An Emergency Department: The “Face” of the Hospital

Building a Patient & Family Centered Emergency Department

Northern Westchester Hospital
Mount Kisco, New York
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Acknowledgements:

With gratitude to the following individuals for their commitment to creating a truly patient-centered Emergency Department and for the development of this manual.

Craig Brandt, RPh, MBA, Director: Performance Improvement, Chairman: Institutional Review Board, Compliance Officer, NWH
Cathy Cioffi, RN, Patient Care Manager, Emergency Department, NWH
Susan Etkin, Redesign Consultant, President, The Alan S. Harris Group
Steve Grayson, Associate Director, Emergency Medicine
Maria Hale, Vice President, Patient Advocacy, NWH
Maria Koroly, MD, Senior Vice President, Chief Medical Officer, NWH
Sharon Marino, RN, Patient Care Director, Emergency Department, NWH
Robert Marcus, MD, Medical Director, Emergency Medicine, NWH
Robert Newborn, MD, Associate Medical Director, NWH
Linda Saslow, Freelance writer, Author
Joel Seligman, CEO and President, NWH
Lauraine Szekely, RN, MBA, Senior Vice President and Chief Nursing Officer, NWH
The Staff of Northern Westchester Hospital

Project Overview

The Face of a Hospital

A hospital Emergency Department is the “face” of the hospital. Any situation that requires a trip to the ED—whether for a simple fracture or a massive heart attack—is a stressful time when patients and their families often feel frightened and vulnerable. When the ED runs smoothly, it helps the entire hospital to run smoothly. When ED patients are satisfied, the Emergency Department staff can work more efficiently and effectively. Emergency care is dependent on the various units within a hospital; therefore, the experience within the Emergency Department impacts every department in the hospital.

At Northern Westchester Hospital (NWH), of the 28,000 patient visits in 2009, more than half arrived through the Emergency Department—reinforcing its importance within the hospital.

Providing the highest quality of patient centered care can only be reached through the perfect combination of medical expertise, leading edge technology and a commitment to humanity. The Emergency Department at NWH meets the highest standards of technological and clinical excellence. But when surveys showed that patient satisfaction scores hovered around the 80th percentile, that was not consistent with NWH’s Planetree philosophy of patient-centered care. With strong competition from other hospitals and high expectations from patients and their families, NWH recognized a vital need: to improve the processes within the ED in order to develop a system that allows patients to be seen, assessed and treated quickly and efficiently, thereby creating higher levels of patient and employee satisfaction.

The result: a redesign of the Emergency Department to build a patient and family centered ED, consistent with the Planetree philosophy of putting patients first, while continuing to provide the highest quality of medical care.

The First Question: What do ED patients want?

A comprehensive patient satisfaction survey found out the answers... The most frequent complaint shared was excessive wait times. ED patients want to be acknowledged, they are looking for kindness, empathy and better communication. Most importantly, patients wanted to see the Emergency Department physician very soon after their arrival. Patient feedback provided the “patient perspective roadmap” to guide the redesign process.

Making the Changes: A Team Effort

The two-year project to improve the flow and patient experience in the ED at NWH was a structured 4-step process that included more than 50 staff members from all areas of the hospital, including members of the local ambulance corps—divided into redesign teams. The teams were charged with examining three key processes: pre-hospital care, patient flow through the ED, and the hospital admission process—using an end-to-end view of the processes. Teams, supported by senior leadership and the hospital Board of Trustees, were assisted by weekly documented data and evidence from the Quality Management Department.

The redesign process involved many changes: new systems put in place, infrastructure modifications, investment in new technology, staff training and several newly created positions.
Recognizing the Need

The Importance of a Positive ED Experience...

The Emergency Department (ED) is often a patient's first and most lasting experience in a hospital. It has been consistently reported that patients spend too long in most emergency rooms. This creates a stressful experience for patients, and consequently, stress and more work for the ED staff.

The Need to Fix Broken Processes...

At Northern Westchester Hospital, patient satisfaction data and comments from ED patients provided evidence that there were broken processes in need of repair. Among the most critical were: long cycle times, bottlenecks, poor communication and processes that were not focused on the patients. NWH was committed to reducing the amount of time that each patient spends in the ED—thereby improving the patient’s ED experience. The top priority recognized was to reduce the length of time before patients were seen by a physician or nurse practitioner. In order to create a patient centered ED, it was also vital to provide the best possible communication to each patient, including steady updates about the plan of care.

Patients Know What They Want...

The first critical step in redesigning an ED to become patient centered is to get inside the heads of patients in the ED. What do they want and need to have a positive experience? Through patient satisfaction surveys, along with written and verbal comments, patients shared their priorities. Their list included:

• Acknowledge me when I first walk in
• Be kind and empathetic to me
• Let me see a doctor within 15 minutes
• Give me frequent updates; tell me what's going on
• Get me in and out fast
• Manage my pain
• Involve my family
• Accept the fact that whatever I am here for, no matter how small, is an emergency to me
• Make me feel safe and connected
• Communicate with my private doctor
• Respect my culture
• Treat me like one of your own; give me a call the next day to see how I'm doing

Improving Processes to Improve Patient Satisfaction...

Equipped with “patient satisfaction roadmaps,” three redesign teams—the Ambulance Team, the ED Flow Team & the Admit Team—embarked on the monumental task of improving the flow and patient experience in the ED. Data and evidence were brought weekly to the teams from the Quality Management Department, helping them to make evidence based decisions. Following is an end-to-end summary of the redesign process for Building a Patient & Family Centered Emergency Department.
About Northern Westchester Hospital

Founded in 1916, Northern Westchester Hospital is a not-for-profit, 233-bed, all private room facility in Mount Kisco, New York, serving residents of Northern Westchester, Putnam and Southern Duchess Counties in New York and portions of Connecticut. The hospital has long been recognized as one of the region’s premier health care providers, offering state-of-the-art care in a warm and nurturing environment. NWH serves all area residents, regardless of their health insurance status or ability to pay for medical care.

In a caring respectful and nurturing environment, more than 600 highly skilled physicians, state-of-the-art technology and a professional staff of caregivers and volunteers are all in place to ensure the optimum treatment for all patients.

NWH is a member of the New York Presbyterian Healthcare system and is affiliated with Columbia College of Physicians and Surgeons and Weill-Cornell Medical College. These relationships offer patients at NWH access to a wide range of advanced expertise, research and clinical trials—within their own community.

NWH is also one of four members of the Stellaris Health Network, which helps achieve operating efficiencies that enable member hospitals to enhance delivery of high quality health services.

NWH has established extensive internal quality measurements that surpass the standards defined by the Centers for Medicare & Medicaid Services (CMS) and the Hospital Quality Alliance (HQA) National Hospital Quality Measures. These highest quality measures ensure that patients receive the best treatments possible.

Expertise at NWH includes: a Cancer Treatment & Wellness Center; designation as a Primary Stroke Center; Level III Neonatal Intensive Care Unit; Institute for Aesthetic Surgery & Medicine; Breast Institute; Orthopedic and Spine Institute Adult, Pediatric & Surgical Hospitalists and Intensivists; Nationally accredited Center for Sleep Medicine; Balance Center; Behavioral Health Unit; Perinatology Antepartum Testing Unit for high-risk obstetrical care.

Cutting Edge Technology include: da Vinci robotic Surgical system; Gamma Knife Center (radiology) and Linear Accelerator (radiation therapy).

As a designated Planetree Hospital—one of the first five hospitals in the country and the only one in New York State—NWH is dedicated to patient-centered and family-focused health care and promotes healing and wellness by integrating time honored complementary therapies with Western evidence-based scientific medicine.

In the Planetree spirit, NWH, in addition to its other high quality services, also offers: Integrative Medicine, Pet, Music & Art Therapy, A Pastoral Care Program, Support Groups, a Family Caregivers Center & Support Group.

Last year, NWH received the 2009 National Best Practice Planetree Award for Evidence-Based methods, for successfully redesigning the NWH Emergency Department processes that directly impact patient treatment and care.

NWH has received other Planetree awards as well: A National Best Practice Award for Integrative Medicine; A National Best Practice Award for Family, Friends and Social Support - The Ken Hamilton Caregiver Support Program, A National Best Practice Award for The NWH Expressive Arts Program & National Caregiver Award for Excellence in Caregiving, Pet Therapy & Physician Champion.

“The redesigning of our ED was about examining and streamlining our processes and creating an experience that is patient and family centered. We are in the process of building a new ED facility that will be truly “Planetree” and we wanted to make sure that we would provide the whole picture to our community: a patient-centered facility design, coupled with patient-centered high quality processes.”

Joel Seligman, President and CEO of NWH

Source: Press Ganey Associates
A New Emergency Department Facility to Support the Patient-Centered Planetree Philosophy...

A new facility for the ED, many years in the planning, is expected to open by the end of 2010, the final step of a patient and family centered Emergency Department.

The new Mary & David Boies Emergency Department will consist of 25 private treatment rooms, with distinct areas for pediatric, adult and behavioral health patients. It will be energy efficient, have an eco-green roof, a dedicated family solarium and house a healing garden. The Department also includes a dedicated Fast Track for less urgent care.

The Mr. & Mrs. Joseph M. LaMotta Fast Track Program allows patients with non-life threatening problems—minor strains, simple fractures, lacerations, coughs, flu—to receive timely care in an area adjacent to the main ER. In Fast Track, nurse practitioners, in collaboration with emergency physicians, take medical histories and provide complete physical exams and treatment.

Goals and Objectives

The Ultimate Goal:
The goal of building a patient & family centered ED was to provide a patient focused model of care that would improve patient satisfaction and consequently employee satisfaction, while maintaining the highest quality of emergency services.

Specific Objectives:
Towards that end, the specific objectives were to:

• streamline admissions which would enable faster initiation of treatment, more personal care and substantially shorter wait times before seeing a physician or nurse
• provide improved communication with patients to keep them informed throughout every step of treatment, including details about their treatment and how long it will take
• improve communication among the members of the emergency team
• make patients feel safe, connected and respected
• involve patients’ families in the communication process
• provide more consistent oversight of patient flow and consistent use of protocols
• use hospital resources more effectively to maximize care
• establish more standardized and synchronized processes within the ED
• provide a proactive, instead of a reactive approach to patient flow
• provide a Fast Track program for patients with non-life threatening problems, enabling them to receive timely care for less urgent situations

Overall, NWH was committed to developing an improved system that would allow patients to be seen, assessed and treated quickly and efficiently.

The decision to initiate the redesign of the Emergency Department at NWH was based primarily on two significant premises:

• An efficiently run ED is a key factor to the success of a hospital.
• If patients have a positive experience in the ED, it is more likely that they will return to the hospital for future medical care, that they will recommend the ED (and the hospital) to others, and ultimately, that they will support that hospital.
Getting Started

One of the greatest challenges in launching a major project is taking the first step—in other words, getting started. At NWH, the 2-year project of redesigning and building a patient and family centered Emergency Department was jumpstarted with the hiring of a redesign consultant and specialist in process redesign.

Why a Re-Design Consultant?

Leadership is a key factor in the success of any major project. To provide the expertise in redesign and organizational change, and to facilitate all aspects of the project at NWH, the Hospital decided to hire a redesign consultant, who would oversee and monitor the entire 2-year process.

Susan Etkin is the president of the Alan S. Harris Group, a subsidiary of SAJ Partners, LLC, a boutique human capital management consulting firm, with locations in New York City, Stamford, Connecticut, and Miami, Florida.

At the ASH Group, Sue works with organizations across all industries to develop and implement targeted strategies and solutions to achieve substantial and lasting improvements in organizational effectiveness and development.

At NWH, Sue became an inspirational leader and guide in the re-design and transformation into a patient and family centered ED.

It Doesn’t Have To Be So Complicated...

Breaking Down the Process

When launching a monumental project like transforming an ED, it helps to simplify the process by breaking it down into smaller steps. Most large projects can be broken into stages (or phases), with key activities assigned to each stage.

At NWH, the 4 phases identified for the ED redesign were:

1. Structure the effort
2. Understand the process
3. Design solutions
4. Implement those solutions

Let’s Get Going...

Structuring the Effort...

There are several key steps to follow.

- **Define the project scope.** Knowing the magnitude of the project will drive how fast you will be able to meet the goals, how much money and resources will be needed, how many people will have to be involved in the project, and the impact that it will have on the organization.

In other words, you have to define where you’re heading before you head there.

At NWH, the ED redesign project was projected to be completed over a 2-year period, commencing in March, 2007 and to include more than 50 staff members from all areas of the hospital, with the goal of improving processes that would improve cycle and wait times, and consequently, improve patient satisfaction. The scope of the project, initially defined to begin with patients’ entry into the ED, was modified and expanded to include pre-hospital care: the EMS process.

- **Create governance structure.** Oversight and accountability are essential to the success of any project. You have to decide how you will manage the project—day to day, week to week, and long term. Every person involved must be accountable and systems must be developed to ensure that the project interacts well with other hospital initiatives.

Following was the governance structure for the NWH ED redesign:

**Executive Management Team:** responsible for providing input into the redesign teams; contributing resources to the team effort; supporting implementation of change and redesigned processes; continuing to drive improvement and sustain the gains post-redesign; monitoring results; championing the process throughout NWH.

**Steering Committee:** included the Chief Executive Officer, Chief Nursing Officer, Chief Medical Officer, Chief Financial Officer, Director of Performance Improvement, Emergency Department Medical Director, Emergency Department Nursing Director, Director of Information Technology, an Intensivist and a Cardiologist. Responsibilities were to champion the process; set overall improvement targets; ensure project visibility and support; provide overall project guidance; monitor results and expedite progress; remove obstacles; integrate with other hospital initiatives; make resources available.

**Process Redesign Teams:** responsible for conducting data collection and analysis; participating in all team meetings; understanding customer expectations; developing process improvements; piloting and implementing redesigned processes; providing expertise; acting as project’s ambassadors; doing team “work” outside of the meetings.

**Team Leaders:** charged with providing strategic leadership & guidance for team and overall initiative; leading redesign team to produce project deliverables; making relevant decisions and resolving issues to ensure progress; updating Steering Committee on issues and progress; communicating to other team leaders; representing the project at meetings; helping facilitate meetings.

**Process Redesign Consultant:** responsible to help define objectives, scope and approach; provide strategic oversight; provide expertise and training; coach teams and team leaders; facilitate workshops and team meetings; provide an external reality check; monitor the progress and help keep it going.

**Set up Teams.** Choosing effective teams is perhaps the most critical part of a redesign process. The effectiveness of the teams largely dictates the success of the project.
High Performing Redesign Teams
The most effective teams are a balanced mix of:
• Skills
• History & Organizational Knowledge
• Subject Matter Expertise

Guidelines for choosing teams...
1. Identify the needs for each team. What part of the process needs to be satisfied? What roles need to be filled?
2. Look for people who have the necessary skills for the team: Can they conduct interviews? Are they good at problem solving? Benchmarking? Collecting data? Writing? Communicating? Creative thinking?
3. Choose individuals who have key personal traits:
   • comfortable with uncertainty and ambiguity
   • can challenge status quo
   • have high energy
   • out-of-the-box thinkers
   • are good at self-management
   • can get the job done in unique ways
   • are result oriented
4. Look for team members who understand the process.
5. Ask Senior Management for recommendations.
6. Make sure that prospective team members can commit to the time required for the project.

Once the Teams Are Chosen...
Make team members feel special. Communicate the importance of their commitment and their dedication to the organization.

At NWH, three redesign teams were chosen, each charged with examining one of the 3 key processes: Pre-hospital Care (The EMS Process), Patient Flow through the ED and The Hospital Admission Process. Each team met weekly, for three hours, over a five month period. The teams agreed to view the processes from an “end to end” perspective—starting from the first ambulance field call to ED disposition.

The Three NWH Teams:
• **Team 1:** The Ambulance Team, a 16-member team, comprised of ED administration, Emergency Medicine physicians, nurses, technicians, patient advocates, medics and five different community volunteer corps—whose goal was to provide valuable insight to things the Hospital could do to improve the relationships with the pre-hospital care providers

• **Team 2:** The ED Flow Team, a 15-member team, comprised of ED physicians, nurses and nurse practitioners, laboratory, radiology, transport and clerical staff and clinical informatics personnel—whose goal was to understand the data and review each process in the ED for effectiveness and enhanced patient flow

• **Team 3:** The Admit Team, a 15-member team, comprised of ED physicians and nurses, patient unit nurses, hospitalists, intensivists, housekeeping, transport, nursing supervisors and bed management, and admission assessment staff—whose goal was to streamline the process of admitting patients to the patient care units.
Communicate to the broader organization. It is important to have a plan in place that outlines how the work of the teams will be communicated to the Hospital. Keeping department heads and hospital staff up to date on the ongoing progress is critical to gain their support and enthusiasm for the project.

At NWH, the ED redesign project was never a mystery to anyone in the hospital. Numerous presentations were made to the hospital staff, keeping them informed about the redesign project. Meetings were held among department heads, as well as among the staff, throughout the process.

- **Teach Redesign tools and techniques.** A kickoff is an important orientation to introduce team members to the project and explain the process redesign. It can be done on the premises of the organization, or off-site at a “retreat.” The kickoff serves to generate enthusiasm for the project, to review the reasons for the project and to provide training in tools and techniques that will be used during the redesign process.

NWH held an off-site 2-day retreat for leaders and team members, to kick off the ED redesign project. Led by redesign consultant Susan Elkin, the retreat set the stage for the work ahead, while building camaraderie among participants and generating excitement for the project.

**Putting Together a Budget...**

There are many considerations when preparing a budget, both for the redesign process and the actual implementations. It is important to list all expenses in advance, in order to have sufficient financing in place.

At NWH, the budget considerations for the redesign process included:
- process redesign consultant fees
- customer service consultant fees
- salary expense for employees being together for training processes
- backfill salary expense for employees to be replaced during time in redesign meetings
- expense of off-site retreat for kick-off
- food provided during training sessions

Some of the significant budget considerations for the redesign process included:
- Installation of a pneumatic tube for the delivery of specimens to the laboratory
- Uniforms for the Business Associates
- Creation of the EMS Room—a dedicated space with computers, telephone, copier and refreshments for EMS personnel
- Expense for enhanced signage
- Technology: Meditech enhancements
- Communication technology: purchase of the Vocera system
- Additional nursing to have 2 nurses per team, extended physician coverage

**Establishing a Timeline...**

People need structure. A timeline serves as a vital guide to provide that structure, including benchmarks that must be achieved by specific dates. A timeline helps keep participants on track, is a useful tool for better planning and sticking to a schedule.

**Here is the NWH timeline for its ED redesign:**

I. Structure the Effort: January, 2007
II. Understand the Process (Map): January-February, 2007
IV. Train and Implement: September-October, 2007
V. Evaluation: October, 2007-Present

Using Resources...

Valuable resources are filled with useful advice and helpful information. Following are some helpful resources that can be used in an ED transformation:
- **Site Visits:** Other hospitals in the region that have already redesigned their EDs serve as a model and great resource. In the New York City area, St. Lukes-Roosevelt Hospital in Manhattan and Lutheran Medical Center in Brooklyn are two prime examples of hospitals with redesigned EDs.
- **Readings:**
  - Who Moved My Cheese? By Spencer Johnson, MD, a brief and thought provoking little book about change in the workplace
  - Suggested authors with books on Change Management and Leadership include: Michael Hammer
  - John Kotter
  - The Internet: A wide range of published articles available on redesigned Emergency Departments; Patient Centered Emergency Departments; Organizational Change; Patient Satisfaction; The Future of Emergency Departments.

Understanding the Processes...

In order to implement improved processes, it is vital to understand those processes. This is the diagnostic phase of the redesign. It’s about: “how does this process really work” instead of: “how should the process work.” You can’t come up with solutions unless you understand what is really going on. Key components of the diagnostic phase are:
- **Conduct analyses:** What are the processes for which each ED team (The Intake Team, The Treatment Team, The Disposition Team) is responsible? What is broken about these processes that should be improved?
- **Understand patient and care team expectations:** What do patients expect compared to what they want? What is important to the care team?
- **Map the processes:** By mapping a process, it is often easier to see the flow of that process: what is working and what needs fixing.
- **Identify the gaps in the current processes:** Are processes too flexible and not standardized? Do they differ in the day versus the night? Is there inconsistent oversight of patient flow? Inconsistent use of protocols? Limited communication among the team, resulting in patients not receiving frequent updates?

Designing Solutions...

Moving from the findings to the solutions is the transition of the redesign process and the creative part. Now that we know what is wrong, how are we going to make the necessary improvements? It is time to design solutions for:
- New Processes
- New Roles
- New Infrastructure

Remember: Every organization is unique; there are no cookie cutter solutions that fit every institution. Solutions have to be individualized to meet the specific needs of the organization and to fix the specific problems that are broken.
Here are several key activities to include in this phase of the project:

1. Investigate other hospitals that have implemented successful changes. Make site visits, talk to individuals who were involved in the changes, and observe the designs which they have put in place.
2. Brainstorm and assess the feasibility of new ideas.
3. Map new processes and then select the best approaches.
4. Analyze potential solutions from a cost-effective perspective: Are they viable? Will they be financially beneficial?
5. Define specific performance outcomes. What will the new solutions strive to achieve?
6. Establish performance measurements for the newly designed solutions. How will you evaluate them to determine whether they meet the targeted goals?

Upon completion of the design of the targeted solutions, get ready to move it forward and implement those solutions.

Setting the Stage for Success...

There are many components to building the foundation for a successful project. Here are some of the most important things to remember:

• Take the time to structure the effort and define the scope of the project. Be as clear as possible about two key questions: Why are we doing this? What are we trying to accomplish?
• Get the support and leadership of senior management. Rely on the organization’s leaders to take ownership and set the direction of the project.
• Remember: redesign is about results. Stay focused on the project’s goals.
• Win the support of project participants. Continue to reinforce that this is their project and they share ownership of the major changes that they are making.
• Choose individuals for the project who are involved with the processes in need of fixing. Strive for multidisciplinary teams consisting of members who can work well together and complement one another.
• Set goals for the project that will keep it sustainable over time. Make sure to put mechanisms in place that will last.
• Develop a redesign methodology and stick to it. Keep a consistent routine.
• Train all participants in the chosen methodology and make sure that everyone is comfortable with it.
• Remember, Rome wasn’t built in a day! No great changes happen overnight. There are often unexpected obstacles and setbacks, so be patient!
Moving it Forward: Implementing the Plan

Once the solutions for redesigning a patient and family centered ED have been finalized, it's time to implement the plan. Based on individual needs, the solutions will vary from institution to institution, but the following guidelines can be useful:

1. Make the launching a big splash. “Go-Live” should be a happening for the entire organization.
2. Prioritize the commitment and leadership from senior management to set the tone for the importance and excitement of the project, and to ensure that participants can devote the necessary time to learn the new roles and processes.
3. Don’t expect 100% improvement right away. More realistic expectations for initial benefits: get it 70% right. Expect to get most of it right but at the same time, recognize that unexpected glitches are inevitable.
4. Monitor the progress steadily and consistently.
5. Implement feedback systems. Put mechanisms in place to communicate: What is working well? What is not working? How can we fix the problems?
6. Modify and refine the design as you move forward.

What’s Different Now at the NWH ED?

New Processes...

- **Ambulance Admission Process:**
  - **The goal:** to help EMS staff and patients feel that they are expected and welcome, rather than a burden to the ED.
  - **The plan:** dedicated phone lines offer earlier communication between EMS and ED staff, improving ED preparedness for incoming ambulance patients. To ease the transfer of care from ambulance to hospital, each call into the ED is now answered by a nurse who assures readiness for the patient and EMS, and who greets them on arrival. A new EMS lounge equipped with computer work space, phone lines and refreshments is available for pre-hospital staff use and comfort.

- **Focused Triage**
  - **The goal:** to move the patient into the care of the clinical team without delays typically cause by a full triage and registration process.
  - **The plan:** immediately upon arrival, the triage nurse makes an assessment of the patient's acuity and collects only the information that is necessary to determine the severity of the illness and record the patient in the ED tracking system. The triage is streamlined to: patient name, stated problem with a brief assessment and vital signs, severity of the illness and record the patient in the ED tracking system. The triage is streamlined to: patient name, stated problem with a brief assessment and vital signs, DOB, allergy, stated height and weight. The patient is assigned a medical record number, ID band, consent to treat, and then moved immediately back to the treatment area. A full bedside registration is done at a mutually convenient time for the patient and the care team.

- **Sorting Principle**
  - **The goal:** to simplify the triage process
  - **The plan:** assign patients through a sorting triage to the appropriate doctor, based on volume; reducing the time for patients to be seen by a medical professional.

- **Team Care**
  - **The goal:** relationship-based care: more focused communication and a more collective understanding of what is happening with each patient.

- **New Roles...**

  - **ED Flow Coordinator:** responsible for the ED flow, 24 hours a day, 7 days a week. The Flow Coordinator, a registered nurse, has no direct patient care but is instead charged with managing the flow of patients through the Emergency Department. The Flow Coordinator is the “air traffic controller” of patient flow, empowered to anticipate bottlenecks and re-assign resources in order to prevent delays before they occur. Teams are assigned by the Flow Coordinator and care is no longer geographically managed by zones. The Flow Coordinator also assigns patients to ED physicians by a new process called “the sorting principle.”
  - **A Dedicated ED Transporter:** responsible for transporting patients back and forth between the ED and the diagnostic testing areas. The ED transporter resides in the ED and is on call for ED patient transport and comfort.
  - **The Business Associate:** responsible for organizing patient information for the Clinical Team. This allows the registration process to be completed at any time after treatment has begun and directly at the patient's bedside, relieving medical providers of clerical responsibilities.

- **Synchronized Processes**
  - **The goal:** to provide efficiencies in the flow
  - **The plan:** The Clinical Team structure enables assessment, diagnosis, treatment and documentation to occur simultaneously throughout the ED care process.

- **ED Physicians Review of X-rays**
  - **The goal:** allow treatment to begin sooner and make the radiology experience more efficient for patients
  - **The plan:** The ED physician does a preliminary review of an X-ray and begins treatment based on its interpretation. Radiologists prioritize reading CT scans and MRIs, and then officially read each X-ray. If the radiologist interpretation differs from that of the ED physician, a revision policy protocol provides for patient notification.

- **Huddles**
  - **The goal:** to improve communication among the members of the medical team, and between doctors and their patients
  - **The plan:** After a patient has been seen by the physician, and at key points throughout the patient’s stay, the ED physician and his/her team have a huddle during which the doctor communicates the initial plan, enters orders and informs the nurse and technician about the next steps in care.

- **Ease of Admission**
  - **The goal:** to facilitate the patient quickly reaching the comfort of his/her room.
  - **The plan:** One call will be made to the Hospitalist for medical admissions. Before making the call, a core set of tests, “The Packaged Patient” will be available with results. Turnaround times and response times for Hospitalists and Intensivists have been set at a “30 minute rule.” The patient will be admitted to the hospital within 30 minutes of the decision to admit. If the Hospitalist considers further evaluation or possible discharge, a 30 minute time frame is set for the evaluation of the patient in the ED. If the Hospitalist cannot see the patient within 30 minutes, the ED physician will send the patient to the floor with “holding orders” and the Hospitalist will see the patient on the floor unit within 90 minutes.
Building Awareness

Communication, communication, communication. In order to generate enthusiasm, maintain the momentum and share the success of the redesign, it is vital to build awareness—among team members before and during the process, with the entire hospital and beyond the organization.

How to do it?

• Among team members: Even before launching the project, it is important to instill among team members the importance of the project and its impact on the entire hospital. Once the process is underway, it is also critical to keep communication ongoing among teams, ensuring that members stay up to date on one another’s activities and progress.

At NWH…

Staff Training:

• A Training and Implementation Team was established to manage the training and rollout of the new ED design. The team oversaw the development of the training curriculum, finalized job descriptions and staffing, developed policies and procedures, measurement indicators for the ED to monitor success, oversaw the implementation of the technology and information systems, and managed the communication of the process. Trainings were held during each phase of the process, customized to the specific stage.

• An ED Boot Camp: the ED environment was recreated with various patient scenarios, allowing the new team approach to be practiced in a simulated environment, working out the processes before implementing them in the live environment.

• Seminars: enthusiasm was reinforced for the new design with several seminars, including a 2½-day seminar led by organizational development expert Daniel Stone, during which tools and techniques were explored to enhance better communication with patients and colleagues, teamwork was fostered, delegation and conflict management skills addressed. The outcome of this training was the Emergency Department Teamwork and Compassion Card, a daily tool used by the Flow Coordinator who shares a tenant under teamwork and compassion during daily team huddles.

New Infrastructure…

• Technology: The Meditech Emergency Department Management application supports the collection of important reporting elements and provides the functionality to triage, track and record treatment of the patient during the ED visit. The EDM is the foundation of a new infrastructure.

  • Vocera: a wireless telephone communication allows staff to communicate directly with other staff both inside and outside the hospital. The Vocera devices are worn by staff on the ED and key personnel around the hospital, allowing for direct communication.

  • Electronic Patient Trackers: allows ED staff to view and track the current status of a patient from the electronic tracker board in the nursing station, as well as from any work station in the ED.

  • A Pneumatic Tube: allows direct transport of specimens from the ED to the lab accessioning area.

  • A “T-System”: physician documentation system allows physicians and nurse practitioners to create a complete record in a short amount of time and speeds the process for the teams.

• Wheelchairs at Entrance

Changes in Fast Track…

• The goal:

  • to decrease the dwell time (of the 22 Fast Track patients daily, 4 patients/day were in the ED for more than 3.5 hours; 8 patients/day were in the ED between 1.5-2.5 hours)

  • to instill urgency to get patients in/out

  • to align the staff with peak hours of demand

• The plan:

  • changed the hours from 9am-9pm to 11am-11pm due to the increased volume in the evening hours after doctor’s offices closed;

  • added an overlap physician from 6pm-midnight to facilitate the flow of patients · allowing Fast Track Nurse Practitioner the time to concentrate on time-consuming patient visits such as musculoskeletal and lacerations

Other Changes…

• Door to Doc: All patients in the ED will be seen by the Emergency Medicine physician within 30 minutes of their arrival to the ED.

• Established Turnaround Times: Acceptable and reasonable turnaround times were identified for almost all procedures that a patient receives. If those times are not met, color coding patient tracking capabilities immediately alert the Clinical Team to avoid potential patient delays.

Within the Organization: To reinforce the importance of the project, it is vital to:

• Keep the entire organization informed and aware of the progress being made.

• Continue to build a sense of excitement, starting with senior management, leading to the “Go-Live” moment

• Reassure staff members that change is positive, that bumps in the beginning are normal and to be expected, and that the redesign will not impact negatively on their jobs, schedules or security.

Established Medical Control Number and Dedicated EMS Number

20

21
At NWH...

- Continuous correspondences were sent through memos and letters to Department Managers, explaining the redesign process and generating support. Before the Go-Live date for the new ED process, a special meeting was held for all Department Managers, discussing the redesign process, addressing questions and concerns about the changes in the ED. A letter was sent to Department Managers by CEO Joel Seligman, encouraging them to facilitate staff training and to sharing his commitment to the success of the program.

- Celebration of Success: When the ED at NWH reached the top 1% in patient satisfaction, the ED staff and leadership recognized the members of the hospital with a thank you letter reinforcing that the success of the ED is due to the commitment of the entire hospital and dedication to the collective mission: putting patients and their families first.

- Communication with the Hospital Board of Trustees was a priority within the organization.

- Beyond the Hospital: Awareness is continuously raised as the word is spread beyond the walls of the hospital.

At NWH...

- Reaching out to the community was an important component of the process. Efforts were made to get the word out about the redesigned ED, to private doctors who refer patients to local hospitals, as well as to the local ambulance corps.

- Sharing the Model: NWH is committed to sharing the new patient centered ED process redesign with other institutions, in an effort to improve wait times and patient experiences in Emergency Departments, both regionally and nationally. Representatives of NWH have spoken at national conferences, hosted on-site visits for visitors from other hospitals, and published articles, all in order to share the NWH model and spread the word.

Dear ____________________

I am writing you because you are about to play a role in one of the most important changes taking place at Northern Westchester Hospital. I am referring to the new Emergency Department Process that will go into effect on October 1, 2007. Your participation in the implementation of the new ED Process will be vital to our collective success.

Change is never easy - even when it is positive change. It is likely that you have questions about how this change will affect your job and your life. It is natural for staff to have concerns. We want to do everything to ease your mind and provide the information you need to make this a successful transition for you and for the Hospital.

To this end, the ED Process Redesign Implementation Team has planned an extensive training program for the 150 employees who are directly involved in the new ED Process. Your participation in the ED Process Training Program is required.

Training will take place during the month of September, in preparation for the October 1st, GO-LIVE date. You will be paid for your training time.

Attached please find the schedule of Training Classes required for your job description. Your manager is aware that your participation in this Training Program is mandatory. Please review this schedule with your manager and then contact Training Coordination (x7699 or 914-242-7699) to sign up for your Training Classes by August 31st.

We also have a homework assignment for you to complete before you attend the Training Program. All participants are required to read “Who Moved My Cheese?” by Spencer Johnson, MD, a brief and thought-provoking little book about change in the workplace. Stop by the Executive Office to obtain your free copy.

The new ED Process has been designed by your peers. More than 50 representatives from many departments have been working with an ED consultant since March to redesign our process. Their goal is to improve the flow of patients through the ED, while ensuring the same high standard of quality patient care that we currently deliver. We expect to improve both patient and employee satisfaction in the ED.

Thank you in advance for your participation in this important process.

Sincerely,

Joel Seligman
Evaluation: Measuring the Redesign Outcomes

Measurement and Accountability are vital in a redesign process. Anecdotal observations are not enough to evaluate whether the redesign has worked. The quality and experience of care must be continuously monitored and evaluated by a process which integrates detailed, rigorous criteria for assessing the synchronized flow and care of patients in real time, from the moment they enter the ED to the moment they leave.

Metrics must be put in place—qualitative and quantitative—to measure the processes/roles/technology within the ED in order to see if the redesign is meeting its goals.

At NWH, the ED has developed the following metrics to capture how the ED is doing, daily and monthly, on key indicators:

- Cycle times: times for door to physician, physician to treatment, and treatment to disposition
- Patient satisfaction assessments to ensure that the work completed is meaningful to patients

A dashboard helps to chart and monitor the progress being made in reaching established benchmarks and meeting the goals of the redesign.

Evaluation is ongoing…

The NWH ED Operations Team keeps a steady eye on the redesigned processes. The team is comprised of the Chief Medical Officer, Chief Nursing Officer, Chiefs of Emergency Medicine, ED Nursing Director and Clinical Manager, ED Staff Nurse and Director of Performance Improvement. Members meet weekly for 90 minutes to review the metrics, review and refine operational flow issues and to provide consistent leadership in order to ensure that the process flow maps are being followed. Ongoing evaluation of the processes is key to sustainable success.

The challenge continues…

- The initial benchmark for 70% success must be improved.
- Improvement must be continuous.
- Commitment must be shared not to revert to old ways.
- Accountability is key. People must be held accountable to new standards.

Dear NWH Staff, Physicians and Volunteers,

The Emergency Department would like to thank the Northern Westchester Hospital staff for helping us achieve the 99th percentile in patient satisfaction for the 1st quarter of 2009. This is an impressive achievement since Press Ganey surveys thousands of patients in Hospitals throughout the United States. We recognize that our ability to provide excellent, compassionate patient-centered care is dependent on the support the Emergency Department receives from you. Much of this success is a result of the Emergency Department Redesign project which many of you were involved in designing and implementing. The process changes made were many, and impacted not just the ED staff, but the entire organization.

We appreciate the time and effort you contributed to making the new processes a success and your continued commitment to ensure the sustainability of this great work. Our patients have noticed the change and we want you to know that all of your hard work was not in vain. We could not have accomplished this impressive satisfaction rating without you.

Thank you,
Dr. Robert Marcus, Dr. Steven Grayson, Cathy Cioffi and the entire staff of the Emergency Department

<table>
<thead>
<tr>
<th>Patients give NWH Emergency Department Top Scores!</th>
<th>Source: Press Ganey 2009 Q1</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Overall rating of care you received during your visit</strong></td>
<td>99</td>
</tr>
<tr>
<td>Waiting time in the treatment area before you were seen by a</td>
<td>99</td>
</tr>
<tr>
<td>doctor or nurse practitioner &amp; 99</td>
<td></td>
</tr>
<tr>
<td>Courtesy of the nurses &amp; 99</td>
<td></td>
</tr>
<tr>
<td>Degree to which the nurses took time to listen to you</td>
<td>99</td>
</tr>
<tr>
<td>Nurses’ attention to your needs</td>
<td>99</td>
</tr>
<tr>
<td>Nurses’ concern to keep you informed about your treatments &amp; 99</td>
<td></td>
</tr>
<tr>
<td>Courtesy of the doctor or nurse practitioner &amp; 99</td>
<td></td>
</tr>
<tr>
<td>Degree to which the doctor or nurse practitioner took the time to listen to you</td>
<td>99</td>
</tr>
<tr>
<td>Doctor or nurse practitioners’ concern to keep you informed about your treatment</td>
<td>99</td>
</tr>
<tr>
<td>Doctor or nurse practitioners’ concern for your comfort while treating you</td>
<td>99</td>
</tr>
<tr>
<td>Courtesy of the radiology staff</td>
<td>99</td>
</tr>
<tr>
<td>Degree to which staff cared about you as a person</td>
<td>99</td>
</tr>
<tr>
<td>How well your pain was controlled</td>
<td>99</td>
</tr>
<tr>
<td>Information you were given about caring for yourself at home (e.g. taking meds, getting follow-up care)</td>
<td>99</td>
</tr>
<tr>
<td>Overall ED Satisfaction Score</td>
<td>99</td>
</tr>
<tr>
<td>Likelihood of recommending our Emergency Department to others</td>
<td>99</td>
</tr>
</tbody>
</table>
Beyond the Metrics...

Anecdotal Observations Continue to Validate the Success

When asked, "What are the most significant changes that you have personally experienced with the redesigned Emergency Department?", here are some of the responses...

"Walking by the ED and seeing no people in the waiting area. Patients go directly to the treatment area and their families stay with them there. The waiting area was always full prior to the redesign."

Craig Brandt, Director of Performance Improvement

"Better communication—both with patients and their families, and among the care team. There is improved continuity of care with patients and their families, giving them periodic updates about the process and where we are, keeping them updated on the treatment plan, and enabling them to express their feelings if they disagree with the plan. Patients and their families feel that we are listening to what they want. Also, once a decision has been made to admit a patient to the hospital, our focus is to make that happen quickly. Our goal is to get the patient comfortably placed in a room, within the appropriate unit, within 30 minutes. That's a huge undertaking that typically takes hours."

Joel Seligman, CEO and President of NWH

"There has been a dramatic decrease in the time it takes for a patient to see a physician or nurse practitioner. There has also been more consistency in following the processes. Although the specifics of each patient differ, the processes are now the same. And there are standardized metrics to measure the effectiveness of our new processes."

Robert Newborn, Associate Medical Director

"There is more sensitivity on the part of the ED staff to think of patients and their families. Our focus is to get patients inside quickly, door to doc and to initiate treatment. It's also more engrained in the staff to keep patients informed throughout the process. Our patient satisfaction numbers tell us that patients have been impressed by the changes and that they are happy."

Catherine Cioffi, RN, Emergency Department Patient Care Manager
Key Learnings

Over the course of any major project, there are mistakes made and lessons learned. At NWH, a summary of some of the most important learnings was compiled among participants in the redesign, in the hope that they will be helpful to others in moving forward to build a patient and family centered Emergency Department...

1. Great leadership is critical to implementation of new processes. To be successful, you must have the support and leadership of senior management. It takes a lot of support and encouragement from the top to send the message throughout the hospital that this is our Emergency Department.

2. You have to be specific about what you are trying to achieve, and why. The clearer you are about goals and objectives, the better.

3. It is vital to commit the resources—intellectual, time and expertise—to be successful. You have to believe in the principle and the process, and gain the commitment from the entire staff to move it forward.

4. It is vital to frontload your efforts and allow enough time for each phase of the project. Every stage is important and appropriate time must be designated to ensure success. Whatever time you thought was enough to designate before and during the process, double it. Whatever time you were planning to allow for training, triple it!

5. Standard processes are vital. Since everyone does his/her own thing a little differently, it is important to train participants in common methodology and stick to it, to be more efficient.

6. Technology should be built to support the process; the process must drive the technology. The process should be developed first; then technology designed appropriately.

7. It is important to identify the process owners. Assigning the individual(s) who will be responsible for the continuation of improving the design is critical to success. The message that must be reinforced is: this is permanent and here to stay; there’s no reverting back to the old ways.

8. Communication begins with listening to patients and their families. Continuous communication—with patients and their families and among members of the care team—is critical.

9. Change is difficult but necessary. By nature, people don’t like change. A project of this magnitude involves a lot of hard work. But at the end of the day, a more efficient ED and more satisfied patients make it all worth the time and effort.