

# Independent Hospitals Update



**ST. JOHN'S**  
**LUTHERAN HOSPITAL**  
Excellent Healthcare Close to Home

“Physicians wanted their patients diagnosed faster so there was no delay in the treatment process.”

- Jeanie Gentry, VP Allied Health Services

## The Right Choice for Your Community Making the decision to add MRI

### Remote community hospital brings MRI home.

“Some people would call us a frontier hospital,” says the CEO of St. John’s Lutheran Hospital in Libby, Montana. Located in the far northwest corner of Montana, Libby is the last sizeable community a traveler encounters before heading west into Idaho or north to British Columbia.

The hospital, perched on the edge of the Kootenai National Forest in the Cabinet Mountains, provides critical access care to the 15,000 residents of Libby and surrounding communities. The nearest other medical facilities are 60 miles away in Idaho or 90 miles to the east in Kalispell, Montana.

In addition to its remote location, St. John’s Lutheran is frontier-like in another respect. This 25-bed Critical Access hospital recently acquired a fixed 1.5T magnetic resonance imaging (MRI) system – making the leap from having no MRI at all, not even mobile, to offering its patients the advanced medical capabilities of high field MRI right in their own community.

Why St. John’s chose to make the investment in leading-edge diagnostic technology and how hospital management went about ensuring a successful venture that, to date, is generating patient volume 100% ahead of projections may provide valuable insights for other hospitals contemplating a fixed MRI system.

### Community confidence was at risk

“We had been thinking about adding MRI for years,” says Jeanie Gentry, Vice President of the Hospital’s Allied Health Services. Among the reasons:

**Patient convenience.** The hospital was sending their MRI cases to Kalispell. “It’s a long 90 miles there on a two-lane highway through the mountains that gets very hazardous in the winter,” says Gentry. The trip was especially hard on older patients, a growing demographic for the hospital as more retirees move into the area.

**Provider responsiveness.** The lead time for MRIs was often a week or longer, says Gentry. “Physicians wanted their patients diagnosed faster so there was no delay in the treatment process.” The need for quicker turnaround was also a key factor in the hospital’s decision to not sign up for mobile MRI service. “The physicians’ opinion was that if their patients had to wait a week or more for a mobile to show up, they would probably keep sending them to Kalispell,” she says.



**Revenue leak.** When patients had their MRI exams at the Kalispell hospital, there was a good chance that additional procedures would be performed there as well, such as lab work and surgery, says Gentry. “We were leaving revenue on the table – actually giving it to another facility – because we didn’t have MRI here. We wanted to bring that volume of business back.”

**Physician recruitment.** “Physicians look at the services and equipment available here,” says Gentry. “Unless we meet the standard of care, they won’t want to come to our community to practice.”

**Community trust.** The hospital’s motto is “Excellent Healthcare Close to Home” and Gentry says that the lack of onsite MRI was threatening to undermine the hospital’s 50-year relationship with the community. “If you don’t have MRI, it says something about the level of care and professionalism of your organization,” she says. “It can destroy patient satisfaction and confidence with your facility and they tend to go to other facilities if they have a choice.”

## Running the numbers

Despite the compelling reasons to acquire MRI, “we thought we could never afford it,” says Gentry. At best, the hospital thought they might be able to have a mobile service one day a week.

What changed their mind? Financial modeling and a high quality fixed MRI system from GE Healthcare that met their clinical standards as well as their budget constraints.

The hospital conducted a thorough analysis of potential volume based on physician and patient surveys, as well as projected costs. When the numbers were plugged into a five-year pro forma model, “we came to the realization that we only needed to average 25 patients a month to break even. Any volume above that would be extra revenue to our organization,” says Gentry.

The hospital explored MRI technology options with a number of vendors and were close to signing with one. However, the radiology group in Kalispell that was advising the hospital on the acquisition encouraged them to get a quality magnet, says CEO William Davis Patten Jr.

‘GE was able to bring a solution that allowed us to get the better magnet and still meet the numbers that we needed to.’ That solution was a Signa® 1.5T system from GE Healthcare.



“There were no surprise costs. What we had was surprise revenue – more volume than we ever anticipated.”

Jeanie Gentry, VP Allied Health Services

## Surprise revenue

Working with GE Healthcare Financial Services, the hospital was able to have a lower lease payment during the first six months, which reduced the target breakeven for the first year from 25 scans per month to only 18 scans per month. “GE Healthcare Financial Services allowed us to have a lower lease payment the first 6 months so we could ‘ramp up’ our volume without having such a stiff lease payment day one. This was very helpful and meant that our year one break even was 18 scans per month with an average breakeven estimate of 25 scans per month over the 5-year life of the project,” stated Gentry. However,



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William Patten, CEO

nine months after installation, St. John’s got a pleasant surprise when they compared their MRI system’s actual performance with their first year target breakeven of 18 scans per month. “We found that we were already averaging 50 scans per month, and some months over 60,” says Gentry. In fact, the monthly volume was already at the level that the hospital had hoped to reach by the fifth year of operation.

In addition, the hospital’s expenses were proving to be in line with their projections. “There were no surprise costs. What we had was surprise revenue – more volume than we ever anticipated,” she says. The system was also helping St. John’s address patient and physician satisfaction issues. “Patients love the fact that they don’t have to drive 90 miles for their MRIs,” says Patten. “Our doctors love the rapid turnaround time – they get a radiologist’s interpretation (a ‘wet read’) within 60 minutes of the scan being performed.” An on-site radiologist reads the bulk of the imaging studies. Others are transferred digitally via PACS to the radiology group in Kalispell. Reports, readings and digital signatures are stored and accessible 24/7 in the hospital’s PACS and EMR system.

With the MRI system in place, the hospital also was able to close the deal with an orthopedic surgeon they had been recruiting for several years. Patten says the MRI acquisition demonstrated the hospital’s commitment to having leading-edge diagnostic technology and reassured the specialist that the hospital would be open to making necessary investments in surgical technologies in the future.



“After one week, we were off to the races – scanning and accepting patients.”

David Broderick, Director of Radiology

## Planning for success

A key factor in bridging the gap between pro forma and desired performance is vendor support in the planning and execution stages, says Patten. “GE took the work we had done in developing the pro forma and built upon it. They gave us the confidence that together we would make this project a success.”

Financially, GE’s financing affiliate structured a lease that allowed the hospital to phase in the cost of the project, paying a lower monthly fee in the first six months as they ramped up their MRI operations.

Physically locating the unit was another challenge. The hospital wanted to install the scanner in a trailer but most of the land adjacent to the main facility was too hilly or taken up by parking lots. The solution developed by CEO Patten and the hospital’s facility manager was to excavate a section of one parking lot, creating a “pit” in the hillside for the trailer that put it at ground level. A new entrance and hallway were constructed in coordination with a laboratory expansion occurring at the same time. “Now patients just go down the hall through a doorway into the MRI. It really feels like you’re just walking into a different part of the building – which is important for patient satisfaction,” says Patten. The hospital signed the contract with GE at the end of June 2006 and by early October, the system was installed and the first images being produced.

## Aggressive training

Achieving operational readiness in a little over three months was also driven by what Director of Radiology David Broderick calls an “early and aggressive” approach to technologist training. Neither of the hospital’s two technologists had experience in MRI.

Before the system was installed, they went to the GE Healthcare Institute in Milwaukee, Wisconsin for one week of formal classroom education that covered everything from the physics of MR to equipment operation. “It was like MRI University,” says Gentry. “No other vendor had that resource.”

Another factor in the rapid ramp-up was the quality and depth of GE applications training, says Broderick. “After one week, we were off to the races – scanning and accepting patients.” GE will ultimately provide four sessions of applications training, staggered over the first year of operation. After that, new technologists will be trained by the imaging department staff.

For ongoing training and education, the hospital is pleased with GE Healthcare’s TiP-TV which provides more than 100 continuing education courses yearly via satellite TV and over the Web. “We love TiP-TV. It’s not just for our imaging staff, but for our nurses and entire clinical staff as well,” says Gentry.

“GE equipment standardization” also helped to shorten the learning curve for technologists, says Broderick. “Virtually every tech has scanned on GE equipment. The operating interfaces are very familiar and comfortable.”



## A world of applications opens up

The hospital initially expected the 1.5T MR to perform only “bread and butter” spine, brain and musculoskeletal studies, says Broderick. “I don’t think we had a clear idea of what we could accomplish with that magnet. Once the system was here, it was like the world was opened up to the radiologists, referring physicians and their patients,” he says.

The imaging department is now using the sophisticated capabilities of the MR scanner to perform a wider and more complex range of procedures, including abdominal exams, carotid studies, magnetic resonance cholangiopancreatography (MRCP), and MR angiography (MRA).

MRI Technologist Anna Dask says that having these enhanced diagnostic capabilities onsite can be a real advantage for patients. She recalls a post-colosectomy patient who was in considerable pain. Ultrasound did not reveal the source, so her doctor ordered an MRCP. “We found that her ducts were completely dilated,” she says. “It was a beautiful study. The surgeon was extremely happy and the patient got the care she needed.”

Looking ahead, the imaging department is talking with referring physicians to gauge the demand for breast MRI and may consider adding a breast coil in the future.

## In thunderstorms and snow storms

Service quality was another factor that drove the hospital's decision to engage GE Healthcare for their entry into MRI. “We are very isolated and it’s not always easy for someone to get to us, especially in the winter,” says Gentry. “GE has enough service personnel and a great reputation for responsiveness. We had no question they would be here if we had a problem.”

The hospital recently experienced a power outage during a thunderstorm. “The field engineer was here in about 90 minutes and within an hour we were back up and running. It was great response time,” says Dask.

## Making a real difference

Based on her hospital's experience in analyzing the need for onsite MRI, developing a business case, and overseeing an implementation effort that culminated in a fully operational MRI system in less than 100 days from contract signing, Vice President Gentry offers two pieces of advice to other community hospitals considering MRI.

Consider fixed rather than mobile. When Gentry was developing a pro forma comparing mobile with fixed, she learned that mobile providers demand a minimum patient volume for their scheduled days. She determined that the hospital would be better able to capture and profit from patient volume by having an on-site system available 24/7. “If you can make the business case for mobile MRI, you can probably afford fixed MRI,” she says.

Pick a good partner. “We looked at some vendors who were interested in selling us a piece of equipment but then we would be on our own,” says Gentry. “The key to our success was engaging a vendor who will help us every step of the way. I know that GE Healthcare is always there for us.”

Most of all, says Gentry, acquiring an MR system is a positive change that will enable a community hospital to significantly improve patient care and physician satisfaction.

“And if it can be done in Libby, Montana,” she says, “you can do it anywhere.”

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