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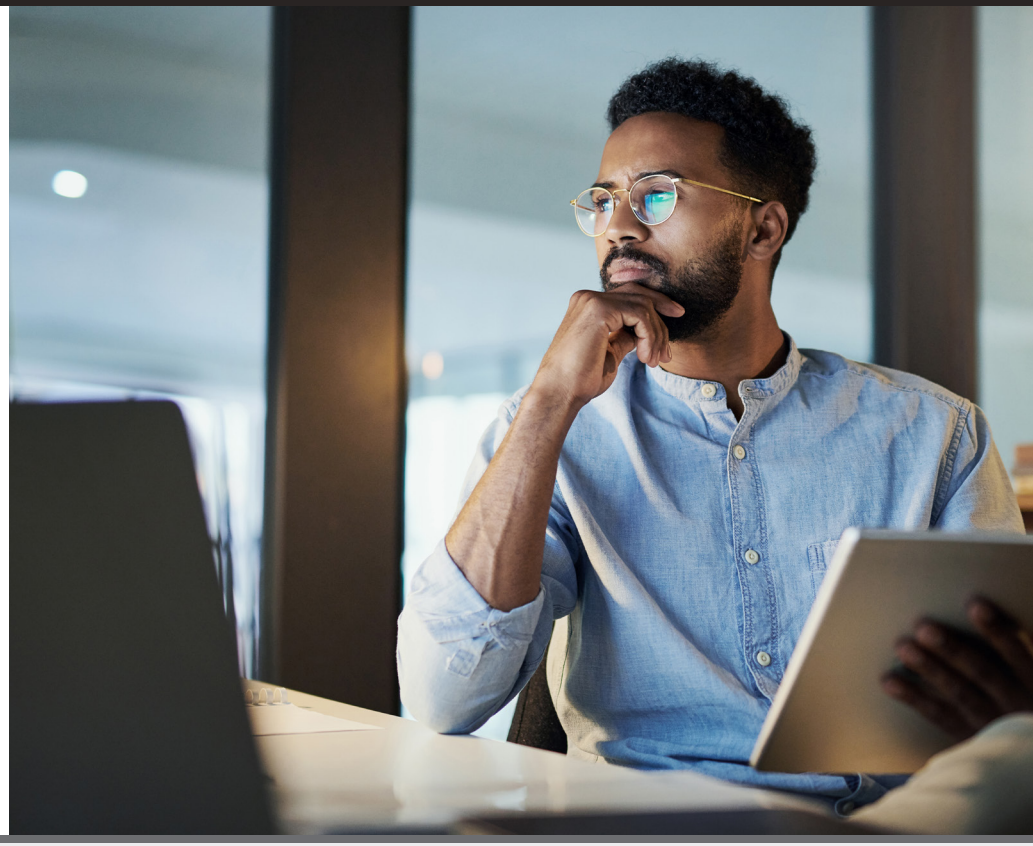
The Proactive CIO: managing the employee experience



What makes a proactive CIO? To start, one who has broken from the norms and found a different way. Given the events of COVID, employees work differently, and CIO needs to work differently, too. As one Gartner analyst summed up, "What COVID has done is forced us to leapfrog five to 10 years, or more in some sectors." With an eye on the future, proactive IT departments solve problems before employees find them and make employee experience the center of everything they do. This eGuide will show you how to stop reacting and start innovating to improve your employees' digital experience.

IT and the employee experience

Employee experience is as vital as customer experience—but it remains an IT afterthought. Here's how to shift your focus and provide employees with the internal IT experience they deserve.

BY MARY BRANSCOMBE | PCs that take eight minutes to boot and make people late for conference calls. Expense reporting systems based on spreadsheets so tedious and convoluted that employees put off doing their expenses for months at a time. Internet connectivity so slow that it's quicker for staff to look something up on their phone. Passwords that have to be reset every 90 days, losing hours of productivity every time.

Organizations that tout digital transformations laser-focused on customer experience often fall down badly when it comes to the IT experience of their own employees. But employee experience (EX)—which aims to help those who actually deliver your company's products, services, and support—is key to productivity and retention.

Companies with great EX outperform the S&P Index by 122 percent and are 21 percent more profitable than those with low workforce engagement scores.

The millions of dollars organizations spend on employee engagement have little effect when they focus on short-term "perks." In 2018, Gallup reported the highest ever level of involved, enthusiastic, committed workers in the U.S.—at just 34 percent of employees.

Worse, however, may be the leadership disconnect when it comes to IT. Nine out of 10 C-suite executives say they choose new technology that delivers what employees need. Fifty percent of employees disagree.

In fact, close to 40 percent of employees feel that their IT department and workplace technology experience is completely out of touch with their needs, says Nicholas McQuire, vice president for enterprise research at CCS Insight. "Improving the employee experience is an area historically underplayed by IT, especially when it came to their 'digital transformation' investments, which were all about focusing on the customer. Companies are slowly realizing that the employee experience is as valuable, if not more in some cases, as the customer experience but many still have a way to go on this."

And as companies look to younger workers to fill their ranks, EX is having an impact. Forty-five percent of employees under the age of 35 say that one of the key factors for choosing where to work is the technology that a company will give them to work on, McQuire warns. "Younger workers and employees are now choosing to work across a mix of devices and applications," he says. "Over 40 percent of employees spend more than three hours a day working on a mobile device—and that's 51 percent for millennials born between 1990 and 2001."

That's a poor fit for internal and line of business apps, points out Tim Minahan, executive vice president of business strategy at

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Citrix. “The typical employee uses more than a dozen apps in the course of their work day, often needing to navigate four or more to complete a single business process.”

Get educated on EX

We’re a long way from “worker-first” IT design, says Dion Hinchcliffe, vice president of Constellation Research. “Today’s business applications are approaching a highwater mark of malleability that allows users to deeply adapt them to their work and needs. What’s not improving as fast is the overall IT environment, which still has too much friction, complexity, cognitive dissonance, and fragmentation,” he notes. “Leading enterprises, however, are beginning to push back and insist on a more human-centric approach, because that turns out to be beneficial to everyone.”

That approach covers issues such as shadow IT and the actual utility of the company’s intranet to more sophisticated approaches such as microwork (using tools like Teams, Confluence, and Wrike) or introducing low-code development tools to empower employees.

Start with the basics: Are the PCs that employees use slowing them down?

A Qualtrics study of Microsoft customers who deployed Microsoft Managed Desktop (MMD) showed that employees whose PCs booted quickly and had a longer battery life were 15 percent more engaged and were 121 percent more likely to say they felt valued by their company.

“We’re seeing an 85 percent reduction in boot time, an 85 percent reduction in the number of crashes, and a doubling of battery life,” says Microsoft 365 Corporate Vice President Brad Anderson. Employee assessments of their IT experience improved significantly too. “They were 37 percent more likely to say, ‘My PC experience enables me to best serve my customer.’”

The main reason for slow systems, poor battery life, and more crashes are the hardware itself (specifically whether the PC has a hard drive or an SSD) and the number of management and security agents. Anderson mentions a CFO who showed him their laptop; it took eight minutes to boot because it had 47 different agents on it.

You don’t have to go as far as handing PC management over to Microsoft to get improvements. The Technology experience score in Microsoft Endpoint Configuration Manager (as System Center is now known) will show you the impact the slow hardware and multiple agents have on your PCs.

You can also conduct your own employee experience survey on existing and new technology with the Qualtrics system used in the MMD study, “EmployeeXM for IT,” which also shows real-time insights about help desk experiences, integrating with Freshdesk, JIRA, Salesforce, SAP, ServiceNow, Slack, and Zendesk.

The Nexthink employee experience platform is another tool that can give IT departments real-time information about the problems

users are experiencing using analytics from a lightweight agent on the device (including PCs, Macs, and virtual desktops), delivered into IT tools like Configuration Manager, ServiceNow, and Splunk. That gives you more information than just monitoring the status of an application or service on the server—which ignores the impact of the local OS and the network connection—and if you've already instrumented server applications, you can correlate the information.

Start fixing faster

Because Nexthink's agents are on endpoint devices, organizations can also use it to remediate problems, in some cases before employees report an issue. "Most of the problems that happen on an endpoint are because something changed: There's a rollout of a patch, or a change in configuration for Wi-Fi settings, or you upgrade an application and it doesn't work like before," says Nexthink CEO Pedro Bados. "When you have visibility across thousands of endpoints, you can establish correlations: This update happened yesterday, and suddenly this application is crashing, or the response time of Outlook is slower."

The tool uses deep learning to detect and explain anomalies. "An IT team doesn't just want an alert," Bados points out. "An IT team wants an alert and an explanation, because they need to understand if they have to take action or not."

Nexthink creates remediations for common problems, such as rolling back a patch that's causing problems, fixing proxy and Wi-Fi settings, or even emptying the recycle bin when there's no free disk space. IT teams can also create their own remediations and set triggers to run them automatically (particularly useful if you flight new versions of applications to pilot groups and discover issues you'll want to fix when you deploy to broader rings of users).

Monitoring and remediation reduce help-desk tickets and incidents by a third, Bados says. "We also deliver a huge amount of info about what people need to be happy and satisfied with their applications."

The agent gathers feedback and sentiment from users through occasional popups when they close an application (rather like an internal version of the Uservoice service many software vendors use to get feedback on products, but with more integration into IT systems).

"IT can say, 'If I want to improve the productivity of an application, who are the people I should ask?'" Bados explains. "You can identify power users and say, 'I know you're a power user of Microsoft Teams or Office 365 or SAP because you use it so often; what are the things that you're missing that would make you the most productive?'"

This crowdsourced feedback is much more targeted than a satisfaction survey for rating a helpdesk experience, and because it asks questions when the experience is fresh in the user's mind, response rates are higher.

You can benchmark yourself and your applications against anonymous sentiment coming from Nexthink's other customers (about a thousand organizations and 7 million endpoints, currently). And if you're really committed, Bados suggests you should consider offering XLAs—experience level agreements—that the IT team commits to delivering.

Some of this is also about culture change, where starting small can help.

Adopting self-service approaches for common IT tasks such as password resets, requesting access to tools, and equipment provisioning doesn't just give employees more control or free IT up for more interesting tasks, notes Patrick Kinsella, CTO and senior vice president of engineering at Onepath. It can also help change some of the less flattering opinions IT staff may hold about users. "As employees begin solving their own 'easier' problems, you remove the scenarios that lead to IT disparaging the technical aptitude of non-IT employees, removing a catalyst for negativity."

Making employee experience a CIO priority

Employee dissatisfaction can have a long-term negative impact on your business. Here's how to turn things around.

BY MITCH BETTS AND MARTHA ROUNDS | CIOs are under tremendous pressure to cut costs, produce innovative new products and services, hire top talent, and even transform the organization's business model. With so much on the CIO's to-do list, the internal employee experience is in danger of falling to the bottom of the CIO agenda.

Digital transformation has set the CIO's attention on external customers, but "There's a piece of the IT organization whose customer is the employee. Yet that always seems to come last in terms of attention and funding. IT departments generally don't put the best talent on that," says Claus Jensen, CTO/CIO at Memorial Sloan Kettering Cancer Center.

IT departments should "apply the exact same energy, care, professionalism and techniques that we apply to systems we build for our customers to the systems for our employees," Jensen notes. "We know how to build systems that are delightful for people to use. Yet for some obscure reason, we never do it for ourselves. Show me someone who says that using the HR system is a delightful experience."

Employee dissatisfaction with IT tools can have a ripple effect that can result in long-term damage and a lack of competitiveness. An improved employee experience, however, will pay off in "better talent, more effective collaboration, a better mood in

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your organization—the list is long," Jensen says.

Here are three steps you can take to make a positive impact on employee experience.

#1. Commit to take action

For Jensen, the employee experience won't turn around if you don't commit to improving it. Transformational CIOs, who aspire to be influential across the organization, must address the employee experience to be successful, Jensen believes. "Decide that you care and that you're willing to spend time on doing something about it."

Improving the employee experience must become "a CIO priority" or it won't happen, adds Niel Nickolaisen, CIO of O.C. Tanner, a company that provides employee recognition software and services.

#2. Engage regularly and measure progress

For Nickolaisen, fixing process problems is an embedded part of his regular six-month planning cycles. The key questions are: "What specific things are we going to do in terms of people and process to make this a better place to work? Who owns it, and how are we going to measure that this thing got done? And then how do we measure whether or not it worked?"

Every June, the whole company takes a survey to identify any areas for improvement. In addition, the IT department has a separate survey focused on the characteristics of high-performing teams.

Jensen agrees that the employee experience should regularly be on the CIO's to-do list. Weekly is ideal, but Jensen acknowledges that, even with his strong feelings on the subject, during some busy periods he can only manage to address employee experience "frequently," not every week.

#3. Lead in technology use

Nickolaisen believes CIOs have a responsibility to influence not only the future direction of the organization's external products and services but also the internal processes and culture of the entire organization—because they're all affected by technology.

"You can have a great workplace culture that's not a high-performing culture, and I want both," Nickolaisen says. It helps to be experimenting—at a regular cadence—with ways that new technologies (e.g., analytics, mobile, virtual or augmented reality, and process automation) could make the employee experience a richer one, he adds.

CIOs are uniquely positioned to lead the organization in the use of technologies that enable employees to be more productive and focus on higher-value tasks. "Our world in IT changes faster than anybody else's, so we have to be a model," Nickolaisen says. "Then, I influence the rest of the organization to improve its agility."

How IT must adapt to the emerging hybrid workplace

User support, the relationship with HR, and front-office technologies will require a rethink as distributed digital work becomes the new reality.

BY GALEN GRUMAN | In spring 2020, tens of millions of people worldwide were suddenly thrust into remote work as the COVID-19 pandemic lockdowns came into force. IT and users alike adapted quickly, and companies were able to keep doing business relatively easily given the scope of the change. What's more, employee productivity actually went up—and stayed that way even after the initial adrenaline surge wore off—across the globe, from Australia to the US.

"Leaders across the board were shocked and amazed by how quickly all their workers made the transition once they had the equipment—and by how productive everyone has been," says Gartner analyst Suzanne Adnams.

Management consultants had been saying for years that a distributed workforce was going to be the new normal, and suddenly it is. Although the pandemic has not ended, the outlines of the post-pandemic workplace are becoming clear. They have major implications not only for workers but also for IT, which will need to adapt user-supporting processes and play a greater role partnering with HR on the policies and approaches that underpin work processes and a changed culture. As a result, IT

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will also need to reprioritize its technology investments.

In interviews with *Computerworld*, analysts from Forrester Research, Gartner, and IDC were practically of one mind on the shape of the emerging hybrid workplace, the notions of flexible work, and where IT needs to adapt to best serve the business in the "new normal," "next normal," "new reality," or whatever you want to call it.

The changed context for workforces

Although management consultants have been saying for years that workforces would become more geographically dispersed due to the use of software- and cloud-powered digital tools, the COVID-19 pandemic made that shift happen all at once, says Gartner's Adnams. "What COVID has done is forced us to leapfrog five to 10 years, or more in some sectors."

Forrester analyst Andrew Hewitt agrees: "The extended enterprise is the larger trend, and that requires a robust change-management program" for users, managers, and IT.

The implications for IT are many: extended support desk hours; remote-support and remote-management tools; work-specific user training; cloud enablement of all software possible; appropriate security for distributed work; enabling multiple forms of collaboration and related activities like scheduling, whiteboarding, and availability tracking; provisioning equipment to home-based workers and/or supporting employee-provided equipment; aiding Facilities in modernizing building technologies to avoid touch-heavy surfaces; and partnering more closely with HR for policy enablement and enforcement and for appropriate monitoring.

Processes go digital

As much as possible, work processes need to be digital and available via the internet, because employees are scattered and will remain that way. This means that workers need access to appropriate bandwidth and work environments, that user experience for employees is now critical for business effectiveness, and that employees need to be partners with IT, not just consumers of IT-provided tools.

Workforces are dispersed

The workforce will not all work in the traditional office or company location, nor will they all be remote. Many people will work from home, but many people will still need to work in a corporate facility—not just a traditional office, but also a production line, a data center, a retail store, a shipping center, or a lab. And there are employees whose work is location-agnostic but who can't work at home due to lack of space or insufficient internet access.

Gartner's Adnams estimates that—although it varies by industry—about half of the workforce in advanced economies will need to work in a corporate facility, 25% to 30% will work permanently at home, and the rest will come to the office two or three days a week and work at home the rest of the time. For white-collar workers, Adnams says to expect about 60% to work at home full-time, 10% to 15% to work full-time in an office, and the rest to work two, sometimes three days a week at an office and the remainder of the week at home. Forrester and IDC see similar breakdowns. It's a mixture typically called "the hybrid workplace."

"There's a ripple effect from this," Adnams says. "It creates a whole bunch of management challenges no one has had to deal with before. If only part of your workforce is coming into the office, what does that do about your office space? Do you assign a permanent workplace to someone who will be there only two days a week? What is the role of an office anymore? If it's not the primary workplace of all the organization, then where does that lead?"

Although these issues are typically addressed by management,

Employees with high-quality UX are at least 1.5 times more likely than others to have high levels of work effectiveness, productivity, intent to stay, and discretionary effort (meaning to go above and beyond their job requirements).

Jason Wong
Analyst
Gartner

the decisions to be made have implications for IT, which has historically been centered on providing technology infrastructure and tools in dedicated, centralized spaces, but now has to make remote work a normal part of the technology environment.

And even in the central spaces that remain, IT will likely have to support the notion of hoteling, where employees reserve a workspace for a day or a few hours. Not only do you need a mechanism for the reservations, but you also have to make sure that the right equipment is available, from multiple monitors for some users to providing both Mac- and PC-compatible peripherals for others. That may require several configurations of the "hotel" workspaces to be available. IT may also be in charge of monitoring high-touch equipment like mice, keyboards, and headsets to be sure it's sanitized before and after each use.

Work times change and flex

Much of the workforce will not work traditional hours. Among digital workers, what Adnams calls "time-blocking" and others call "time-slicing" will become common. They'll divide the day from when they awake to when they go to bed into scheduled slices of personal, family, and work times to best juggle all their commitments.

"It's not the fabled work-life balance. What we have is life integration: one life, one set of hours, one day into which we need to integrate our work activities, our family activities, our social activities, and our personal activities," Adnams says.

That time-slicing is something high performers have long done, she notes, but it's now a skill everyone needs—and something that both work policies and technology systems need to support.

Work teams will need to set core hours during which everyone is available, and they will need to set standards around when it's okay to reach out to someone outside a work time-slice. Management will become less top-down and more team-based.

The change in work hours and the reliance on more employee self-management is typically called "work flexibility."

Physical controls reduce virus transmission risk

In corporate facilities, much of the office infrastructure needs to be updated to protect employee health until the coronavirus threat is ended. Things like door handles, light switches, and elevator buttons suddenly become potential virus transmitters and need to be replaced by touchless methods where possible, which may require IT support in some buildings.

Beyond IT, conference rooms and huddle rooms can't be used as long as the COVID risk remains. "People can't sit together and breathe on each other," says Gartner's Adnams. Changes to air conditioning for better filtering may also be required. And office layouts need to change to enable appropriate social distancing—for instance, by adding plexiglass barriers and taking half or more of cubicles out of service.

Often, the cost of reducing COVID risk at an office is too high, which encourages even more remote work, Adnams notes—and this then becomes an IT issue as well.

How IT can support the hybrid workplace

For CIOs and other IT leaders, the emerging hybrid workplace introduces several challenges that require changes at both the strategic and tactical levels. Many of these need to involve Human Resources, because they need to be supported by and align to work policies.

Engage employees as partners, not consumers

All the analysts interviewed encourage a reformed relationship between IT and its corporate users that gives users a stake in the

process of selecting, deploying, assessing, and improving technology tools, and even outright ownership of some technology areas. After all, the technologies IT delivers are supposed to help them work better, and they know their work needs best.

User experience (UX) for workers—think of it as internal customer experience (CX)—is critical in the new hybrid reality, but IT has been very bad at it for decades. "Users are going to expect the highest level of technology. It's no longer acceptable to have a degradation of technology" for those who work outside the office, says Forrester's Hewitt.

UX is not just a feel-good exercise. Employees with high-quality UX are at least 1.5 times more likely than others to have high levels of work effectiveness, productivity, intent to stay, and discretionary effort (meaning to go above and beyond their job requirements), says Gartner analyst Jason Wong. And Gartner surveys show that 77% of employees see that good UX for their tools translates to better customer experience; Wong points out that if employees can do their work more easily and flexibly, customers get better service and support, which leads to more revenue.

To get to a better balance between IT and users, IT has to make several shifts, including ceding some technology to business departments and even individual users, engaging users as stakeholders for the entire technology product cycle, and actively listening to users.

Wong sees several technology portfolios at an enterprise, including:

- Central apps and services that IT has historically owned and continues to own, from networking to email
- Core business apps and services that the business specifies but that IT manages and largely owns, such as financial and human resources information systems
- Departmental business apps that the business owns but that IT helps deliver and guide, such as data analytics and sales tools
- Business apps that individuals in the business own in a self-service way, with IT engaged only if policies such as privacy or data validation come into play—for example, robotic process automation tools and low-code or no-code "citizen developer" tools

"Post-pandemic, IT is not agile enough to provide all these applications—not that they were before the pandemic," Wong says. So IT organizations need to shift to a product model where they enable various technology product lines; some they own, some they co-own, some they support, and some they let be.

Co-owning, Wong says, tends to happen with operational applications for automation and process improvement, as well as for enabling new channels, such as to partners or customers. He recommends the use of "fusion teams" composed of IT and business stakeholders to define, manage, and deliver co-owned apps.

In all cases, IT needs to shift from a project mentality to a product mentality, Wong adds. "IT should be organizing around these business-outcome-driven capabilities; aligning toward product lines; creating services that can be plug and play, sharable, and reusable," he says—all aspects of what he calls "the composable enterprise."

Users should be active in any technology deployment, including the technology selection. Lisa Rowan, an IDC analyst, recommends that IT use agile software development methodologies such as having formal user stakeholders, user engagement throughout the process, usability testing, a continual feedback loop, and user acceptance testing—all hallmarks of agile development and a product mindset.

"But they rarely do that before they toss it over the wall," Rowan says. By contrast, "Vendors are good at taking suggestions from user panels. Why should IT be any different?" she asks.

And of course IT has to be actively listening, which is why Rowan suggests that there be an equivalent of a suggestion box

"It's smarter for a data security strategy to allow [over-restricting users], because a lot of people will otherwise transfer stuff to their home equipment, which often is not secured" so they can more easily work at their convenience.

Lisa Rowan
Analyst
IDC

or periodic survey that IT uses to get feedback from users beyond the specific projects IT is working on with them.

IDC analyst Laura Becker advises that "users have to be vocal on what their needs are," but concedes that "it's only useful if IT acts on it."

Forrester's Hewitt further suggests that IT survey the users on the experience of using various technologies. In companies that make employees active stakeholders in the technology they use, "IT is being forced to understand the needs of the user a lot more in a qualitative, sentiment-analysis sense," he says.

For the long term, IT should experiment with more work scenarios to identify flexibility-supporting technology before it is urgently needed—to get ahead of the curve, not just react to it. Doing so is a key part of a future-proofing effort for the IT infrastructure, because the journey to the new reality is just beginning.

Provide comprehensive user support and training

In most organizations, IT is not close to the users, instead providing support only when there is a problem or providing technology to users without much prior engagement. Instead, IT needs to embrace user enablement as part of technology enablement.

"IT needs to decide how much more support to give workers," says Forrester's Hewitt, because under remote work, users can't easily get support from a colleague in the next cubicle or have an IT support technician come and diagnose an issue.

In addition to extended phone support periods to cover the wider working hours in a hybrid office, IT needs to install tools to better see what is happening on computers, whether company-owned or not, for those employees not in an office with an IT support staffer available. Although pricey, co-browsing (a.k.a. collaborative browsing) technology is now emerging that may help support staff and employees have a shared user experience to make remote support more effective, says Gartner's Wong.

Co-browsing technology goes further than traditional remote-support tools that let a technician see a user's screen; instead, it lets the remote support person work in the user's browser along with the user, as well as add annotations, such as to highlight fields and buttons a user may have missed or to number user interface elements to make step sequences clearer. Co-browsing is already in use for customer-facing applications at several retailers, including Verizon and Burberry, so staff can help customers research and find products and complete a purchase while maintaining social distance or even being in different locations.

And training has usually been limited, pro forma, or nonexistent. Sorry, providing videos from YouTube, LinkedIn Learning, or links to vendor support pages is not real training. Such resources rarely help employees best use the technology in their actual work.

As small examples, users often don't know how to turn off notifications at night, check availability of their teammates, use collaboration tools not provided by their company (such as those used by clients or business partners), or set up no-meeting periods for teams using collaboration software. Users need more mastery of the capabilities of their tech. Letting them figure it out on their own or providing links to generic how-to videos won't cut it.

IT, like HR, rarely understands users' actual work, which is why it so often relies on cookie-cutter training. Instead, IT could transfer that training budget and ownership to the business departments to do their own training. Better, the business could create training teams composed of power users and IT support staff to jointly develop job-specific training so employees gain more technical knowledge and IT gains subject matter expertise.

Reshape equipment policies

A decade ago, the BYOD movement brought personal equipment into formal work processes, and a slew of mobile management technologies followed to support that. Under the hybrid office, computers, networks, and phone services join the party, with workers often using their own equipment for at least some of those.

In the past, remote work was an exception at many companies, so equipment policies were nonexistent or specific to particular departments, Hewitt says. That needs to change. "You need more universal policies on equipment," says IDC's Rowan.

Companies could decide to provision all equipment used at workers' homes, providing or reimbursing authorized computers, routers, phones, and related peripherals like headsets and monitors, perhaps even chairs and desks or tables to ensure safe ergonomic work environments. But even that strategy ends up using shared networks—the internet connection that comes to the home and the network within the home—so there will be some personal equipment in the mix.

Many companies will be more flexible than that, either formally or informally, such as by issuing laptops to employees but letting them use their own (possibly subsidized) peripherals and perhaps their own computers as well. Still, policies will be needed to establish what equipment employees must have to do their work and what employees may add to the mix on their own.

That policy effort also provides an opportunity for the business to rethink its disposal of retired equipment, Rowan says—such as allowing lower-paid employees to purchase such equipment for personal and family use or donating it to schools, charities, and other organizations to help poor people participate in the even-more-digital world that has emerged after the pandemic.

Regardless of who owns the equipment, the remote worker's computing environment will be largely provisioned through cloud services and secured by a range of tools and services: access management tools like Microsoft Authenticator or Okta; cloud storage and backup services; unified endpoint management (UEM) tools; remote support tools; anti-malware tools; and the like. The potential mix of corporate and personal devices has implications for software licensing and costs that IT needs to ensure it understands.

A related issue is paying for internet access, which some companies do and others do not. You could argue that internet access is a normal personal expense, like electricity or heat, that the employee should pay for. But many lower-paid employees forgo the often-high cost of broadband internet access at home and instead rely on their cellphones. Or they get the cheapest plans, which don't support videoconferencing and other work needs well. As a result, "IT needs to consider improving employee infrastructure like internet, even if it is an additional expense," says IDC's Becker.

Reshape access schedules for corporate systems

With the need for many employees to time-slice work hours and personal hours as they interleave work with personal and family issues throughout the extended day, IT has to consider how to support that reality.

At the beginning of the BYOD movement, recalls Gartner's Adnams, "we went through a phase when cell phones became common, with people emailing on the weekend and others feeling they needed to respond." As a result, some companies restricted access to corporate systems to specific hours with good intentions. "We're in a different world now, where we need to give employees the control and respect to manage their own time," she says.

Thus, IT should enable anytime access to corporate systems where they are now unnecessarily restricted by time of day, and

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Laura Becker
Analyst
IDC

provide tech support over a greater portion of the day. Organizations should also monitor access and data flow over that longer day to find possible intrusion patterns under these changed access patterns.

Help HR help users for the long term

The change in the work environment has brought IT and HR closer together, both in strategic and tactical areas. IT can help HR in several ways to help the users they both support.

A high priority should be to help HR head off bad management practices and instead encourage good ones. For example, some managers don't trust their employees and want to monitor them in unhealthy ways, such as tracking the number of keystrokes or hours they are active. These are "managers who don't have enough experience and are used to top-down directive forms of management, as opposed to supportive forms of management where they are trying to help get to a desired outcome," says Forrester's Hewitt.

While some jobs' work outcomes can be measured in minutes of activity or actions per hour, many cannot—and companies should not fall into that trap, concurs Gartner's Adnams. Furthermore, employees have shown they can be trusted, says IDC's Rowan, which is why productivity gains have remained nearly a year after the pandemic hit.

"Productivity actually increased for companies that took employee satisfaction seriously. Retention increased, and there was reduced absenteeism," adds IDC's Becker, stressing the phrase "for companies that took employee satisfaction seriously."

Rather than enable unhealthy Big Brother tracking, which will only frustrate productive employees and risk driving them away when the economy recovers, Forrester's Hewitt suggests that IT help HR implement constructive monitoring instead, such as user experience management tools, which try to get better telemetry data on what users are experiencing.

"They collect info on the app, network, and device to try to optimize the experience for the user," he says. The good news, he says: "We see HR leaders coming to IT teams asking for the data to help inform how they understand the user experience."

Some of what may be useful to monitor may not be so obvious. For example, Hewitt says, "People are fatigued by 10 hours in a day of videoconferencing. For a manager-employee one-on-one, say yes to video. But for a team call with 20 people, it's less likely the right medium." Knowing how much time people use various collaboration channels may help identify where one, like videoconferencing, is overused—that data combined with user training could result in a healthier balance of tool usage.

Where burnout is a concern, IT could use activity tracking tools to identify individuals who may be working too much—not too little—to let managers and HR know where there's a risk. "People are working longer hours and working harder, and that is not sustainable," Hewitt says.

Fortunately, says Gartner's Adnams, after the immediate crisis caused by the lockdowns settled down, many employees started to work more rational hours, using techniques like time blocking to avoid burnout. "Most people are pretty self-sufficient and self-monitoring," adds IDC's Rowan. So IT needn't overreact to the fear of burnout, but instead help HR and managers identify those who do struggle with overwork.

Fine-tune your security

Security concerns dominated IT attention in the early days of the work-from-home shift, and rightfully so. Organizations that already supported mobile workers and home-based workers were in a good position during the lockdowns, while others had to catch up

to what today should be considered standard security practices.

First, IT should review the security changes made at the beginning of the pandemic to make sure they are still valid and optimal, and to correct errors or weak settings done in the rush as the first COVID lockdowns occurred.

Then, notes Forrester analyst Hewitt, there are some new security issues to address. One is that more data is coming out of the data center than in the past. "I wouldn't say remote working is less secure fundamentally, but you need to contend with more data to be protected." So, IT must make sure its security scanners and other tools can handle the increased volume of data flow into and out of its networks.

At the same time, IT should be careful to not over-restrict users, such as by limiting access to corporate systems to artificial working hours or disallowing access to corporate systems from personal equipment, says IDC's Rowan. "It's smarter for a data security strategy to allow that, because a lot of people will otherwise transfer stuff to their home equipment, which often is not secured" so they can more easily work at their convenience.

Hewitt also suggests that IT look beyond VPNs to secure data traffic, because VPNs weren't designed for hybrid work scenarios. If the VPN takes all traffic from computers used by employees for both business and personal purposes, all personal traffic has to go through it, not just corporate traffic. That causes a huge increase for the VPN and corporate network to handle. And if the VPN only handles traffic to corporate apps—the typical deployment approach—then there is no protection on personal data connections. (Only one VPN can run at a time, so you can't have both a corporate VPN and personal VPN in use.)

Those unsecured personal data connections could become malware vectors that infect the user's computer and then risk the malware getting into the corporate network. This is why IT organizations have long disliked mixing personal and corporate connections on the same devices.

The limitations of VPNs have given rise to zero trust networking and privileged access management tools, which Hewitt advises should be explored.

IT should also help people ensure the security of their home routers, such as by educating them on minimal security standards to use, such as WPA2 for wireless encryption and the use of built-in firewalls. Hewitt suggests that, for lower-paid employees, companies consider buying or paying for recent routers whose security settings meet corporate standards when what is in the worker's home does not.

Phishing attacks have risen during the pandemic, with criminals taking advantage of more isolated, less supported, and more frazzled work-from-home employees. IT should be more aggressive where possible in identifying such attacks, and training (or refreshing) users on how to detect them more easily. If anti-phishing tools aren't in place, they should be.

Continue the shift to cloud computing

The shift away from data center staffing and increased use of cloud services during the pandemic show that IT already knows that the future is in the cloud. Microsoft 365/Office 365 and Google Workplace (formerly G Suite) have gained usage, as have cloud-based collaboration tools like Slack, Zoom, and Teams. So has cloud-based security.

With the initial pandemic shock over and the immediate needs addressed, IT should step back a bit and make sure it has a cohesive cloud strategy across the board.

Make mobile enablement the default

It may seem strange that mobile support should be on IT's agenda for the new reality, but many software tools and web ser-

vices, whether homegrown or vendor-supplied, still aren't designed for use on smartphones. They may not support mobile operating systems or smaller screens and touch interfaces, or they may use too much bandwidth for cellular connections.

Organizations that haven't yet delivered on this strategic need, or have done so only partially, need to finish the job. Mobile is no longer exotic or new; it's now a core part of how employees and customers alike engage with the digital world.

"IT can help on the deliverables side, making things available through mobile," advises IDC's Becker. "Raise the priority. Many people live in homes where Wi-Fi isn't sufficient," so they use their phones instead.

And remember: The need for mobile enablement of apps and services is even more critical for customer-facing technology.

The digital transformation that affects us all

There's a lot of talk in the IT industry about digital transformation, ranging from feel-good vagaries to specific technology deployments. The COVID-19 pandemic's move to remote work forced a real digital transformation on companies—affecting technology, business processes, customer engagement, and priorities across so many industries globally.

It is a shared digital transformation that won't stop as the pandemic ultimately recedes. The Herculean efforts made during this pandemic aren't the end of the journey. To do it right, IT needs to think differently about employee involvement, support, and needs, partnering with HR, business management, and the employees themselves. The immediate pandemic response shows that such a transformation is possible. Now we just need to make it a part of our new normal.

NHS East & North Herts CCG CDO: shared services helps us deliver more

Working with Nexthink, this branch of Britain's National Health Service is helping IT departments go from reactive to proactive.

BY THOMAS MACAULEY | Phil Turnock, the Chief Digital Officer of Britain's National Health Services East and North Hertfordshire Clinical Commissioning Group, is leading an ambitious transformation of the group's infrastructure and end user experience.

Turnock's strategy harnesses the combined power of the Hertfordshire, Bedfordshire, and Luton Information Technology (HBL ICT) Partnership of six NHS organizations, which his CCG hosts.

The partnership initially focused on building a resilient infrastructure by creating its own hybrid cloud comprised of two of its own hosted data centers as well as running certain services in the public cloud.

"The business benefit is greater uptime for our clinicians, which means a better patient experience," Turnock told CIO UK.

A key test of the investment came in 2017, when the WannaCry ransomware attack wrought havoc across the NHS. The attack disrupted at least 80 out of 236 hospital trusts in England, as well as 603 primary care and affiliate NHS organizations—but none at HBL ICT.

"That was by design and not by luck," says Turnock. "This very much gave the partnership more confidence about what we do and the way we do things."

"IT in the past has often been criticized as being reactive; this is about making us proactive, and eventually predictive, so we can predict faults before they happen."

Phil Turnock
Chief Digital Officer
National Health Services East and North Hertfordshire Clinical Commissioning Group

As a result, the partnership shifted its focus from building a stable infrastructure to developing better services.

Turnock wanted to create a better user experience by developing applications that perform well across the numerous sites where they're used, which still wasn't the case after completing the new hybrid cloud.

To identify the root of these problems, the CCG deployed Nexthink to analyze real-time data from all of its endpoints to diagnose and automatically remediate any issues. The CCG also uses the tool's Digital Experience Scores, which combine hard metrics with user sentiment data to improve its employee experience.

"IT in the past has often been criticized as being reactive; this is about making us proactive, and eventually predictive, so we can predict faults before they happen," says Turnock.

Other focuses of the service improvement plan are robotic process automation (RPA) and introducing live chat to supplement the phone calls and emails to the service desk.

The CCG has now completed more than 22,000 live chats. It has also used RPA on over 5,000 RPA tasks, such as setting new user accounts. This task previously took 20-25 minutes to complete. The robot cuts this down to less than a minute.

Turnock now wants to push RPA into repeatable processes outside of IT, in both corporate and clinical areas of the organization.

"This is very much about how we use things like robotics and technology to free up clinical time to make us focus on clinical activities," he explains. "It's not about cost reduction; it's about making better use of our resources."

Windows 7 migration

One of the key lessons that Turnock took from the WannaCry attack was the importance of upgrading operating systems.

Researchers from Kaspersky Lab found that approximately 98% of the PCs using the company's software that had been infected by WannaCry were running a version of Windows 7. Windows 10 was entirely unaffected by the ransomware.

NHS East & North Herts CCG ensured it wouldn't have to run an outdated operating system by implementing a thorough Windows migration plan. The strategy involved designing different versions of Windows 10 for the various environments spread across the partnership's multiple trusts and 9,500 end-user devices.

The CCG also used Nexthink to send messages about the migration to users and receive feedback on any issues with the deployment, as well as to pinpoint any problems, such as a slowdown to the asset management software that was duly identified and remediated.

"We spent 18 months planning how we were going to do it, and that felt quite frustrating because people wondered why we didn't just get on with it," Turnock recalls. "But it was important. The devil's in the details."

Shared future

Turnock, who was ICT Director at HBL ICT prior to his appointment as CDO of NHS East and North Herts CCG, has great faith in the benefits of the shared services model.

"It's all about shared ownership, shared risk, shared costs and shared benefits, and therefore, we can actually invest more in technology because we're reducing duplication," he said.

He believes that the approach will greatly improve interoperability in the NHS, make services run more smoothly by enabling a better flow of information, and increase buying power for mutual benefits.

"I think now in the NHS we're starting to talk more among ourselves. We're moving away from our silos, which is really good and what we need to do," he said. "We're now starting to share strategies, share experiences, and share initiatives."

4 tips for getting the business to stop hating IT

Long seen as back-office problem solvers and the department of 'no,' IT still has an image problem with business executives and users alike. Here's how to fix it.

BY MINDA ZETLIN | A few years ago, the IT department at networking systems company Ciena had a virtual all-hands meeting. Although the meeting was led by the IT department and its roughly 300 employees, all of Ciena's 6,500 employees were invited to join. The meeting was a test of the new videoconferencing and collaboration tools Ciena had just deployed.

That event took place in late 2017. But both the rollout and the event had been in the works for a long time, explains CIO Craig Williams. "We've been on this digital transformation journey for about three years," he says. "What if you reimagined IT and the company did it all over? You wouldn't build data centers. You'd probably come out with a video-first strategy. You'd invest in collaboration tools, and you'd support any mobile device anywhere in the world."

At the same time as his team was introducing Ciena's users to its new mobile-friendly collaboration tools, Williams also wanted to give them an inside view of IT's somewhat offbeat personality. "We had a talent show," he says. "We had break dancing and people who could fix their hair in 10 seconds." One executive gave a presentation in which she'd been asked to include a variety of unrelated words, things like "bowling ball" and "jungle gym," and the audience used chat to try and guess what they were. Another read a poem she'd composed for the occasion—which mocked Williams, her boss.

"The feedback we got was, 'That's weird! That's cool! We want to see more of this,'" Williams says. "That's exactly what you want people to think, not 'OK, I've got a job to do—let me get back to it.'"

It was all part of Williams' carefully planned strategy to project an image of IT that is different from how it's traditionally been viewed. "IT has been in the business of fixing problems, and when you're only in the problem-solving business you can easily get a bad rap," he says. "But there's an opportunity to have a different culture. At Ciena, IT positions itself as being a competitive advantage to the company. It's what we try to be, and what I hope and believe we are."

And so, he says, "We wanted to make a statement about IT. We're quirky, we're transparent, we share stuff, and we ask some tough questions. And in parallel, we're testing our collaboration tools."

Learning to love IT

Attitudes about IT departments are evolving in the right direction, but they still have a long way to go, IT experts say. "There's the historical aspect that IT systems used to take a long time to

"We've been on this digital transformation journey for about three years. What if you reimagined IT and the company did it all over? You wouldn't build data centers. You'd probably come out with a video-first strategy. You'd invest in collaboration tools, and you'd support any mobile device anywhere in the world."

Craig Williams
CIO
Ciena

deliver, when we worked in a waterfall approach," says Merim Becirovic, managing director and global CTO for Accenture's IT organization. "Some of that image still resonates. No one has forgotten that IT used to take on projects and it would be years before the business saw any value."

As businesses have grown more digital, they've started realizing, "Oh, what IT is doing is good, and we need them," says Suzanne Adnams, vice president and analyst at Gartner. On the other hand, she adds, when business leaders want to try new technologies, some assume IT can't provide what they need, so they work with vendors or outside talent, often without informing IT. That approach leads to trouble once those business leaders have acquired that new technology and now throw these tools "over the wall" for IT to manage. IT personnel may push back, saying that they knew nothing about this deployment and aren't familiar with the technology or coding language in question. Thus, "IT can't help us" becomes a self-fulfilling prophecy.

It doesn't have to be this way. There's a lot that IT leaders can do to improve IT's image and build better relationships with both top management and the organization as a whole. Here's how.

#1. Think of users as colleagues, not "customers"

"For a long time, we were trying to get IT to run a service organization, and we told them they had to think of the rest of the organization as their clients or customers," Adnams says. But if IT is simply providing a service to customers, there's no reason why LOB executives shouldn't obtain that same service from a different vendor.

"Now we talk about IT organizations and CIOs needing to demonstrate the value they deliver, rather than the service they

ANDRE HUNTER (CC0)

offer, and that's a big difference," Adnams says.

That distinction can seem tricky for IT organizations that are moving to a product-centric model, as Adnams and many other experts are advising these days. But, she explains, a product-centric model means having a holistic view of the business and how the product in question helps the end user.

When that holistic view is lacking, it can lead to trouble. "I was talking to an infrastructure guy who managed the products we sold his company, and I said, 'There might be some interesting partnership possibilities between our company and yours,'" recalls Andrew Wertkin, chief strategy officer at BlueCat Networks. "He answered, 'Our networks are really complex, and I understand them very well but I don't really know what we do.'"

That kind of attitude might seem reasonable if you think of your company's technology users as customers. But if you think of them as colleagues, you'll know better.

#2. Go all out to build up trust

Before you can upgrade IT's image with users and executives, you have to establish a solid foundation of trust, Adnams says.

"If you want to transform the IT organization and the way it's behaving and expressing itself, you have to actively build trust between IT leaders and their peers," she explains. "There has to be trust from the executive suite. They have to be able to trust the CIO to tell them what they need to hear and to give them real information. No matter how you look at it, you can't rebrand IT's image without that trust."

Building trust takes lots of time. It takes curiosity about the business and the problems your business colleagues face. And it takes a willingness to listen.

"Develop relationships where, on an ongoing basis, your only agenda is for your business colleagues to share their concerns and challenges," Adnams suggests. "IT leaders can take that information back with them and start identifying areas where they can provide some relief for a given pain point." That's different from IT's usual stance of constantly trying to solve problems and tell the business what it can and can't do.

Don't make the mistake of believing you can dictate what others think of IT or force them to recognize its importance, Adnams says. And, Wertkin adds, don't assume you're dealing with people who know less about technology than you do.

"There can be an attitude of, 'We're not equals because you don't understand what we do,'" he says. But that may be completely untrue, because many companies these days have very sophisticated technology experts working outside of IT. "You could be talking to someone who's written hundreds of thousands of lines of code."

#3. Look beyond the executive suite

CIOs and other tech leaders routinely focus relationship-building efforts on the C-suite and on line-of-business leadership. That's not enough.

"The question is, how does a CIO build trust and partnership with every single user in the business?" says Jamshid Rezaei, CIO at telecommunications company Mitel. "When employees come to work, they want to make sure they have the tools, information, and processes in place to do their jobs. Building a relationship with the executive team is important, of course. But it's just as important to build a relationship with the entire organization."

How do you build that relationship with end users? The first step is to understand their needs and desires, and you won't

learn that from help desk tickets alone, says Tim Flower, global director of business transformation at digital employee experience company Nexthink. Before joining Nexthink, Flower spent 20 years working in IT at The Hartford. "There was a famous internal meeting with our CEO, who asked us why we weren't fixing problems for our users in California. Our response was that we didn't know they had problems," he explains.

For most IT leaders, one of the biggest opportunities to build—or destroy—trust with end users is when rolling out new technology. A recent survey commissioned by Nexthink suggests that IT organizations overall aren't doing as good a job of this as they should be. For example, 64 percent of responding IT executives thought innovation activities at their company had been "mostly" or "totally" successful, while only 41 percent of employees agreed.

The survey also found that, on average, IT only has 56 percent visibility into the success or failure of new technology deployments and only 58 percent visibility into user adoption levels. "You'll think your new environment is running fine," Flower notes. "Eventually, you shut off the old technology—and then you find out there's a problem."

#4. Do as many types of outreach as you can

What's the best way to overcome this disconnect with end users? Fun live events like Ciena's virtual all-hands meeting? Pre-recorded webinars? "Lunch and learn" events? Internal trade shows? Company-wide social networks? The best answer is all of the above, and anything else you can think of.

"Flex all those muscles. See what works," Accenture's Becirovic says. "There are many ways for users to consume the data." For example, Accenture IT sometimes does brown-bag lunch events to teach users about a new technology, but with employees in 130 countries there's no one time of day that works for everyone. "Some people are willing to stay up and listen live," he says. "Others want to listen to it recorded, and that's all OK."

Accenture recently rolled out a video chat and collaboration solution to the whole company. This was a deployment that had long been in the works, and Becirovic says the company was fully set up to work virtually even before that became a requirement under social distancing orders. When it came to teaching users about the new collaboration tool, he says, "We used multiple channels to get the word out, whether through an email campaign, internal social platform campaigns, video, broadcast campaigns, or train-the-trainer type events."

Pretty soon, he says, "Word of mouth was another component. Employees were getting pings from other employees. We were seeing the adoption happen. Before you know it, you've got a machine moving forward."

BlueCat's Wertkin adds, "There are a variety of ways to communicate." Although things like brown-bag lunch events and internal trade shows can be very useful, he says, "the important thing is finding ways to interact and communicate that aren't project-based and that get people from different parts of the organization together and speaking. I don't have a formal way to do it because I think the key isn't formality, it's informality."

Informally or not, he says, there are many conversations that IT and business users should have in this time of rapid technological development and rapidly changing needs. "From waterfall to agile—bring that mentality to everything," he advises. "It's how you plan and think about requirements, how you prioritize work. If you're not trying to change the conversation, then there are tons of missed opportunities."