

Stroke Care Closer to Home: Building a Stroke Program at Beloit Memorial Hospital

Keeping stroke patients and their families in their community motivated Beloit Memorial Hospital in Beloit, Wisconsin to develop the organization's stroke program. Small hospitals in Wisconsin often serve as the first point of care for patients with stroke before they are transferred to certified stroke centers. But this makes visits from family and friends more difficult at a time when social support is especially important. As a small, 103-bed hospital, Beloit has made large improvements to manage stroke care. Brenda Williams, Stroke Coordinator at Beloit, explains the hospital had a basic stroke policy in place but wanted to excel in stroke care by becoming a certified stroke center and, where appropriate, treat and keep those with stroke in their local community.

Beloit's first step was to assess and improve its stroke care processes. Beloit staff networked with the University of Wisconsin (UW Health) Comprehensive Stroke Program to create a stroke alert process. The Beloit stroke team developed a full algorithm for when a patient comes in with stroke-like symptoms. This algorithm guides employees from multiple departments through the acute care process from the time a patient enters the emergency department, to getting a CT scan and beyond.

Because caregivers from multiple departments are involved in treating stroke, it was essential that everyone involved was current on evidence-based clinical practices. The staff was trained on their roles as part of the stroke alert process, and was certified in administering the NIH Stroke Scale. All nurses were educated on a standard way to administer t-PA to patients. And, in-house caregivers were trained on how to ensure that patients were getting personalized education on risk factors. Other staff joined the care team as needed, such as a dietician to suggest diet modifications and a social worker to address transitioning to another facility or home.

To become a certified stroke center, hospitals must be able to have a neurologist in the Emergency Department (ED) within 15 minutes of receiving a stroke alert. Beloit Health System had two neurologists who worked in the busy clinic setting and they were not always available for stroke emergencies. So, Beloit arranged to have access to a UW Health neurologist by virtual consult within 15 minutes of the request.

Williams also participated in two stroke learning collaboratives to gather ideas from other stroke programs. Beloit partnered with the Wisconsin Coverdell Stroke Program to obtain free resources relating to the stroke data entry tool Get With The Guidelines[®] and other best practices. Coverdell provided a quarterly re-abstraction process to help Beloit maintain data reliability, and assisted the stroke team in monitoring performance measures. In addition, a Coverdell consultant provided an in-service educational Outreach for the hospital stroke caregivers with their valued Emergency Medical Services team. Williams had also participated in the Stroke Coordinators Of Wisconsin (SCOW) group for several years, networking and learning from 55 other hospitals dealing with the same concern – how to ensure the best outcomes for patients with stroke.

What they did

Develop standard processes across the stroke care continuum.

Provide education to all staff involved in treating stroke patients.

Set up virtual consults with neurologists via a telestroke network.

Learn from others' successes through the Wisconsin Coverdell Stroke Registry and the Stroke Coordinators of Wisconsin Group.

What they accomplished

Sustaining speedy, quality care is an ongoing process that requires continual data collection and monitoring.

Here are a few of Beloit Memorial Hospital's achievements:

- Achieved Primary Stroke Center certification with The Joint Commission
- Reduced CT read time to as little as eight minutes
- Increased rate of patients receiving counseling on personalized stroke risk factors from 10 percent to 100 percent
- Reduced all-cause readmission for stroke from 30 percent to 13 percent



Success factors

Get the medical director involved.

"Our medical director is an ED physician and really on-board with stroke," Williams said. "She's well respected and assists with trouble-shooting. This helps bridge the gap with other staff."

Learn from others.

"Being a small hospital, we took advantage of the extra resources provided by Coverdell," Williams said.

Barriers and challenges

Multi-disciplinary communication.

"Having team members from multiple professions and with varying educational backgrounds means that we have to work to make sure everyone is heard," Williams said. "We take the time to undersand where each person is coming from. Still, the stroke team uses any potential difficulty as our motivation to keep moving.

Being a small hospital.

"Being a small institution means a smaller budget and fewer staff." Williams said. "We aren't a large research facility, but we were able to partner with a one to achieve improvements through networking and virtual consults."

What they learned

Monitor and communicate performance data.

"We look at the eight core stroke measures," Williams said. "I bring measures to the stroke unit and have time to share data on stroke every month during the unit in-service education. The stroke data scorecard also gets posted so all staff can see how we are doing."

Meet regularly as a stroke team.

"Our stroke team meets quarterly, and we keep looking at stoke data and conducting plan-do-study-act cycles," Williams said. "The team also reports to leadership to let them know about the progress we've made."

What they are doing now

The stroke team at Beloit Memorial Hospital is now working on further standardizing the neurological assessment, including how the assessment gets documented. Similarly, they are looking at improving the reliability of the bedside swallow screen for patients.

"There's always more to do," Williams said. "Change can be exhausting so you have to make improvements in increments."