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Healthcare
Transforming Physician and Patient Engagement at LifeBridge Health
A consumer style of engagement is supercharging physician communications and patient care coordination at a major regional health network.

Most industries today are actively engaged with how to deliver great experiences to target customers. Until relatively recently, that has not necessarily been the case for healthcare, which has lagged in engagement technologies for physicians and patients, our primary customers.

Even before “patient-centered” and “healthcare consumerism” were buzzwords, LifeBridge Health’s vision was to deliver the same level of best-in-class services and experiences to our customers as they receive when they interact with other service providers, from online retailers to travel providers. Our goal was to solve important business and communication issues with leading-edge engagement capabilities that would also support our overall digital transformation strategy, designed to deliver better patient and population health services.

The solution we implemented uses consumer-like service and technology options to make it easy for physicians to access our health system, coordinate care and empower our patients to manage their health. So far, the benefits include better care delivered with greater efficiency, more satisfied physicians and healthier patients, and robust engagement resources that support a range of uses well beyond what we initially envisioned. The solution has also helped us build market share and a reputation for quality care that spans the state of Maryland.

Coordinating Great Performance

Quality and cost are rapidly becoming the measures by which insurers will calculate reimbursements for LifeBridge and other providers vs. healthcare’s traditional fee-for-service model. The Department of Health and Human Services intends to tie 80% of all
Medicare fee-for-service to quality or value measures by 2018, and the overall industry expects the majority of reimbursements to be pay-for-performance-based by 2020. These trends make efficient care coordination and patient and physician engagement extremely critical capabilities for delivering high-quality care at great value.

Effective coordination of care helps prevent test and procedure duplication, ensures physicians inside and outside our facilities have all the information they require to make the best decisions for their patients, and equips patients to follow pre- and post-discharge regimens and manage their health conditions.

One means of accomplishing better care coordination is to adopt the “hospitalist” model. A hospitalist is a physician whose entire focus is caring for patients while they are in the hospital. Ideally, the hospitalist coordinates care with the specialists treating the patient, such as surgeons and oncologists, and with the patient’s primary care physician (PCP) outside the hospital.

The challenge is that hospitalists simply can’t be on a first-name basis with all the PCPs and specialists in a major health network like ours, or in a large city like Baltimore and its suburbs, where we operate.

Our scale is considerable: LifeBridge has almost 1,238 beds across four hospitals, one of which is a teaching facility and the largest community hospital in Maryland. We also offer a range of destination programs, operate a health and fitness group, and have many subsidiaries and affiliates, all spread over a roughly 100-mile radius of urban and suburban settings.

Given our size, we were seeing a breakdown in “warm handoffs,” in which a hospitalist and a PCP share detailed notes when a patient is admitted to or discharged from the hospital. This failure to connect is more than a cosmetic issue; it has a direct impact on the quality and cost of care. Post-discharge care can be less effective if the PCP doesn’t have a full picture of what occurred in the hospital. It can also lead to patients using expensive emergency care departments for follow-up services and/or being readmitted to the hospital. Care coordination is clearly essential for ensuring patients have the best possible experience at LifeBridge, which in our view extends to their ability to manage their own health once they are back home.

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A Platform for Engagement

Our thinking was to create an engagement platform that would offer PCPs in our communities an easy way to connect with hospital-based providers so they could exchange notes and engage in useful warm hand-offs. The platform would have the best features that online retailers, airlines, financial services providers already deliver. It would store transaction histories, offer suggestions and provide customizable options.

We initially scoped a pilot to see if we could combine people, process and data effectively to deliver the services we envisioned. The pilot results would help us gauge whether it made sense to invest in rolling out the platform on a broad scale.

We had worked with Cognizant previously and were well acquainted with the company’s global clinical services, including a call center in Manila staffed with U.S.-trained registered nurses available 24x7. The nurses are equipped with Cognizant’s cloud-based OnVida engagement platform. We worked internally to develop the call scripts the nurse agents would use and the processes the physicians would follow.

The engagement pilot, launched in July 2015 after about six weeks of planning, included these basic mechanics:

- An automated workflow engages nurse agents in the call center to make contact with physicians via their preferred communication method (phone, secure e-mail or text).
- The nurse agent then coordinates a connection between the care team via text, phone or e-mail, whichever communication preference is dictated by the use case executed.
- The nurse captures the notes from the conversation, entering them into the platform and the electronic medical record (EMR).

The platform is also designed to help patients follow post-discharge orders. A call center nurse contacts the patient to answer questions, review care instructions, coordinate medicine deliveries and even organize transportation for the patient to reach follow-up appointments.

Making Connections

The engagement program, called LifeLink, has come a very long way since we launched it with 10 nurses and a call volume of 1,000 contacts in the first month. Today, 30 nurse agents support more than 22,000 contacts per month and a range of additional features.

We have integrated our EMR system with the OnVida platform, which enables automated physician consult orders. A physician creates a consult order in the EMR, and the EMR automatically populates OnVida with
a worklist of patients requiring consults. The nurse agents use the platform capabilities to connect consulting specialists with the ordering physician and PCP via their preferred channels. If physicians have all selected the secure texting app as their channel, the entire process is fully digital. Such automation improves compliance too, with the EMR record updated to show that the consult, in fact, occurred.

We’ve also added remote patient monitoring to our suite of engagement services, beginning with a population of patients with congestive heart failure. Our nurse practitioners enter threshold parameters for blood pressure, weight and medical adherence when they enroll a patient into the system. The system alerts our remote nurse agents when a threshold is exceeded so they can contact a patient’s physician through the engagement platform. Through the program, patients have 21.5% lower odds of a 30-day readmission than in the year prior, when LifeLink was not in operation.

Our nurse agents also enable us to centralize patient transport arrangements, working with ambulance companies and Uber Health. With a central transport hub, we can ensure adherence to the transit service guidelines established for Medicare, Medicaid and private health plans.

**The Rules of Engagement**

In all these applications, the platform enables the community-based PCP to rightfully remain the captain of the ship throughout patients’ treatment journey, including their time in a LifeBridge facility. It delivers simplicity, intuitiveness and ease of use – all the qualities of a retail engagement model. The results have been significant and measurable, including:

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**LifeBridge Engagement Platform Connects Primary Care Physicians and Hospitalists**

The LifeBridge LifeLink engagement platform streamlines the warm handoff process between a PCP and a hospitalist or other physician. The PCP needs to contact a call center nurse just once; the nurse manages the other connections based on the platform data and ensures the handoff call is documented.

![Figure 1](image-url)
Increased patient interaction after hospital discharge. This has led to improved patient follow-through, appointment scheduling, medication adherence and follow-up with primary care. This is important for ensuring continuity of care for patients among our facilities.

A 15% reduction in no-shows via reminder calls.

Streamlined management of acute care patient transfers. Transfers to LifeBridge Health hospitals from other care facilities have more than doubled, with the process being managed through a single integrated call center.

We learned some interesting lessons on the way to achieving these results. While we’d envisioned a white-glove, concierge-style service for physicians, it turned out that the physicians we serve were too busy even for salutations such as “How are you today?” They wanted to get to business, fast. As a result, we rewrote call scripts on an almost daily basis in the early days. Conversely, patients needed a warmer approach on follow-up calls to establish trust between themselves and the call center nurses.

Again, engaging patients and physicians in their preferred communication styles is more than a matter of style points. Rather, it yields objective data that helps us identify issues and pain points that affect care quality so that we can address them. In one of our facilities, the data showed the call center nurses were having difficulty reaching patients after discharge. An investigation revealed that at this facility, nurses had to make initial contact with patients before they were discharged instead of afterwards to establish trust and get the best phone number to ensure follow-up.

Lowering Costs, Accelerating Speed

The platform also helps us avoid costs while ensuring patients get proper care. Patients often come to emergency departments (ED) with chest pain, but certain low-risk patients could receive a stress test and echocardiogram at a clinic or other lower cost location. ED physicians are reluctant to let these patients do so, however, because of their concerns the patient won’t follow through. With the engagement platform, a nurse calls the patient while she is still in the emergency department and tells her where and when to go for the test. The nurse follows up with the patient to ensure the test is completed and also connects with the ED physician to relay the results and close the information loop.

The platform also accelerates our ED response times. Our ED physicians simply hit a pre-programmed speed dial to summon the right clinical team, e.g., #1 for a STEMI heart attack, #2 for a stroke, #3 for acute care, etc. This new process has reduced door-to-needle and door-to-balloon times – key measures, respectively, for good outcomes for heart attack and stroke patients.

We use the analytics and metrics built into the platform to refine performance, such as eliminating call holding time, which is not acceptable in an emergency care setting. Critical calls are now routed to our most senior nurse agents – agents who our emergency physicians know personally – and their task list is divided among three agents,
The nurse agents work so quickly that the patient is often still on the ambulance gurney when the cardiac or stroke teams arrive.

Each of whom immediately goes into action so the necessary steps are carried out simultaneously. One might order an ambulance, for example, while a second alerts a clinical intervention team (for instance, the cath lab), and a third reaches the hospital operations officer with news of an acute patient’s arrival. This change has compressed a 20- to 25-minute process to literally a few minutes. In fact, the nurse agents work so quickly that the patient is often still on the ambulance gurney when the cardiac or stroke teams arrive.

The platform and agent nurses are available 24x7, so a physician may call at, say, 2:00 a.m. to request a same-day appointment at our new neuro-urgent care center, or a patient may connect with an on-call provider.

On a wider scale, these platform capabilities support our accountable care organization (ACO) initiative and our entire Medicare population through connections with the Chesapeake Regional Information System for Our Patients (CRISP), a health information exchange (HIE). LifeBridge Health Medicare population members are registered in CRISP. When a Medicare patient arrives at any hospital in the CRISP network, CRISP automatically notifies our nurse agents, who then alert the patient’s PCP. CRISP’s clinical information portal is being integrated into our EMR environment, which will further streamline our nurse agents’ abilities to keep PCPs informed.

Also, CRISP helps us identify high-risk patients in our population areas, so we may ensure they have 24x7x365 access to our nurse agents and the engagement platform to support early interventions.

Continuing to Connect, While Protecting Privacy

LifeLink enabled us to achieve a 98th percentile ranking on the Hospital Consumer Assessment of Healthcare Providers and Systems (HCAHPS) patient satisfaction survey, which we conduct through the engagement platform. This is indicative of the difference we’re making in how patients perceive LifeBridge and has given us impetus to continue expanding the reach of the engagement platform.

Looking ahead, we plan to build a clinical command center that would help us coordinate care management with services such as scheduling, bed control, teletriage and telemedicine, and integrate the efforts of nurses, social workers, PCPs and specialists. Nurse agents would be the primary coordinators, with the engagement platform helping them connect to patients, deploy ambulances and establish telemedicine links to patients’ homes so physicians can decide whether to treat in place, order an admission to a chronic care facility, or send the patient to an ED.

We envision these efforts being coordinated across our entire system vs. in hospital silos. That said, we must be sensitive to HIPAA compliance, such as keeping all patient data in U.S.-based data centers, and security and privacy practices. We have drawn a firm line between our EMR and its clinical data streams and the patient engagement platform and its tools. While we may integrate additional third-party systems into our nurse agent platform, the EMR will likely remain a standalone entity.
In the meantime, we are establishing ourselves as a hub of care and a “transfer to” location. Our reputation for high-quality care is growing across the state, quite a feat for a midsized community hospital system. Physicians and patients outside of our network routinely call and ask for care services at our facilities. From the very start, our goal was to make it as easy as possible for physicians to access our healthcare system’s services and provide their patients a high level of care. Our growing market share and satisfaction scores suggest we are succeeding.

We must also interact with members of the community who may never become patients at any of our hospitals, and the platform provides options for us to engage with them in ways never before available in healthcare. Delivering the same level of technological capability that our physicians and patients enjoy in consumer settings will help LifeBridge thrive under value-based reimbursement models by offering top-notch medical care at great value. In turn, this success will enable us to fulfill our primary mission of maintaining and improving the health of the community we serve.

Authors

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