

Best Practice Brief

Strategies for Successful Care Transitions When care transitions are not handled well, adverse events are more likely to occur, including falls, infections, and medication errors.¹ As a result, healthcare organizations are exploring ways to enhance care transitions, not only to improve patient health outcomes and experiences, but also to reduce costs associated with unnecessary readmissions and expensive health services.^{2,3} This brief presents five strategies to consider in planning any care transition improvement efforts.

Strategy 1

Enhance discharge processes.

Support the development of a personalized discharge plan to ensure the provision of adequate post-discharge services.² Early discharge planning can help reduce readmission risk, hospital length of stay, and mortality risk.^{4,5}



- Begin discharge planning soon after admission.²
- Determine the best care site for discharge (eg, home, skilled nursing facility), taking into account the patient's medical condition, functional abilities, and social issues (eg, available support at home).²
- Provide a discharge summary to all providers who will care for the patient after discharge. The summary should cover the patient's condition at discharge, outcome of hospitalization, follow-up plans, and other information critical for aftercare.²
- Give patients written discharge information that uses the appropriate language and literacy level. Review the information with the patient, family and caregiver, including any important instructions that the patient needs to care for him or herself.²

Case Examples

Applying an established discharge improvement process. After adopting the Re-Engineered Discharge (RED) Toolkit, Penn Medicine Chester County Hospital saw its average heart failure readmission rate decrease to 14%–16%, which is significantly below the national average. Patient experience scores also improved. Staff implemented several RED toolkit elements, including planning for discharge on the day of admission, making follow-up appointments for patients, and developing an electronic version of RED's After Hospital Care Plan.⁶

Planning for potential discharge delays. At Nemours Children's Hospital, nurses on the medical-surgical unit ask patients and parents easy-to-answer questions (eg, "Is your medical equipment working?") to uncover challenges they might face after discharge. The nurses ask these simple questions within two hours of a child being admitted to the unit, and responses are documented in the patient's record and discussed during interdisciplinary rounds. As a result, overstay days on the unit decreased from an average of 1.04 days in 2017 to 0.69 days in December 2018.^{7,8}

Identify patients at risk of hospital readmission and arrange for needed services and supports to ensure effective care transitions.^{2,9,10}

A number of clinical, behavioral, and socioeconomic factors are associated with an increased risk for poor care transitions including:¹¹

- · High number of admissions and/or inappropriate use of health care resources
- Polypharmacy and/or poor medication adherence
- · Multiple comorbidities and/or 2+ chronic conditions
- Cognitive or functional impairments
- Behavioral health issues
- Significant unmet social needs

Various screening tools have been developed to help predict a patient's readmission risk, from acuity-based tools (eg, the four-item LACE Index) that assess a relatively small number of risk factors to predictive data analytic models based on machine learning algorithms, such as the Baltimore score (B score), that sort through thousands of variables available in the electronic health record (EHR).^{2,10}

Conduct a comprehensive assessment of the patient, their family, and caregivers to gain a better understanding of specific needs and identify the services and supports that can best help following discharge.^{2,9}

Case Examples

Implementing a readmission risk screening tool. UnityPoint Health reduced its all-cause readmission rate by 40% in 18 months using a homegrown predictive analytics model that calculates a patient's risk of readmission. In addition to determining a patient's overall 30-day readmission risk, the model assigns the patient a risk score for each day of the 30-day post-discharge period. This data allows care teams to easily see what days post-discharge will be most risky for a particular patient and determine how to effectively intervene to prevent a readmission.^{12,13}



Providing patients with targeted support post-discharge. When inpatients at ProMedica are identified as being food insecure, they are given a day's worth of dietician-designed meals when they are discharged, as well as information on local food pantries, soup kitchens, and other food-related resources. They are also assigned to a social worker to further discuss their food and financial stability. ProMedica uses a two-question screening tool, known as the Hunger Vital Sign[™] to help identify food insecure patients. Patient responses to the survey are integrated into the inpatient admission database.¹⁴

Carefully review patients' drug regimens at admission, discharge, and transfer to identify omissions, duplications, or inaccuracies.¹⁵

Develop a standardized process for conducting medication reconciliation. Specify the roles and responsibilities of each discipline involved (eg, nurses, pharmacists, physicians). Integrate the process into the workflow (eg, send reminders to clinicians via EHR prompts).¹⁶



More on Medication Reconciliation

Effective medication reconciliation generally includes compiling a full medication history on admission of both prescribed and non-prescribed medications, using information from all available sources, including the patient, family/caregivers, community pharmacies, past medical records, and other providers. This is then documented in a single location within the medical record that is used by and accessible to all providers.¹⁶

It is essential to confirm the list with the patient or caregiver¹⁵ and to compare (reconcile) the admission orders against the medication history list to ensure there are no unintended differences. Any unintended discrepancies discovered during medication reconciliation should be discussed with the patient's physician and any resulting changes should be documented.¹⁶

If the patient is transferred from one unit to another during hospitalization, the medications the patient is receiving in the sending unit are reviewed and updated accordingly to reflect the patient's treatment plan. A review of the medications the patient was taking prior to admission should also be done to assess if they are still applicable or not for the receiving unit or new care setting (ie, to assess if a home medication held upon admission is now appropriate and could be restarted in the new care setting).¹⁶



In preparing for discharge, it is important to compare the current medication orders to the list of medications the patient was on prior to admission. This reconciliation and assessment helps form the patient's discharge medication list.¹⁶

Before the patient leaves, they should be informed of any changes, additions, or deletions that were made to the medications they were taking prior to admission and the discharge medication list should be communicated to the next care provider (eg, the primary care practitioner).¹⁶

Case Examples

Making a commitment to improving the medication reconciliation process. A pharmacy-led admission medication reconciliation program at a 432-bed hospital utilized pharmacy technicians in a medication history role which included gathering patient information and documenting it in the patient medication history profile. The program was led by a pharmacist who managed the technicians, rectified drug therapy issues (e.g., duplications, omissions), proposed guideline-driven therapies, solved medication adherence barriers, and collaborated with providers to reconcile medication lists. Measures for the program included patient outcomes, workforce productivity, and interdisciplinary healthcare team satisfaction. During the program implementation period 6,530 admission medication histories were completed. Comparing the study periods of August 2018 – February 2019 (pre-program implementation) and August 2019 – February 2020 (postprogram implementation), the adverse drug event (ADE) rate decreased 49% and the complication rate decreased 29.3%. Nurse, pharmacist, and physician groups all reported a significant increase in satisfaction scores as measured by a health care professional satisfaction survey, with most respondents agreeing or strongly agreeing that the program had a positive impact. They credited the program with reducing medication errors, creating a comprehensive and accurate medication list, and conserving nurse and provider time.¹⁷

Implementing a post-discharge medication reconciliation program. An insurer-driven care transition program reduced the relative risk of readmission within 30 days of discharge by 50% among health plan members who participated in a medication reconciliation consultation following hospital discharge. The pharmacist had access to the members' preadmission and post-discharge medication lists and reached out to providers to simplify and clarify members' drug regimens. During the consultations with members, the pharmacist also provided advice about adherence. The pharmacists met face-to-face with members at high risk of readmission and via phone with members at medium risk. This approach contributed to the program's cost-effectiveness.¹⁸



Collaborate and share accountability to ensure effective hand-offs with other care sites and providers.

Both the sending and receiving care providers are responsible for the exchange of all essential information about the patient.^{9,19}



Connect the patient with needed follow-up care, whether that be primary care, post-acute care, or other needed services. Make follow-up appointments, referrals, and other arrangements.⁹

Communicate essential patient information to patients, receiving care sites, and providers as appropriate. This can include:¹¹

- · Diagnosis, comorbidities, any chronic conditions
- Medications, adherence history
- Polypharmacy, opioid/substance abuse
- Labs/other tests
- Appointments
- · Cognitive/functional impairments
- · Behavioral health issues

Share information electronically when possible.11

Confirm that the receiver has received the information (eg, via an automated acknowledgement of receipt).¹¹

Provide warm hand-offs, which involve two members of the health care team exchanging information about the patient while the patient is present.¹⁹



Case Examples



Maximizing opportunities for collaboration. Duke Health has established a collaborative network of skilled nursing facilities (SNFs) to help ensure high-quality, coordinated care for patients discharged to a SNF. To join the collaborative, SNFs must agree to connect to Duke's EHR via a special portal for affiliated providers so they can easily access patient information electronically. To improve post-acute care across the network, Duke also requires that partner SNFs participate in quality improvement projects and share key performance data.²⁰

Establishing a Transitions Clinic. To reduce adverse outcomes during the transitional period, Brigham Health, an academic medical center in Boston, established a transitions clinic to address needs that require post-discharge follow-up and to ensure timely follow-up care with a primary care physician (PCP). The clinic is meant for patients with medical and/or social needs (ie, access to housing or food) that must be addressed prior to establishment of PCP care or their next available appointment with an existing PCP. The transitions clinic employs one full-time nurse care coordinator and one full-time medical assistant and is staffed by one PCP or nurse practitioner each weekday afternoon. Patients are referred to a permanent PCP within the clinic and are seen as often as necessary until PCP care is established.

The program was evaluated 1-year after its establishment from January 20, 2019, to January 19, 2020. During this time, the clinic received 498 patient referrals with the most referrals coming from the emergency department (ED) (73.2%) and inpatient setting (23.3%). A total of 403 patients interacted with the transitions clinic in some capacity (eg, phone call with the nurse care coordinator, appointment scheduled but patient did not attend). Two hundred seven (41.5%) patients were ultimately seen in the transitions clinic. Patients were seen a median 4 days after discharge compared to a median 41 days for patients referred to Brigham Health Primary Care upon discharge between January 20, 2018, and January 19, 2019. In the 3 months after their referral, patients seen at the transitions clinic also had significantly fewer ED visits than those in the comparison group. In addition, patients seen in the transitions clinic had significantly fewer ED visits than those in the comparison post-referral than they did in the 3 months prior to the referral.²¹



Actively engage patients and their families in the discharge planning process to help make care transitions safe and effective.³

At admission it is important to identify who will be the patient's caregiver after the transition to home, and to inform and educate the patient and family about the discharge process. Utilizing a white board can facilitate communication by allowing the patient and family to record any questions or concerns they may have.³

Throughout the stay it is crucial to treat patients and families as partners and involve them in discharge planning.³ This includes listening to and honoring the patient's and family's concerns, goals, and preferences.³ Using the teach-back method to provide educational activities focused on teaching about the condition, medications and treatment regimen, can ensure that patients and families understand the condition and know when to seek care.³



Before discharge. Scheduling a discharge planning meeting with the patient and family can help to prepare them for the transition to home. This is the time to coordinate home-based care and equipment needs, schedule follow-up with other providers (eg, primary care, specialists, community organizations) as needed, and arrange for any post-discharge testing.^{3,9}

On the day of discharge. It is essential to assess how well the patient and family understand the patient's diagnosis, condition, and discharge instructions. This is also the time to review the reconciled medication list with the patient and family and to ensure that follow-up appointment times and the hospital contact information are well understood to help prevent problems after discharge.³

After discharge. Continuing to engage patients through post-discharge follow-up calls, home visits and telemonitoring (eg, equipment to monitor blood pressure, heart rate, weight, oxygen saturation) may help reduce emergency department visits and improve follow-up with post-hospital care providers. These kinds of post-discharge interventions can involve different members of the care team including the discharging clinician, a pharmacist, or a clinician from patient's primary care clinic.²

Case Examples

Improving the care experience with patient-centered discharge planning. Advocate Trinity Hospital saw its patient experience scores on the Consumer Assessment of Healthcare Providers and Systems (CAHPS®)ⁱ survey trend upward after piloting the IDEAL Discharge Planning model, which emphasizes involving patients and families in discharge planning. Nurses on the medical-surgical unit that piloted IDEAL also credited the approach with helping them become more cognizant of patients' post-discharge needs.³

Incorporating care management services into the post-discharge process. After several years of receiving penalties for high readmission rates under the Hospital Readmissions Reduction Program a network of hospitals and associated medical practices in New Jersey joined the CMS Medicare Shared Savings Program as an Accountable Care Organization and began to utilize transitional care management (TCM) as a strategy to improve care coordination. The TCM offering consisted of the following three components:²²

- Interactive contacts: These contacts require a health care provider to make at least 2 attempts to contact the patient or caregiver within 2 business days of discharge from an observation or an inpatient stay within a hospital or extended care facility. Contacts can be conducted telephonically, electronically (via portal or email) or face-to-face and must include a review of discharge information, medication reconciliation, needed follow-up on diagnostic tests and treatments, any needed arrangement for community resources, and scheduling a follow-up appointment with a community provider.
- Face-to-face visits: These visits must be conducted by a physician or other health practitioner and scheduled within 14 days of discharge.
- Non-face-to-face services: These services can be provided at any time during the 30-day period after discharge to ensure the patient receives necessary treatment, education, and support.

Medicare fee-for-service beneficiaries who received the TCM services had lower 30-day readmission rates (11.65%) compared to those who had a non-TCM PCP visit (15.20%) and those who had no physician visits (21.95%).²²



¹CAHPS® is a registered trademark of the Agency for Healthcare Research and Quality

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