Standardized Nursing Documentation Templates: Development, Deployment and Data

PAM PICKETT, RN-BC, MS
VHA OFFICE OF INFORMATICS AND ANALYTICS
NURSING DATA SERVICES TEAM
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Objectives

- Discuss the evolution of the VA Nursing Outcomes Database (VANOD)
- Describe the drivers and business rules for development of standardized clinical nursing documentation tools in the VA
- State the concepts behind the development, deployment and evaluation for the upcoming comprehensive Patient Assessment
Acknowledgments

- **Mimi Haberfelde RN-BC MS**
  - Nursing Informatics Specialist
  - VHA Office of Informatics and Analytics
  - Nursing Data Services Team

- **Alicia Levin RN, MS**
  - Nursing Informatics Specialist
  - Director Of Clinical Applications Development
  - VHA Office of Informatics and Analytics
About the VHA Network

- 8.15 million enrollees
- 152 Hospitals & Medical Centers
- 17,252 beds (average)
- 166,100 Admissions
- 958 Outpatient Clinics
- 134 Community Living Centers (Nursing Homes)
VHA Staff

- 308,070 VHA Employees
- 77,894 Nursing Employees
- Approximately 60,000 Direct Care Nursing Staff
- Nursing represents 25% of the VHA workforce

FY 2010
VANOD Annual Summary Report and VANOD Demographic and Financial Cube
What is VANOD?
(VA Nursing Outcomes Database)
Nursing Informatics Vision

- Front Line Nurses
  - Skills, tools & environment to support patient care

- Nurse Managers & Executives
  - Skills, tools & information to manage resources
  - Data needed to develop evidence for patient care & policy

- VACO & Program Offices
  - Information necessary to establish policy

- Researchers

Veteran
Business Rules

- **Data Entry** – minimal burden; integrated or transparent in the process of doing work. Minimize duplicate documentation
  - Provide front line nurses the tools to document their care at the point of service (Nationally standardized skin assessment and patient assessment templates)

- **Data Extraction** from the EHR – no manual data collection

- **National roll-up** of extracted data – no manual reporting

- **Timely**- data should be provided as close to ‘real time’ as possible

- **Start with the end in mind**
Development of Skin Risk Indicators

- First clinical indicator – required a new process
- Two nationally standardized nursing documentation templates – Initial & Reassessment
- Data content sources: VHA Handbook; IHI; Wound Care Nurse Workgroup
- Data successfully extracted - April 2008
- Data is available from January 2008 for all VHA Medical Centers
Template Deployment

- **Skin Templates:**
  - Initial Skin Assessment – completed within 24 hours of admission to acute care
  - Skin Reassessment – daily skin inspection section for all patients with LOS > 48 hours.
  - Reassessment template identifies previously documented pressure ulcers
The template provides a consistent skin risk tool and scoring for Braden and has hyperlinks for additional reference.
Tagged data elements from the assessment
Provides stages and definitions based on the NPUAP for consistent documentation of pressure ulcers.

For each stage, click on all pressure ulcer locations that apply.

- **Suspected Deep Tissue Injury**
  Purple or maroon localized area of discolored intact skin or tissue from pressure and/or shear. The area may be preceded or followed by a cooler area that may not have visible blanching; its color may differ from the surrounding skin.

- **Stage I**
  Intact skin with non-blanchable redness of a localized area may not have visible blanching; its color may differ from the surrounding skin.

- **Stage II**
  Partial thickness loss of dermis presenting as a shallow open ulcer with a red pink wound bed, without slough. May also present as an intact or open/ruptured serum-filled blister. *This stage should not be used to describe skin tears, tape burns, perineal dermatitis, maceration or excoriation. Bruising indicates suspected deep tissue injury.*

- **Stage III**
  Full thickness tissue loss. Subcutaneous fat may be visible but bone, tendon or muscle are not exposed. Slough may be present but does not obscure the depth of tissue loss. May include undermining and tunneling.

- **Stage IV**
  Full thickness tissue loss with exposed bone, tendon or muscle. Slough or eschar may be present on some parts of the wound bed. Often include undermining and tunneling.

- **Unstageable**
  Full thickness tissue loss in which the base of the ulcer is covered by slough (yellow, tan, gray, green or brown) and/or eschar (tan, brown or black) in the wound bed.

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How Are the Skin Data Obtained?

- Captured via tagged data elements from use of the nursing documentation templates (VANOD Skin Initial and Reassessment Templates were released to the field through Office of Information October ’07)
- Report updated by the second week of the month for the prior month’s discharged patients
- “Real Time” skin data reports currently in development
What Do the Skin Data Provide?

• Raw data that show the numerators and denominators for each indicator’s calculation
• Patient-level data for comparison to station results/numbers
• A tool for viewing local, VISN and VHA data extracted from the VANOD Skin templates
• A tool that supports indicator trouble-shooting and identifying local documentation or education issues
• At present, a way of gauging local performance
Initial Risk Assessment (Initial Assessment and Braden score) within 24 hours of Admission
(higher is better)

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</thead>
<tbody>
<tr>
<td>Assess-24 %</td>
<td>89%</td>
<td>90%</td>
<td>91%</td>
<td>91%</td>
<td>92%</td>
<td>92%</td>
<td>92%</td>
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<tr>
<td>Assess-24 Count</td>
<td>44,569</td>
<td>43,173</td>
<td>41,836</td>
<td>43,293</td>
<td>43,708</td>
<td>43,445</td>
<td>42,469</td>
<td>42,933</td>
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<tr>
<td>Discharges LOS 24 hrs or longer</td>
<td>50,009</td>
<td>47,874</td>
<td>46,170</td>
<td>47,614</td>
<td>47,665</td>
<td>47,456</td>
<td>46,284</td>
<td>46,593</td>
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</tbody>
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Assess-24: % of patients with an Initial Skin Risk Assessment (Initial Assessment and Braden score) recorded within 24 hrs of admission with a length of stay 24 hours or longer.
Hospital Acquired Pressure Ulcers Stage 2+ (lower is better)

<table>
<thead>
<tr>
<th>Month</th>
<th>HAPU 2 plus %</th>
<th>HAPU 2 plus Count</th>
<th>Discharges LOS 48 hrs or longer</th>
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<tbody>
<tr>
<td>March 2010</td>
<td>2%</td>
<td>873</td>
<td>40,534</td>
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<tr>
<td>April 2010</td>
<td>2%</td>
<td>891</td>
<td>38,268</td>
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<tr>
<td>May 2010</td>
<td>2%</td>
<td>797</td>
<td>37,042</td>
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<tr>
<td>June 2010</td>
<td>2%</td>
<td>769</td>
<td>38,418</td>
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<tr>
<td>July 2010</td>
<td>2%</td>
<td>827</td>
<td>38,172</td>
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<tr>
<td>August 2010</td>
<td>2%</td>
<td>769</td>
<td>38,543</td>
</tr>
<tr>
<td>September 2010</td>
<td>2%</td>
<td>734</td>
<td>37,183</td>
</tr>
<tr>
<td>October 2010</td>
<td>2%</td>
<td>734</td>
<td>37,183</td>
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</tbody>
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Note: Scale adjusted for illustration.

HAPU 2+: % of patients with hospital-acquired pressure ulcers (HAPU) Stage II and above with a length of stay 48 hours or longer.
Dr. Robert Petzel Department of Veteran’s Affairs Under Secretary for Health committed to transparency: “giving Americans the facts”

Aspirational goals identified

http://www.hospitalcompare.va.gov/
<table>
<thead>
<tr>
<th>Domains · Measures · Aspirational Goals</th>
<th>Aspirational Goals Met · click VISN (01 to 23) to expand</th>
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<tbody>
<tr>
<td></td>
<td>Avg.</td>
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<tr>
<td>Safety</td>
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<td>Healthcare associated infections</td>
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<td>MRSA infection rate</td>
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<td>Surgical Care Improvement Project</td>
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<td>Composite SCIP</td>
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<tr>
<td>Hospital acquired pressure ulcer rate</td>
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<tr>
<td>Effectiveness</td>
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<tr>
<td>Efficiency</td>
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<tr>
<td>Timeliness</td>
<td></td>
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<td>Patient-Centeredness</td>
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<tr>
<td>Equity</td>
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Are we there yet?

There are still challenges to overcome:

- Correction of erroneous entries
- Correct Staging / Identification of pressure ulcers
- “Real time” skin care reports designed to assist in daily workload management and to identify areas where incorrect staging may have occurred and may be corrected
- Differences in practice
- Workflow - pre-admission screening clinics
- Templates in use for 3+ years – posting on external web site has piqued interest of top leadership
- Changes / updates must be coordinated through the Office of Information Technology – lengthy review process
Patient Assessment Documentation Package

- Patient Admission Assessment
- Patient Reassessment
- Interdisciplinary Plan of Care Prototype
- End of Shift Report
Local Reports
Examples: Summary & Detail Display of Patients with:
1. MRSA Swabs
2. Admission Assessment done within X hrs
3. Skin risk assessment done within 24 hrs
4. Fall risk assessment done within 24 hrs
5. List of patients at risk for ..??

Extracted Data for National Reports

Key Data Elements from Patient Assessment, Reassessment & Care Plans

Embed in Files: Clinical Observations (CLiO), Health Factors, Vital Signs

Reassessment (Shift Note)
End of Shift Report
Care Plan
Patient Assessment

Vision
38 nurses from across VHA representing:
  - Multiple VISNs/facilities
  - Various nursing roles
    - Clinical Nurse Leaders
    - Nurse Executives
    - BCMA Coordinators
    - Clinical Nurse Specialists
    - Informatics Nurses
    - Educators
    - Researchers
    - Clinical Application Coordinators
  - Representatives from Data Standardization
Who Participated (continued)

- National representatives from other professional healthcare disciplines e.g. chaplaincy, social work, nutrition services, pharmacy etc.

- Representatives from other specialty groups/offices within the system e.g. pain nurses, MRSA coordinators, Office of Ethics, dialysis experts etc.

- Representatives from the technology arm (Information Systems) of the VA
Content Selection

- Licensing Body (e.g. Joint Commission) requirements
- VHA directives and policies/procedures
- Indicators determined to be “Nursing Sensitive” (Nursing Quality Forum) and captured by other nursing databases.
- Evidence based practice (what does current evidence in healthcare point to as best practices for patient care)
  - Assessment tools
  - National guidelines for care
  - Patient care interventions
Patient Admission Assessment

- Completed within 24 hours after admission to acute care (or sooner based on facility policy)

- Provides a clear comprehensive view of the patient as he/she arrives at the facility

- Pulls from administrative data for background information

- Assessment allows for problem identification and development of interventions - pulls forward into interdisciplinary care plan
Template contains tagged data elements that will be used for report development.
Where are we?

- Initial pilot testing completed at 25 sites representing large & small; urban & rural; teaching & non teaching; all regions of the country
- Enhancements / changes made based upon test site feedback
- Final “sign off” from the VA Office of Information Technology still pending
Implementation Challenges

- Diversity of current practices – workflow
- Potential for “double documentation” at sites using ICU flow sheet software
- Buy-in from multiple disciplines (Interdisciplinary Plan of Care)
- Technical support both locally and system wide (hardware, wireless infrastructure)
Looking to the future

- Systems that “share” data – background coded terms that capture data regardless of the tool

- Data available “real time” – for patient care and quality reporting
Summary

- Today we have discussed
  - the evolution of VA clinical nursing indicators data capture,
  - the creation and use of the VANOD Skin templates
  - the current effort to develop a comprehensive patient assessment tool for wider capture of electronic nursing data
Questions?