

CUTTING PATIENT WAIT TIMES, WASTE BY BEING LEAN

ST. JOHN'S MERCY MEDICAL CENTER (SJMMC)

- ◆ St. Louis, MO
- ◆ 859 beds
- ◆ www.stjohnsmercy.org

SJMMC is a not-for-profit teaching hospital, part of St. John's Mercy Health Care, a member of the Sisters of Mercy Health System.

STEEEP

Timely

Wait times for physical and occupational therapy have been slashed.

Efficient

New process for providing therapy services has cut wasteful steps.

Patient-centered

Scheduling therapy revolves around patient readiness.

THE PROBLEM

Wait times in the hospital's inpatient rehabilitation center were unacceptable; some patients were refusing physical and occupational therapy as a result. Patient satisfaction scores reflected the frustration patients felt.

THE SOLUTION

Using Lean methodology, St. John's turned patient therapy scheduling on its head, coordinating scheduling among acute therapy, nursing and transportation staffs, putting the patients' needs first.

RESULTS

- » Median wait times for acute therapy dropped 54 percent from 24 minutes in January 2008 to 11 minutes by September 2008.
- » Transportation cancellations upon transporter arrival to a patient's room were reduced by 78 percent between January and September 2008.
- » Press Ganey scores increased from 64 percent in January 2008 to 81 percent in November.
- » Number of steps in providing patients with acute therapy was cut by 61 percent, from 31 to 12.

BACKGROUND

Waiting stinks. SJMMC patients who receive therapy after an accident, stroke, surgery, or other condition were used to waiting, an average of 24 minutes from the time they reached the inpatient rehab unit until they returned to their room. "Some patients could wait up to an hour," recalls Kandi McClellan, a hospital physical therapist. "Patients were very dissatisfied." The result—a chaotic atmosphere where therapists felt pressured and some patients missed visits. "We do know patients were declining visits," says Joan Frost, RN, Six Sigma Black Belt.

"Visually, it was pretty evident," says CEO Denny DeNarvaez, who also heard patients' frustration in the "Dear Denny" letters she encourages patients to write her about their experiences. The rehab unit tried several times to address the issue. "Ultimately, everything would kind of go back to being the same," DeNarvaez says. The issue: therapy staff made changes within its silo, independent of nursing and transportation personnel.

A permanent fix came from a new board member, an executive from Boeing, who suggested hospital officials apply Lean methodology to the bottleneck in inpatient therapy. Used by Boeing to improve its processes, Lean focuses on providing exactly what the customer wants or needs, eliminating waste in associated process to meet customers' needs better.

Boeing officials mentored a SJMMC multidisciplinary team, some of whom were trained in Lean and Six Sigma improvement techniques. Boeing officials worked with the SJMMC team on value stream mapping and serve as technical advisers. The team discovered quickly a lack of coordination among therapists, nursing and transportation. The new approach—a pull system in which therapists pull the trigger for patients rather than having patients pushed on them—"is very different from anything we've ever done," McClellan says. "It's about very direct communication."

TEAM MEMBERS

- » **Denny DeNarvaez**
President and CEO
- » **Joan Frost, RN**
Six Sigma Black Belt
- » **Laura Johnston**
Manager, Inpatient Therapy Services
- » **Michelle Lowe**
Acute Therapy Occupational Therapist
- » **Kandi McClellan**
Acute Therapy Team Leader
- » **Diana Moore**
Director of Central Transportation/
CARE Center
- » **Jan Simms, RN**
Nurse Manager Neuroscience
- » **John Wood**
Six Sigma Master Black Belt

PRINCIPLES OF PERFORMANCE EXCELLENCE

The Patient Experience

Upon taking the helm in 2005, DeNarvaez introduced a holistic “total healing environment” concept, seeking to make the complicated and impersonal system work better for patients and their families, at least within the hospital’s walls. DeNarvaez instituted her “Dear Denny” letters to patients and staff, and in each room her cell phone number is posted so she gets feedback on her hospital’s care and service.

What was happening in rehab “wasn’t in sync with what we are about,” Frost says. Examining the process using Lean tools and concepts, it became apparent the system wasn’t working. Patients waited at three key points: to get initial therapy; to get the second part of that therapy, as most patients receive both physical and occupational therapy at the same visit; and to get back to their room. Lack of coordination around scheduling became obvious too. Inpatient rehab scheduled roughly 100 patients throughout the day, but appointments weren’t always conducive to the patients or to the nurses caring for them. Early morning patients ran late; by mid-morning a crush of patients was left waiting to see a handful of therapists. Therapy resources from other areas of the hospital had to jump in to meet the demand. The same scenario was repeated in the afternoon.

“The issue was scheduling and coordination of scheduling,” DeNarvaez says. “The big ‘aha’ moment—realizing we had to stop pushing patients down to therapy... and pull the patient based on their readiness.” Staff created a new system—the central piece being coordination among therapy, nursing and transport staffs—where a therapist contacts a scheduler to “pull” for the next patient about 20 minutes before the therapist finished with a current patient. This prompts a call to a nurse about a patient’s readiness. Work is now standardized for the therapy scheduler, transportation and nursing so that each discipline knows its role and duties to get the patient to therapy at the right time.

It took a while to figure out the pull system. While Lean is customer focused, SJMMC’s pull system had to be based around the readiness of both patient and therapist. If a nurse determines a patient can’t be ready within 10 minutes, a call for another patient goes out. “Keeping it in the forefront, keeping it from backsliding, takes work,” Frost says. Remembering to pull for the next patient 10 minutes before finishing with the current one was hard at first, McClellan says. A good reminder is what’s posted on a white board in the therapy center: “the previous day’s wait time is right in front of us,” McClellan says.

Removing Waste

The value stream mapping effort revealed an arduous 31 steps from the time a therapy order was written to the point at which the patient returned to his or her room. Patient contact didn’t happen until about half way through the process. Ultimately, the number of steps in the process was sifted to 12. Boeing officials were particularly helpful in highlighting workflow issues, but “it was the frontline workers who made the big decisions” about revamping the system to make it more efficient, McClellan says.

CONTINUAL IMPROVEMENT

The pull system continues to be refined, and has been rolled out to weekend staff, as well as smaller satellite therapy gyms located at different places in the organization. More importantly, SJMMC has rolled out the Lean method to improve process in the discharge process and in ancillaries, including CT scan and ultrasound.