

Robots: Healthcare Product Today, Driver of Future Growth

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Healthcare organizations are recognizing robots as valuable assets for getting tasks done more efficiently and effectively, and at a lower cost in numerous areas of the organization. However, the true value of robots will occur when organizations no longer use robots to simply perform tasks once done by people but leverage them as an enabler for operational and clinical success.

Improve Quality, Gain Market Share

Robotic surgery has become increasingly common [with approximately 4,000 robots performing 750,000 operations](#). [While studies on robotic surgery](#) vary in highlighting whether they truly deliver better results, adoption is growing. For physicians, robots offer the promise of increasing quality by reducing human error and for patients, they offer the benefit of a less invasive procedure with a shorter recovery time.

The potential of robotic surgery doesn't lie in the surgery experience of today, it offers the opportunity for reaching new consumers. Just like telemedicine allows physicians to see patients hundreds of miles

away, the use of robots to perform remote surgeries could move surgery outside the four walls of your hospital and into ambulatory surgery centers in neighboring towns or the operating rooms of rural hospitals. While the technology for tele-robotics exists today, the business strategy and operational elements have yet to be developed by healthcare organizations in order to make this a reality.

For healthcare leaders, a mindset around how to best adopt tele-surgery could be viewed as a growth enabler that could play into their strategic planning for the future.

Improve the Consumer Experience, Develop a New Healthcare Experience

Healthcare organizations are feeling similar pressure to provide a better consumer experience that rivals the experience that consumers have in other industries. However, as organizations simultaneously face increased pressure on their bottom line, leaders often struggle to allocate funding for investments and human capital that could better meet consumer needs. Within the retail and hospitality industries robots have been used to achieve both objectives.

They're using robots to answer basic questions of consumers in an immediate fashion and triage difficult questions to the appropriate person. For example, robots act as [greeters in airport restaurants](#), and help travelers navigate to their appropriate gates and locate amenities around the airport. These same principles could be applied to the healthcare industry. Robots can address these growing consumer demands by creating solutions to assist consumers with wayfinding around your organization, and answering their basic billing questions and other common inquiries. By incorporating robots as point solutions for customer service, you can create a better experience by simply giving consumers the information they need at the time and place they need it while also helping you increase productivity across the organization. This also frees up your employees from needing to execute these tasks.

As care continues to move outside the four walls of the hospitals, robots can serve as the platform that enables care delivery to transform to be more consumer focused. Devices like Alexa are poised to offer consumers the ability to receive medication reminders, directly connect them to their physician for virtual care and answer simple medical questions for consumers. In Japan, robots are a solution to their [shortage of caregivers](#) while simultaneously helping consumers age-in-place by offering some components of care without the need for human intervention. Robots could bring medication to the consumer, perform simple tasks instructed to them by those in a remote monitoring location and even communicate with the consumer to provide social interaction. This will enable care to be delivered in new ways.

Realize Efficiencies, Transform Your Business Model

Robots are delivering food, cleaning rooms and automating aspects of the revenue cycle and supply chain within health systems. These are tasks that many humans are performing today, but when automated they create a more efficient business process and allow staff to focus on more strategic work. Robots are gaining widespread adoption in niche areas, where they are used to drive down cost.

Robots coupled with sensors could not only lower costs today but transform the way you operate in the future. An example from another industry is [John Deere](#) where rather than focusing on simply improving the process today, they're invested in sensors on their machines that harness data in order to make more informed decisions for the future. With sensors, they're able to assist farmers with forecasting while simultaneously helping to predict the demand for spare parts for the farming products they sell. Similarly, in healthcare, sensors coupled with robots could generate insights that create an integrated network which provides actionable insights specific to the consumer. This data can be another building block that moves healthcare organizations from improving individual outcomes to improving outcomes on a global scale.

For healthcare providers, robots should be looked at as a transformative capability for their organization and a key driver of innovation. This requires thoughtful planning around how you can leverage them to be more than just task masters but to truly become growth enablers.

Key Takeaways

To use robotics as a solution for today's challenges and a key component of your strategy for building a successful healthcare system of tomorrow, you should:

Think differently.

Look for opportunities to address strategic priorities or free up your staff's time to focus on these priorities with robotics.

Plan differently.

Develop a vision of the future and work backwards to create a success formula that makes providers, clinicians, employees, consumers and communities more accountable for care outcomes.

Act differently.

Make strategic investments in robotic technology that won't just serve as a function of increasing efficiencies today but will also enable transformation in the future.



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