An Introduction to Transitional Care, Polypharmacy and Health Literacy

Developed by Jennifer Heffernan MD
Outline

- Define transitional care
- Appreciate the impact of discharge quality and outcome on older patients, their caregivers and physicians who care for them
- Review interventions to improve transitional care
- Discuss how polypharmacy and health literacy affect the quality of transitional care
Outline

Avoiding pitfalls:

- Nursing home to hospital
- Hospital to home
- Hospital to another institution
Transitional Care

A set of actions designed to ensure the coordination and continuity of health care as patients transfer between different health care settings

Different Healthcare Settings

Different locations or different levels of care within the same location

- Hospitals
- Rehabilitation Facilities
- Assisted Living
- Long-Term Care
- Hospice
- Physician’s Offices
- Patient’s Home
Why does it matter?

- Patients get “lost in transition”
- Adverse events are common
- Medical errors are newsworthy
#1 IOM report
“To Err is Human”

- Extrapolated from 2 studies which found 2.9-3.7% rate of adverse events during hospital admission (53-58% preventable)
- Based on 33.6 million admissions → **44-98K deaths due to medical errors** (More than 8th leading cause of death)
- Defined types of errors as **diagnostic** (error or delay in dx), **therapeutic** (procedure, drug error), **preventive** (inadeq f/u), and other
- Included ADEs, surgical injuries, restraint injuries, falls, pressure ulcers
- *ALTHOUGH MOST INJURIES ARE MINOR, 1 in 10 RESULTS IN DEATH*
- Concluded that majority of errors due to system problem
Scope of Issue

Diamond Hospital admission = first of *multiple* care transitions for older patients

- At least 25% of hospitalized patients over 65 are D/Cd to another institution
- 12% D/C with home care services
- Of those transferred from hospital to rehab/SNF, *nearly 50% have 4 or more additional care transitions in next 12 mths.*

Diamond Multiple opportunities for miscommunication and insufficient care
Further emphasized problems with the system

- failure to translate knowledge into practice
- health care settings as “silos” of care

2001
Concluded at least 1.5 million preventable ADEs in US each year at cost of $3.5 billion/year

Equated to a hospitalized pt being subjected to 1 or more medication errors each day

*Defined **medication errors** as errors in procuring, prescribing, dispensing, administering and monitoring a patient’s response

Occurs most often in prescribing and administering stages

Hospital setting is most studied

*Doesn’t include errors of omission e.g. failing to prescribe a beta blocker

2006
How often do transitions occur?

- After hip fracture pts underwent an average of 3.5 “relocations”

- Medicare beneficiaries see a median of 2 PCPs and 5 specialists yearly!

- 33% changed their PCP every year
Show me the numbers

- Almost 1 in 5 patients suffers an adverse event during the transition from hospital to home
- 1/3 of adverse events are preventable
- 2/3 of adverse events are medication-related
  - Drugs for which require outpt monitoring to prevent acute toxicity account for >50% of hospitalizations in those age >65.
- 1/4 of patients are re-admitted to the hospital
Types of adverse events

- Medication-related
- Procedure-related
- Nosocomial infection
- Falls
- Other
What were the identified deficits in the system?

The most common deficit was poor communication

- Inadequate pt education
- Poor communication between pt and physician
- Poor communication between hospital and community providers
Other deficits that lead to system failure...

- Inadequate monitoring
- No emergency contact information
- Difficulty obtaining prescriptions
- Inadequate home services
- Delayed follow-up care
- Premature discharge
What are the key components of good transitional care?

- A comprehensive care plan
- Medication reconciliation
- Patient preparation
- Patient education
- Communication of the plan to receiving professionals
Medication Reconciliation

- How to do it
- When to do it

Why to do it: It’s not just about JCAHO!

- (Joint Commission on the Accreditation of Healthcare Organizations)
5 Steps to Constructing the Reconciled Medication List

1. Stop prophylaxis and prn meds if no longer indicated (eg, PPI, “sleepers”, SQ heparin)
2. If drug was changed to another in its class because of hospital formulary (not medical indication), change back to previous drug
3. Indicate all new, stopped or changed drugs
4. Provide prescriptions for all new or changed drugs
5. For SNF/rehab D/C: all IV meds & unusual abx need to be called to facility the day before D/C; otherwise could be delay in care
Data on Discharge Summaries:

JAMA 2007 review of communication deficits between hospital physicians revealed critical information missing from discharge summaries:

- Responsible hospital MD (Missing 25%)
- Main diagnosis (17.5%)
- Discharge medications (21%)
- Specific follow-up plans (14%)
- Diagnostic test results (38%)
- Tests pending at discharge (65%!!!!)
- Counseling provided to patients or families (91%)

Kripalani et al. JAMA 2007;297:831-841
“Side Effects” of Poor Transitional Care

- Inappropriate plan
- Conflicting recommendations
- Incorrect medication regimen
- Inadequate follow-up
- Insufficient patient education
- Patient frustration and dissatisfaction
- Increased health care utilization
Challenges to Improving Transitional Care

- Lack of provider awareness/familiarity
- Multiple “isolated” providers
- Unprepared patients
Challenges Continued

- Isolated institutions
- Lack of financial incentives to collaborate
Interventions work!

- Can be patient or provider centered
- Involve a team approach!
- Decrease readmission rates
- Decrease costs
- Decrease mortality

One intervention for CHF pts results in a 30% reduction in mortality and re-admission—
EQUAL TO EFFECT OF BEING ON A BETA BLOCKER!!!!

News you can use...

How can you ensure a safe transition?

- Decrease polypharmacy
- Assess health literacy
Polypharmacy

- 73% of seniors with chronic illnesses take 5+ medications daily

Causes
Complications
Interventions
Causes of Polypharmacy

- chronic conditions
- multiple symptoms (prescribing cascade)
- multiple providers
- multiple pharmacies
- multiple routes of administration
Complications of Polypharmacy

- ADEs
- non-adherence
- increased costs
Interventions for Polypharmacy

**Patient:**
- one pharmacy, updated list, inform PMD of changes, throw away outdated meds, avoid sharing meds

**Physician:**
- use each encounter/admission as opportunity to decrease polypharmacy, ask about adherence, know which medications are “inappropriate,” education re: changes/names/side effects/instructions
Medication Non-Adherence

Study of seniors with chronic illness:

- 20% skipped doses or stopped a med b/c of side effects
- 20% stopped meds they believed were not helping
- 25% did not fill a Rx due to cost
- Age itself is not predictive of non-adherence (#of medications is!)
Health Literacy

- 50% of US adults lack the reading and numerical skills necessary to understand and act on health information.

What can you do?
What can you do?

- Assess literacy skills – educational level is not sufficient
- Pay attention to behaviors that suggest limited literacy
- AVOID MEDICAL JARGON
- Use pictures
- Ask pts to demonstrate understanding “PLEASE SHOW ME HOW YOU WOULD TAKE THESE PILLS”
- Education materials should be at 6th grade reading level
How can a complete discharge summary improve transitional care?

Use the d/c summary to communicate the care plan to the patient and next providers:

- Complete list of diagnoses
- Succinct hospital course
- Relevant labs and test results
- Complete list of medications
- Allergies
- Diet and activity instructions
- Clear follow-up instructions (including f/u labs!)
- Warning signs and sx
Avoiding pitfalls:

- Nursing home to hospital
- Hospital to home
- Hospital to another institution
Medical Errors

This report says medical errors such as indecipherable prescriptions cause the deaths of 98 patients a year, or is that 98,000? It's hard to read this. In any case, we're supposed to report this, or is that repeat them?

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Patient Should Arrive From the Nursing Home With:

- Chief Complaint or HPI
  - is the observation that made the nurse request transfer: will be in nursing talk “alteration of mental status”
- Advance Directive: may be separate sheet
- Baseline Functional Status
- Face sheet
  - NH phone number
  - Next of Kin contact information
  - Name and phone number of PCP
- Current MAR; diagnoses at bottom of page will not be prioritized or even current.
- Recent labs: unlikely but can request in the a.m.
Frequent Fumbles:
Transfer From NH to Hospital

- Patient rerouted to nearest hospital
- No records available.
- Patient unable to give history.
- Transfer ordered by “covering” physician not PCP
- Pressure to transfer high acuity residents
- Illegible transfer sheets.
- Incomplete or outdated information.
- NH nurse doesn’t know resident (shift change, RN turn over ~100%/yr).
- HIPAA confusion
Communicate with the Nursing Home

Let your fingers do the walking:

Day shift nurse for baseline:
- FAX MDS?
- PCP for
  - additional history
  - prognostic information
  - give heads up on discharge. It is appreciated.

DON
- if trouble locating above
- if any major change in status in hospital. They do care.
TRANSITIONS FROM THE HOSPITAL

• Should aim to maximize the chance that patients will maintain the benefits of hospitalization

• Can reduce the risk of early readmission and the use of emergency services

• Ideally begins at admission, with a projection of medical, nursing, rehabilitative, and functional support required at the time of discharge
TRANSITION TO HOME

Communicate the following to patients or their caregivers:

- Follow-up appointments
- Warning symptoms or signs to watch for, with instructions on whom to contact
- Clinical disciplines (e.g., nursing, physical therapy) contracted for care in the home
- Reconciled medication list, with clarification of which pre-hospital medications are to be continued
TRANSITION TO ANOTHER INSTITUTION

• Orient the patient to the nature of the institution, the identity of the new attending physician, and the expected frequency of physician visits

• Promptly send a discharge summary that includes:
  - Summary of hospital course with care provided
  - List of problems and diagnoses
  - Baseline physical functional status
  - Baseline cognitive status
  - Medication list (with termination dates for time-limited drugs)
  - Allergies
  - Test results still outstanding
  - Follow-up appointment
  - Goals and preferences
  - Advance directives
“Once you’ve seen one nursing home you’ve seen one nursing home.” – Jim Webster, MD
Hospital Discharge Critical Pathway
Can this patient go home?

1. Patient walks & performs ADL’s without assistance (direct observation)?
2. Willing & able caregiver at home?
3. Required medical treatment covered by outpatient insurance, e.g. IV?
4. Has > 1 daily skilled nursing requirement, i.e. wound care, trach, drains, Foleys, PICC lines, suctioning, IV, injections?
5. Hospitalized for FTT, unsafe at home, dementia, psychiatric or physical frailty?
6. Hospice appropriate & no home caregiver?
Critical Pathway

If NO to Q. 1-3

Can these supports be brought into the home long enough, often enough and soon enough to make discharge safe?

- IF NO: Discuss NH transfer: See qualifying stay.

IF YES to Q. 4

Is the patient medically stable to continue treatment at a non-acute facility?
Medicare Qualifying Stay

- **72 hours acute stay: 3 midnights.**
  - Clock starts with admission to floor not arrival in ER.

- **Medicare qualifying diagnosis**
  - (SNF or rehab)

- **Within 30 days of DC after qualifying stay**
  - Can go home for a trial if unsure. If they fail, can still go directly to NH with Medicare coverage.)

- **NOTE:** Hospital discharge before 3 midnights
  - Days are not cumulative. NHP would require a second 72 hour hospital stay. $$$$?
<table>
<thead>
<tr>
<th></th>
<th>Acute Rehabilitation</th>
<th>Subacute Rehabilitation / Skilled Nursing Facility</th>
<th>Long-term care</th>
</tr>
</thead>
<tbody>
<tr>
<td>Therapy - availability</td>
<td>5-7 days/week</td>
<td>3-5 days/week</td>
<td>1-3 days/week</td>
</tr>
<tr>
<td>Therapy - intensity</td>
<td>3-5 hours/day</td>
<td>1-3 hours/day</td>
<td>0.5-1 hour/day</td>
</tr>
<tr>
<td>Length of stay</td>
<td>7-14 days</td>
<td>21 days</td>
<td>indefinite</td>
</tr>
<tr>
<td>MD-visits</td>
<td>daily</td>
<td>1-3 times/week</td>
<td>once per month</td>
</tr>
<tr>
<td>Nursing assessments every 8 hours</td>
<td>required</td>
<td>optional</td>
<td>optional</td>
</tr>
</tbody>
</table>
Critical Pathway: Discharge
What is the goal of NH care for this patient?

- Complete prolonged course of treatment
  - Can it be provided in another setting?
- Recovery of previous level of function
  - Is this realistic? Is return home likely or not?
- Rehab
  - Consult OT, PT on admission!
  - Failure to progress in rehab Medicare will stop; self-pay will kick in. About a 10 day grace period.*
- *Respite
  - Giving an exhausted caregiver a break may deflect future social admissions.
Critical Pathway
Medically stable for NH transfer if

Could cruise on your discharge orders for up to 48 hrs. May not be seen by MD for 48-72 hrs.
Will be seen by MD generally 48-72 hrs, 5 days, 14 days then monthly.
Has been hemodynamically stable on present medical management ≥ 24 hrs.
Can tolerate a possible 24 hr lapse in medication.
Does not require telemetry, daily or stat labs.
If “no” or “not sure” to any of the above:

- Consider delaying discharge a day or two
- Evaluate for chronic hospital (e.g. “vent unit, LTAC.”)
- Call the DON of the NH you are considering to discuss whether THIS facility is ready for this patient. Yourself.
- Include your med-surg floor RN in this discussion.
Medication Errors

Most are unintentional discontinuations.

Up to 36% of discharges in one series had a potentially dangerous transcription error.

Code status

Hospital code status remains the same after NH transfer 49% if the physicians talk to each other. Otherwise 9%.

Frequent Fumbles
Transition From Hospital to NH

- Late discharges to evening shift nurse who has 50 patients
- On-call MD does not know patient
- Transfer sheet illegible or incorrect
- Misspellings, wrong doses (decimal slide)
- No active problem list or goals of therapy
- Sparse, poor quality or no records
Frequent Fumbles
Transition From Hospital to NH

- Not sending MD name or pager
- Discharging RN gone, chart off the floor
- Hospital refuses to provide records “HIPAA”
- Inappropriate orders (“Wean dopamine drip.”)
- Unstable conditions (Foley dc’d on the way to the elevator, no trial of voiding, no record of this in transfer.)
- Prn’s, especially analgesics should be scheduled.
Transfer Don’ts

“Sugar coat” the information to the patient or family about “sub-acute rehab.”
- Sub-acute rehab is a nursing home.

Expect the NH physician to “optimize” an unstable condition: “Titrate CPAP to RR.”

Expect stat labs; NH STAT = 24 hrs.

Expect > 2/d IVPB, IV push, IV drip or wean anything except at a “chronic acute” facility.
- “We tried to wean her for 11 days so my attending thought she would do better with a slow taper in a subacute....”
Transfer Do's

- Encourage family to visit LTCF before transfer.

- As early in day as possible...write orders day before anticipated discharge. If >1 major change, reconsider.

- Senior team member reviews discharge sheet:
  - LEGIBLE, prioritized diagnoses.
  - Legible CURRENT orders.
  - Legible name & pager of MD, nursing unit.
  - Advance directives.
  - Flag conditions to be monitored.
  - Order and flag labs needed within 3 days.
  - Avoid IV; Change to p.o. if possible. If IV necessary, provide secure PICC access.
Transfer Do’s

- Copy the whole chart AND send the dictation when available.

- Remove unused IV, PICC, Foley etc.

- Call DON ahead on drugs that cannot be late; special equipment (e.g. CPAP)
Poorly managed transitions of care cause

- Poor patient care
- Increased morbidity and mortality
- Further disruption in continuity of care
- Higher individual and system costs
- Angry patients, angry families
- Poor relationships between institutions and professionals
Summary

Improving the complex process of transitional care will require a multi-factorial approach including changes in the:

- Health Care Delivery System
- Technology
- Health Policy
- Research
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