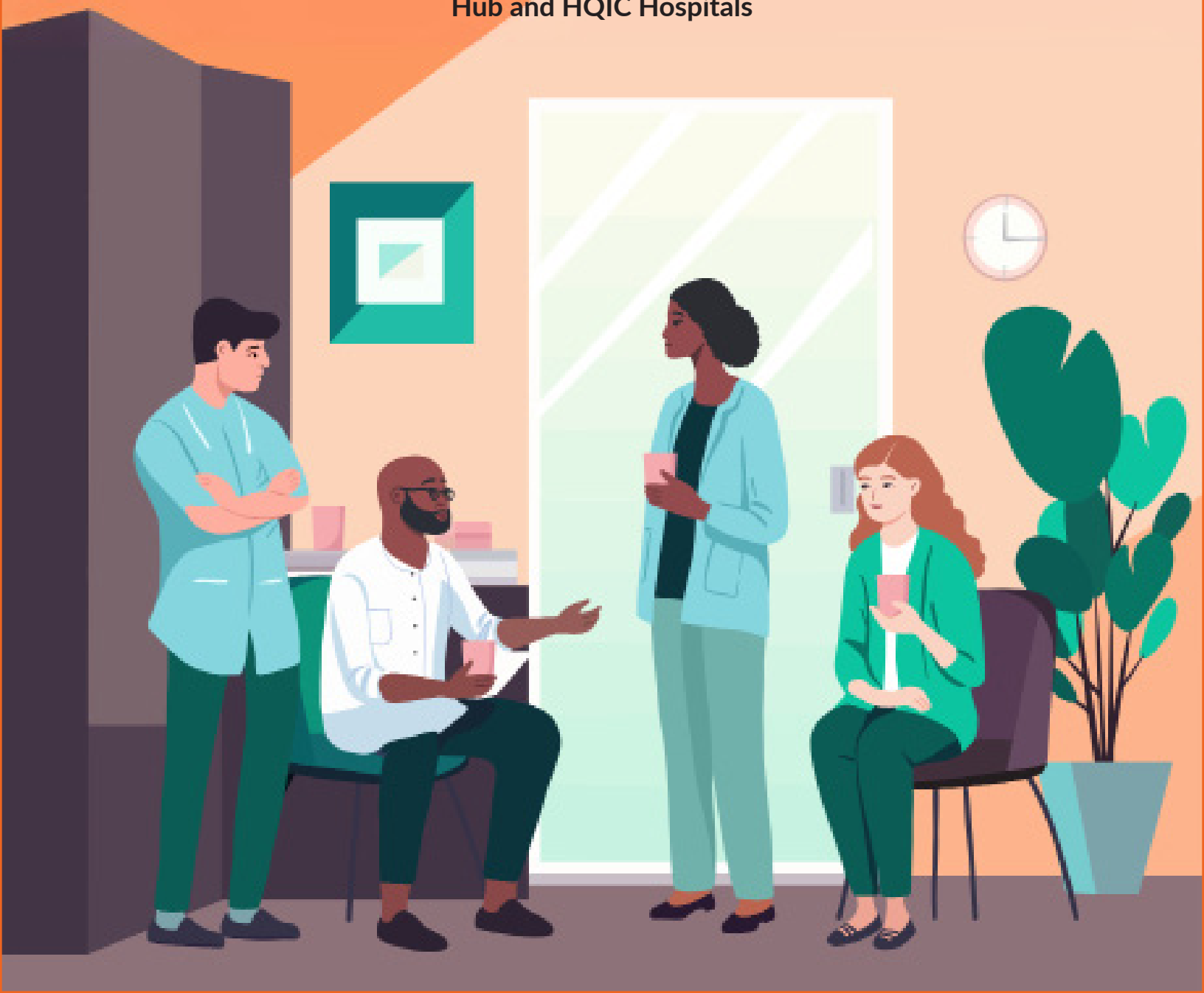
CONVERGENCE
HEALTH CONSULTING

EMERGENCY DEPARTMENT IMPROVEMENT FOR RURAL HOSPITALS

Special Thanks to PFCC Partners
Hub and HQIC Hospitals



BACKGROUND

Emergency Departments (ED) are often the busiest and highest volume departments in a hospital. Because of this, optimizing hospital ED, "provides improved patient flow, better patient safety, and enhanced clinical quality"[1].

In rural communities, Critical Access Hospitals (CAH) and Rural Emergency Hospitals (REH) must be able to identify, treat and/or transfer patients that present to the ED in the most efficient and timely manner, to ensure safety for patients that may require treatment or transfer to a higher level of care. The Rural Emergency Hospital Quality Reporting Program (REHQR) and the Medicare Beneficiary Quality Improvement Project (MBQIP) Outpatient Quality Improvement Measures include data metrics from the Centers for Medicare and Medicaid Services (CMS) Hospital Outpatient Quality Reporting Program (Hospital OQR) to determine timeliness and efficiency of ED processes that impact patient flow through the department.

The Convergence Hospital Quality Improvement Collaborative hosted listening sessions with Patient and Family Partners, State Hospital Associations, and rural hospital staff members. Through these calls, we identified opportunities for improvement in rural EDs. These include, patient experience, transitions of care, communication, social drivers of health (SDOH), optimization, and violence prevention.
This toolkit provides real-world examples and simple, actionable ideas on how to drive improvement, address barriers and challenges, along with reference materials to support your journey. Change ideas for these areas were collected through hospital sharing of what has worked at their facility, and internet research of best practices. The spread of this information allows rural emergency departments to improve further, faster, together.

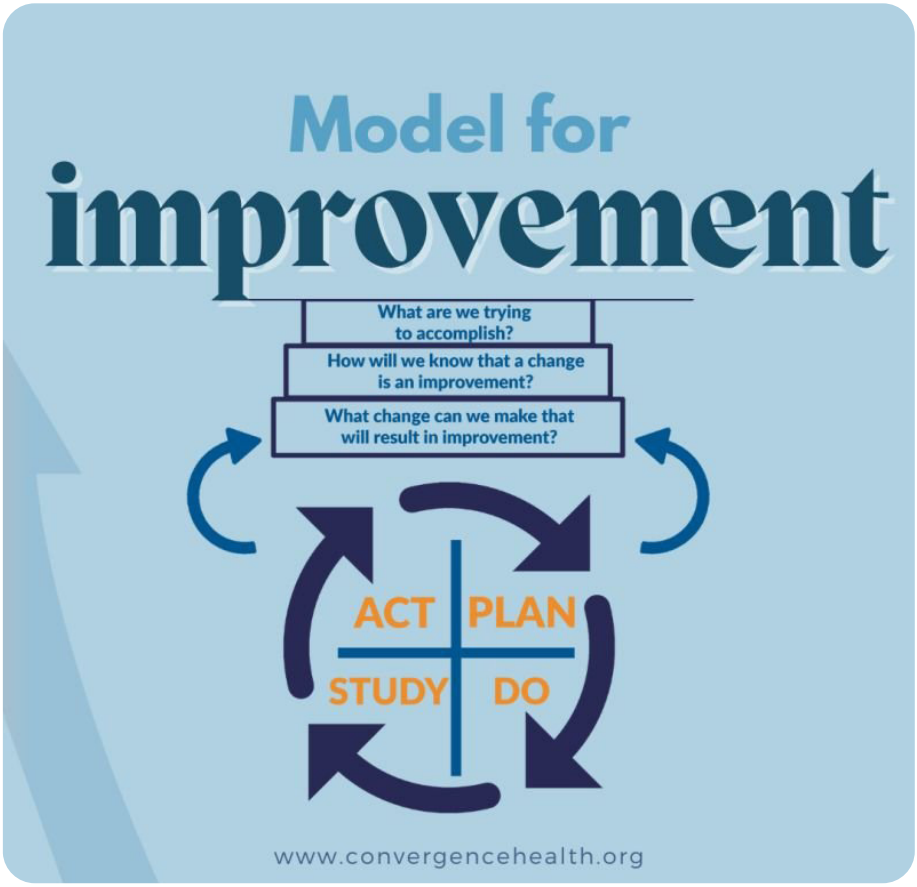
We encourage you to review the materials with your quality leaders and determine how they can support your quality improvement work.

1 Compass One Healthcare. (n.d.). How to improve patient experience in the emergency department. Compass One Healthcare. Retrieved from https://www.compassonehealthcare.com/blog/improve-patient-experience-emergency-department/

QUALITY IMPROVEMENT PRINCIPLES

Effective change requires an understanding not only of how one part of a system functions, but of how all parts of the system are linked together and coordinated. For example, education and training for staff to enhance their knowledge and skills will only improve a system, if the lack of such knowledge and skills was the major cause of deficient performance in that system. If the system has other unaddressed problems, such as lack of resources, inadequate staffing, or ineffective management or communication structures, even well-trained staff will not be able to accomplish their duties to the best of their abilities. Changes in one specific area may not lead to quality improvements if they do not significantly affect the overall quality of care the system provides.

The first step in the quality improvement process is the identification and prioritization of improvement needs, identification of an aim statement, or improvement goal, followed by the identification of team members tasked with leading the improvement process. Key to success in team identification is the inclusion of team members involved with the system being analyzed, organizational leadership with the ability to provide resources and direction, as well as team members with expertise in quality improvement principles. Once the team is formed, the quality improvement process starts with a series of questions, followed by short, rapid cycle tests of change called the “PDSA Cycle”, as demonstrated with the graphics below.



QUALITY IMPROVEMENT PRINCIPLES

It is important that the team tasked with leading improvement be willing to test multiple ideas on a small scale, while searching for the changes that result in improved care at the local level. In quality improvement models, these multiple small tests of change are referred to as the PDSA, or Plan Do Study Act cycle. The PDSA cycle is an improvement tool that promotes improvement via the implementation of rapid-cycle tests among an increasingly larger population and a wider range of conditions.

1

PLAN

involves identifying and planning the change to be tested.

2

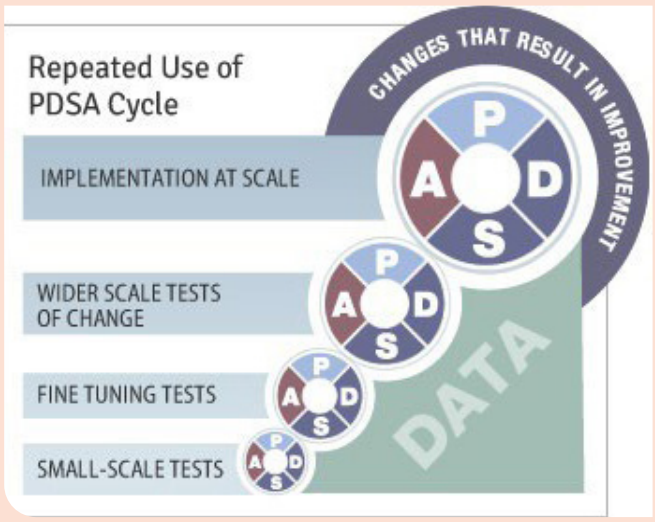
DO

is the actual act of carrying out the test on a small scale.

3

STUDY

involves rapid data collection that is done during testing through a "huddle" or "debrief" with the staff or patients involved in the newly designed process.



SOURCE: Coaching and Leading https://coachingandleading.wordpress.com/presentation1/pdsa-and-types-of-change/

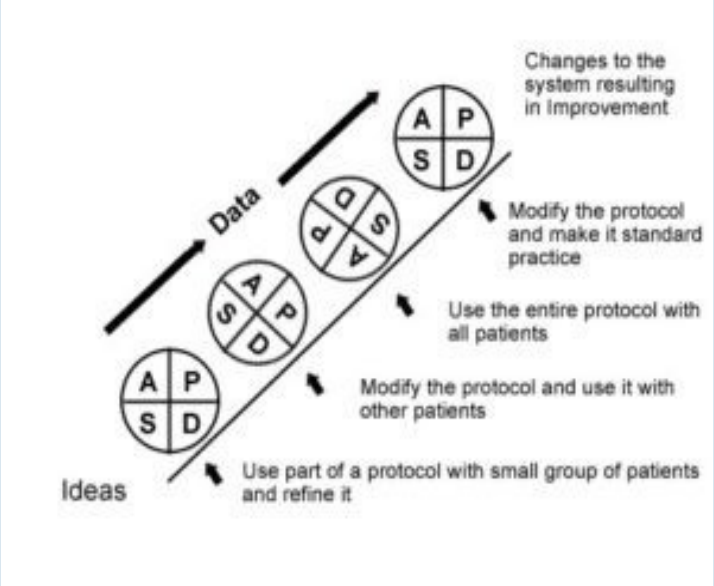
4

ACT

occurs when the decision to **Adapt, Abandon** or **Adopt** is made, based on the analysis of rapidly-collected information. If revisions and changes are indicated, the process is revised or **"adapted,"** and a new testing cycle is instituted. If the trials have been unsuccessful, the change idea may be **"abandoned."** The decision to **"adopt"** a new process occurs after it has been tested broadly under various circumstances and settings.

PDSA cycles should be run among smaller groups (for example, one nurse, one physician, and during one shift to start) before gradually expanding to a larger population within the system or organization if the change is determined to be successful.

QUALITY IMPROVEMENT PRINCIPLES



SOURCE: Wyoming Department of Health https://health.wyo.gov/publichealth/infectious-disease-epidemiology-unit/infection-prevention-orientation-manual/quality-improvement/figure-4-sequential-use-of-the-pdsa-model-for-improvement/

Quality improvement initiatives are best implemented by designated improvement teams composed of representatives from the relevant departments, units, or groups involved in the process or system to be addressed. Project management includes identification of team leadership and membership; creation of aim statements; development of a project plan; selection of tests of change and tools for implementation, measurement, and analysis of change efforts; and communication with relevant stakeholders including senior management, medical staff, front-line staff, and patients and families about the progress and success of the improvement project.

In the small hospital setting, large improvement groups may not be possible. A **"hub and spoke"** model for improvement work can be effective.

- Instead of convening large teams for every improvement initiative, one **core quality** and patient safety committee (the **"hub"**), led by a chairperson, initiates and oversees multiple improvement activities by designating a leader (or **"spoke"**) for each initiative.
- Individual project leaders can be selected based on **topic expertise**, **enthusiasm**, or **proximity** to the process being improved.
- Active project implementation can be conducted in **ad hoc working sessions**, with the leader attending quality and patient safety meetings **only upon request**, if the leader is not a standing member of the quality and safety committee. This allows for improvement work to commence without interruption of duties for large groups of staff members.

KEYS TO SUCCESSFUL AND SUSTAINABLE IMPROVEMENT

Partnering together to improve quality and safety is challenging work. In addition to what feels like a regular onslaught of new and competing priorities, getting on board with meaningful improvement requires a culture that supports quality of care and eliminates barriers.

A safety culture that supports this work requires an understanding of change management at all levels of the organization because improvement requires change.

To exact positive change in the work that we do to keep patients and staff safe and improve outcomes, it takes small, incremental changes by all individuals in our organization that will build up to the large cultural shift that is needed for reliable improvement. Our frontline staff members are the eyes and ears of our organizations. Organizational leadership and middle managers can help to make this work safer and processes more reliable by listening to the frontline workforce when barriers and challenges are brought up and acting on the suggestions made. Organizational leadership input, encouragement, and follow up can be the key to successful change.

KEYS TO SUCCESSFUL AND SUSTAINABLE IMPROVEMENT

A few keys to successful change management, and eventual cultural shifts include:

1

CREATE A SENSE OF URGENCY

You are part of something big, we must make a difference now – reference not only what we know from research about the vast number of errors we are missing, but stories from actual events in your organization and your own department.

2

BUILD A GUIDING COALITION

Organize opinion leaders and those in authority to help spread the message. Work with the willing before trying to engage those who are opposed to anything new. Let those who are enthusiastic about the new processes become the unit champions and help to spread the message.

3

FORM A SHARED STRATEGIC VISION TO HELP STEER THE CHANGE INITIATIVE

Do you have a unit-specific strategic vision that is built by staff? Create that vision together at the outset.

4

ENLIST A VOLUNTEER ARMY

Work with the willing. The others will come as they see enthusiasm grow.

5

ENABLE ACTION BY REMOVING BARRIERS

What can you do to leverage work that is already being done? How can you help staff create time to make this a priority? Can you include a discussion about the new process in daily shift huddles and department meetings?

6

GENERATE SHORT-TERM WINS

Publicly celebrate the small, individual steps being made. Together they make a significant impact.

7

SUSTAIN ACCELERATION

Keep the attention on the cultural shift by celebrating near misses that are caught and safety issues that are identified.

8

INSTITUTE CHANGE

New processes by showing how the new way of doing things has made a positive impact. Use the power of storytelling.

1 PATIENT EXPERIENCE

COMMUNICATION IS CARE

FOCUS ON PATIENT ENGAGEMENT

Patient experience is the range of interactions that patients have with the healthcare system from providers, clinics, hospitals, to insurers. Growing evidence shows that positive patient experience can result in improved outcomes such as patient safety, ability to adhere to care plans, and clinical outcomes.[1]

All improvement and change should be patient-centered; meaning we must empower patients to be active in discussions and problem-solving. As mentioned earlier, Convergence Health engaged members of our Patient and Family Partnership Community, hosted by PFCCpartners, to hear the patient's voice. These perspectives are vital to providing patient-centered quality care in the ED. The overwhelming themes centered around communication. Insights and ideas are summarized below.

> **"You are missing talking to me and telling me what is next. You are seeing me at my very worst and here I am with all of these people and not knowing what is going to happen next."**
>
> **- Patient & Family Partner**

2 What Is Patient Experience?. Content last reviewed August 2024. Agency for Healthcare Research and Quality, Rockville, MD. https://www.ahrq.gov/cahps/about-cahps/patient-experience/index.html

1 PATIENT EXPERIENCE

WHAT IS THE MATTER WITH THE PATIENT AND WHAT MATTERS TO THE PATIENT?

Patient and Family Partners (PFPs) overwhelmingly voiced the importance of clear communication from providers and the care team. Stressing the need to involve the patient in decision-making by not only addressing what is the matter with the patient, but also what matters to the patient.

Providers can control their communication with patients. Conversations that include both the patient and their family/caregivers lead to greater understanding of the situation, expectations of the ED visit and the process of care. Active dialogue among all involved helps to address questions, concerns, and identify any potential barriers in healing after discharge.

1 PATIENT EXPERIENCE

CONSIDER THE WHOLE PERSON

The patient's journey does not end when they leave the hospital; rather it is in the most critical stages. Social drivers of health (SDOH), the non-medical factors that impact a person's health, well-being, and quality of life, contribute 80% to health outcomes, while clinical care only contributes 20%.[1] To ensure a safe discharge and avoid unnecessary follow-up visits, EDs can work to understand and address some of the factors that may impede recovery.

Most hospitals are now screening patients for SDOH needs in the inpatient setting, including questions about food insecurity, housing instability, difficulty paying utilities, difficulty with transportation, and interpersonal violence. Even if your ED is not yet screening patients for these needs consistently, your patients may benefit from connections to available resources. Your facility may have community resource lists, relationships with partner organizations, informational flyers, or social work or case management staff who can share insight on how you can support patients' SDOH needs, even in a busy and complex environment like the ED.

If you are beginning to ask patients about these circumstances, be sure to consider how to create space for honesty and vulnerability that will build trust with the patient and help the care provider keep the patient safe and design a treatment plan that works for their unique life. Consider who asks these screening questions (for example, a nurse or social worker), when they ask, and the training needed to feel equipped to have these conversations.

Use of language and terms can impact patient care. The term frequent flyer is commonly used; however, it creates a mindset that isn't conducive to high-quality care or patient safety. Consider using terms such as underserved to refer to patients that visit the ED frequently and may need additional support or services.

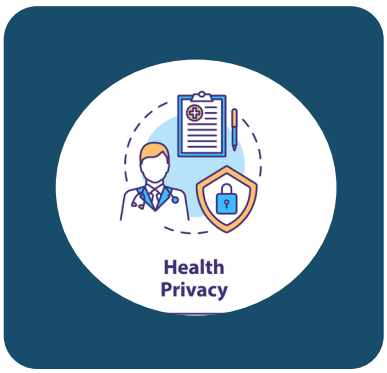
3 University of Wisconsin Population Health Institute: County Health Rankings Model 2024. https://www.countyhealthrankings.org/what-impacts-health/county-health-rankings-model

1 PATIENT EXPERIENCE

INTERVENTIONS TO CONSIDER

Explore **delivery of care coordination** during the patient stay in the ED. What points of time in the service is it efficient and effective for the Care Coordinator to connect with the patient (i.e. ED waiting room with follow up later)?

Design **waiting rooms with patient comfort** in mind, this may include a variety of seating so patients can lay down/sit as most comfortable for them.



Explore **ways to increase privacy** for patients to communicate with providers and the care team.

2 TRANSITIONS OF CARE

BARRIERS IDENTIFIED

- If the facility does not have in-house psychiatric or behavioral health services, it may take significantly longer for these patients to be accepted at a receiving facility. While these patients wait to be transferred, they are not receiving the care they need.
- Long waits for bed availability in receiving hospitals or long-term care settings.
- Specialty transport for psychological emergencies can take long periods of time to arrange and uses many resources. During this time, patients experiencing a psychiatric emergency may be intimidating to other patients and can lead to patients leaving without being seen.

CHANGE IDEAS

1. **COMPLETE RISK SCREENINGS FOR PATIENTS** that include, but are not limited to, SDOH, substance use disorders, depression and suicide risk, and infectious disease. Upon completion, connect patients with appropriate resources.
2. **DEVELOP UNDERSTANDING OF RESOURCES AVAILABLE** in the hospital and throughout the community or region.
3. **CONNECT WITH TERTIARY HOSPITALS** to build efficient transfer agreements that allow for a "first choice" for bed.
4. **INCORPORATE DISCHARGE FOLLOW-UP CALLS** to ensure all follow-up appointments and tests are scheduled, the patient has transportation, and other instructions are clear and able to be followed through with.
5. **INSTITUTE ED-MADE FOLLOW-UP APPOINTMENTS FOR PATIENTS.**
6. **COMPLETE AN ED DISCHARGE CHECKLIST.** An example specific to older patients is linked in the resources section. It can be tailored to fit your needs, goals, and priorities.
7. **INCLUDE PEER SUPPORT ROLES** in the facility for behavioral health patients. Peer Support staff show unique empathy and connection with patients via lived experiences. Peer Support staff can also support SDOH and mental health screenings.

3 COMMUNICATION

BARRIERS IDENTIFIED

- Delays are common in rural hospitals in receiving test results for radiology and laboratory departments. This is often due to staffing and most prevalent outside of business hours when contract radiology is covering.
- Incomplete patient information and status between hospital departments.

CHANGE IDEAS

1

USE A DATA DRIVEN APPROACH

to provide direct feedback to laboratory and radiology departments on report times. Using this data, engage these departments in multidisciplinary team-based problem-solving activities to identify potential improvement interventions.

2

DEVELOP A NURSING HANDOFF TOOL

for high-risk diagnosis to ensure vital information is shared between departments. (i.e. accurate and up-to-date measurements of fluid for sepsis patients).

3

IMPLEMENT A PROCESS TO CAPTURE DATA

on each shift for patients that left the ED prior to being seen by a qualified medical professional. Follow up by gathering data related to reasons for leaving by calling patients that leave without being seen and analyze that data with a multi-disciplinary team.

4 SOCIAL DRIVERS OF HEALTH

BARRIERS IDENTIFIED

- Transportation was overwhelmingly identified as a primary indicator for long patient times in the ED. Rural communities often do not have robust public transportation.
- Non-medical factors contribute up to 80% to patient outcomes. Healthcare providers recognize this but are unsure how to bridge gaps using current resources.

CHANGE IDEAS

1. **HOSPITAL SPONSORED TRANSPORTATION MODELS**
   such as ride share programs provided by hospital volunteers or transportation vouchers if transportation options exist in the community.
2. **BUILD A GUIDING COALITION**
   Coordinate and collaborate within the community to find opportunities to use existing community resources or influence infrastructure.
3. **SCREEN FOR SELECT SDOH IN THE ED**
   Using inpatient screening data, identify the top five most common SDOH in the community and complete mini-screening for those drivers in the ED.
4. **INCORPORATE CASE MANAGEMENT OR CARE NAVIGATION INTO ED SERVICES**
   These services can provide support to identify possible impacts to patient outcomes and close gaps post discharge.

5 OPTIMIZATION

BARRIERS IDENTIFIED

- Low volume and rural EDs struggle with staffing for volume, acuity, and financial sustainability.
- Significant delays in results from laboratory and radiology departments.

CHANGE IDEAS

1. **IMPLEMENT STANDARDIZED PROCESS** for rapid evaluation of patent needs and condition, and appropriate care. The Emergency Severity Index (ESI) is a common industry resource.
2. **IMPLEMENT STREAMLINED STANDING ORDERS.** Are there specific interventions that the provider is going to order anyway that can be started prior to being seen? (i.e. pain medication)
3. **BEDSIDE REGISTRATION** lessens wait time and increases patient privacy.
4. **ENABLE STAFF TO WORK AT THE TOP OF THEIR LICENSES** by cross training in competencies that impact efficiencies. (i.e. IVs and blood draws completed by nursing staff or ED Techs.)
5. **EXPERIMENT WITH CREATIVE STAFFING MODELS** for efficiency and cost effectiveness.
6. **DEVELOP OR EXPAND TELEMEDICINE SERVICES THAT MEET COMMUNITY NEEDS.**

6 VIOLENCE PREVENTION

BARRIERS IDENTIFIED

- Violent events in EDs pose significant risks to both staff and patients, compromising safety, care quality, and overall healthcare outcomes.

CHANGE IDEAS

1. **DEVELOP A MULTI-DISCIPLINARY PATIENT SCREENING TOOL**
for risk of violence to be shared with other departments to increase awareness of violent tendencies.

2. **PROVIDE REGULAR STAFF TRAINING**
to identify and deal with violent situations. This may include de-escalation, self-defense, and intervention measures.

3. **IMPLEMENT A ZERO-TOLERANCE POLICY IN THE HOSPITAL.**
Clearly communicate that any form of violence is unacceptable and will result in immediate action. A word of caution, some communication may make patients feel less safe or uncomfortable so be sure to engage with patients and families in the design of policy and communication.

4. **UTILIZE SECURITY PERSONNEL, SURVEILLANCE EQUIPMENT, AND PHYSICAL BARRIERS**
to protect staff and patients.

5. **DESIGN SAFE SPACES FOR STAFF**
to go to if feeling unsafe or threatened.

6. **COORDINATE WITH LOCAL LAW ENFORCEMENT**
to develop policies for handling violent situations and securing firearms.

7. **ENCOURAGE CONTINUOUS AND OPEN REPORTING**
of safety concerns by staff and visitors.

RESOURCES

1. Quality Improvement Implementation Guide and Toolkit for CAHs. Stratis Health. (2019) https://www.ruralcenter.org/resources/quality-improvement-implementation-guide-and-toolkit-cahs

2. Improving Patient Flow and Reducing Emergency Department Crowding: A Guild for Hospitals from the Agency for Healthcare Research and Quality (AHRQ). (2012) https://www.ahrq.gov/research/findings/final-reports/ptflow/appendix-a.html

3. Emergency Severity Index Handbook Fifth Edition. Emergency Nurses Association. (2023) https://californiaena.org/wp-content/uploads/2023/05/ESI-Handbook-5th-Edition-3-2023.pdf

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5. Rural Transportation Toolkit. Rural Health Information Hub (2024) https://www.ruralhealthinfo.org/toolkits/transportation

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8. Discharge Follow-Up Phone Calls. Jay Kaplan, MD. (n.d.) https://www.jaykaplanmd.com/article-connection-discharge-follow-up/

9. Geriatric Emergency Department Intervention (GEDI) Discharge Checklist. Queensland Health. (n.d.) https://clinicalexcellence.qld.gov.au/sites/default/files/docs/gedi/ed-discharge-checklist.pdf

10. Implementing a Discharge Checklist in the Emergency Department. Angela Hahn, MSN, RN, CEN and Rose Delarosa BSN, RN, CCRN. (2017) https://digitalcommons.providence.org/cgi/viewcontent.cgi?article=1022&context=stvincent-bootcampv

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12. Creative Staffing Models for Rural Emergency Departments. Concord Medical Group. (n.d.) https://concordmedicalgroup.com/creative-staffing-models-for-rural-emergency-departments/

13. Optimizing Rural Emergency Department Hospital Admissions Processes. Concord Medical Group. (n.d.) https://concordmedicalgroup.com/optimizing-rural-emergency-department-hospital-admissions-processes/

14. Interventions for Workplace Violence Prevention in Emergency Departments: A Systematic Review. Wirth, T., Peters, C., Nienhaus, A., Schablon, A. (2021) https://www.ncbi.nlm.nih.gov/pmc/articles/PMC8392011/