Preventable Readmissions

2015 UPDATE

Change Package

PREVENTING READMISSIONS

American Hospital Association

U.S. DEPARTMENT OF HEALTH & HUMAN SERVICES
PARTNERSHIP FOR PATIENTS
HealthCare.gov

HRET
HEALTH RESEARCH & EDUCATIONAL TRUST
In Partnership with AHA

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How to Use this Change Package

This change package is intended for hospitals participating in the Hospital Engagement Network (HEN) 2.0 project led by the Centers for Medicare & Medicaid Services (CMS) and the Partnership for Patients (PFP); it is meant to be a tool to help you make patient care safer and improve care transitions. This change package is a summary of themes from the successful practices of high performing health organizations across the country. It was developed through clinical practice sharing, organization site visits and subject matter expert contributions. This change package includes a menu of strategies, change concepts and specific actionable items that any hospital can choose to implement based on need and to begin testing for purposes of improving patient quality of life and care. This change package is intended to be complementary to literature reviews and other evidence-based tools and resources.

PART 1: ADVERSE EVENT AREA (AEA) DEFINITION AND SCOPE

The harm described in this change package is preventable readmissions. A preventable readmission is an unplanned inpatient returning as an acute care inpatient to the same facility (short-term acute care) within 30 days of the date of discharge. This change package provides ideas to reduce readmissions that are not scheduled or planned such as scheduled readmissions for planned procedures or treatments.

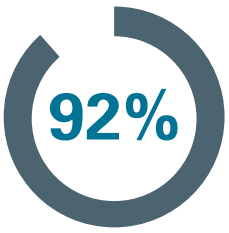
Magnitude of the Problem

Readmissions are common, expensive and frequently preventable. Nearly 20 percent of Medicare patients who are discharged from a hospital are readmitted within 20 days.[1] Additionally, a 2009 study showed that this rate rose to 34 percent when the observation period was increased to within 90 days of hospital discharge. According to this study, merely 10 percent of these readmissions were planned.

A growing body of evidence suggests that unplanned readmissions are associated with lower quality of care.[2] Unplanned readmissions are frequently the result of ineffective discharge processes including discharge planning, medical reconciliation, failed handoffs and insufficient patient education.[3] In addition to concerns regarding quality, readmissions are also very costly for the health care system and for patients. In 2010 alone, the readmission rate of 19.2 percent cost Medicare $17.5 billion.[4] In 2012, CMS implemented the Medicare Hospital Readmissions Reduction Program that penalizes hospitals for excess readmissions. In 2015, the maximum penalty for inpatient hospital payments is 3 percent, a nontrivial incentive for hospitals to reduce unplanned readmissions. As such, hospitals face a financial and moral imperative to reduce unplanned readmissions, ultimately resulting in improved outcomes and experience for patients. In 2014, the majority of America's hospitals received a Medicare penalty associated with readmissions totaling $420 million, suggesting that more improvement is possible.[5]

HEN 1.0 Progress

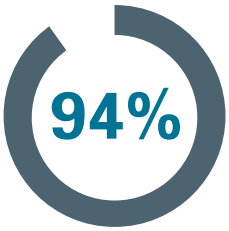
From 2011 – 2014, the AHA/HRET HEN reduced all cause readmissions by 18 percent. This equates to 65,022 readmissions prevented and a cost savings of $572,713,776.



of Eligible Acute/CAH/ Children's Hospital Reporting Data

18%

Reduction in All Cause Readmissions



"Chance The Information Will Improve My Effectiveness/Results"

of Positive Responses to Readmissions Education Events

What does that Mean?

65,022
READMISSIONS PREVENTED

$572,713,776
TOTAL PROJECTS ESTIMATED COST SAVING

20% **7 states** MEETING A REDUCTION GOAL

HEN 2.0 Reduction Goals

Reduce all-cause 30-day readmissions, by 20 percent by September 23, 2016.

PART 2: MEASUREMENT

A key component to making patient care safer in your hospital is to track your progress toward improvement. This section outlines the nationally recognized process and outcome measures that you will be collecting and submitting data on for the AHA/HRET HEN. Collecting these monthly data points at your hospital will guide your quality improvement efforts as part of the Plan-Do-Study-Act (PDSA) process. Tracking your data in this manner will provide valuable information you need to study your data across time, and determine the effect your improvement strategies are having in your hospital at reducing patient harm. Furthermore, collecting these standardized metrics will allow the AHA/HRET HEN to aggregate, analyze and report its progress toward reaching the project's 40/20 goals across all AEAs.

Nationally Recognized Measures: Process and Outcome

Please download and reference the encyclopedia of measures (EOM) on the HRET HEN website for additional measure specifications and for any updates after publication at: http://www.hret-hen.org/audience/data-informatics-teams/EOM.pdf

HEN 2.0 EVALUATION MEASURE

Readmission within 30 Days (All Cause)

PROCESS MEASURES

Compliance in implementing the seven essential elements of the care transitions bundle

Percentage of discharge care plans that contain all the elements of the Project BOOST discharge care plan

Percentage of Project RED patient care plans that contain all the elements of the Project RED patient care plan

Percentage of patients receiving Project BOOST risk assessment tool at admission

Percentage of patients receiving appropriate transition care (NQF 0228)

Percentage of patients receiving complete discharge education verified by teach-back or other means

PART 3: APPROACHING YOUR AEA

Suggested Bundles and Toolkits

- Project Re-Engineered Discharge (RED), retrieved at: http://www.bu.edu/fammed/projectred/index.html
- The Care Transitions Program®, retrieved at: http://caretransitions.org/
- Transitional Care Model, retrieved at http://www.transitionalcare.info/
- Better Outcomes by Optimizing Safe Transitions, retrieved at: http://www.hospitalmedicine.org/Web/Quality_Innovation/Implementation_Toolkits/Project_BOOST/Web/Quality___Innovation/Implementation_Toolkit/Boost/Overview.aspx
- Hospital Guide to Reducing Medicaid Readmissions, retrieved at: http://www.ahrq.gov/professionals/systems/hospital/medicaidreadmitguide/index.html
- The Huddle for Care, a platform to foster peer-to-peer exchange of transitional care solutions, visit www.huddleforcare.org.
- For key tools and resources related to preventing and reducing preventable readmissions, visit www.hret-hen.org.

Investigate Your Problem and Implement Best Practices

Driver Diagrams: A driver diagram visually demonstrates the causal relationship between your change ideas, secondary drivers, primary drivers and your overall aim. A description of each of these components is outlined in the table below. This change package is organized by reviewing the components of the driver diagram to: 1) help you and your care team identify potential change ideas to implement at your facility; and 2) to show how this quality improvement tool can be used by your team to tackle new process problems.

AIM	Primary Driver	Secondary Driver	Change Idea
		Secondary Driver	Change Idea
	Primary Driver	Secondary Driver	Change Idea

AIM: *A clearly articulated goal or objective describing the desired outcome. It should be specific, measurable and time-bound.*

PRIMARY DRIVER: *System components or factors which contribute directly to achieving the aim.*

SECONDARY DRIVER: *Action, interventions or lower-level components necessary to achieve the primary driver.*

CHANGE IDEAS: *Specific change ideas which will support/achieve the secondary driver.*

Prevent Readmissions	Understand and Segment Readmitted Patients by Risk	Analyze Data from Readmitted Patients	Change Idea
		Understand Reasons for Readmission	Change Idea
		Engage Multidisciplinary Team	Change Idea
	Reliable Standard Discharge Process	Admission Assessment of Discharge Needs	Change Idea
		Educate Patients and Caregivers About Symptoms and Red Flags and Post-discharge Follow-up	Change Idea
		Identify and Address Patient Health Literacy and Activation Levels	Change Idea
		Use Teach-back to Validate Patient Understanding	Change Idea
		Create a Patient-centered Record	Change Idea
	Enhance Services Based on Need	Assess Emergency Department	Change Idea
		Palliative Care	Change Idea
		Provide Population Specific Programs	Change Idea
		Pharmacy Intervention	Change Idea
	Ensure Adequate Follow-up and Community Resources	Coordination with Care Providers to Facilitate Resources and Follow-up Needs	Change Idea
		Post-discharge Calls and Visits	Change Idea
		Integrate Organizations and Identify or Develop a Medical Home	Change Idea
		Coordinate with Skilled Nursing Facilities	Change Idea
		Determine the Available Community Resources for Highly Vulnerable Populations	Change Idea

OVERALL AIMS: PREVENT READMISSIONS

Primary Driver > Understand and Segment Readmitted Patients by Risk

Understand which patients are more likely to be re-hospitalized to enable more effective deployment of resources to target priority patients.

Secondary Driver > Analyze Data from Readmitted Patients

Use your readmissions data to better understand the context of the readmission. Try to find patterns in readmissions.

Change Ideas

+ Use the past 12 months of readmissions and determine by major payer type:
  - Total number of discharges
  - Total number of readmissions
  - Rate = readmissions/discharges
  - Discharge disposition
  - Number home
  - Number home with home health
  - Number skilled nursing facility (SNF)
  - With any coded behavioral health diagnosis
  - Discharges
  - Readmissions
  - Number and/or percentage of readmissions occurring within seven days of discharge
  - Number of patients with ≥four hospitalizations in past year
  - Total number of discharges in >four groups
  - Total number of 30-day readmissions among them
  - Top 10 DRGs by payer
  - What are they?
  - Do they differ between payers?
  - What percentage of readmissions do the top 10 DRGs account for?

Suggested Process Measures for Your Test of Change

Conduct a regular assessment of your 30-day readmissions data and reprioritize your prevention efforts to meet your facility's needs.

Secondary Driver > Understand Reasons for Readmission

Hospitals can target their strategies to reduce readmissions more effectively when they have a better understanding of the reasons for their readmissions. For example, after performing an analysis, one hospital learned that their surgical patients were returning. They were able to discuss this with their surgical floor to modify the post-surgical assessment of bowel sounds. Through risk assessment, patient populations can be segmented into groups such as high-, medium- or low-risk for readmission. Assessment of patient risk permits the selection of specific care interventions based on a patient's risk level and, as appropriate, engagement of the patient and/or primary caregiver in the care planning process.

Change Ideas

+ Select a risk assessment tool that is easy to implement, will require minimal training and can fit into current workflow. (See Appendix II)
+ Document findings from risk assessment in a place that is visible to care providers.
+ Develop a series of actions based on the identified risk.

Suggested Process Measures for Your Test of Change

Conduct a formal assessment of patient risk of readmission. Determine for each patient if the risk assessment tool was completed accurately and if the results were readily accessible in the medical record.

Secondary Driver > Engage Multidisciplinary Team

All complex patients, including those at high risk of readmission, benefit from care managed by a multidisciplinary team. Depending on a patient's specific needs, consider expanding the care team beyond physicians and nurses to include hospitalists, pharmacists, physical, occupational, and respiratory therapists, case managers, social workers and nutritionists. Several studies have shown the value of early engagement of palliative care services in assisting with symptom management, reducing overall costs and aligning care with patients' treatment preferences.[6,7,8] Other research has demonstrated the benefits of adding a care coordinator, transitions coach, care navigator or similar provider in improving quality of care and safety both during a hospital stay and after discharge.[9,10]

Change Ideas

+ Identify members of the team. Include family members or other care providers.
+ Implement multidisciplinary rounds to proactively anticipate and prepare for discharge.
+ Communicate care transition plans among the team. Test various communication approaches to determine what is best for your team. Some approaches to consider include: whiteboards, encrypted emails or specific care transitions software.

Suggested Process Measures for Your Test of Change

+ Evaluate the effectiveness of multidisciplinary rounds using 10 cases.
+ Number of rounds completed within the desirable time frame (e.g., within 48 hours after admission).
+ Number of patients and families engaged in the rounds.

Hardwire the Process

Hardwiring is the result of highly reliable processes. Organizations with reliable processes track small failures, resist oversimplification, remain sensitive to operations, maintain capabilities for resilience and take advantage of shifting locations of expertise.[11] Including a family member or care provider on your multidisciplinary team is one way you can take advantage of shifting expertise. The family member would serve as the expert in the home setting to inform the clinical team. Other team members also serve as experts, using all of the combined knowledge to develop the best plan.

Primary Driver > Reliable Standard Discharge Processes

Interventions should have patient self-management as a goal. Patients should leave the hospital with the understanding of how to manage their medical condition(s). Keys to success include knowledge of medications, early warning signals, what to do if these signals occur and where to go when questions arise.

In some cases, the patient is neither the primary caregiver nor the primary learner. Identify who provides the care for the patient and whether multiple caregivers are involved, and target care management skill development towards the appropriate party.

Secondary Driver > Admission Assessment of Discharge Needs

For patients who have a higher risk of re-hospitalization perform an enhanced admission assessment that includes identification of their primary caregiver and their discharge care needs. If a patient has a prior admission, analyze previous discharge plan failures and care transition challenges and identify potential barriers to self-management to be addressed more effectively in the future.

Change Ideas

+ Identify the patient's primary caregiver and communicate that information to the members of the health care team. Use a standardized method to communicate this information such as use of a whiteboard or specific, standardized entry in the medical record.
+ Include the patient's primary caregiver as a member of the health care team.
+ Identify potential barriers to self-management, including limited financial resources and lack of a support network.

Suggested Process Measures for Your Test of Change

Sample a small number of patients (e.g., 10 cases per month) to evaluate if information about the primary caregiver is accurate and accessible to all members of the health care team.

Secondary Driver > Educate Patients and Caregivers About Symptoms, Red Flags, Medications and Post-discharge Follow-Up.

Before discharge, patients should understand what to do if their condition begins to worsen. With this knowledge, patients can obtain assistance in a timely manner and thereby prevent the need for urgent or emergent care. Some patients may be able to identify red flags but lack the assertiveness or problem-solving skills necessary to navigate the ambulatory care system, especially if their doctor is not easily accessible.

Medication management issues are a significant driver of avoidable readmissions. Completing an accurate assessment of home medication history is the first component of medication reconciliation. The history should include the name, dose and frequency of the medication as well as the patient's understanding of the purpose of the medication and how to take it (e.g., on an empty stomach or with food). At discharge, medication reconciliation includes a review with the patient or responsible caregiver of new prescriptions, home medications which are to be discontinued and any other modifications to medications. For a safe discharge, each patient or caregiver should understand: 1) The details associated with each medication prescribed including dose, frequency and time of day; 2) The purpose of each medication (i.e., what condition or symptom the medication addresses); and 3) How to obtain the prescribed medication(s).

Patients also need to understand what to do once they leave the hospital, including tests that need follow up and medical appointments.

Change Ideas

+ Develop patient-centered educational tools about diagnoses and treatments that use health literacy concepts such as the Personal Health Record[12] created by Eric Coleman, MD, MPH
+ Make health information easily accessible to patients using tools such as wallet cards or refrigerator magnets.
+ Keep red-flag instructions simple.
+ Assess the patient or caregiver's ability to manage red flags and take necessary steps to address concerns and seek care.
+ Write out steps to be taken as appropriate. Develop patient-centered educational tools about diagnoses and treatments that use health literacy concepts.
+ Educate patients before discharge regarding each medication prescribed, the purpose of the medication and methods of obtaining and taking each medication. Simplify instructions to the greatest extent possible.
+ Provide clearly written medication instructions using health literacy concepts to ensure patient understanding. Include easy-to-understand text and use pictures when appropriate.
+ Set up a medication simulation center in the hospital where the patient can demonstrate their medication administration process before discharge.

Suggested Process Measures for Your Test of Change

Assess patient understanding of their red flags. Sample a small number of patients each month and determine each patient's level of comprehension regarding their red flags.

Secondary Driver > Identify and Address Patient Health Literacy and Activation Levels

Not all patients have the same ability to learn and implement self-management techniques. Patients must be able to understand discharge education and apply the information provided, including knowledge of when to seek medical care, how to take medications correctly and how to follow care instructions. Health literacy is "the ability to obtain, process and understand health information to make informed decisions about health care." Health literacy involves using skills such as reading and listening to understand health-related issues and perform health-related tasks.[13] Limited health literacy has been associated with self-management difficulties, medication errors and higher health care costs.

Change Ideas

+ Develop patient-centered education and training materials using health literacy concepts.
+ Focus on improving communications with patients. Limit the use of medical jargon, ask open-ended questions and use the teach-back technique.
+ Improve written educational materials. Use documents that are easy-to-read and incorporate images.
+ Ensure written materials align with and reinforce verbal instructions.
+ Have patient focus groups or patient advocates assist you in developing effective patient education materials.
+ Consider The Patient Activation Measure® (PAM®), a proprietary measure and coaching program.[14]
+ Consider using motivational interviewing techniques for patients who are at high-risk and have lower activation. Motivational interviewing is a technique to increase the participation and desire of the patient to carry out self-management tasks.[15]
+ Set up a simulation center in the hospital where patients can simulate what they need to do at home (e.g., weigh themselves, select nutritious food to eat).

Suggested Process Measures for Your Test of Change

+ Percent of patients that have materials that match their health literacy or activation level.
+ Evaluate the effectiveness of educational materials via qualitative and quantitative assessments of patient comprehension. Refine the materials until maximal effectiveness is achieved.
+ For organizations who have implemented the PAM or a formal health literacy assessment tool, evaluate the use of these assessment instruments.

Secondary Driver > Create a Patient Centered Record

The patient is a key source of his/her clinical information. Develop a patient-centered record that can be used by patients to manage their care and to communicate with their clinical providers.

Change Ideas

+ Consider adopting available tools and best practices such as Project RED's After Hospital Care Plan (AHCP)[16] or the Personal Health Record (PHR)[17] developed by Care Transitions Program®.[18]
+ Determine where in the patient record key information will be stored and accessed to be used in care plans. Consider using the information technology department to assist in this process.

Suggested Process Measures for Your Test of Change

+ Number of completed patient care plans that contain all the required elements:
  > Date of discharge
  > Contact information for the primary physician and other key care providers
  > Medications to be continued at home, including name, purpose, dosage, frequency
  > Follow-up appointments scheduled
  > Other orders related to patient self-care, such as diet and activity
  > Information about the diagnosed disease(s) or condition(s)
  > Signs and symptoms that warrant a phone call to the physician
  > Signs and symptoms that warrant a visit to the emergency department (ED)
  > A form on which a patient can record questions to ask at the follow-up appointment

Secondary Driver > Use Teach-back to Validate Patient Understanding

Use teach-back as a communication tool to validate the patient's understanding of instructions. Teach-back is a method wherein clinicians ask patients, in a non-threatening manner, to recite the instructions provided. If a patient or caregiver cannot effectively teach back, additional support is needed.

Change Ideas

+ Use role-play to train clinical staff how to perform teach-backs and observe technique. Consider creating videos starring your own staff that display examples of "good" and "could be better" teach-back examples. Some tips for good teach-backs include:
  > Use "I" statements when speaking with patients and caregivers (e.g., "To make sure I did a good job explaining your medications, can you tell me…?")
  > Script specific teach-back questions staff can use (e.g., "Can you tell me who you would call if you gained five pounds?")
+ Designate where and how the status of patient understanding will be documented in the medical record. Create an education record within the medical record if the current clinical record is not sufficient.
+ Determine how this information will be transferred from provider to provider throughout the patient's stay.
+ Monitor the use and effectiveness of teach-back through observation and validation of patient understanding. For example, ask a nurse manager to interview patients to independently assess their level of understanding and compare the assessments to the reports on the education record. Provide real-time feedback if the nurse manager's assessments and the staff assessments are not in agreement.

Suggested Process Measures for Your Test of Change

+ Percent of patients that undergo a teach-back with clinical staff prior to discharge.
+ Number of patients that recall instructions after discharge using follow-up phone interviews.
+ Have a nurse manager or care coordinator observe seven discharge educational interactions occurring Monday through Friday and three occurring on Saturday or Sunday for a total of 10 observations per month. Limiting the observations to a sample decreases the resources needed to assess effectiveness.

Hardwire the Process

Reliable standard discharge processes occur when all staff are aware of these processes, have the tools to complete these processes and receive feedback regarding the level at which they complete these processes. Staff should be involved in the development and testing of processes.

Primary Driver > Enhance Services Based on Need

While all patients receive a reliable standard discharge, for some, more is needed. Enhanced services should be provided to those in need.

Secondary Driver > Assess Emergency Department

Question the need for readmission. If a patient recently discharged from the hospital returns to the ED, the patient is often readmitted. If a member of the care transitions team is more knowledgeable about the patient, alternatives to readmission can sometimes be achieved through use of community resources.

Change Ideas

+ Develop a method for ED staff to know if the patient was hospitalized in the previous 30 days.
+ Trigger an alert to ED staff, possibly in the electronic medical record (EMR).
+ Embed care transitions coordinator or other knowledgeable staff in the ED if possible. Alternatively, have knowledgeable staff able to respond rapidly to ED staff.
+ Determine if transitions coordinator can develop an alternative plan instead of readmission, such as home with additional resources and follow-up with primary care provider (PCP) the following day.
+ Consider if observation status is an appropriate level of care if returning home or return to a SNF is inappropriate.

Suggested Process Measures for Your Test of Change

Number of avoided readmissions through ED.

Secondary Driver > Palliative Care

Incorporate palliative care services into care transitions program. A segment of the readmissions occur due to end-of-life issues that are not proactively addressed. By incorporating palliative care into your care transitions program, advance care planning can take place in a more timely fashion.

Change Ideas

+ Develop criteria for an automatic referral for palliative care consult that includes a set number of readmissions (e.g., all patients automatically receive palliative care consult during their third readmission in a 12-month period.)
+ Include an individual knowledgeable of the palliative care program in multidisciplinary rounds.
+ Engage palliative care early in the hospitalization of patients at high risk of readmission, especially for those patients who are experiencing challenges with symptom management or end-of-life needs.
+ Develop a process for obtaining palliative care consultation within 48 hours of patient admission.
+ Develop accessible educational materials for patients and families on the benefit of palliative care.

Suggested Process Measures for Your Test of Change

The number of palliative care referrals for multiple readmissions criteria.

Secondary Driver > Provide Population-specific Programs

Develop population-specific programs based on need. Examples include a program for patients with sickle cell disease or a program for patients with substance use disorders.

Change Ideas

+ Based on your data analysis, determine if specific patient populations might benefit from an intensified program that includes enhanced education and post-discharge follow up.
+ Many excellent disease-specific programs exist. Review other programs that use a networking tool, such as Huddle™ for Care.
+ Based on your resources and patient needs, design a program.

Suggested Process Measures for Your Test of Change

Rate of patients readmitted who are enrolled in population-specific programs compared to rate of patients who are readmitted not enrolled in such programs.

Secondary Driver > Pharmacy Intervention

Augment care transitions program with pharmacy intervention. Issues associated with medications (i.e., the correct medication, medication availability) are leading causes of readmissions. Adding dedicated pharmacist resources to specifically address these issues is useful to many readmission reduction efforts.

Change Ideas

+ Allocate specific time for pharmacy care transitions to work with patients that have a high risk of readmission.
+ Develop criteria for referral to care transitions pharmacist (i.e., total number of new medications, high-risk medications and current admission due to medication issue).
+ Care transitions pharmacists are valuable team members. Pharmacist duties may include medication reconciliation, medication maximization, coordination with insurance companies, and ordering physicians and patients.

Suggested Process Measures for Your Test of Change

+ Number of patients meeting criteria for referral to care transition pharmacist.
+ Percent of referrals meeting each criteria (i.e., polypharmacy, high-risk medications).
+ Number of patients seen by care transition pharmacist.
+ Percent of referred patients who are seen by care transition pharmacist.
+ Number of interventions by type (i.e., medication reconciliation, medication maximization).

Hardwire the Process

Providing enhanced services based on need demonstrates the principle of resistance to oversimplification. By using these secondary drivers you will customize solutions for the needs of your higher risk patients rather than providing the same services to all. Additionally, the capability for resistance is hardwired through an ED hard-stop process. When a patient returns to the ED following an acute care discharge it becomes clear that the prior discharge plan for the patient was unsuccessful and needs to be modified.

Primary Driver > Ensure Adequate Follow-up and Community Resources

Develop care plans for patients to follow after discharge that are designed to meet the required levels of care. After-care plans are crucial for care coordination and should integrate input from a patient's entire clinical team.

Secondary Driver > Coordination with Care Providers to Facilitate Resources and Follow-up Needs

Determine which provider(s) should follow up with the patient after discharge, and the necessary intervals and frequency of follow-up. Identify and address other patient post-discharge needs, including: medications, durable medical equipment or oxygen.

Change Ideas

+ Upon admission, begin to plan for what post-hospitalization resources and appointments will be necessary.
+ Clearly communicate the post-acute care plan to patients and caregivers.
+ Health care facilities and their physicians should determine the acceptable length of time between discharge and the first follow-up visit with a clinician. Ideally, the follow-up appointment should occur within seven to 14 days. However, for patients at high-risk of readmission, a follow-up appointment within 48 to 72 hours may be necessary. Track your institution's readmission data to determine the intervals at which patients are returning. This analysis informs you about the timeframe needed for follow-up appointments for your patients.
+ Work with patients and care providers to determine any barriers to making and attending follow-up appointment(s). If barriers are identified, determine how they might be resolved. For example, coach patients to call their physician and say, "I need to make an appointment to see the doctor, because I just got out of the hospital and I need to be sure that I am taking my medications correctly." Consider hospital-run follow-up clinics staffed by hospitalists or nurse practitioners if timely access to a PCP is not available.

+ Work with health plans, Medicaid agencies and other safety net programs to identify a PCP for patients who do not have one.
+ Work with patients and caregivers to identify any barriers to addressing other follow-up needs such as medications, special diets or transportation barriers. If barriers are identified, determine how they might be resolved. For example, an extended supply of medications obtained prior to discharge or medications mailed to the patient.

Suggested Process Measures for Your Test of Change

Percent of patients who are discharged to home who attend their first follow-up appointment in timeframe designated by your facility (e.g., seven days).

Secondary Driver > Post-discharge Calls and Visits to High-risk Patients

Develop a process to call and/or visit high-risk patients to ensure that they are able to carry out their plan of care. Determine if the plan has been understood and whether changes or revisions are necessary.

Change Ideas

+ Determine which patients will be telephoned, who will complete the calls and when the calls will occur. Gather and analyze information from these calls to identify trends that can inform your readmission team. For example, repeated patient questions about medications may guide your team to revise medication education materials or processes.
+ Anticipate high no-answer rates for cold-calls. Patients and caregivers tend to answer calls from an identified clinician they met in the hospital. During the discharge process, advise patients to anticipate a follow-up call from an identified hospital staff member and confirm the specific phone number where they can be reached. Do not assume that phone number is the number in their medical record; patients may be staying with a relative or neighbor during their recovery.
+ Determine if patterns are occurring with unanswered calls (e.g., a specific time of day, the location of the patient, or the patient's level of engagement).
+ Maximize the continuity of post-discharge calls when possible by assigning one individual to follow-up and connect with the patient or caregiver.
+ Determine which patients will require a home visit, who will do these visits and when they will occur. Review home health referrals and readmission patterns to determine opportunities for additional focused interventions.
+ Consider implementing telehealth or other remote monitoring.
+ Consider using an automated phone call process to triage only those calls that need follow-up with a clinician.

Suggested Process Measures for Your Test of Change

+ Percent of calls placed within 48 hours of discharge.
+ Percent of calls answered by patients and/or caregivers.
+ Percent of patients with home visits completed within two days after discharge.
+ Percent of patients who had a follow-up visit scheduled before being discharged.
+ Percent of patients who visited their PCP (or other provider) within seven days of discharge.

Secondary Driver > Integrate Organizations and Identify or Develop a Medical Home

Including high-risk patients in a comprehensive medical home program may prevent avoidable readmissions. Partner organizations should engage in outreach to high-risk patients and provide accessible information and services, as well as monitor patient health and wellness via a multidisciplinary ambulatory infrastructure.[21]

Change Ideas

+ Consider ongoing case management through a medical home.
+ Refer the patient to complex care clinics.
+ Develop population registries to identify and monitor the health needs of the community served.
+ Consider accrediting medical homes.

Suggested Process Measures for Your Test of Change

+ Percent of patients discharged to a physician practicing within a medical home.
+ Rate of readmission rates from patients with a medical home, compared the rate of patients discharged to other practices or models.

+ Number of transition records to PCP or other follow-up health care providers within 24 hours of discharge.
+ Number of follow-up appointments before patient discharge.
+ Number of examined by PCP within seven days of discharge.

Secondary Driver > Coordinate with Skilled Nursing Facilities

Patients who are discharged to SNFs and other post-acute care providers are readmitted at a higher than expected rate. Many of these re-hospitalizations could have been prevented.[22]

Change Ideas

+ Evaluate the percentage of re-hospitalized patients from skilled nursing facilities.
+ Review admission source data to determine which SNFs drive your readmission rate.
+ Consider Interventions to Reduce Acute Care Transfers™ (INTERACT II). INTERACT II provides tools and strategies for SNFs to improve care and reduce the frequency of readmissions.[23]
+ Periodically review readmissions with the SNF to look for improvement opportunities. For example, consider providing after-hours physician phone triage/consultation services for SNFs that are contemplating sending a patient to the ED.
+ If re-hospitalized patients have come from a number of nursing facilities, drill further into the data to identify the SNFs that you can partner with on readmission reduction strategies.
  > Invite SNF leadership and clinical teams to visit your hospital and offer to spend time at their facility. This collaboration can create a shared knowledge base of the services provided by each organization and the care needs of patients.
  > Implement a process for verbal handoffs from hospital clinicians (physician and/or nurse) to nursing home providers.
  > Use a standardized transfer form to communicate information from the hospital to the SNF. Several states have implemented this process at the state level and work to balance the needs of the "receivers" and the resource limits of the "senders."

Suggested Process Measures for Your Test of Change

+ Number of completed standard discharge forms transferred to a SNF.
+ Number of follow-up phone calls from the hospital to SNF clinicians within 48 hours of transfer.

Secondary Driver > Determine the Available Community Resources for Highly Vulnerable Populations

More vulnerable patient populations may benefit from additional interventions and resources. These populations include: behavioral health patients; homeless patients; patients with end-stage renal disease (ESRD); those infected with human immunodeficiency virus (HIV); and children with complex, chronic conditions. Identifying and partnering with community-based organizations can be key to achieving timely care transitions and effectively responding to patients' needs.

Change Ideas

+ Collaborate with established community resources (e.g., nutrition programs, transportation programs, case management programs) or identify and develop new services.
+ Patients with the highest risk of re-hospitalization may benefit from the support of other clinical and non-clinical community resources.
  > Consider a complex care management program for your highest utilizers.
  > Map out the resources in your community.
  > Consider partnering or developing a referral relationship with community-based resources such as local agencies on aging and home health.
+ For patients without a PCP, enlist local health plans, Medicaid agencies and other safety net programs to help identify a PCP.

Suggested Process Measures for Your Test of Change

Evaluate whether readmitted patients had access to primary care, home care services, transportation, appropriate nutrition and social services.

Hardwire the Process

Establish processes and tools to ensure discharge follow-up and use of community resources that work into the existing workflow in the hospital. Involve staff in the development, improvement and implementation of processes and tools. Track small failures to find opportunities to improve the processes.

Choice of Tests and Interventions for Readmission Reduction:

Based on the findings from your diagnostic studies, select improvement priorities. Your priorities might be based on criteria such as potential impact, level of readiness or availability of resources. If, for example, you wished to determine which readmission risk assessment should be used by your facility, you could:

- Review a variety of risk assessment tools.
- Select a tool that appears to be compatible with the resources and needs of your organization.
- Ask: "Is there anything we need to modify before we test this here?"
  - > If yes, make the modification. However, note that if you are using a validated tool, modifications may negatively impact the reliability and validity.

Implement Small Tests of Change

Choose a Risk Assessment Tool to Adopt

PLAN

Tomorrow, one nurse will test this readmission risk assessment tool on his/her first admission.

DO

The nurse tests the readmission risk assessment.

STUDY

At the end of the shift, the team debriefs with the nurse to ask questions, such as:

- "Were there any challenges in completing the assessment?"
- "Were you able to collect the required information from the patient or medical record?"
- "How much time did it take to complete the tool?"
- "Are there any suggestions for modifications of the tool for the process?"

ACT

Make any recommended changes and re-test to determine if the changes are an improvement. If no changes are suggested, plan additional testing with more patients the following day.

Once the assessment has been tested successfully on several patients, you can expand the test to other nurses. Document each Plan-Do-Study Act (PDSA) cycle so you will have a record of the changes you implemented. You can run several PSDA cycles in parallel. For example, while one group is working on the readmission risk assessment, another might be testing changes to obtain accurate information about the PCP. Coordinate the findings from all of your PDSA cycles so that you can keep track of the entire project.

Identify potential barriers

- Depending on the payment structure in place in facilities, reducing preventable readmissions may not be aligned with reimbursement at the current time. Understanding the financial ramifications of readmissions and their reduction helps to identify potential economic benefits for institutions and patients.
- Reducing preventable readmissions is challenging work because it requires the involvement of many individuals and systems both within and beyond the hospital. Time and resources must be expended to understand the organization's current level of performance and to identify performance gaps, as well as to select the appropriate interventions to address the needs identified in the gap analysis. After the interventions are selected they should be tested, adapted and implemented, as appropriate. Common barriers to implementation include organizational drift towards other strategic priorities, a lack of accountability and expectations for completion of the initiative and inadequate availability of resources.

Enlist administrative leadership as sponsors to help remove or mitigate barriers

- Align readmission reduction efforts with strategic business priorities.
- Enlist a senior leader as a champion to advocate for the initiative.
- Enlist a senior leader to mitigate barriers and to provide adequate resources to support the improvement efforts.
- At least monthly, review processes, barriers and outcome measures with a senior leader.

Change not only the practice, but also the culture

- Promoting changes in cultures and practices can be very challenging. It's common for people to be reluctant to give up "what is comfortable" and replace it with "what is unknown." However, change is critical for quality improvement. Health care professionals may be more receptive to change if the process is framed in a way that highlights the benefits for patients and providers. Suggestions include:
  - > Keep the patient "front and center." Show the expected benefits of the change.
  - > Unite and motivate staff around the aim. Use respected champions in a breadth of professions to advocate for the change and demonstrate the benefits of new processes and collaborative implementation.
- Another cultural shift that promotes positive outcomes is the transition from a paternal approach, in which patients are told what to do, to a patient-centered approach, wherein patients play pivotal roles in their care. For example, some clinicians would be unfamiliar with asking patients why they believe they needed to return to the hospital or validating the patients' understanding of educational information. Explaining the value of patient engagement will be helpful to shift towards a more positive, empowering culture.
- Readmission reduction work often includes the need to partner with both clinical and non-clinical members of the community. An excellent first step is to look beyond the walls of the hospital and bring community partners together to collaborate.

PART 4: CONCLUSION & YOUR NEXT STEPS

Reducing preventable readmissions decreases stress for patients and their families. By understanding proven strategies to improve care transitions and implementing them in accordance with the needs of your patients unplanned readmissions can be reduced saving patients and families countless burdens. Hospitals should state their aim to reduce readmissions and resource their effort to do so. Organizational plans to reduce readmissions should be informed by data, and evaluated and modified as needed to ensure their effectiveness.

PART 5: APPENDICES

APPENDIX I: TOP TEN CHECKLIST

Associated Hospital/Organization: AHA/HRET HEN 2.0

Purpose of Tool: A checklist to review current, or initiate new interventions to prevent avoidable readmissions in your facility.

Reference: www.hret-hen.org

Preventable Readmissions Top 10 Checklist

Process Change	In Place	Not Done	Will Adopt	Notes (Responsible And By When?)
Enhanced admission assessment of discharge needs and begin discharge planning on admission. Formal assessment of risk of readmission—align interventions to patient's needs and risk-stratification level.	☐	☐	☐	
Accurate medication reconciliation at admission, at any change in level of care and at discharge.	☐	☐	☐	
Patient education—be culturally sensitive; incorporate health literacy concepts; include information on diagnosis and symptom management, medication and post-discharge care needs.	☐	☐	☐	
Identify primary caregiver, if not the patient, and include in education and discharge planning.	☐	☐	☐	
Use teach-back to validate patient and caregiver's understanding.	☐	☐	☐	
Send discharge summary and after-hospital care plan to PCP within 24 to 48 hours of discharge.	☐	☐	☐	
Collaborate with post-acute care and community based providers including SNFs, rehabilitation facilities, long-term acute care hospitals, home care agencies, palliative care teams, hospice, medical homes and pharmacist.	☐	☐	☐	
Before discharge, schedule follow-up medical appointments and post-discharge tests/labs.	☐	☐	☐	
For patients without a PCP work with health plans, Medicaid agencies and other safety net programs to identify and link patient to a PCP.	☐	☐	☐	
Conduct post-discharge follow-up calls within 48 hours of discharge; reinforce components of after-hospital care plan using teach-back; and identify any unmet needs such as access to medication, transportation to follow-up appointments, etc.	☐	☐	☐	

APPENDIX II: SAMPLE VALIDATED READMISSION RISK ASSESSMENT TOOLS

a. Associated Hospital/Organization: Project Boost

Purpose of Tool: The Project BOOST 8P tool contains risk-specific interventions aligned with the assessment. The best results will be achieved when implementing the entire tool and not only the screening criteria.

Reference: www.hospitalmedicine.org/ResourceRoomRedesign/RR_CareTransitions/html_CC/06Boost/03_Assessment.cfm

	Risk Assessment: 8Ps Screening Tool *Check all that apply*
☐	Problem medications + (anti-coagulants, insulin, oral hypoglycemic agents, aspirin and Clopidogrel dual therapy, Digoxin, narcotics)
☐	Psychological + (depression screen positive or history of depression diagnosis)
☐	Principal diagnosis + (cancer, stroke, Diabetes Mellitus, COPD, heart failure)
☐	Polypharmacy + (> 5 or more routine meds)
☐	Poor health literacy + (inability to do Teach-back)
☐	Patient support + (absence of a care provider to assist with discharge and home care)
☐	Prior hospitalization + (non-elective; in last 6 months)
☐	Palliative care + (Would you be surprised if this patient died in the next year? Does this patient have an advanced or progressive serious illness?)

b. Associated Hospital/Organization: Modified Lace Tool

Purpose of Tool: The Modified Lace Tool scores a patient on four variables with a final score predictive of readmission within 30 days.

Reference: http://www.mtpin.org/docs/Utilization%20Review/LACE%20Nursing%20instruction%20modified.pdf

NURSING: Readmission Alert Discharge Plan

Instructions: Place behind the Medication Reconciliation Form in the chart.

1) Assess Prior Admit: by reviewing old chart, obtain history from patient/family/caregiver and/or checking OC system. If patient was discharged 30 days or less prior to present admission than score previous admission for **L** (Length of Stay), **A** (Acute Admission), **C** (Comorbidity) and **E** (Emergency Room Visits past 6 months). Check ❑ Prior admission at the top of page one and enter LACE score.

2) Assess Present Admit: by a projected **L**ength of Stay of 3 days (3 points), **A**cute Admission, **C**omorbidity and **E**R Visits. Check ❑ Present admission at the top of page one and enter projected Lace score for 3 days LOS, 4-6 days LOS and 7-13 days LOS

MODIFIED LACE TOOL

Attribute	Value	Points	Prior Admit	Present Admit
Length of Stay	Less 1 day	0		
	1 day	1		
	2 days	2		
	3 days	3		
	4-6 days	4		
	7-13 days	5		
	14 or more days	6		
Acute Admission	Inpatient	3		
	Observation	0		
Comorbidity **(Comorbidity points are cumulative to a maximum of 6 points)**	No prior history	0		
	DM no complications, Cerebrovascular disease, Hx of MI, PVD, PUD,	1		
	Mild liver disease, DM with end organ damage, CHF, COPD, Leukemia, lymphoma, any tumor, cancer, or moderate to severe renal disease,	2		
	Dementia or connective tissue disease	3		
	Moderate or severe liver disease or HIV infection	4		
	Metastatic cancer	6		
Emergency Room visits during the previous 6 months	0 visits	0		
	1 visits	1		
	2 visits	2		
	3 visits	3		
	4 or more visits	4		
	Take the sum of the points and enter the totals ➔			

c. **Associated Hospital/Organization:** Transitional Care Model (TCM): Hospital Discharge Screening Criteria for High-Risk Older Adults

Purpose of Tool: The TCM provides comprehensive in-hospital planning and home follow-up for chronically ill, high-risk older adults hospitalized for common medical and surgical conditions.

Reference: http://www.avoidreadmissions.com/wwwroot/userfiles/documents/50/tcm-overview-protocol-and-assessments.pdf

Transitional Care Model

SCREENING CRITERIA & RISK ASSESSMENT

Are the following statements true for the patient:

- ☐ Admitted to hospital within the last 24-48 hours?
- ☐ 65 years of age or older?
- ☐ English speaking?
- ☐ Reachable by telephone?
- ☐ Alert and cognitively intact? (see Instruments, SPMSQ >6)
- ☐ Documented history of a primary cardiovascular, respiratory, endocrine, or orthopedic health problem?
- ☐ Does not have end-stage renal disease?
- ☐ Does not have primary neurological diagnosis?
- ☐ Does not have major psychiatric illness?
- ☐ Does not have a primary diagnosis of cancer?
- ☐ Lives within 30 miles of the admitted facility?
- ☐ Returning home after discharge (SNF/rehab stay < 3 weeks)?

If yes to all of the above, does the patient have two (or more) of the following risk factors:

- ☐ Age 80 or older
- ☐ Moderate to severe functional deficits
- ☐ History of mental/emotional illness
- ☐ Four or more active co-existing health conditions
- ☐ Six or more prescribed medications
- ☐ Two or more hospitalizations within past 6 months
- ☐ Hospitalization in the past 30 days
- ☐ Inadequate support system
- ☐ "Poor" self-rating of health
- ☐ Documented history of non-adherence to therapeutic regimen

PATIENT DATA

Patient data is collected from patients, caregivers (as identified by the patient), or medical records, including:

- sociodemographics
- caregiver involvement and availability
- physical data
- general health status
- severity of illness
- illness specific data
- number of prescribed daily medications
- health resources (utilization activity prior to hospitalization)

www.transitionalcare.info

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