

HEALTHCARE BENCHMARKS™

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Error reporting: Even if it doesn't seem broken, it still might need fixing

Medical error reporting systems get an overhaul

Just because your hospital doesn't report medication errors in large numbers doesn't mean you don't have a problem. Indeed, according to **Sharon Lau**, a consultant with Medical Management Planning in Los Angeles, members of her group of children's hospitals that share data contend that a low error rate really means your staff are underreporting the problem.

Since the Institute of Medicine released its report last November detailing the problem of medical errors, the media, the public, and many hospitals have focused on the issue. For many facilities, the problem has become one of overhauling their systems, creating new ways to report and catch errors, and encouraging all staff to participate in the process.

Lau's group started looking at the issue back in 1993, and for six years struggled repeatedly with the question of how to make sure that the data the group shared were reliable and accurate. A big problem was defining what was a medication error. The group met in Dallas in January to hash out definitions. (See list of definitions, p. 77.)

Coming up with a definition solves the issue of "what is the numerator," Lau explains. But the group had similar problems — and continues to have them — on determining the definition of the denominator. "[Our] definition has always been for dispensed doses," she says. "However, in some instances, hospitals have been unable to retrieve that information from their information systems.

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Even the little guys can make use of protocols. Last month, a story in *Healthcare Benchmarks* focused on how a five-hospital system was able to implement a clinical pathway program with strong results. But in keeping with a trend to investigate how other kinds of facilities and organizations can adapt tools to their use, *HB* decided to look at how a small hospital, the 80-bed Valley View Hospital in Glenwood Springs, CO, took on a similar challenge. 81

Comparing data apples to data apples

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JCAHO launches patient safety initiative. 84

Patient Safety Alert

Institute seeks elimination of handwritten prescriptions

According to the Washington, DC-based Institute of Medicine, prescription errors claim up to 7,000 American lives annually and cost upward of \$77 billion each year. Because illegible handwritten prescriptions are a primary source of medical errors, the Institute of Safe Medical Practices has called for all prescriptions to be electronic by 2003 Insert

How to encourage staff to report medical errors

Administrators at Sacred Heart Medical Center in Spokane, WA, have taken steps to increase the reporting of medical errors by stressing that the facility is interested in correcting systems, not assigning blame. Insert

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They have, therefore, submitted administered/billed doses as their denominator.”

She adds that the group has discovered a correlation between medication errors per dose and medication errors per day. That means “when the error rate per dose is high for one hospital, its error rate per patient day also tends to be high. Conversely, when the rate for a hospital is low for errors per dose, its rate of errors per patient day also tends to be low.”

This does not necessarily mean that patient days is a more accurate denominator than doses even when adjusted for case mix index. “It may simply be an interesting statistical observation.”

And even if the hospitals agree on how to report the data, there is a continuing question about how many errors are actually reported.

They all do it their way

Roger Resar, MD, is the “change agent” at Luther Midelfort Hospital in Eau Claire, WI. The 300-bed facility is part of the Mayo Health System. Resar doesn’t like to compare his facility’s errors with anyone else’s, in part because systems vary so greatly from hospital to hospital. “I can’t compare to other hospitals until the others are doing what we are,” he says. “It’s a moving target. So for now, I compare us to us.”

Resar says the problem exists at every hospital and that he believes it exists in similar rates at most hospitals. “But once we found we were like every other hospital — that is, mediocre — we knew we had to make a change. Our mission isn’t to strive for mediocrity.”

Steve Meisel, PharmD, assistant pharmacy director at Fairview Southfield Hospital in Edina, MN, also suggests the problems are similar from hospital to hospital. “I think everyone is victimized by the same bad systems,” says Meisel. At his 300-bed facility, about 40% of the problems are prescription errors, about 35% are administration errors, and the rest relate to transcription.

However, to build a system that tackles medication errors seriously, says Resar, you have to change your facility’s culture. “You have to have leadership that is convinced that this is an area worth spending resources on, and you have to make it a reportable issue.”

Meisel agrees that along with changing systems, implementing more automation, and improving the management of the formulary, changing the culture of a facility is the most important part of solving the medication error

problem. “Addressing this problem has to be one of your top five priorities,” he says. “Otherwise it isn’t a quest but a hope. And a hope isn’t a plan.”

Because no facility observes staff all the time, error reporting is by its nature voluntary, says Meisel. “You have to rely on someone telling you about a mistake that either they made or they witnessed.” Because it is voluntary, hospitals face the problem of underreporting. “But we think that we underreport the kinds of errors, when and why they occur equally.”

Along with not knowing how many errors a hospital has, there is also a lack of data on near misses, which can be very instructive in developing patient safety programs. But Northern Michigan Hospital in Petoskey, MI, took an idea from the supermarket — the bar code — and used it as part of a patient safety system that should not only reduce errors, but also provide a way of accurately counting errors and near misses.

Communicating, verifying

Using a system from Bridge Medical, a San Diego-based company, that works with bedside computers and radio wave-controlled communications systems that are wired into the ceilings of hospital hallways, Northern Michigan Hospital started a pilot project with 36 beds in late 1998.

Nurses scan the drug to be administered, the patient ID bracelet and their own ID badge. The system then verifies the “five rights” — right patient, right drug, right dose, right time, right route of administration (oral, intravenous, or injection). The system also checks for safe dosing levels and alerts nurses of potential hazards with look-alike, sound-alike medications.

Because of the computers and radio communications the system includes, changes in medications, dosage levels and other patient information can be instantly communicated from hospital information systems to the bedside unit, keeping nurses on the floor up to date on changes.

The new system automatically records when a medication dose is given, which staff member gave the medication, and other information. It produces reports that allow managers to monitor the medications given to patients and helps hospitals identify opportunities for improvements in their medication administration procedures.

“With the system, we have the capability of tracking medication events and determining whether an error was prevented,” says **Trudy**

Day, RN, clinical nurse manager at the hospital. “Without the system, we are unable to identify all errors, let alone near misses, since the clinician involved is often unaware that an error has occurred.”

One way to make sure that staff understand the importance of error reporting is to show them the numbers, Meisel says. At Fairview, pharmacists, physicians, and nurse leaders identify and prioritize the problems that need to be addressed. Teams are commissioned to collect the data on particular kinds of errors. Various committees, including the quality committee, the safety committee, and the steering committee responsible for addressing the issue of medication errors, are given that data. “Information on every error is collated and included on a statistical report provided to various committees,” Meisel continues. “There is nothing more powerful than a run chart in terms of visualizing your improvement process.”

When there are successes, they are shared with the hospital staff at large. Teams that work on the problems are also given rewards and awards for getting the job done.

A lot of people talk about how the system of error reporting should not be punitive, but Resar doesn’t think that’s the most important aspect of

“We had 14 physicians here who had 28 different sliding scales for insulin protocols. And if you are a nurse working with those 14 physicians, you have a greater chance of making a mistake.”

creating a good system. “That our system isn’t punitive doesn’t get them to report errors. You have to actively praise people for reporting, do something about the problem, and

then report back to them what you have done. They have to see the results, not just fill out some form.”

Maybe when all hospitals have systems like Luther Midelfort, Resar says, he will start comparing his facility to others. “We have had a system for a long time where each physician has a way of doing something based on his or her training. They want to use that system. But that variability can cause a lot of errors. We had 14 physicians here who had 28 different sliding scales for insulin protocols. And if you are a nurse working with those

14 physicians, you have a greater chance of making a mistake. We really have to rethink a lot of things to get this right. There are many areas that are ripe for improvement.”

“There are three elements to creating change,” Meisel concludes: “Will, ideas, and execution. There are lots of ideas out there, and you shouldn’t be ashamed to steal shamelessly. There is no monopoly on patient safety.”

Meisel thinks that with all the attention medical errors are getting now, will is not an issue. “But execution means doing something. In health care, we like to study things to death. We gather hundreds of data points, go to 87 committees, and modify the plan. But by the time you start, half the team has died of old age.” At Fairview, there is a motto: What are you going to do next Tuesday? “When I sit down with a team to coach, lead, or facilitate, that is my question,” he says. “If the answer is study, discuss, meet, review, or plan, the meeting isn’t over. There have to be action words about next Tuesday. Even if you do it with just three patients for two days with one doctor, that is the beginning of change. That is actionable stuff. We can’t discuss things to death. Start small, but start.” ■

Everyday Innovations

Ideas that work for error reduction

Simple solutions can reap big rewards

With medical errors having such a high profile in the news, many hospitals are grabbing headlines with their efforts to make a positive impact on patient safety. But it isn’t always a splashy and expensive idea that has the biggest impact. Sometimes a small, simple idea can make a difference.

At Luther Midelfort Hospital in Eau Claire, WI, a thorough chart review showed that most medical errors happened due to a “faulty handoff,” says **Roger Resar**, MD, the “change agent” at the 300-bed facility.

“When you come into the hospital, the medications you take at home aren’t always continued. When you go from one unit to another, the same problem might occur. When you are discharged

10 Ideas for Medication Error Reduction

1. Implement a policy regarding preprinted orders.
2. Include high-hazard medication education and competency assessment in resident orientation.
3. Educate pharmacy staff in root cause analysis and how pharmacy fits on the overall process.
4. Investigate the possibility of standardized dosing.
5. Make the order entry process more user-friendly.
6. Complete a drug dictionary.
7. Educate nurses and other staff on the problems at your institution.
8. Look for patterns of problems.
9. Make sure error reporting isn’t punitive; don’t kill the messenger!
10. Replace addressograph with labels to improve clarity.

Source: Medical Management Planning, Los Angeles.

from the hospital, we forget you might have other drugs you will add in at home. We were seeing 200 plus errors per 100 admissions. And in 56% of the cases, there was not adequate communication about drug regimens.”

The answer was simple: reconciling medications. The nurse or pharmacist looks at admitting orders and all the medications the patients are taking on the outside. That information might come from the patient or a family member, but barring that, a call to the patient’s primary care physician or area pharmacies can help fill in the blanks.

At the other end of hospitalization, all the medications the patient is taking as an outpatient and those that are the result of the patient’s

Medication Error Definitions

PRESCRIBING ERROR

Medication orders that could or do lead to an error, which include, but are not limited to: right patient, right drug, right route, right frequency, right dose. Illegible orders that require clarification to prevent errors will be included. Source data will be obtained from incident reports and pharmacy interventions and will include those interventions which prevent errors in the above categories.

PROCESSING ERROR

Communication of information to the dispenser, from prescription up to but not including dispensing. This includes: transcription/order entry errors (including errors in recording verbal orders), unreadable patient demographic information (addressograph stamp), delays in getting order to the pharmacist.

DISPENSING ERROR

Preparation by pharmacy personnel, which includes wrong dose, wrong amount, wrong strength, wrong quantity, or wrong labeling that is not related to order entry. This piece ends when the drug correctly reaches the caregiver (med station, nurse, MD, etc.). It does not include a nurse or other licensed caregiver removing the incorrect medication from a med station or floor stock. It also does not include errors detected and corrected during routine checks by pharmacy personnel.

ADMINISTRATION

Giving the wrong drug, wrong dose, at the wrong time (as defined by the hospital), to the wrong patient, or via the wrong route. Administration errors include: omissions, incorrect or incomplete documentation, or deviations from the order or from policy and procedure.

MONITORING

Failure to review a prescribed lab or other clinical data for patient response to prescribed therapy.

Source: Medical Management Planning, Los Angeles.

hospitalization are printed on a report. The nurse, physician, and pharmacist all look over that list. "If there is something we didn't want you taking in the hospital but want you to continue at home, we add that in," says Resar.

The pharmacist, the physician, and the hospital each get copies of the report. The pharmacist then makes up a spreadsheet calendar for the patient that includes information on when the patient should take each medication.

Just by making sure all the medications a patient is taking are known, one busy medical unit reduced its error rate by 82%, Resar says.

Steve Meisel, PharmD, assistant pharmacy director at Fairview Southfield Hospital in Edina, MN, saw another simple solution reap big rewards. "A few years ago, we changed our policy so that if elderly patients are taking sleeping pills and the dose hasn't been appropriately adjusted for their age, we automatically convert it."

In 1995, five patients fell out of bed due to over-sedation. After the change in procedure in 1996, that number fell to zero and has stayed there since.

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Hip replacement data lead to efficiency

Bryn Mawr Hospital tops in group

Medicare Provider Analysis & Review (MEDPAR) data indicate a decline in hip fracture admissions for all but the oldest patients. But there were still some 280,000 cases in 1998. (**For more on the data, see list, p. 81.**) That equates to some brisk business in hip replacement surgery for hospitals. And knowing how you compare to others is more important than ever.

Judy Dahle, RN, MS, director of OR Benchmarks in Santa Fe, NM, says the endeavor started five years ago by looking mostly at cost issues. “There are plenty of people looking at outcomes,” she notes. “We felt looking at cost efficiencies was more important.”

Nineteen hospitals were involved in the most recent hip replacement study. They looked at 80 cases over a six-week period in 1999 and included some of the premier hospitals and health systems in the country, such as Seton Medical Center in Austin, TX, Providence St. Peter’s Hospital in Olympia, WA, and Bryn Mawr (PA) Hospital.

The study looks at the equipment and supplies used, their cost, time spent on a replacement, and staffing issues. **(For more on the data collected and the performance of the best hospitals, see lists, pp. 79-81.)**

“We look at turnaround time, which is important for surgery,” says Dahle. “We look at the staff mix.”

Over the five years, Dahle says there have been few changes in the kinds of data collected. “Not much has changed in the procedures,” she says. “What supplies are used is pretty static. But we do make some changes. We never used to include the cost of anesthesia supplies, and now we are doing that.” The group will also start including salary ranges for procedures, although these data are largely regionally driven. “We can break the information out in different ways to make it valuable to users,” she says.

The hospital groups are instrumental in determining what data are collected, says Dahle. “We want to know where the administration is looking for cost and time efficiencies.”

What makes the OR Benchmarks programs, which include 16 high-volume, high-cost procedures, unique is that the data are collected real time by the personnel doing the procedures. They fill out simple worksheets that the company uses to collate the data. “You can be held accountable to any data, but it’s a lot easier to get buy-in if the data are real time and you know exactly where

“You can be held accountable to any data, but it’s a lot easier to get buy-in if the data are real time and you know exactly where they come from.”

they come from.”

There is also an agreement of definitions that makes the information valuable to participants, says Dahle. “If you say start time or induction time, we know among ourselves exactly what we mean.”

The comparisons are done among like groups of hospitals, too, so that medium-sized teaching hospitals like Bryn Mawr are compared to other teaching facilities of similar size, and small rural hospitals look at data from other small rural hospitals.

Along with the single procedure reports, OR Benchmarks produces a book that includes all major hospital processes, from scheduling to discharge, from salaries to computer systems.

Bryn Mawr came out on top in the hip replacement survey. According to **Claire Baldwin**, assistant vice president for patient services at Bryn Mawr’s health system, Main Line Health, one of the key performance indicators where the hospital excelled was in how long the surgeries take. “The longer an operation takes, the more time the patient is under anesthesia, and the longer the patient is open to possible infection,” she says.

The results also showed Bryn Mawr hospital as being cost-effective and time-efficient in its procedures, Baldwin adds.

Robert Good, MD, says that the outcomes from the OR Benchmarks survey is not the only proof the hospital has that it does well. The facility also excels according to the Hip & Knee Registry, maintained by the University of Massachusetts. “As a result of this study, which evaluates hip and knee replacement patient satisfaction at five and 18 months post-op, we know that our orthopedic program is one patients can depend on,” he says.

What the data show

The OR Benchmarks study shows that 86% of supply costs come from the artificial hips. The study notes that although noncemented prostheses cost about \$1,000 more, they seem to be a better option for younger patients who have better bone density. Bryn Mawr rarely cements implants, compared to an average of 68% among the 80 cases.

The costs of the implants, ranging from \$2,200 to \$5,160, haven’t changed a lot over time. Total supply costs ranged from \$2,653 to \$5,869, and the number of items used ranged from 82 to 173. Towel use is down significantly, as is autotransfusion equipment use.

The latter seems to be a result of more facilities encouraging patients to donate their blood before the procedures, the study says.

Staff ratios ranged from using all RNs to using between two and four non-RN tech staff. A quarter of the hospitals had staff on hand who were not paid by the facility — including physicians, private scrub staff, or physician’s assistants.

Just over three-fifths of the cases started on time in 1999, compared to 49% the year before. Turnover time — the time from setup to cleanup for a single procedure — was down one minute to 44. Dahle says that because this time has moved little since 1997, it may be the “gold standard” for times and might not be able to move without significantly increasing staffing costs.

And what do you do if your facility doesn’t match up with some of the better performers? According to the study, best performers have this advice:

- If the supply costs for your facility are greater than the first quartile cut off, there is room for improvement.
- If your facility has an issue with pricing or consumption and if the total supply cost is high, it may be due either to using too many items or paying too much for them. Compare the total number of items used by the best performing facility. “If your number of items is greater,” the report says, “your focus should be toward trimming consumption as opposed to pricing. If you use a similar profile of supply items when compared to the best performing facility, then you might discuss pricing with your materials manager.”
- Some facilities prepare a supply profile by surgeon. The best mark supply item list could be given to surgeons for comparison.
- Don’t compare providing the best care possible — which all surgeons want to do — with providing the best affordable care possible. Nurses, surgeons, and support staff are more likely to embrace change if an atmosphere of teamwork and constructive flow of ideas is encouraged.

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- *Claire Baldwin, Assistant Vice President, Patient Services, Main Line Health, Bryn Mawr, PA. Telephone: (610) 526-3752.] ■*

Hip Fracture Data

NUMBER OF HIP FRACTURES

1995: 290,980
1996: 295,980
1997: 291,191
1998: 279,519

BY AGE GROUP

> 90
1996: 41,305
1998: 45,756

65 to 69
1996: 12,326
1998: 9,372

Source: Medical Provider Analysis & Review, Dept. of Health and Human Services, Washington, DC.

Data for OR Benchmarks Hip Replacement Report

(For readers interested in collecting the same data as members of the OR Benchmarks hip replacement study, here is the the information the hospitals were asked to provide.)

EQUIPMENT USED (include number used)

Cell saver
Cement mixing vacuum equipment
Smoke evacuator
ESU
Irrigation pump/Water Pik
Laminar flow room
Patient warming unit

PREP SUPPLIES (include number used and unit cost)

Prep solution
Prep kit
Small towel
Other _____

SUTURES (include number used and unit cost)

Suture packs/custom
Suture
Suture needles (free needles)
Suture bag
Needle counter
Other _____

SKIN CLOSURE (include number used and unit cost)

Skin staples

Refill cartridges
Suture
Steri strips
Other _____

DRESSINGS (include number used and unit cost)

Gauze 4x4
Adhesive
Keroform/Telfa
Cast padding/wadding
Ace wrap
Other _____

IMPLANT (include number used and unit cost)

Supplier:
Acetabular cup:
Femoral stem
 Cemented
 Press-fit
Head/ball
Liner
Spacers
Screws
Acetabular hole eliminator
Centralizer
Bone plug
Other _____

IMPLANT ACCESSORIES (include number used and unit cost)

Cement-half/full
Mixing system/set
Cement pressurizer
Femoral canal brush
Other _____

DRAINAGE/DRAINS (include number used and unit cost)

Autotransfusion
Drains
Other _____

PACKS AND KITS (include number used and unit cost)

Pack/kit (include list)
Second pack (include list)
Basin set
Other _____

SURGICAL ATTIRE (include number used and unit cost)

Gown pack (#/pack)
Gloves (pairs)

Face shields
Environmental protection suit
Other _____

DRAPES (include number used and unit cost)

Towel pack
Hip drape
Incise drape
U drape
Stockinette
Equipment drapes
Other _____

SUCTION/IRRIGATION (include number used and unit cost)

Suction irrigation tip/handpieces
Suction canisters
Suction tubing
Suction liner
Decanting device
NaCl irrigation solution
Water irrigation solution
Connectors/adaptors
Other _____

CAUTERY SUPPLIES (include number used and unit cost)

ESU pencil/cord
ESU electrodes
ESU dispersive pad
ESU holster
ESU tip cleaner
Smoke evacuator supplies
Other _____

SPONGES/PACKING (include number used and unit cost)

Lap sponges
4x4 Raytec
Other

CATHETERS (include number used and unit cost)

Foley/cath & prep set
Foley catheter
Foley cath bag/urine meter
Other _____

SYRINGES/NEEDLES (include number used and unit cost)

Syringe _____ cc
Syringe _____ cc
Syringe Asepto
Needle-hypo

Needle-spinal
Other _____

BLADES (include number used and unit cost)

SURGICAL ACCESSORIES (include number used and unit cost)

Light handle/light handle cover
Marking pen
Patient warming blanket
Instrument pad
Instrument pocket
Burs
Saw blades
Cell saver supplies/kit
Other _____

POSITIONING/PROTECTIVE DEVICE (include number used and unit cost)

Pillow
Ulnar pads
Heel pads

TED hose/compression stockings
Head donut
Security strap
Other _____

Source: OR Benchmarks, Santa Fe, NM.

Best Performers Data Bryn Mawr (PA) Hospital

- ✓ Number of cases annually: 126
- ✓ Number of items used (average): 91
- ✓ Average total cost per case: \$2,650
- ✓ Average procedure time: 45 minutes
- ✓ Pack content list:
 - Small basin set: four bowls, one square basin, two towels
 - Total joint pack: drapes, suture/stapler, hoods, suction, cautery, marking pen, sponges, miscellaneous small items

Following the path to improved outcomes

Even the little guys can make use of protocols

(Last month, a story in Healthcare Benchmarks focused on how a five-hospital system was able to implement a clinical pathway program with strong results. But in keeping with a trend to investigate how other kinds of facilities and organizations can adapt tools to their use, HB decided to look at how a small hospital, the 80-bed Valley View Hospital in Glenwood Springs, CO, took on a similar challenge.)

If you work in an 80-bed hospital, you probably have many issues to worry about. Being able to deliver the highest quality of care with more limited resources than colleagues in big city hospitals is one of them. And if you wanted to start a new program designed to improve quality, you might not have the staff to do so. But Valley View Hospital in Glenwood Springs, CO, has started a clinical pathway program that has saved the facility millions of dollars and hundreds of bed days.

Cathy LaBaw, RN, director of performance improvement, worked with clinical pathway coordinator Linn Kight, RN, to develop 22 different paths over the course of four years.

“In 1996 when the effort began, our hospital

was financially stable, had good outcomes, did well with regulators, and had high patient satisfaction,” says LaBaw. “We had no compelling need to make a radical change. Instead, the initial decision to begin was the result of a grass-roots effort by nursing staff who recognized the value of pathways and managed to convince a particular physician to champion the effort to do a path for community acquired pneumonia.”

Kight notes that decreasing resource utilization, though, was always in the back of the minds of those who participated in the program.

Several people who were interested attended a training session on clinical pathway development methodology. The path, after creation, was implemented by a multidisciplinary team of clinical caregivers. “The learning curve was steep and long,” LaBaw recalls. “Not only because this was a new process, but because pneumonia was — and remains — a difficult condition to develop practice guidelines for.”

That first pathway process, though, helped the group work through some general difficulties. Now, Kight researches new pathways to determine internal and external best practices. Using existing pathways, suggested data goals from various specialty societies, and other published work, she comes up with the basis for a new pathway.

For example, Kight says the Chicago-based

Sample Data Collected Chest Pain/MI

ASSESSMENT/MONITORING

Vital signs, pain assessment, continuous cardiac monitoring

DIAGNOSTIC TESTING

EKG within five minutes of admission, X-ray

MEDICATIONS

ASA, four 81 mg tablets, chewed within 10 minutes

EDUCATION

Instruct patient to care routine, review patient pathway

DISCHARGE PLANNING

Evaluate patient support system; create preliminary discharge plan

EXPECTED OUTCOMES

Patient pain free within 30 minutes of arrival

Note: Some data items require initials, others require initials and the time completed.

Source: Valley View Hospital, Glenwood Springs, CO.

American Hospital Association recommends that patients with chest pain get aspirin within 20 minutes. “Our target time is 10 minutes, and right now we are at about 12 minutes,” she notes. They are working to further improve that by continuing community education on the importance of taking aspirin if a heart attack is suspected, and working with the local ambulance service to administer the aspirin at the home or en route to the hospital.

“Depending on its focus, the pathway is then assigned to one of three existing Collaborative Care teams: surgery, medicine, or peripeds,” LaBaw adds.

The teams meet for four hours every month, with pretty consistent membership. During the meetings, the teams work on new pathways, evaluate data from existing paths, and review older pathways to see if they need any updating, says Kight.

One reason LaBaw thinks the effort has gone

smoothly is that the clinical pathway steering committee included people from every area of the hospital. Physicians, clinicians, and administrative staff all participated, she says. “Eventually the data began speaking for itself, and that has ‘sold’ many physicians.”

The goal has always been to combine better outcomes while lowering average length of stay and charges. With the 22 pathways, there have been nearly 680 patient days saved, \$1.4 million in charges eliminated, and more than \$1 million in cost savings. Readmission rates have declined by 43%.

“Additionally, each pathway has two or three dedicated quality outcome indicators, each of which shows improvement or maintenance of satisfactory results,” LaBaw says.

Perhaps the most telling evidence of how well the program works, though, is that physicians use it, says LaBaw. “We don’t require them to use the pathways,” she says. “But they do it. The orders are written, the process was developed against the standard of care, and it has eased their administrative burdens. They love it.”

LaBaw adds that having the pathways in place has helped the hospital in its managed care contract negotiations. “This isn’t a very high managed care area, but we use it when we negotiate, and it does provide leverage.”

Data-driven quality improvement

Another measurement of success has been the hospital’s ability to use the data gathered because of the pathways to make further improvements. LaBaw notes that physicians wanted to make sure that patients received preoperative antibiotics within 60 minutes of having the first incision during their surgery.

By looking at data collected from other pathways, she knew they weren’t in that window. “We revised pathways based on that knowledge, and we were able to bring it from an average of 67 minutes prior to the changes to 30 minutes after them,” LaBaw says. “Having data often provides us with ideas for improvements. And we analyze the data regularly.”

The data are reviewed in the collaborative care team meetings, and also with process improvement teams and among physician groups, says LaBaw. The board also sees data every six months.

Costs can be cut only so much, Kight admits. “Everyone has to work smarter and more efficiently, but this takes a multidisciplinary

plan of care and tools that allow everyone to care for patients in a like manner," she says.

Next, Kight adds, is expanding the pathway process throughout the continuum of care. "We are trying to bring it into home health, nursing homes, and even one physician's office so that wherever patients go we can help them reach a better level of wellness."

[For more information, contact:

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Comparing data apples to data apples

Market comparisons highlight regional differences

San Diego and Seattle may seem like similar markets. Both are on the West Coast and are in areas where managed care has deeply penetrated the market. Both have populations around

2.5 million, with a growth rate of about 6% expected in the next five years. They have similar numbers of staffed beds and emergency department encounters per 1,000 population. But the similarities end there. San Diego's growth in discharges is half that expected in Seattle by 2004. It also has a much higher number of inpatient utilization days per 1,000 population.

Seattle currently does and expects to continue to do more ambulatory surgeries per 1,000 people and fewer imaging procedures.

Another pair of cities that shows off differences are Orlando, FL, and San Antonio, TX. Both have about 1.5 million people and a five-year expected growth rate of about 9%. But inpatient days are expected to drop in San Antonio by more than a quarter by 2004, and only by about 19% in Orlando.

Although there are similar numbers of primary care providers, specialists, and hospital beds per head of population, Orlando will continue to have a higher rate of ambulatory surgeries and imaging procedures than its Texas counterpart.

These and data on dozens of other cities are available from HCIA-Sachs' Web site: www.hcia-sachs.com. Click on the market views tab. ■

Comparisons for Select Demographic Data

City	Inpatient Utilization Days/1999	Inpatient Utilization Days/2004	ED Encounters 1999	ED Encounters 2004
San Diego	1,072,046	1,020,895	879,792	929,835
Seattle	698,279	897,483	686,126	733,077
Orlando	786,060	639,425	546,062	96,715
San Antonio	785,440	575,619	629,792	680,962

City	Ambulatory Surgery Estimates/1999	Ambulatory Surgery Estimates/2004	Major Imaging Procedures/1999	Major Imaging Procedures/2004
San Diego	183,242	205,272	292,539	349,355
Seattle	180,112	193,123	216,754	254,633
Orlando	144,757	157,809	252,473	287,586
San Antonio	130,390	141,483	215,564	241,531

Note: All 2004 data are estimated

Source: HCIA-Sachs, Evanston, IL.

NEWS BRIEF

JCAHO launches patient safety initiative

Saving thousands of lives by translating patient safety research and learning into common practice is the goal of a new initiative launched by the National Patient Safety Foundation (NPSF) and the Joint Commission on Accreditation of Healthcare Organizations. The initiative focuses on the broad dissemination and proactive promotion of patient safety solutions proven to reduce health care errors and improve patient safety.

More than 30 of the best solutions submitted through the "Call for Solutions" process will be showcased at the Joint Commission Resources' National Conference on Quality and Safety in Health Care, Oct. 4-6, 2000 in Chicago. The third day of the conference is "Patient Safety 2000: Spotlighting Strategies, Sharing Solutions," and will be co-convened by NPSF and the Joint Commission.

Three outstanding submissions will be selected to receive awards from the new Patient Safety Awards Program established by the NPSF. Each winner will receive \$10,000. Solutions will be judged for an award in elder care, innovative clinical solutions, and patient/provider communications solutions. Those and other solutions also will be included in a "Compendium of Solutions" to be copublished by NPSF and the Joint Commission in early 2001. The publication will feature full papers of all abstracts meeting established evaluation and selection criteria. Abstracts of these papers also will be available on NPSF's Web site.

More information about Patient Safety 2000 is available at www.npsf.org. Additional information about the conference is available at www.jcaho.org/edu_pub/natlevnt/npsf.html or www.jcrinc.com.

All abstracts must be received by July 1, 2000 and should be submitted to Mitch Dvorak, Program Manager, National Patient Safety Foundation, 515 N. State St., Chicago, IL, 60610. E-mail: mitch_dvorak@ama-assn.org. For further information on submission guidelines, contact Dvorak at (312) 464-5418. ■

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