



International survey pinpoints operational maturity, scalability, sustainable IT infrastructure, diverse connectivity and real-time visibility as key colocation needs

About the survey

This independent survey polled 500 ClOs, CTOs, IT Directors and Heads of IT of global businesses based in the United States, the United Kingdom, France and Germany to gain insight into the state of their digital strategies and their needs and expectations as they relate to third-party data center colocation. Conducted in March 2021 by Vanson Bourne, a global technology market research consultant, the survey breaks down data according to business size, industry sector and country. The research used an online fieldwork methodology and adhered to the latest MRS Code of Conduct.

A new international survey conducted by Vanson Bourne for QTS Data Centers, a leading provider of software-defined and mega scale data center solutions, revealed that 79% of large enterprises with more than 3,000 employees agree or strongly agree that their digital strategies are rapidly increasing their companies' requirements for third-party colocation services. The study also identified several key requirements for outsourced colocation among large enterprises:



agree or strongly agree that a third-party colocation provider with a proven pedigree of operational maturity serving the enterprise space is important in its company's selection criteria.



agree or strongly agree that the ability of a third-party colocation provider to rapidly scale with its business is important.



report that access to multiple types of connectivity to support their digital strategy has increased in importance over the last 12 months.



report that selecting a thirdparty colocation partner with the ability to demonstrate sustainable infrastructure and business practices has increased in importance over the last 12 months.



report that a third-party colocation partner that enables real-time visibility and control of deployments has increased in importance over the last 12 months.



"The Vanson Bourne survey results echo the increasing requirements we are seeing from large enterprises as they expand their IT environments in response to digital transformation," said Sean Baillie, Chief of Staff, QTS. "What used to be normal requests for 250–500 KW environments are now becoming multi-megawatt, multi-site, hyperscale-like requirements architected for continued expansion."

In addition to validating the centrality of outsourced colocation in enterprise digital strategies, the survey provides more granular details on enterprise requirements for data center services.

<u>Digital strategy continues to drive</u> business success

The Vanson Bourne survey confirms the relevance of a company's digital strategy in meeting its business goals. According to the survey, 94% of large enterprise IT leaders across the U.S., the U.K., France and Germany agree or strongly agree that their digital strategies are central to their success. This metric saw very little variation by industry or business size, and only a slight variation by country—with the U.S. tallying a high of 99% and France and Germany on the low end with 90%.

While digital strategies have been at the root of enabling business to more quickly and effectively meet strategic objectives and address customer needs, COVID-19 has significantly accelerated digital transformations. Dell's Digital Transformation Index 2020 reports that the pandemic highlighted the need for a more agile and scalable IT environment for 89% of global IT leaders. A well-defined, digital strategy can help a business achieve the flexibility necessary to quickly pivot to address the ever-evolving business landscape and stay ahead of the curve.

Third-party colocation services tapped to support digital strategy

According to the survey, 79% of large enterprise respondents agreed or strongly agreed that their digital strategy is rapidly increasing their requirements

for third-party colocation services. While data was relatively consistent across mid-sized and large business, it varied somewhat by industry with 86% of business and professional services organizations agreeing or strongly agreeing to represent the high end of the scale and 74% of retail, distribution and transport companies on the lower end. The differential is more pronounced by country with 56% of the U.K. agreeing or strongly agreeing as compared to France with 78%, Germany with 85% and the U.S. with 91%.

COLOCATION MOVES BEYOND SPACE AND POWER

These results support the ongoing reliance on outsourced colocation services. Yet, the report also highlights the importance of a colocation provider delivering more than just space and power.

While more than three-quarters of large enterprises say their digital strategies are expanding their need for colocation services, just 5% describe their digital strategies as colocation centric versus cloud based at 37%, hybrid at 36% and managed hosting and services at 27%. These data points seem to suggest that strict colocation—simply the delivery of space and power—is no longer enough.

Not surprisingly, the underlying infrastructure also seems to vary along industry lines. Cloud is most widely used in a digital strategy in the business and professional services market with 53% and the least in financial services with 28%. This is likely because of the intense security and compliance demands on the financial services industry.

Hybrid is also widely used with 28% of business and professional services; 32% of financial services; 26% of IT, technology and telecom; and 37% of manufacturing and retail, distribution and transport. This solution allows each organization to place workloads in the most appropriate environment to deliver the requisite performance, security and more.

Colocation services that can connect businesses or help them build business-focused hybrid IT



strategies are increasingly essential. As businesses continue to look to third-party colocation services to support their needs, these providers must offer a comprehensive solution that allows businesses to access the services they need, while also delivering the space, power, security and compliance required of a colocation solution.

Survey data also suggests that businesses are relying on third-party colocation that can deliver a high level of operational maturity, scalability, sustainable IT infrastructure, customer service, diverse connectivity options and real-time visibility.

The study analyzed these key factors, asking global respondents to prioritized them according to their first, second and third choices.

Important third-party data center services for large enterprises:

Scalability

59%

Operational maturity

58%

Sustainable infrastructure

52%

High-touch customer support

42%

Diverse connectivity options

42%

Visibility and control of colocation environment

41%

This data offers a deeper understanding of the services and supports businesses expect of a colocation provider to support their digital strategies. To gain further insight into the value of each of these offerings, the survey assessed each independently.

Scalability supports growth and evolving needs

With 59% of large enterprises ranking it in their top three data center needs, scalability is an essential element of successful colocation. When evaluated independently, 80% of large enterprise IT leaders agreed or strongly agreed that rapid scalability is important to their businesses. The survey showed minimal variance between the answers based on business size or vertical market. However, according to geography, the U.K. was the outlier with a 66% agreement rate versus the U.S., France and Germany with 89%, 83% and 82%, respectively. The percentage of respondents that disagreed with this statement was low across the board, demonstrating the criticality of being able to scale power and space to meet business demands.

Many businesses outsource their data center needs because they lack the in-house expertise or resources to support their needs into the future. When evaluating colocation providers, businesses need to ensure the data center has the space and power supply to grow with them and allow the business and its goals to evolve uninterrupted. This is particularly important as IT migrations are complex, time consuming and expensive. Migrating to a new data center because the original facility could not support new demands can impact the bottom line and overall business success.

Operational maturity provides confidence in data center capabilities

For 86% of the large enterprises surveyed, a proven pedigree of operational maturity serving enterprises is important to their businesses. This information is relatively consistent across international locations, with the U.S. at 91%, France and Germany at 87% and the U.K. at 80%. Across vertical market, business and professional services and retail, distribution and transport weighted operational maturity slightly higher than the other markets with 98% and 93% agreement, respectively. Other vertical markets polled in the mid to high 80% range.



Offering a strong level of confidence in the ability to operate a data center and support complex customer requirements is essential for third-party data center providers as businesses rely on them to ensure highly available, secure environments that support their critical infrastructures and data. This level of expertise and technical prowess is built over years of experience.

Operational maturity is the cornerstone of delivering this experience by integrating operational integrity, innovative technology and best practices, and an unrivaled customer experience.

A sustainable environment supports the future

Sustainable practices have increasingly been in the spotlight. As a huge consumer of energy and water, the data center industry is increasingly challenged to take the initiative to employ more eco-friendly practices.

The findings of the Vanson Bourne survey support the importance of sustainable efforts among outsourced data center providers. In fact, 71% of large enterprises said that selecting a third-party colocation partner with the ability to demonstrate sustainable infrastructure and practices has become increasingly important over the last 12 months. This commitment varies by country with 84% in the U.S., 71% in France and 73% in Germany acknowledging that it has become more important, as opposed to 40% in the U.K.

Data centers need to take this message to heart as the industry is responsible for 3% of global power consumption and 2% of greenhouse gas emissions.

Corporate giants such as Facebook and Microsoft have already embraced sustainability. Microsoft, for example, plans to cut its carbon emissions in half by 2030. These businesses are also expecting their partners to commit to more sustainable practices to continue doing business with them.

Akamia, a global content delivery network, cybersecurity and cloud service company, is also focused on sustainability with plans to utilize 100% renewably sourced energy across its data centers

and offices. Like Facebook and Microsoft, they are dedicated to partnering with like-minded businesses.

Putting forth a concerted effort to conserve energy and water and minimize waste will likely continue to be an increasing expectation among colocation customers, making sustainable choices increasingly critical elements of data center operational strategies and forward-looking paths.



A single large data center may require 100+ megawatts of power capacity—that is enough to power 80,000 U.S. households.

(U.S. Department of Energy)



The data center industry is currently responsible for 2% of greenhouse gas emissions—that rivals the airline industry.



A data center uses approximately 360,000 gallons a day—enough to fill half an Olympic-sized pool.

High-touch customer service remains key amidst technology focus

Delivering an exceptional customer experience can be a key differentiator among data centers as the industry has been largely commoditized. A strong customer support model moves the data center beyond offering technology, availability and security to create a powerful partnership that supplements these basic requirements.



The results of the Vanson Bourne survey echo this sentiment with 42% of large enterprises ranking high-touch customer service in their top three needs. Other studies agree, including one that reports that 46% of businesses are prioritizing the customer experience over the product and its pricing strategy over the next five years.

In a technology-oriented environment, the customer experience must not be discounted or overshadowed by artificial intelligence (AI), automation and other digital innovations. High-quality human interactions must remain central to ensure the strength, growth and success of the relationship.

<u>Diverse connectivity options support the</u> <u>digital strategy</u>

According to 79% of large enterprises, access to multiple types of connectivity to support their digital strategies has increased in importance over the last 12 months. Response to this question was largely geocentric with 90% of U.S. respondents reporting an increase in importance and 66% in the U.K. reporting the same.

Results varied to a lesser degree across market segments with 89% of retail, distribution and transport ranking access to multiple connectivity options as increasing in importance while financial services; IT, technology and telecom; and manufacturing were on the other end of the spectrum with 78%.

Regardless of the diversity of answers, more than three-quarters of IT leaders across location, size and industry exhibited a growing need for diverse connectivity options, making connectivity an integral piece of global digital strategies.

As businesses continue to diversify their IT landscapes and introduce geographic diversity, hybrid solutions, edge deployments, and distributed workforces, the ability to connect these environments becomes more critical. A portfolio of connectivity options, such as multiple on-net providers, cross connects, dedicated and blended internet and cloud direct connects allows

businesses to choose the solution that works best for the business or a specific situation.

Carrier neutral data centers, for example, provide the flexibility to enable businesses to utilize the carrier of their choice. This opportunity also encourages competitive pricing and better service delivery.

EDGE STRATEGY DRIVES NEED FOR CONNECTIVITY

The increasing integration of edge deployments further drives the need for diverse connectivity options. According to the survey, 78% of large enterprises agreed or strongly agreed that edge deployments of their IT infrastructures would be central to their digital strategies over the next year. However, just how integral the edge is varies by country as 57% of U.K. respondents agreed or strongly agreed with the statement as opposed to 78% in France, 83% in Germany and 94% in the U.S.

Across market segments, the results are also somewhat varied with 86% of business and professional services; manufacturing; and retail, distribution and transport agreeing or strongly agreeing versus 71% of financial services.

As end users increasingly demand low-latency delivery, businesses rely on edge deployments to decentralize compute and storage, and place workloads closer to where the data is being created and consumed. However, as much as businesses integrate edge deployments in their digital strategies, the centralized data center will always be necessary to leverage the benefits of scale and data analytics.

To move data between edge locations and the core data center, businesses will rely on diverse connections.

The rise of edge deployments is well documented by <u>Gartner</u> which expects the amount of enterprisegenerated data created and processed outside a centralized data center or cloud to grow from 10% in 2018 to 75% by 2025. Gartner also notes that while <u>91% of today's data is created and processed in core data centers</u>, by 2022, an estimated 75% of all data will need analysis and action at the edge.



This is likely based on the expected introduction and growth of new applications and capabilities—including 5G deployments, autonomous driving, Al-driven capabilities and virtual reality—which will demand low-latency data delivery and unfaltering network performance.

Whether connecting the central data center to edge deployments, cloud service providers, other data centers or any other location, diverse interconnections ensure businesses can connect to where they need to be with the appropriate speed and security.

Real-time visibility strengthens control and enables data-driven decisions

Al and other IT innovations have changed the scope of business expectations, offering opportunities for realtime insights previously unavailable.

The survey reported that 68% of large enterprises believe the ability to work with a third-party colocation partner that enables real-time visibility and control of deployments increased over the last 12 months. This question had tremendous diversity along country lines with the U.S. and U.K. at opposite poles with 83% and 49%, respectively.

Access to real-time information about the data center environment offers enterprises tremendous opportunities to optimize the environment and make more data-driven decisions. These insights can strengthen security, improve allocation planning and head off potential issues before they impact availability.

Survey results validate QTS data center initiatives

QTS OPERATIONAL MATURITY AND CUSTOMER FOCUS

This data corroborates the business decisions and direction of QTS Data Centers. Its years of operating mega scale data centers and addressing complex customer requirements has fostered an industry-leading level of Operational Maturity that is founded on

three critical, customer-focused pillars—Operational Expertise, Operational Discipline and Operational Partnership.

These pillars ground and guide its highly skilled and knowledgeable team, its leading-edge technology and best practices, and its commitment to an unparalleled customer experience.

This commitment is evident in its rolling Net Promote Score of 88—a score that nearly doubles that of the closest data center provider.

"The survey validates our commitment to delivering innovative technology with a human touch," said Sean Baillie, Chief of Staff, QTS. "Our operational maturity allows us to deliver on customer needs while keeping a keen eye on the future of data center services—specifically the delivering data center transparency and real-time visibility."

With more than 7 million gross square feet of data center space in North America and additional square footage in the Netherlands, QTS offers its customers access to the space and power they need—now and in the future. Its 28 strategic locations also provide the geographic diversity necessary to build a resilient, high-performing environment.

ROBUST CONNECTIVITY OPTIONS

QTS also offers the diverse connectivity solutions to connect these facilities to anywhere businesses need to be. Offering carrier neutral connectivity and a growing ecosystem of networks, software-defined data centers and direct on-ramps to the world's five largest clouds, QTS world-class data center interconnection solutions are designed for automation and integration. Additionally, its Switchboard product allows enterprises to connect to multiple locations from a single port, simplifying, speeding and controlling the costs of connectivity.

Its Richmond, New Jersey and Hillsboro data centers also serve as Network Access Points (NAPS), allowing services that utilize subsea cables to peer and interconnect.



EDGE DEPLOYMENTS

QTS' ability to offer both core and edge data center services within its existing footprint has been critical to its expansive customer base. According to US Census Bureau data, QTS' 24 U.S. data centers, coupled with its on-net network partners, offer low-latency connectivity to more than 90% of the U.S. population.

REAL-TIME VISIBILITY AND CONTROL

QTS Operational Maturity is also evident in its commitment to continually invest in its data centers and drive innovative solutions. QTS' proprietary Service Delivery Platform (SDP) offers real-time views of the customer environment, including access to power draw metrics, badging data, asset management tools and more. Using SDP, customers have complete transparency and control of their data center environments from anywhere, anytime and on any device. This level of visibility and control is not offered by other data centers.

SUSTAINABLE PRACTICES

QTS is also committed to incorporating sustainable practices and minimizing its carbon footprint. Its sustainability goals include:

- Procuring 100% of its power from renewable energy sources by 2025
- Pursuing Green Building Certifications in 90% of its facilities by 2025
- Conserving at least 15 million gallons of water per year
- Installing EV charging stations at 75% of QTS facilities by 2025
- Recycling 90% of operational waste by 2025

These initiatives are already making an impact and contributing to a more eco-friendly environment.

Using rain harvesting systems, QTS has collected **9+ million gallons** of water, which it reintegrates into its cooling systems.

QTS has recycled **103,260,779 gallons** of water since 2019—equal to 103 Olympic-sized pools.

QTS has recycled over **1.2 billion pounds** of material—the weight of 75% of the Golden Gate Bridge.

QTS' annual green power usage in 2019 was more than **324 million kWh**—enough to power the Dallas Cowboys Football stadium for 13 years.

The Vanson Bourne survey paints a picture of the direction businesses are headed with respect to their IT environments and business expectations. As global businesses continue to adapt and execute their digital transformations, data center colocation services are positioned to have a growing place in these digital strategies.

ABOUT QTS

QTS Data Centers is a leading provider of data center solutions across a diverse footprint spanning more than 7 million square feet of owned mega scale data center space within North America and Europe. Through its software-defined technology platform, QTS is able to deliver secure, compliant infrastructure solutions, robust connectivity and premium customer service to leading hyperscale technology companies, enterprises, and government entities. Visit QTS at www.qtsdatacenters.com, call toll-free 877.QTS.DATA or follow on Twitter @DataCenters_QTS.