DIGITAL HOSPITALITY

Exceptional Service through the Power of Information
Digital transformation is fundamentally shifting the way hospitality companies conduct business and empower their employees at every level. Moreover, for the first time in history, we have as many as six different generations working side by side in the labor force. These shifts call for a modern workplace designed to meet evolving employee expectations and the challenges of an increasingly complex digital landscape. In hospitality, a truly modern workplace equips employees with the tools and solutions to deliver a better experience to guests through greater collaboration, optimized operations, and more efficient business models. A successful digital transformation requires participation by all workers, from the boardroom to the executive team all the way down to employees manning the front desk.

Firstline Workers are the more than two billion people in roles that make them the first points of contact between a company and the world it serves. They are often the first to engage customers, the first to represent a company’s brand, and the first to see products and services in action. They are, in other words, the ones who bring the ambitions and strategies of company leaders into the real world. In the hospitality industry, they’re the employees who directly serve the guests, from facilitating the check-in process to providing clean linens. Their intimate knowledge of guest preferences and daily operations can provide a wealth of insight. These workers have huge potential to promote growth, spark innovation, and accelerate a hospitality company’s success in the digital age—and that potential is largely untapped at the moment.

At Microsoft, our mission is to empower every person and every organization on the planet to achieve more. Recognizing the unique potential of Firstline Workers in the hospitality industry, we aim to build tools to close long-standing technology gaps that separate employees from the data, resources, and expertise they need to do their best work. By providing all the information necessary for their work while reducing the routine parts of their jobs, we can connect Firstline Workers to each other and back to the organization. This in turn has the potential to foster greater collaboration and camaraderie, and a better workplace culture while enabling anyone in the organization to turn their ideas into action.

In our faster, more competitive world, it should be one of the top priorities of every leader in the industry to unleash this potential by empowering their Firstline Workers. When these employees are equipped with the right technology, their perspectives, insights, expertise, and ingenuity can help shape the business, generate new ideas, and deliver a superior experience to their guests.

We’ve partnered with Harvard Business Review Analytic Services to examine the unique and critical role Firstline Workers play in the hospitality industry’s digital transformation. This is part of a broader series exploring the opportunity organizations have to build a more intuitive, immersive, and empowering experience for Firstline Workers and provide new solutions that reshape how employees think, innovate, and take action for their customers and business.
INTRODUCTION
Hospitality companies—hotels, resort operators, casino companies, and cruise lines—see opportunity for new value creation in digitizing firstline work. Enabling firstline workers with technology and access to timely information creates both greater efficiency and the ability to enhance customer experience. In hospitality, the two go hand in hand.

Firstline workers in hospitality fall into two basic categories: roles that are primarily guest-facing (front-desk associates, casino hosts, food and beverage workers, concierge and bell desk staff) and those that are more operationally focused (housekeeping, maintenance, and engineering). However, in the hospitality world, everyone and everything contributes to the guest experience. New technology capabilities are blurring the lines between groups and enhancing firstline workers’ roles in new ways.

In a recent survey about Firstline Workers conducted by Harvard Business Review Analytic Services, 78% of respondents strongly agreed with the statement “To be successful in the future, our organization must connect and empower its firstline workers with technology and information.” Respondents said the primary drivers for customer-facing firstline workers are to increase productivity and efficiency (named by 67%), enhance customer engagement/satisfaction (62%), and improve product and service quality (59%).
At Caesars Entertainment resorts, “front-desk staff will soon be roaming the check-in areas—or anywhere else on the property—to welcome guests and check them in on a smartphone or tablet by scanning their ID and swiping a credit card,” said Les Ottolenghi, EVP and chief information officer at Caesars Entertainment. “Our new touchscreen-based lodging system allows guests to check themselves in as well.” In fact, Caesars already checks in more than 30% of its guests via kiosks, and it “plans to eliminate the barriers of the front desk at many of its properties sometime next year,” he said.

Not only will such moves make check-in more efficient, it will enable hotels to shift labor to areas where it can have a greater impact, such as providing more in-room service, said Chris Curran, chief technology officer at PWC New Ventures. “The check-in process is not necessary; it’s an artifact of hotels’ traditional business processes,” Curran said.

Robert Rippee, professor at the University of Nevada Las Vegas and director of its hospitality innovation laboratory, agrees, but he sees this shift happening slowly. “Everyone would like to increase the amount and impact of in-room service,” he said. “Doing that by reducing investment in front desk sounds good, but hotels have spent tremendous amounts of capital” in their existing front-desk infrastructure and systems. “It will take time.”

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**FIGURE 1**

**PRIMARY DRIVERS**

What are the primary drivers for creating a more digitally connected and empowered frontline workforce?

- **CUSTOMER FACING**
  - Increased productivity/efficiency
  - Enhanced customer engagement/satisfaction
  - Improved product/service quality
  - Greater market intelligence/customer understanding
  - Increased innovation (by engaging those closest to the customer/product)
  - Increased employee engagement/satisfaction

- **PRODUCERS/OPERATORS**
  - 67%
  - 62%
  - 59%
  - 50%
  - 40%
  - 37%

**SOURCE:** HARVARD BUSINESS REVIEW ANALYTIC SERVICES SURVEY, JULY 2017

**MORE EFFICIENT CHECK-INS WILL ALLOW HOTELS TO SHIFT LABOR TO AREAS WHERE IT CAN HAVE A GREATER IMPACT, SUCH AS PROVIDING MORE IN-ROOM SERVICE.**

CHRIS CURRAN, CHIEF TECHNOLOGY OFFICER AT PWC NEW VENTURES
Caesars is looking beyond simply untethering its front-desk staff to empowering them to become “virtual concierges.” Its new hospitality management system is integrated with its customer relationship management (CRM) system to provide “real-time information in a single customer record,” Ottolenghi said, compared with the eight sources of information they worked with before. Moreover, it also connects to “every major web service that’s travel-oriented” such as Yelp or TripAdvisor, putting a wealth of useful information at staff members’ fingertips.

**Connecting with Employees for Quality and Efficiency**

Marriott Vacations Worldwide recognized that providing firstline operational workers around the world with digital tools and technologies would enable them to do their best work. The company initially focused on four main areas: communication, training, scheduling, and inspections.

An enterprise social tool makes it possible to communicate with firstline workers without having to deal with the higher level of licensing required for email, said Ed Kinney, global vice president of corporate affairs and communications. “In the past, the company had to rely on print and post, or managers passing messages along, or payroll stuffers,” said Kinney. The social tool serves another purpose as well, enabling property managers to give associates a way to talk to each other.

Employees can access short training videos on their mobile devices. “They can do that in the time or in the place where they work,” said Kinney—for example, “while cleaning a villa, or at the bar making a drink. They can consume that training in the middle of that process.” This is both easier and more effective than getting firstline workers to a training lab or PC. “We just couldn’t do that before.”

Scheduling is easier too. A number of properties closed during the natural disasters that took place in the U.S. and Caribbean in the fall of 2017. Managers were able to easily adjust schedules to reflect the reduced staffing need and to communicate those changes to the people affected. “In the past, that would have required calling each employee and making them aware of the changes, because there was no other way to get that information to them,” Kinney said.

Finally, Marriott Vacations has dramatically increased both the efficiency of its villa inspection process and the condition of its villas by loading inspection forms onto mobile devices that connect to a central system. “Every room must be inspected prior to a guest’s arrival,” said Kinney. “In the past, the inspector would print out the inspection form, manually fill it out, and turn it in to a manager or administrative assistant in housekeeping. The data would be input into a spreadsheet, where managers could look at scores and trends.”

Today the forms are loaded onto tablets. The inspector types in the room number and the name of the associate who cleaned it. They then fill out the form, upload pictures, hit complete, and the information goes into a database. Managers access a series of dashboards and reports that can be run with little additional work. “We look at the top trends; what things are failing the most [e.g., a particular lamp or seat cushion]; the performance of a particular associate or department over time; what scores a particular inspector is giving,” Kinney said. This data is used to increase training in certain areas and to celebrate and recognize people for exceptional work.

Data can be used to **increase training** in certain areas and to **celebrate and recognize people** for exceptional work.
THE ULTIMATE GOAL IS TO BE ABLE TO ANTICIPATE AND FULFILL GUESTS’ NEEDS WHILE IMPROVING QUALITY AND EFFICIENCY.
Technology has improved the productivity of maintenance work in hospitality as well. At Caesars, using a system to log and track incidents has made the process more efficient while providing insight into trends. “As an employee or team member you can register a ticket, you can see where the ticket is in real time, and the person performing the fix or the maintenance can communicate with you in real time,” Ottolenghi said. “It never has to go to a service desk. It goes straight to the person that’s got to commit to the activity.”

Guest requests for maintenance at Marriott Vacations properties go directly to the associate assigned to that work. The associate can input notes and pictures from the job and log when the work is complete. Managers run the same app and can assign work. This has eliminated traffic that used to go through the PBX. The improvements in housekeeping and maintenance have contributed to Marriott Vacations’ five-year record of steady improvements in guest satisfaction, scoring in the low 90s for cleanliness and exceeding hotel industry averages.

**Creating a Firstline Culture of Service**

The ultimate goal in digitally enabling firstline workers in hospitality is to be able to anticipate and fulfill guests’ needs while improving quality and efficiency. Today’s tools make that possible, but for most organizations, it also requires culture change.

“We started building a service-oriented culture before the technology,” said Ottolenghi. “We focused on how to engage and train our employees [reinforce that each is] more than just a person who gives directions.” Everyone—including the EVP and CIO—participates. “We engage guests, ask them where they’re from, why they’re here, how long they’re staying, and what they would like.”

Once these insights are gathered from guests, they are codified and actions based on the insights are automated. The popularity of various guest suggestions is recorded in the CRM system and then the resulting actions are automated through machine learning. “The uplift is ridiculous,” said Ottolenghi. “It’s the ability to use traditional training and programs, focusing on service first, then [capturing popular suggestions] and automating that.” The technology amplifies the value of what hospitality workers have to offer.

Marriott Vacations has built a culture of accountability with its operations staff, and the technology has enabled that by recording and tracking performance, said Kinney. The teams can see their own and each other’s scores and trends. “Everyone wants to improve and be recognized as superstars.”

Hospitality companies enabling large numbers of firstline workers with new technology know they’ll be more successful if they start with easy, intuitive tools that require minimal training.

From an adoption standpoint, Marriott Vacations purposely picked the tools that were easy for associates to start using quickly with a minimal learning curve. This created quick wins and established a foundation to build on; other capabilities will come later. Another key part of Marriott Vacations’ firstline strategy is providing associates with a degree of choice in the tools they use and how they use them. This has increased adoption, helping integrate these workers into the digital workplace.
Next year will also see the launch of Caesars’ first “casino of the future,” designed to appeal to Millennials and the growing numbers of people who prefer to go out as a group, but “loosely coupled” through their social apps, Ottolenghi said. “Once they cross our geo-fence they’ll be registered with us with their own devices.” Set up as a group, “they can win together rather than individually.”

To move into the future will require hospitality companies to take a long view, Rippee said, especially companies whose current business model is still profitable. “They have to look at the operating model five years from now, look at the technology today, and begin to disrupt their own business,” he said.

At Caesars, doing so has resulted in starting seven and completing four technology transformations in two years. The goal: to achieve a flatter, less siloed enterprise architecture with a common data model where information can flow from people and machines through key systems and back to provide insight and empower the people serving customers in an easy and frictionless manner.

With these investments, Caesars, Marriott Vacations, and other organizations in the hospitality industry are building the workplace of the future. They are creating the conditions for success by providing all workers, from boardroom to firstline, with the tools, data, and expertise they need to do their best work.

The Future: Advanced Tech Will Turbo-Charge Firstline Work

Hospitality leaders are excited about the potential of what technology can do for firstline workers in the future. Caesars is already using chat bots to supplement associates’ knowledge on the fly so they can become even more effective virtual concierges. Robert Rippee, from the University of Nevada Las Vegas, sees translation technologies as being key to enabling housekeeping staff to increase their guest service engagement—whether to overcome their own limitations with English or to accommodate international guests from a variety of countries.

Another way Rippee sees technology helping housekeeping staff is through robotics. For example, Virginia Tech is testing the use of exoskeletons with Lowe’s to help workers lift heavy objects like air conditioners without injury. The same technology could be used by room attendants to make beds. “This allows humans to go beyond their human capacity,” Rippee said.

Caesars is also starting to incorporate the internet of things into its casino operations, with machines and casino employees all recording and sending data back to an enterprise data management system that feeds into Caesars’ CRM. Then, using rules and machine learning, the CRM alerts casino hosts on the floor to make instant offers of rewards and credits the player has earned. This is currently in operation for the company’s VIPs and will be rolled out to encompass all rewards customers next year.

Translation technologies will be key to enabling housekeeping staff to increase their guest service engagement. Robert Rippee, The University of Nevada Las Vegas
Creating the conditions for success requires that all workers be equipped with the tools, data, and expertise they need to do their best work.
**METHODOLOGY AND PARTICIPANT PROFILE**

A total of 383 respondents drawn from the *Harvard Business Review* audience of readers (magazine/enewsletter readers, customers, HBR.org users) completed the survey.

**SIZE OF ORGANIZATION**

All respondents’ organizations had 250 employees or more.

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<th>Size of Organization</th>
<th>250-999 Employees</th>
<th>1,000-9,999 Employees</th>
<th>10,000 or More Employees</th>
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<tr>
<td>Percentage</td>
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**SENIORITY**

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<th>Percentage</th>
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<td>C-Level or Executive managers</td>
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<tr>
<td>Vice President or Director</td>
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<td>Managers, Supervisors, Senior Managers, or Department Heads</td>
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**KEY INDUSTRY SECTORS**

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<td>Education</td>
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<tr>
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<td>Other</td>
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**JOB FUNCTION**

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<tr>
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<td>Strategic Planning</td>
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<td>Finance/Risk</td>
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<tr>
<td>HR/Training</td>
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<tr>
<td>Other</td>
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Figures may not add up to 100% due to rounding.