ESTABLISHING A CULTURE OF MOBILITY IN THE HOSPITAL SETTING...THE CLINICIAN’S TOOLBOX

Combined Sections Meeting 2016

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Cleveland Clinic

Cleveland Clinic Rehab and Sports Therapy

- Therapy Locations
  - Cleveland Clinic Main Campus and 8 regional hospitals
    - 100 IRF beds
    - 65 SNF beds
    - 3,277 Acute care beds
    - 47 Outpatient locations

- Rehab Team
  - 350 Physical Therapists
    - 100 PTA’s
    - 135 OT’s
    - 25 COTA’s
    - 35 SLP
    - 15 Audiologists
    - 50 ATC’s
Description

Healthcare reform has reinforced the need to transform service models to focus on value by emphasizing efficiency and efficacy. This need for system re-design, culture change and the call for innovation presents an opportunity to overcome the long-standing challenges faced implementing an interdisciplinary mobility program as a standard of care.

In this educational session, we will build on the 2014 and 2015 CSM discussion will examine opportunities, strategies and tactics to position, implement, and evaluate interdisciplinary mobility initiatives in the hospital setting.
Where is the opportunity?

Transform service models to make us more effective and efficient.
System re-design and culture change
Implement patient reported outcomes to begin the culture change around patient mobility

Objectives

- Examine specific strategies to leverage organization health care reform initiatives to drive interdisciplinary mobility.
- Discuss strategies to initiate, conduct, and evaluate an interdisciplinary mobility model.
- Detail practical tools and strategies to promote adoption of new interdisciplinary, patient, and family roles and responsibilities to maximize culture change.
- Discuss practical strategies to measure implementation success.

So where are we now..

- Last year we talked about
  - 10 Critical Components of Creating a Culture of Mobility in the Hospital Setting
  - Value and Waste
  - The Systematic Use of Data
  - How Rehabilitation Departments Create Value

Let's review..................
Critical Components to Success

- Be able to clearly articulate to all members of the team the benefits of mobility and harmful affects of immobility while the patient is in the hospital setting.

- Identify opportunities to integrate “Culture of Mobility” concepts within existing hospital initiatives (e.g. LOS, ICU, readmissions)

- Physician and nursing support – Identify engaged physician and nurse champions with influence over practice with their peer groups

Critical Components to Success

- Identify barriers to implementation

- Assess workflow and hardwire operations and accountability

- Have a good understanding of your baseline metrics. What do you want to achieve – have data to support it.

- Develop an Education and Training Strategy

Institute for Healthcare Improvement
Triple Aim

Improve patient experience
Improve the health of populations
Reduce health care costs

www.ihi.org
What does this mean to us

- We used data from a validated tool to give us information about patients mobility
- We used that information to drive CULTURE change in our organization
Our Journey at the Cleveland Clinic

Uniform data Collection

Use information from large uniform data sets to make decisions

Use of 6 clicks Data

Discharge Recs

Improve patient mobility

Guide therapist resource utilization

What is 6 Clicks?

• Short form of the AM-PAC (Activity Measure for Post Acute Care)
  • Patient Reported Outcome Tool
  • 25 years in development
  • Validated across all levels of care
  • 269 items – 3 domains
  • Can be shortened, and answered by surrogates
• Used in Acute Hospital
• PT/OT complete 6 Clicks for every patient at Every visit
6 Clicks

6 Clicks - On evaluation and every follow up visit each discipline completes a functional measure assessment.

PT evaluates the patient's abilities in:
1. Turning over in bed
2. Supine to sit
3. Bed to chair
4. Sit to stand
5. Walk in room
6. 3-5 steps with a rail

OT evaluates the patient's abilities in:
1. Feeding
2. O/F hygiene
3. Dressing Uppers
4. Dressing Lower
5. Toilet (toilet, urinal, bedpan)
6. Bathing (wash/rinse/dry)

| Scale: 1= Unable (Total Assist) | 2= A Lot (Mod/Max Assist) | 3= A Little (Min Assist/Supervision) | 4= None (Independent) |

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### Physical Therapy 6 Clicks Documentation in EPIC

<table>
<thead>
<tr>
<th>6 Clicks</th>
<th>0100</th>
<th>Last/First Value</th>
</tr>
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<tbody>
<tr>
<td>Difficulty Turning Over In Bed</td>
<td>2-A Little</td>
<td>3-A Little</td>
</tr>
<tr>
<td>Difficulty Lying On Back To Sitting</td>
<td>3-A Little</td>
<td>3-A Little</td>
</tr>
<tr>
<td>Help From Another Person Moving To And From Bed To Chair</td>
<td>3-A Little</td>
<td>3-A Little</td>
</tr>
<tr>
<td>Difficulty Sitting Down And Standing Up From Chair With Arms</td>
<td>2-A List</td>
<td>3-A Little</td>
</tr>
<tr>
<td>Help From Another Person To Work In Hospital Room</td>
<td>2-A List</td>
<td>2-A List</td>
</tr>
<tr>
<td>Help From Another Person Climbing 3-5 Steps With A Rail</td>
<td>2-A List</td>
<td>3-A List</td>
</tr>
<tr>
<td>PT 6 Clicks Score</td>
<td>10</td>
<td>11 (calculable)</td>
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### Occupational Therapy 6 Clicks Documentation in EPIC

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<th>6 Clicks</th>
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<tbody>
<tr>
<td>Help From Another Person Eating Meals</td>
<td>3-A Little</td>
<td>3-A Little</td>
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<td>Help From Another Person Taking Care Of Personal Grooming</td>
<td>2-A List</td>
<td>2-A List</td>
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<tr>
<td>Help From Another Person To Put On/Take Off Upper Body Clothing</td>
<td>3-A Little</td>
<td>3-A Little</td>
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<td>Help From Another Person To Put On/Take Off Lower Body Clothing</td>
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<td>2-A List</td>
</tr>
<tr>
<td>Help From Another Person Toileting</td>
<td>2-A List</td>
<td>2-A List</td>
</tr>
<tr>
<td>Help From Another Person Bathing</td>
<td>2-A List</td>
<td>2-A List</td>
</tr>
<tr>
<td>OT 6 Clicks Score</td>
<td>15</td>
<td>15 (calculable)</td>
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</table>
How does Cleveland Clinic use 6 Clicks data to demonstrate value and improve functional mobility of our patients?
Value Opportunities

- Decrease inappropriate consults “24’s”
- Increase awareness of the importance of patient mobility
- Increase therapy provided in critical care units

Value Based Results

- Repurposing of therapist from “24’s” to lower functioning patients allowed us to increase therapy activity in ICU by 40%

- Ability to get to the right patient and improvement in therapist productivity resulted in a 24% decrease cost/visit.
Precertification Challenges

Therapy staff perception is that the number of precertification requests are increasing

Current State: Therapy staff is requested to see a patient specifically for purposes or precertification

- The patient may or may not have a planned visit that day

Preliminary Precert Metrics

Initiative:
- Measure the number of precertification requests define the operational impact
- Verify the value contributed by these visits

3930 PT and OT visits between October 7th and Jan 24th 2016

<table>
<thead>
<tr>
<th>Main</th>
<th>FV</th>
<th>MM</th>
<th>HC</th>
<th>SP</th>
<th>EU</th>
<th>LW</th>
<th>MED</th>
<th>LU</th>
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<td>672</td>
<td>528</td>
<td>528</td>
<td>506</td>
<td>176</td>
<td>119</td>
<td>79</td>
<td>55</td>
</tr>
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</table>
Next Steps

• Working with Health System leadership, Connected Care Partners and Payers to leverage the therapist discharge recommendation combined with the 6-Clicks score to facilitate patient admission to post-acute care without additional precertification visits.

CATALYST FOR CHANGE

ANNETTE LAVEZZA, OTR/L
Experience in the Intensive Care Unit
Critical Care Rehabilitation Quality Improvement Project 2007

Shown decrease in:

- Medical ICU (MICU) days in patients with benzodiazepine and narcotic use and improved delirium status.
- Average length of stay in the MICU (4.9 vs. 7.0 days) and hospital (14.1 vs. 17.2) compared to the prior year.


If we can mobilize people in the ICU why can’t we throughout the hospital?

Mobility is important but how important?
Who is responsible for mobility?

All members of the health care team

Who is the “Right” provider to mobilize patients?

ENGAGING ALL TEAM MEMBERS
Therapists as consultants

- Daily attendance at Care Coordination Rounds
- Expectation that therapy engage in the discussion of mobility on ALL patients

Education on Tools

- What do the numbers mean?
- When is it OK to redirect consults?
- Does independence on measure mean no therapy after discharge?

Therapist Expectations in Rounds

- Facilitation of activity and mobility reporting
- Proactive questions
- Alignment of need with appropriate providers
- Education on activity and mobility strategies
Patient and Caregiver

- Video on admission
- Scripting for nursing during admission process
- Patient/family “clearance” to walk with patients
- Use of volunteers

Patient and Caregiver

- Goals written on board on room for patient
- Activity calendars

Providers

Vital Signs
MOVING TO THE BEDSIDE

Barriers to Early Mobility

• Similar concerns for community and academic hospital staff
• Newer staff perceived greater barriers to mobilizing patients
• Nurses perceived greater barriers to mobilizing patients compared to rehabilitation therapists


Attitudes and Beliefs Survey

• Knowledge
  — I have received training on how to safely mobilize my inpatient:

Training

- Unit based superusers
  - Review mobility techniques with therapy
- Train other nurses
  - Nurse to nurse training
- Use resources provided by therapy
  Created power point with pictures on proper placement for movement

Equipment

- Basic unit equipment
- Exercise supplies

Attitudes and Beliefs Survey

- Attitudes
  - My inpatients are NOT too sick to be mobilized.
  - Increasing the frequency of mobilizing my inpatients DOES NOT increase my risk for injury.
  - I DO feel confident in my ability to mobilize my inpatients.
  - I believe that my inpatients who are mobilized at least three times daily will have better outcomes.
  - I AM sure when it is safe to mobilize my inpatients.

Why is promoting activity and mobility in the hospital important?

For Patients
Most hospitalized patients currently spend most of their time in bed.
Lower levels of physical fitness are directly associated with all-cause mortality and increased complications.
Affects patient’s ability to perform activities of daily living and basic needs.
- Can affect a patient’s dignity.

Why is promoting activity and mobility in the hospital important?

Body Systems:
- psychosocial (depression)
- respiratory (hypostatic pneumonia)
- cardiovascular (orthostatic hypotension, thrombus)
- musculoskeletal (atrophy and contractures)
- urinary elimination (infection and dehydration)
- bowel elimination (constipation and dehydration)
- metabolic (fluid and electrolyte imbalance)

Attitudes and Beliefs Survey

- Behavior
  - Inpatients who can be mobilized usually have appropriate physician orders to do so.
  - I DO have time to mobilize my inpatients during my shift/work day.
  - Nurse-to-patient staffing is adequate to mobilize inpatients on my unit(s).
  - My departmental leadership is very supportive of patient mobilization.
  - We HAVE the proper equipment and/or furnishings to mobilize my inpatients.
  - My inpatients are NOT resistant to being mobilized.

Perception of More Work

- Solicit and share patient care experiences
- Have champions from successful units provide feedback
- Share data supporting positive outcomes for patients

COMMON TOOLS FOR COMMUNICATION

- PT/OT G-Codes
- Care Coordination: Readmissions
- AKI-PAC
- CMS CCP for Discharge
- Orders and Protocols
- Meaningful Use
- EMR Transition
Nursing

- JHH HLM
  - 2xs per day during waking hours
- AMPAC Inpatient Daily Activity and Mobility
  - On Admission
  - Mon, Wed and Fri

Therapy

- JHH HLM
  - Every therapy touch
- AMPAC Inpatient Mobility
  - Every PT session
- AMPAC Inpatient Daily Activity
  - Every OT session

EDUCATION, EDUCATION, EDUCATION

Understand the Tools
• Listen carefully to the questions and customize education to address

• Learn how other disciplines are educated at your facility

• Partner with nurse educators

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Development of Education

• Use of case studies

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• Consider Rehab referral and/or establish mobility plan
  – 10 point change in AMPAC t-score or stage change
  – 3 day change in JH-HLM
• AM-PAC raw score 22-24 considering canceling PT/OT consults
• AM-PAC raw score less than 17 consider placement
Culture of Mobility
Passing the Torch
Practical Solutions

February 20, 2016
Karen Green PT, DPT

Manage Perception vs. Reality

NOT

Pick Your Partners

• Physician Champions
• Nursing Champions
• Administrative / Project Management
  – Find people that share the vision and have the authority to push it
• Don’t give up!
Where We Started

• Executive Leadership
• Small Workgroup
  — Physicians
  — Nurse Leaders
  — Therapy Leaders
  — Front line nurses / educators

Where We Started

• Order to Consult

<table>
<thead>
<tr>
<th>Field</th>
<th>Answer</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Does the patient currently have an order for therapy to prevent progression?</td>
<td>Yes</td>
</tr>
<tr>
<td>2. Reason for referral to Physical Therapy</td>
<td>Unusual mobility due to nursing or Primary Service</td>
</tr>
<tr>
<td>3. Has NURSING or PRIMARY SERVICE attempted the order?</td>
<td>Yes</td>
</tr>
<tr>
<td>4. Enter weight-bearing status</td>
<td></td>
</tr>
<tr>
<td>5. Condition for Release of Order</td>
<td></td>
</tr>
</tbody>
</table>

Where We Started

• Hands – On Nurse Training
  — Culture of Mobility Classes
    • Minimal Didactic Information
    • Focus on demonstration and practice
    • Comprehensive handout
    • Follow-up on the unit to assist with specific patients
Where We Started

- Culture of Mobility Classes
Where We Started

- Culture of Mobility Classes
  - Use a standard template but don’t be afraid to tweak it

Where We Went

From training current nurses

To training new nurses

Nurse Residency Program

Where We Went

From Drivers of Mobility

To Consultant for Nursing Mobility Care Path

Mobility Care Path
Where We Went
From Looking for Partners

To Continuing the Conversation

Safe Patient Handling Committee
Falls Committees
Patient Education
Lessons Learned

A river cuts a rock not because of its power but its persistence.

Friend a Nurse!

VALUE AND FUNCTION

MICHAEL FRIEDMAN, PT, MBA
The Value Equation

"Achieving high value for patients must become the overarching goal of health care delivery, with value defined as the health outcomes achieved per dollar spent." — Michael Porter, PhD Harvard Business School

Value = Outcome / Cost


Examples of Waste

- Failure of care delivery
  - poor execution
  - lack of widespread adoption of best practice resulting in patient injuries, worse clinical outcomes, and higher costs. (e.g. hospital acquired complications)
- Failures of care coordination
  - care that is disjointed (e.g. handoffs, discharge plans)
  - unnecessary hospital readmissions, avoidable complications, and declines in functional status, especially for the chronically ill.
- Overtreatment
  - care that is rooted in outmoded habits, that is driven by providers' preferences
  - unnecessary tests or diagnostic procedures to guard against liability
  - use of higher-priced services that have negligible or no health benefits over less-expensive alternatives

Why is promoting activity and mobility important?

Body Systems:
- Cardiovascular: orthostatic hypotension, thrombus
- Musculoskeletal: atrophy and contractures
- Urinary elimination: infection and dehydration
- Bowel elimination: constipation and dehydration
- Respiratory: hypostatic pneumonia
- Integumentary: pressure ulcers
- Metabolic: fluid and electrolyte imbalance
- Psychosocial: depression

The Catalyst...
Critical Care Rehabilitation Quality Improvement Project 2008

- Shown decrease in:
  - Average length of stay in the MICU (4.9 vs. 7.0 days) and hospital (14.1 vs. 17.2) compared to the prior year.

Potential Benefits to Hospital

Why so many empty MICU beds?
patients are awake and moving, patients are better

Versus same 4-month period in 2006:
• 20% increase in MICU admissions
• 10% reduction in hospital mortality
• 30% (2.1 day) reduction in MICU LOS
• 18% (3.1 day) reduction in hosp LOS

For details on ICU Financial Modeling see:

Readmission of Medicine Patients

- Patients with lower function (measured by Functional Independence Measure) upon admission at in-patient rehab:
  - JHH had 2.6 times increased odds of readmission (n=1515)
  - GSH had 3.0 times increased odds of readmission (n=9405)


Investment in Pre-habilitation

Variable incremental cost of a general surgery readmitted patient:
Outcomes of 12 month, Early Mobility QI Project - LOS

- LOS was reduced by 0.40 days for all patients
- Patients with Expected LOS >7 days had LOS reduced by 1.11 days.
- Patients with longer ELOS patients had significantly reduced LOS compared to control medicine units (unpublished data).

Association between JH-HLM and Daily Call bells

- This graph shows that for patients with an average JH-HLM score of ≥3 during their hospitalization, patient’s who are more mobile press their call bell less.
- Notable jump when patient’s are on average ambulating (JH-HLM score of ≥6)
- Patients with scores averaging 1 or 2 are very impaired, which is why they press call bell less often.
Nurse AM-PAC Assessment to Reduce Therapy Consults for Adult Neurology/Stroke Pts with No Impairments

<table>
<thead>
<tr>
<th>Time Period</th>
<th>Initial PT/OT AMPAC %</th>
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<tbody>
<tr>
<td>Baseline (1/1/14-6/30/14)</td>
<td>13.8%</td>
</tr>
<tr>
<td>FY2015 Q1</td>
<td>13.3%</td>
</tr>
<tr>
<td>FY2015 Q2</td>
<td>12.6%</td>
</tr>
<tr>
<td>FY2015 Q3</td>
<td>8.4%</td>
</tr>
<tr>
<td>FY2015 Q4</td>
<td>6.6%</td>
</tr>
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</table>

Number of OT/PT visits per patient stay increased from 3.8 to 4.6 per patient hospitalization.

Percent of Initial OT/PT visits for AMPAC 21-23 reduced from 12.4% to 10.8%

INTERDISCIPLINARY FUNCTIONAL MEASUREMENT STRATEGY

PERSPECTIVE

Standardizing Patient Outcomes Measurement
Michael E. Pieter, Ph.D., M.B.A., Stefan Lasser, M.D., Ph.D., and Thomas H. Lee, M.D.
Functional Reconciliation Vision: Interdisciplinary Awareness of Immobility Risk

The comparison of a patient's functional ability prior to hospitalization with their current status.

Function as a Vital Sign


Translating Research into Practice (TRIP)
The Dys-Functional Assessment Puzzle

Functional Assessment Strategy – Tool Selection

- Interdisciplinary
- Documentation efficiency
  - EMR design
  - Regulatory requirements
- Meaningful across settings
- Meaningful across initiatives
- Composite and specific measures
  - Meaningful clinical difference
  - Ceiling and floor
- Drive Intervention

JHH Functional Assessment Strategy – Execution

1. Workflow: Hospital-wide
   - Johns Hopkins – Highest Level of Mobility (JH-HLM) for Nursing
   - AM-PAC Inpatient Mobility and Activity Scales (6 Clicks)
     - Nursing (frequency under re-evaluation)
     - PT and OT (every visit)
   - Interdisciplinary diagnosis specific measures
   - Population specific workflows for outliers
     - [OB/GYN, Psychiatry, Inpatient Rehab, Pediatrics]
2. System Architecture:
   - Collect: Electronic data entry as part of the EMR
   - Aggregate: Data System Infrastructure design and build
   - Display: Reports
3. Identify Patients at Mobility Risk and implement interdisciplinary mobility plan
4. Policy: "Interdisciplinary Functional Assessment"
Johns Hopkins Highest Level of Mobility (JH-HLM)

<table>
<thead>
<tr>
<th>Activity</th>
<th>Score</th>
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<tbody>
<tr>
<td>WALK 25+ FEET</td>
<td>8</td>
</tr>
<tr>
<td>WALK 25+ FEET</td>
<td>7</td>
</tr>
<tr>
<td>WALK 10+ STEPS</td>
<td>6</td>
</tr>
<tr>
<td>STAND 1 MINUTE</td>
<td>5</td>
</tr>
<tr>
<td>CHAIR TRANSFER</td>
<td>4</td>
</tr>
<tr>
<td>BED SIT AT EDGE</td>
<td>3</td>
</tr>
<tr>
<td>BED TURN SELF / ACTIVITY</td>
<td>2</td>
</tr>
<tr>
<td>BED LYING</td>
<td>1</td>
</tr>
</tbody>
</table>

Score 106

Patient with poor outcome

Contact Johns Hopkins Medicine for permissions and instructions for use.

Integrate Communication
- Interdisciplinary Care Coordination
- Nursing Report
- MD Rounds
- EPIC Implementation
  - JH-HLM for PT and OT
  - JH-HLM goals
  - JH-HLM activity orders and protocols
- AM-PAC discharge Planning
confirm if built for OT

Mike Friedman, 1/29/2016
CURRENT WORK - HOPKINS

Ongoing Projects at Johns Hopkins

• Activity and Mobility Promotion (AMP) bundle across JHM
• Scientific Inquiry
• Reliability, Feasibility, and Validity
• Value based outcomes
• Creating daily mobility goals for patients
• Surveillance of functional decline
  • Ambulatory (Primary Care, Surgery, and Oncology)
• Homecare
• Surgery Pre-habilitation
• Wearable Devices
• Pediatrics
  • AMP Bundle development
  • AMPAC short form development

Feasibility – Nursing time to mobilize patients by AMPAC
Patient Daily Mobility Goal

Activity and Mobility Program

Adjusted Association between % of Pt Days Reaching Mobility Goals, and LOS

For pts who reach daily mobility goal >30% of during hospitalization, we see progressive decrease in LOS.

Every 10 point increase in compliance to reach daily mobility goal associated with 0.3 reduced LOS.

Analysis adjusted for Age, Gender, Race, Payer, Comorbidity Count, UHC Expected LOS, and Admission AMPAC Score.

Analysis for patients with Expected LOS > 3 days.

Adjusted Association between % of Pt Days Reaching Mobility Goals, and Readmissions

For pts who reach daily mobility goal >30% of during hospitalization, we see progressive decrease in Readmissions.

Analysis adjusted for Age, Gender, Race, Payer, Comorbidity Count, APR-DRG SOI Readmissions in MD, and Admission AMPAC Score.

Analysis for patients with Expected LOS > 3 days.
"In the middle of difficulty lies opportunity."
~ Albert Einstein

Questions & Contacts
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