellular data services all with cloud connectivity options.
- **Global Data Center Interconnect:** Over 500,000m² of data center space in key markets with high-speed, cross-connect services to public cloud providers.
- **Consulting Services:** Business, infrastructure and operations consulting for networking, cloud and security, to navigate the best possible outcome.
- **Managed Services:** Portfolio of platform-delivered services providing automation, AIOps, real-time monitoring and operational management of multivendor, multitechnology networks and clouds.
- **Support Services:** Globally consistent SLA-driven support across hardware and software assets that help realize the business value of network investments.
- **Technical Services:** Design, deploy, program management and logistics capabilities to operationalize network transformation initiatives quickly and effectively.

Addressing your challenges

Challenge	How our solution addresses it
Reduce risk	Our secure-by-design approach considers security controls that provide maximum protection, detection and response. Consistent management across hybrid infrastructure helps mitigate threats and continually improve defences.
Improved performance and end-user experience	We architect networks with applications, data and end-users in mind to provide the very best performance for physical, virtual or container-platformed applications, and accelerating traffic for exceptional quality of experience for all local and remote consumers of application and business services.
High-speed cloud connectivity	Our global data center and network infrastructures provide multiple high-speed cloud connectivity options (cross-connect, VPN, direct connect); from our data center facilities, from our MPLS and SD-WAN networks and our global IP Transit services.
Operational efficiency	We offer a set of platform-delivered cloud, network and security managed services that include single portal access, consistent ITSM, automation, AIOps, analytics and reporting for leading operational capabilities.
Access to skills	We have a global footprint of skilled people and over 5,800 network certifications that enable us to assist clients with the most demanding and sophisticated projects. In addition, our skills transformation, learning platforms and InnerSourcing programs ensure we continue to invest in this area.
Greater agility	Our end-to-end network capabilities provide the foundation for organizations application portfolios and are able to flex as business requirements evolve to drive the very best application outcomes.

The NTT advantage

We're one of the world's largest providers of networking solutions and services. Our portfolio of services include consulting, technical, support and managed services to help clients at any stage of their cloud journey. Our significant investments in data center and cloud infrastructure can be leveraged by clients wishing to consume cloud connectivity services. We build network infrastructure foundations for the most demanding applications residing across hybrid cloud landscapes that help deliver business objectives.

'Organizations require a partner that provides a network foundation that enables their hybrid cloud ambitions, connects globally-distributed, **multicloud environments and delivers agility and operational efficiencies while security posture and costs are managed.**

Why NTT?



Global Managed Services Platform

Leading provider of innovative and platform-delivered automated and AIOps-enabled managed services.



Deep cloud and security capability

We're able to couple our networking pedigree with recognized capabilities in cloud and cybersecurity to deliver a multitower approach to success.



Leading network provider

We've been named a Leader in the Gartner Magic Quadrant for Network Services, Global and we're ranked highest in Global Critical Capabilities for Network Service, Global.



Global coverage

Network, cloud and data center services coverage in over 190 countries.



Together we do great things