How to Perform a Prevalence Study for Pressure Injuries
August 22, 2017
Prevalence Studies for Pressure Ulcer/Injury

• Hosted by FHA Mission to Care HIIN
  — Presenter: Jackie Conrad RN, BSN, MBA, RCC
    Improvement Advisor, Cynosure Health
  — Facilitated by Phyllis Byles, RN, BSN, MHSM, BC-NEA
    Improvement Advisor, Florida Hospital Association

• August 22, 2017
Agenda

• Welcome and Introduction
• Current Data Results for Pressure Ulcers/Injuries
• Presentation
• Q & A - Next Steps for your hospital
• Upcoming Events
• Evaluation and Nursing Continuing Education
• DON’T FORGET-SOAP UP!
Pressure Ulcer Rate, Stage 3+

Source: Comprehensive Data System, August 17, 2017
Pressure Ulcer Prevalence, Stage 2+

Source: Comprehensive Data System, August 17, 2017
Resources Available

- HRET-HIIN.org
  - Change package
  - Checklist
  - Past P/U/I webinars
  - Additional Resources
  - Jackie Conrad-slides, upcoming needs assessment, remote coaching
HAPI Prevalence studies:
*why they are important and how to do them*

Jackie Conrad RN, MBA
Improvement Advisor, Cynosure Health
August 22, 1017
Pressure Ulcer MAGNITUDE

• 2.5 million individuals impacted every year in USA

• 6 year study 2200 US Hospitals conducted in 2004 (Whittington)
  – Pressure Ulcer (PrU) Prevalence Rates- 16%
  – PrU Incidence Rates – 7%

• 10 year International Pressure Ulcer Prevalence Survey:
  – Overall US prevalence decreased from 13.5% (2006) to 9.3% (2015)
  – US Acute care prevalence decreased from 6.4% (2006) to 2.9% (2015)


International Pressure Ulcer Prevalence Study 2015
Pressure ulcer costs

- 2001 estimated average hospital cost to treat stage III or > was $38,000 to $55,000.
- PfP estimates of the difference in hospital costs comparing those with and without a pressure ulcer are $15,394 for Medicare and $40,000 for non-Medicare.
- CMS Cost Averted Analysis for HfH: each pressure injury prevented saves $17,000

Pressure ulcer impact on lives

- Pain
- Emotional distress
Reimbursement changes

• 2007 CMS Payment withheld for PrU treatment if the wound was acquired during the hospital stay.
  
  – Admitting provider must document a stage III or IV as POA for the hospital to be reimbursed for the treatment interventions.
  
  – Although the provider must document, it is typically the nurse that inspects the skin.
Terminology

incidence

prevalence
**Incidence** describes the number or percent of patients developing a new PrI in your facility

- Can be underreported
- Reliance on documentation
- Small hospitals will have higher rates

**RATE**

\[ N = \# \text{ pts with new HAPI} \]

\[ D = \# \text{ pt admissions} \]

http://www.ahrq.gov/professionals/systems/hospital/pressureulcertoolkit/putool5.html
How reliable is reporting?

• In a review of 2012 Medicare Data:
  – Among transfers with a POA PI reported, only 34% had a PI documented at the prior facility
  – Consistency of pressure injury documentation across interfacility transfers

• Allnurses.com, June, 2015 posting: “…that’s a heck of a lot of paperwork….do any other facilities fill out incident report for pressure ulcers? Does that even make sense?”
Prevalence

- **Prevalence** describes the number or percent of patients having a pressure ulcer at a single point in time.
- Best measure of the burden of care when providing for care and prevention measures.
  - \( N \) = # of patients with stage II or greater (POA excluded)
  - \( D \) = # of patients assessed on the day of the study
What’s best?

• AHRQ and NPUAP guidelines:
  – Incidence is best
  – Prevalence is reliable snapshot in time
  – Both methods have their drawbacks

• NDNQI reporting for national comparisons
  – Monthly rates can be determined for comparisons.
What can prevalencing do for you?

- Hardwire accurate staging
- Connect with staff
- Assure timely admission skin assessments and daily risk assessments
- Assess implementation of skin care prevention protocols
- Assess ongoing orientation changes
- Improve professionalism of caregivers with pro-active approach
- Gateway “drug” for professional advancement of staff
- What gets measured gets done!
- Ongoing preoccupation with high level care—everyone notices!
- “An ounce of prevention......”
Quotes from a Skin Team

• What we do:
  – Check for pressure ulcers
  – Answer questions regarding other skin and wounds
  – Help to facilitate interventions and consults as needed
  – Serve as extra hands during the busy hours of a shift
  – Discuss prophylaxis interventions and or treatments with bedside RN
  – Complete hand checks on patients with air overlays

• What we like:
  – Learn about new products and how they work
  – Discuss in terms of skin things that are improving and provide insight to areas of concern.
  – Discuss the reaction of other staff members and efficacy issues with any new products
  – The process of being a proactive resource rather than just reactive
  – Teaching other staff members about products, the how, why, and when for each use.
  – Becoming more knowledgeable in skin as a bedside RN
Quotes from a Skin Team

• Why it works:
  – We are a close group in this size hospital setting
  – We enjoy the work, look forward to the process
  – The audit becomes both a reflection of interventions and care outcomes
  – Important discussions occur that change outcomes and processes
  – It feels good to be valued and contribute
## Pressure Injury Prevalence Measure

### Hospital-Acquired Pressure Ulcer Prevalence, Stage 2+

<table>
<thead>
<tr>
<th>Pressure Ulcer/Injury: CMS Evaluation Measure (NQF 0201)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Measure type</strong></td>
</tr>
<tr>
<td><strong>Numerator</strong></td>
</tr>
<tr>
<td><strong>Denominator</strong></td>
</tr>
<tr>
<td><strong>Rate calculation</strong></td>
</tr>
<tr>
<td><strong>Specifications/definitions</strong></td>
</tr>
<tr>
<td><strong>Sources/Recommendations</strong></td>
</tr>
<tr>
<td><strong>NHSN data transfer</strong></td>
</tr>
</tbody>
</table>

**Baseline period**  
Preferred: Calendar year 2014  
Alternate: Oldest 12-, 9-, 6-, or 3-month consecutive period prior to Oct 2016  
*If measure not tracked prior to HIIN, report monthly as early as possible beginning with October 2016.*

**Monitoring period**  
Preferred: Monthly, beginning Oct 2016  
Alternate: Quarterly, beginning with 4Q 2016 (report in last month of each quarter)

<table>
<thead>
<tr>
<th>HIIN CDS Measure ID(s)</th>
<th>HIIN-PrU-2</th>
</tr>
</thead>
<tbody>
<tr>
<td>AHA/HRET HEN 2.0</td>
<td>HEN2-PrU-2</td>
</tr>
</tbody>
</table>
# Prevalence Data Tips

## Hospital Acquired Pressure Ulcer Prevalence, Stage 2+ NQF0201 (HIIN-PrU-2)

<table>
<thead>
<tr>
<th>Numerator</th>
<th>Number of patients that have at least one stage 2 hospital acquired pressure ulcer/injury, unstageable and/or deep tissue injury on the day of the prevalence study. Tip – Count patients, not number of ulcers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Denominator</td>
<td>Number of patients surveyed on the day of the study</td>
</tr>
</tbody>
</table>
| Numerator Inclusion | Medical, Surgical, Step-Down, Med-Surg combined, and Intensive Care units  
Patients aged 18 years and older |
| Numerator Exclusion | Ulcers/injuries present on admission  
Patients refusing assessment  
Patients who are off the unit at the time of the study (x-ray, therapy)  
Medically unstable patients or those for whom assessment is contraindicated  
Patients who are actively dying and pressure ulcer prevention is no longer a treatment goal  
Moisture associated skin damage  
Skin Tears  
Venous or arterial stasis ulcers  
Mucosal membrane ulcers |
| Data Sources | Prevalence study observations |
| Frequently Asked Questions | Q: Are unstageable pressure ulcers included in the numerator?  
A: Yes  
Q: We usually collect this data quarterly. Do we have to report this data monthly?  
A: Hospitals are strongly encouraged to report pressure ulcer prevalence monthly.  
Preferred: Monthly, beginning Oct 2016  
Alternate: Quarterly, beginning with 4Q 2016 (report in last month of each quarter) |
Prevalence Party!
Getting Started – Who?

• Assign a coordinator
• Determine who will conduct the study
  – Team approach
  – Combination front line and exempt nurses
• Preventing bias
  – Assign team from another unit
The Team

• 2 observers
  – 1 lead individual specially trained or certified in wound care
    • CNS, Educator, WOCN
    • Unit manager or staff nurse champion
  – 1 individual to assist with turning
    • Staff nurse wound champion
    • Staff nurse orientee
    • Unlicensed staff

• 1 chart auditor, documenter (ideal, can be optional)
Training the Team

NDNQI® Pressure Ulcer Training
Module 1 Home Page Outline:

- Module Home
  - Pressure Ulcer Definition
  - General Staging Information
  - Category/Stage I Pressure Ulcers
  - Category/Stage II Pressure Ulcers
  - Category/Stage III Pressure Ulcers
  - Category/Stage IV Pressure Ulcers
  - Unstageable Pressure Ulcers
  - Suspected Deep Tissue Injury
  - Pressure Ulcer Location
  - Medical Device Related Pressure Ulcers
  - Mucosal Pressure Ulcers
  - Pressure Ulcer Healing
  - Pressure Ulcer Staging Test

Welcome to Module 1
Pressure Ulcers and Staging

https://members.nursingquality.org/NDNQIPressureUlcerTraining/Module1/Default.aspx
Pressure Ulcer Staging Test

Question 1
Reddened area over the left heel does not blanch with lightly applied pressure.
No underlying area of purple or maroon discoloration is noted.

Correct! The answer is: Category/Stage I

Please make a selection
- Category/Stage I
- Category/Stage II
- Category/Stage III
- Category/Stage IV
- Unstageable/Unclassified
- Suspected Deep Tissue Injury

Question 2
This 78 year old patient has a pressure ulcer on the right heel.
Eschar and slough cover the wound bed.

Correct! The answer is: Unstageable/Unclassified

Please make a selection
- Category/Stage I
- Category/Stage II
- Category/Stage III
- Category/Stage IV
- Unstageable/Unclassified
- Suspected Deep Tissue Injury
<table>
<thead>
<tr>
<th>Stage 1</th>
<th>Stage 2</th>
<th>Stage 3</th>
<th>Stage 4</th>
<th>Unstageable</th>
<th>Deep tissue injury</th>
<th>Indeterminate or mucosal</th>
</tr>
</thead>
<tbody>
<tr>
<td>Think Tomato!</td>
<td>Think potato!</td>
<td>Think apple!</td>
<td>Think peach!</td>
<td>Think rotten peach!</td>
<td>Think eggplant!</td>
<td>Think seedless grape!</td>
</tr>
<tr>
<td>Doesn’t blanch and return to original color. Has an unusual feel.</td>
<td>Top layer of skin gone, but not too deep.</td>
<td>“Partial thickness loss of dermis presenting as a shallow open ulcer”.</td>
<td>Deep wound, open to core (bone, tendon).</td>
<td>You know it’s probably bad very deep, but you can’t see how deep or to where.</td>
<td>People are not supposed to be purple or have a bruised appearance!</td>
<td>No underlying structure to judge by but missing or damaged skin.</td>
</tr>
</tbody>
</table>
Study Procedure

• Pick a day to conduct the study each month
  – First Wednesday etc
  – All units should be surveyed on the same day
  – Pick a good day for staffing: orientees, students
Assess Each Patient on the Unit

- Inspect the skin of each patient from head to toe
- Look closely at all bony prominences
  - Peds and neonates, look at occiput
  - Visualize each heel using a handheld mirror
  - Palpate for temperature or consistency changes
- Examine the soft tissue under and around medical devices
- Assess the skin under skin folds in bariatric patients
Record Presence of Pressure Ulcers

- Skin Breakdown present on admission?
- If pressure ulcers are present:
  - Anatomical Location
  - Stage
  - Was this ulcer present on admission
Review the Chart

• Demographic data
  – Age
  – Gender

• Admission skin assessment and Pressure Ulcer Risk Assessment
  – Was initial skin assessment completed within the designated time period?
  – Was the risk assessment completed within the designated time frame
  – What was the risk assessment score?
  – Was risk reassessed daily?
Process Measure Observations

• For patients determined to be at risk, are interventions in place?
  – Positioning – turning, heels floated, HOB < 30
  – Support surface, bed not over padded
  – Moisture management
  – Nutritional support

• For patients with Medical Devices – are interventions in place?
  – Padding
  – Evidence of repositioning the device
# Hospital Acquired Pressure Ulcer Prevalence Study Data Collection Tool

**Hospital:**

**Unit & Type:**

**Date:**

**Unit census of day of study:**

**# of patients assessed:**

**Page:**

### Patient Identifiers

- PT ID: 22042
- Admit date: 1/12/16
- Age: 72
- Gender: m

### # of hospital acquired pressure ulcers at each stage

<table>
<thead>
<tr>
<th>Ulcer 1</th>
<th>#1 stage</th>
<th>2</th>
</tr>
</thead>
<tbody>
<tr>
<td>#1 location</td>
<td>L Heel</td>
<td></td>
</tr>
<tr>
<td>#1 POA?</td>
<td>N</td>
<td></td>
</tr>
<tr>
<td>Ulcer 2</td>
<td>#2 stage</td>
<td>3</td>
</tr>
<tr>
<td>#2 location</td>
<td>Sacrum</td>
<td></td>
</tr>
<tr>
<td>#2 POA?</td>
<td>Y</td>
<td></td>
</tr>
<tr>
<td>Ulcer 3</td>
<td>#3 stage</td>
<td></td>
</tr>
<tr>
<td>#3 location</td>
<td></td>
<td></td>
</tr>
<tr>
<td>#3 POA?</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

### Comments

See below

### Skin assessed upon admission

- y

### PU Risk assessment upon admit

- y

### Was pt identified to be at risk?

- y

### What was the risk score?

- 9

### Interventions (see key)

- Pt on a pressure redistribution surface: y
- Repositioning as prescribed: y
- Nutritional support: N
- Moisture Management: N

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**Part 1 Pressure Ulcer Staging Key:**

- Stage 1 U = Unstageable
- Stage 2 DTI = Suspected Deep Tissue Injury
- Stage 3 or greater plus U and DTI are reportable

**Part 2 Key:**

- y = yes
- n = no
- nr = no risk
- na = admit w/in 24 hours, not necessary for pt
- dc = documented contraindicated
- r = refused

### Pt ID

<table>
<thead>
<tr>
<th>Additional comments</th>
</tr>
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<tbody>
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<td></td>
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</tbody>
</table>

**Team members completing this tool:**

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Optimizing the Study Process

• Use the prevalence study to teach
  – Orientees, rotate staff to assist, use student nurses

• Use the prevalence study to assess practice
  – Observe for patterns
  – Select interventions to study

• Assess for other measures
  – Restraint prevalence
  – Environmental safety
  – Use of white boards
Benefits of PrU Prevalence Study

Patient level data + Care process data = Actionable information
Benefits of PrU Prevalence Study

• Structural process
  – Real time data collection & intervention
  – Staff involved – learning opportunity, use orientees, light duty

• Demonstrates commitment to HAPU and Teamwork
  – Leadership and staff partnership in monthly rounding team
    • Lead - Wound expert, trained RN, manager, educator
    • Support - Staff nurse or PCT to assist with positioning, turning
    • Recorder - Staff nurse, PCT or other ancillary staff

• Richness of data
  – Quantitative outcome and process measure data on ulcers, implementation of interventions
  – Qualitative data on staff skills, beliefs, abilities and barriers encountered in preventing pressure ulcers
Prevalence Study Costs are estimates based upon average US RN hourly rate

Advice for others

• Engage your team with education either by yourself or invite vendors in for education – nurses love to learn

• Do whatever you can to make sure they feel valued – because they are and their input and work is invaluable!
Resources

• NDNQI Pressure Ulcer Training [NDNQI Pressure Ulcer Training]

• Pressure Ulcer Prevention: prevalence and incidence in context
  [http://www.woundsinternational.com/media/issues/64/files/content_24.pdf]
Let’s Chat. What are your questions?

WE WANT TO HEAR FROM YOU!
Jackie Conrad RN, MBA, RCC™

Improvement Advisor
Cynosure Health
jconrad@cynosurehealth.org
UP Campaign: Hand Hygiene

CDI
CAUTI
SSI
VAE
CLABSI
Sepsis

SOAP-UP
<table>
<thead>
<tr>
<th>S</th>
<th>Scrub: for 20 seconds with the right product. Remember soap for <em>C. diff.</em></th>
</tr>
</thead>
<tbody>
<tr>
<td>O</td>
<td>Own: your role in preventing HAIs.</td>
</tr>
<tr>
<td>A</td>
<td>Address: immediately intervene if breach is observed.</td>
</tr>
<tr>
<td>P</td>
<td>Place: hand hygiene products in strategic locations.</td>
</tr>
<tr>
<td>-</td>
<td></td>
</tr>
<tr>
<td>U</td>
<td>Update: hand hygiene products and policies as needed to promote adherence.</td>
</tr>
<tr>
<td>P</td>
<td>Protect: patient and families, get them involved.</td>
</tr>
</tbody>
</table>
Upcoming Events

- **Aug. 24** – HRET HIIN ADE Opioid Safety Fishbowl
- **Sept. 7** – HRET HIIN Sepsis Virtual Event
- **Sept. 11** – HRET Informational Session for SNAP Sepsis
- **Sept. 12** – Chasing Zero Infections Webinar on Preventing Sepsis
- **Sept. 14** – HRET HIIN Reduce Readmissions Fishbowl
- **Sept. 18** – Readmissions Stakeholder Summit | Westin Lake Mary
- **Sept. 26** – TCAB Cohort 2 Nursing Unit Launch Meeting | Harry P. Leu Gardens, Orlando
- **Sept. 27** – TCAB Cohort 1 Mid-point Meeting | Orlando, FL
- **Sept. 28** – Sepsis Workshop | Orlando, FL
- **Nov. 7-8** – TeamSTEPPS Master Trainer Course | Vero Beach, FL (Sept. 28 Pre-meeting Informational Webinar)
- **Nov. 16** – Chasing Zero Infections Meeting | Davie, FL

Check your **MTC HIIN Upcoming Events** Weekly Email for details and registration
Register today at:
www.FHAAnnualMeeting.com
Eligibility for Nursing CEU requires submission of an evaluation survey for each participant requesting continuing education:

https://www.surveymonkey.com/r/PUI082217

Share this link with all of your participants if viewing today’s webinar as a group *(Survey closes Sept. 1)*

Be sure to include your contact information and Florida nursing license number

FHA will report 1.0 credit hour to CE Broker and a certificate will be sent via e-mail *(Please allow at least 2 weeks after the survey closes)*