

Cloud Trends: 2021

What must organizations do to adapt to new realities and accelerate their cloud modernization journeys?



Introduction

Charles Darwin's words (paraphrased) have never resonated more

66 It's not the strongest of the species that survives, nor the most intelligent that survives. It is the one that is the most adaptable to change.



Whether by design or duress, organizations have had to adapt to a new way of doing business in the past 12 months.

That's what this ebook is all about... adaptability. In the first four trends we can see the direct impact of the COVID-19 pandemic and the massive impact it has had on businesses globally; many have adapted and managed to survive—and even thrive—by transforming the way that they work and how they deliver services to customers. The latter two trends are about the actual act of adapting, both organizationally and technologically.

More than ever before, enterprises need to find ways to become—or remain operationally resilient, flexible to changing business conditions and cost conscious. It just so happens that, done right, the cloud promises all of those things.

Read on to learn why digital transformation is more important than ever in meeting the challenges and opportunities that lie ahead in 2021 and beyond.

 $\underline{Dave} \& \underline{Jez}$ - Hosts of Cloudbusting Podcast

Our trends are based on research carried out in partnership with IDC. Focused on North America, the research surveyed over 200 CIOs asking how the COVID-19 pandemic has influenced their role as well as their organization's outlook and approach to cloud and digital transformation. The results have been collated in the InfoBrief: U.S. Businesses Become Future-Ready with Large-Scale Cloud Migration





Cloud Trends: 2021

Trend #1: The Modernization Era

The first public cloud was launched by Amazon Web Services in 2006; other public clouds, such as Microsoft Azure, Google Cloud Platform and Alibaba Cloud, soon followed.

Over time, we have noticed several eras of cloud—distinguished by key adoption drivers, sponsors and challenges. *IT Driven Adoption, Business Experimentation,* and most recently, *Business Transformation.*

The Modernization Era





Era 1: IT Driven Adoption

Initially an IT driven technical toolset, early cloud adoption was highly tech centric, largely driven by cost savings use cases and attempts to exit the data center. This is still the case today for some organizations. But the cloud isn't only about technology. It's also about people and culture - and IT has struggled with this concept.

Insurance Company Tries and Fails—to Adopt Cloud

Like many insurers disrupted by digital transformation, a global insurance provider sought to harness cloud technology to boost operational efficiencies. But after making several attempts to adopt public cloud, it was proving difficult to realize the benefits it expected at scale. Instead, these failed attempts to put a cloud strategy in place led to low acceptance from business users, competing and costly shadow IT initiatives, and lack of governance for consumption and security.





Regional team in Global Financial Services company adopts cloud

The UK team within a large, global financial services company want to bring a valuable new product to market quickly. Rather than wait for the Global IT department, the region started ordering their own cloud services directly.

They were able to achieve the agility and accelerated time-to-market that they required but via a shadow-IT initiative.



Era 2: Business Experimentation

More recently, we have seen the rise of business experimentation. This is where organizational entities (be they regions or departments like HR and marketing), have sought to adopt cloud services directly into their lines of business sometimes without the involvement of central IT. These business cases are often about increasing agility and revenue, or opening up new channels and new services to the market.

These cases are often associated with shadow-IT which can be problematic with central IT teams and in some cases led to the rise of the Chief Digital Officer role.



Era 3: Enterprise Modernization AKA The Modernization Era

The COVID-19 pandemic has accelerated transition into a third era, where joining the dots between large scale cost-centric and IT-driven work and business revenue-driven lighthouse projects will open the door for larger scale enterprise-wide modernizations.

Truly successful transformations will occur when the business drives it and partners with IT to achieve it. It's about business and tech transformation happening in step with each other at enterprise scale. The result is the elimination of shadow IT and an inclusive transformational approach.

We further explore COVID-19's role as a catalyst for digital transformation in our next trend...



Energy Company Involves Business Stakeholders for Successful Cloud Adoption

A global energy company engaged a cloud expert to facilitate cloud strategy workshops with each of its four regional teams. Stakeholders from IT and across the business were involved in creating a holistic strategy, supported by a mutually agreed-upon actionable roadmap. The cloud operating model defines new ways of working, with repeatable frameworks and new tools, to help the organization accelerate its cloud transformation, minimize disruption and gain operational efficiencies.

Trend #2: Continuity-Driven Transformation

Historically, business cases for digital transformation have been largely driven by cost savings or agility—or both.

The pandemic of 2020 has changed all that. It has been the catalyst for a third type of business case: *continuity-driven transformation*. The pandemic has accelerated modernization and innovation in a way the world has never seen before, driving organizations to recognize how much change is truly possible with technology.



Organizations will be focusing on accelerating the removal of physical data centers, equipment and people from their digital supply chains. Why? They represent significant continuity, competitive and operational risks. We only have to look at what happened a few months ago... businesses with onpremise infrastructures took weeks to pivot to a remote working model. On the other hand, businesses operating cloud infrastructures made the transition in just hours or days.

The goals... first, ensuring businesses survive in the short term, and second, ensuring they can fully function in the face of future crises. Pandemic response will move up much higher on the priority list than ever before.



Leadership perspective on large-scale migration to public cloud²

Nearly **two-thirds OF CIOs** asked executed as planned or accelerated digital transformation because of the pandemic.²

29.5% indicated that the pandemic **has accelerated their organization's digital transformation plans**.²

We've seen two years' worth of digital transformation in two months. From remote teamwork and learning, to sales and customer service, to critical cloud infrastructure and security - we are working alongside customers everyday to help them adapt and stay open for business in a world of remote everything."

- Satya Nadella, Microsoft CEO, April 2020

2. U.S. Businesses Become Future-Ready with Large-Scale Cloud Migration (IDC doc #EUR147203120, January 2021)

Trend #3: Next-Level Robustness

"Consumer digital", the online purchasing of items like clothing, books, music, meals, household goods and groceries has typically been considered more of a luxury than a need. The unprecedented steps taken to respond to the COVID-19 pandemic proved that an even greater disruption would have occurred had it not been for the ability of many of these businesses to operate remotely at speed while maintaining their end-to-end supply chains.





Online Grocery Ordering: From Luxury Service to Lifeline

During the lockdown, online grocery ordering became an essential service to large sectors of society - especially in regions where strict lockdown measures were put in place. If that capability hadn't already existed, physical stores would have experienced even further reduced capacity, would have been overwhelmed with even longer queues and many vulnerable people would not have had access to much needed supplies. Overall, digital grocery services have been very successful, but not without some challenges. For example, lack of capacity on the front end of websites and supply chain issues for high demand products.



The importance of consumer digital to our society has increased dramatically, and much like other utilities we rely on day-to-day, requires a high degree of security and robustness. This is true even when—especially when—these services have to be hastily scaled and relied on for what could be life saving services, for example, food delivery.

The reliance on consumer digital is here to stay and due to many people permanently changing their buying habits, opportunities exist. Especially for businesses who can update and innovate the digital experiences they offer alongside these new customer expectations. For example:

- Rather than queuing up at your local pub to buy a beer, simply order through an app and get served at your table.
- Instead of waiting in line for hours to renew your driver's license, book an appointment online and come prepared with the appropriate paperwork.
- Do-it-at-home banking where the majority of transactions and services can be completed / received digitally with minimum contact in-branch.

Consumer Changes Due to COVID-19

ça 44%

44% of customers agreed that COVID-19 will lead to long-term changes in their shopping habits.³

34%

Due to the crisis, a third (34%) of shoppers shifted both essential and non-essential spending online.³

19%

A Mercatus and Incisiv study in US polled nearly 60,000 consumers across 20 states adoption of online grocery shopping rose from 24% in 2018 to 43% in 2020.⁴

U.S. online grocery sales increased from \$1.2 billion in August 2019 to \$7.2 billion in June 2020.⁴

3. The Big Ask: The Connected Customer Journey, 02 in partnership with Retail Economics (September 2020)

4. eGrocery's New Reality: The Pandemic's Lasting Impact on U.S. Grocery Shopping Behavior, Mercatus in collaboration with Incisiv (September 2020)

Trend #4: Tech at the Board

Gone are the days of IT being viewed by senior business leaders as a slow-moving organization that fixes printers and delivers desktops.

The pandemic disruption has sparked the realization of executive boards that technology done right can have an enormous positive impact on the enterprise as a whole. It has driven different thinking, risk and change appetites for boards that are now looking to technology to support different business models, improve continuity, and fuel innovation.



The gap that once existed between revenue-centric business decisionmaking and cost-centric IT decisionmaking is closing fast. Technology decision-making is now very much a part of board conversations and is viewed as an integral part of business moving forward. This means that the role and responsibilities of CIOs need to change—they will need to be business savvy with a solid understanding of finance.

This change in technology decisionmaking relates directly back to the rise of business experimentation mentioned in Trend #1: The Modernization Era. IT and business teams are coming together to drive more profound transformation in understanding customers, new ways of working and service delivery fundamentally affecting the future of organizations.

55% 45% 45% 45% Changed focus of IT Enhanced my Increased the scope Improved relationships with from cost center to credibility with of my influence C-suite across the business business leaders business enabler

Which statement describes how the pandemic has impacted your role as CIO?⁵ [Choose all that apply]

How is the role of the CIO changing?

- Helped stabilize and sustain operations during the pandemic.
- As tech becomes value-driver, CIO leads high-impact initiatives that help navigate complex decision making.
- Will the prominent role of CIO continue after the dust of the pandemic has settled?
- How will other tech roles (CTO, CDO etc) be impacted?

5. U.S. Businesses Become Future-Ready with Large-Scale Cloud Migration (IDC doc #EUR147203120, January 2021)

Trend #5: Being an Adaptable Organization

The COVID-19 pandemic has forced many businesses to adapt, challenging them to accelerate or reprioritize their digital transformation strategy. But What does adaptability actually look like from an organizational perspective?

It essentially boil down to those who can make trusted decisions, and act upon them quickly. Your use and understanding of data plays a significant role here. So too does your organizational culture.



Making smart decisions

Being adaptable means being dataled. By giving your people access to data and insights that help them make informed decisions at speed and scale you are empowering them to make smart decisions. By leaning on cloudbased intelligent automation your organization can sense and respond to threats and opportunities in real time.

Rapid response

Armed with the ability to make smart decisions, your teams then need to be able to act quickly.

In <u>That's Not How We Do It Here</u>, a

book by Dr. John Kotter and Holger Rathgeber, two types of organizations are described:

Hierarchical Organization – The chain of command flows top down, from senior management and executives to general employees.

Networked Organization – A flat structure where people and groups act

independently yet collaborate with each other towards a common purpose.

A key difference between the two is the deep empowerment and delegation of individuals and teams within a networked organization. They make their own decisions, conduct tests, implement, measure and continue to iterate. These are the same types of behaviors that exist in agile methodologies and DevOps ones that enable rapid adaptability.

COVID-19 has forced many companies to embrace remote/distributed working, use collaboration tools and accept a more decentralized approach. We believe that a new normal of hybrid working will lead to continued adoption of agile methodologies and acceleration toward networked models - focused on resilience and empowerment rather than commanding and controlling.

Hierarchical Organization



Networked Organization



The end result should see your teams better informed and facing far less friction when introducing new products and updates to market.

- Smart decisions rely on good data - by focusing on data hygiene and accessibility organizations can ensure their teams are equipped with reliable insights.
- Traditional organizations, accustomed to top-down linear processes, should explore redefining their culture and mission around a unifying purpose (or North Star) This should provide a framework to all functional areas as they work collaboratively to deliver shared business outcomes.

How has a large-scale move to public cloud better positioned your company to effectively deal with future disruptions?⁶

Improved collaboration across different functions	85%
Enabled faster response times	78%
Created more resilient supply chains	71%
Enabled the use of sensors and advanced analytics for increased viability and faster decisioning	68%
Strengthened business continuity.	67%
Improved productivity through intelligent automation	64%
Enabled end-to-end processes and workflows	64%
Increased the scalability of computing resources under changing conditions	54%
Improved collaboration across ecosystems	52%

6. U.S. Businesses Become Future-Ready with Large-Scale Cloud Migration (IDC doc #EUR147203120, January 2021)

85%

Trend #6: Don't Just Migrate, Modernize

Covered in Trend 1, the modernization era of cloud is upon us!

The IT-driven, cost-centric era of cloud resulted in a lot of liftand-shift migrations, purportedly to save money and boost efficiency. Yet this approach did not necessarily deliver cost savings - it only transferred technical debt to the cloud. And without deeply exploring the modernization aspect of the journey, It may not have delivered technological transformation either.

Cloud migration is not an end point—there is increasing understanding that to truly modernize and realize the promise of cloud, it's important to have a mindset of continuous improvement.



How are organizations looking beyond lift-and-shift?

- They are focusing on the opportunity cost of modernizing, rather than the upfront costs.
- They are identifying apps that support business processes as a starting point (lighthouse projects).
- They are embracing cloud native approaches. Exploring platforms tiered, loosely coupled architectures which allows innovation and experimentation without risk of system wide disruption. This enables controlled empowerment of teams as well as more rapid testing of new features.
- They are understanding how best to utilize cloud with their business. For example, hybrid was once thought to be an interim state to bridge legacy into the cloud. However, elongated migration, geographical challenges, data regulation and edge computing has driven a reassessment of hybrid as a legitimate longer term solution for certain businesses. Likewise, a desire for best-in-breed functionality id leading to multi-cloud models that are tailored towards exploiting the strengths of different cloud vendors towards business-specific use cases.



Using a scale of 1 to 5, with 1 equal to no impact and 5 equal to significant impact, please indicate how the move to public cloud has impacted your organization's ability to innovate in each of the following areas:



The level of adaptability and innovation that can be driven by utilizing cloud native services and architectures is profound. As cloud maturity increases and IT's emerging role as a business value driver continues to develop within organizations, we expect that cloud initiatives will increasingly focus on modernizing rather than virtualizing their digital estate.

82%

of organizations planning large-scale cloud migrations are doing so to accelerate digital transformation.⁷

7. U.S. Businesses Become Future-Ready with Large-Scale Cloud Migration (IDC doc #EUR147203120, January 2021)

Key Takeaways

2020 was a year of unparalleled business disruption and upheaval, challenging every business to reevaluate the role that technology will play in its future.

Many of our trends point to COVID-19 as a catalyst accelerating cloud adoption, and in many cases, forcing transformational change on organizations in every sector, on every continent.

If 2020 was a year of crisis response then 2021 will be one of opportunity, where the actions taken to keep your operational wheels turning, compound to drive new levels of success.

How can you stay ahead of this year's cloud trends?

- **Rethink how you view value in the cloud.** Stop purely looking at the impact cloud migration has on your bottom line. Consider what value modernization can bring.
- Arm your people with insights. A core part of empowering your team is providing them with the data they need to make smart decisions.
- Focus on purpose. Move away from hierarchical, linear organizational to structures, to a networked collaborative way of working. Identify your organization's North Star to help guide decision making.
- Embrace cloud native as a means to boost adaptability and speed innovation. Focus your culture and skills around continuous improvement and modern software development practices.
- Evaluate and understand your existing applications and workloads. Are your digital experiences optimized for your customers? Can your distributed work force work with maximum efficiency? Identify the applications that hold the most value and invest in them.

Do you want to accelerate your cloud journey in 2021?

Our expert team of strategists, consultants, architects and engineers will help you tackle the technical and organizational challenges you are facing.

Get in touch

Want to learn more?

Join Jez Ward & Dave Chapman as they explore what it means to live, work, and solve business challenges as a cloud-native organization. Each week they invite thought-leaders, innovators and experts to the show to share their insights and experience.

Focusing on transformation, leadership, ways of working, and emerging technology they explore the significant impact that cloud is having on people and businesses.

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About Cloudreach

Cloudreach is the leading multi-cloud services provider. Our mission is to help companies navigate their unique journeys to the cloud and build new foundations for future growth.

We're a team of cloud natives with over 800 certifications across AWS, GCP and Azure. We challenge people to do things better, so they can do better things. Businesses that work with Cloudreach adopt cutting edge technologies to solve challenges and create new opportunities. In this way, we deliver unrivaled value for more than 1000 enterprise clients globally.

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