Developed by the BC Provincial Interprofessional Skin and Wound Committee in collaboration with Occupational Therapists, Physiotherapists & Wound Clinicians from: Provincial Health northern health Providence fraser health CoastalHealth Interior Health island health Retter health Rect in health care **Title** Procedure/Documentation: Braden Risk & Skin Assessment - Adults **Practice** Health care professionals in accordance with health authority/agency policy. Clients at risk for pressure injuries and moisture associated skin breakdown require an Level interprofessional approach to provide comprehensive, evidence-based assessment and treatment. This clinical guideline focuses on the interprofessional team providing client care. **Background** The Braden Risk Assessment Scale The Braden Scale has established validity and reliability and is a widely used risk assessment scale used in all care settings and for adult populations. Factors not included in the Braden Scale such as advanced age, hypotension, hemodynamic instability, fever, prolonged ICU stay, severity of illness, comorbid conditions such as diabetes mellitus, peripheral vascular disease, and obesity can increase pressure injury risk beyond the score indicated on the Braden Scale. The Braden Risk & Skin Assessment Flow Sheet (BRASFS) is used to document the client risk for developing skin breakdown/pressure injuries as well as determine the recommended interventions as per the Braden subscale. Total Braden Scale scores reflect the level of risk of developing a pressure injury. The total score assists in determining the: Preventive interventions and the Probability that a pressure injury will occur. Subscale Braden assist in determining the: Specific client problems or deficits that require further assessment and Specific preventive pressure injury interventions. The Braden Scale must be used in conjunction with a Head-to-Toe skin assessment when developing a plan for prevention and/or treatment of pressure injuries. This procedure has been developed to determine an adult client's risk developing a pressure injury. **Indications** for Use **Bookmarks Practice Level** Background Indications for Use Assessment and Documentation Determine Level of Pressure Injury Risk Interventions: Reassessment Schedule, Discharge Planning **Client Clinical Outcomes Quality Assurance Indicators Definitions** References/Bibliography **Document Creation/Review**

Guideline: Assessment and Treatment of Pressure Injuries in Adults & Children (2017 version pending)

Appendix A: Braden Risk & Skin Assessment Flow Sheet pg.1
Appendix B: Braden Risk & Skin Assessment Flow Sheet pg.2

Guideline: Prevention of Pressure Injury in Adults & Children 2017

Flow Sheet: Braden Risk & Skin Assessment Flow Sheet (BRSAFS)

Appendix C: Braden Scale Interventions Guide

E-Learning Module: Pressure Injury Prevention

Guide: Braden Scale Interventions Guide

Related

Documents

Assessment, Documentation and Determination of Level of Pressure Injury Risk

Assessment

- The Braden Scale is one part of an overall comprehensive client assessment that includes: (Link to Prevention DST)
 - a) Client concerns
 - b) Risk factors for skin breakdown
 - c) Head-to-Toe skin assessment
 - d) Pain assessment
 - e) Blood flow of the lower extremities
- 2. Complete the Braden Risk & Head-to-Toe Skin Assessment as per the schedule below:
 - a. Emergency Room: Upon admission.
 - b. ICU/CCU: As part of admission process, within 8 hours of admission.
 - c. Operating Room (OR): need to be knowledgeable of the pre-operative Braden Scale risk score
 - d. Acute Medical/Surgical Units: As part of admission process, within 8 hours of admission, and upon return from the OR.
 - e. Sub-Acute/Rehabilitation Units: As part of admission process, within 8 hours of admission.
 - f. Community Care (Clinic or Home): As part of admission process, within the first 2 visits.
 - g. Residential Care:
 - Within 24 hours of admission a Braden Scale Risk assessment must be completed to determine and communicate to the team immediate prevention strategies required for the client.^{62,67}
 - ii. The PURS will be completed as part of the overall admission MDS-RAI assessment.
- 3a. Complete the Braden Risk Assessment to determine the client's level of pressure injury risk.
 - a. Assess each of the 6 subscales by selecting the subscale descriptor that best describes the client's current condition (See Appendix A):
 - Subscale 1: Sensory Perception ability to respond meaningfully to pressure-related discomfort. Choices 1, 2, & 3 have *OR* statements. Score the client from 1 to 4.
 - Subscale 2: Moisture degree to which skin is exposed to moisture. Score the client from 1 to 4.
 - Subscale 3: Activity degree of physical activity. Score client from 1 to 4.
 - Subscale 4: Mobility ability to change and control body position. Score client 1 to 4.
 - Subscale 5: Nutrition usual food intake pattern. Choices 1, 2, & 3 have OR statements.
 Score the client 1 to 4.
 - Subscale 6: Friction/Shear friction occurs when skin moves against surfaces (i.e., heels on bed linens). Shear occurs when the skin and the underlying adjacent <u>bony</u> surface slide across one another (i.e., coccyx). Score client 1 to 3.
- 3b. Complete a **Head to Toe Skin Assessment**
 - a. Visualize the skin from head to toe, remove clothing as needed (including socks).
 - b. Assess bony prominences for evidence of blanchable or non-blanchable erythema, a deep tissue pressure injury, a known pressure injury, or that the skin is intact and healthy. Use finger pressure method to assess for blanching in areas with erythema.⁶⁰
 - c. Assess all large and deep skin folds, for maceration, inflammation and/or pressure damage resulting from increased tissue weight. Assess behind the neck, mid-back, under arms/breasts, under panniculus, buttocks, sacral and perineal areas, upper and lower thighs, knees, calves, elbows, ankles, and heels and other areas of high adipose tissue concentration.
 - d. Assess mucosal membranes for mucosal membrane pressure injury.
 - e. Assess for medical device related pressure injury by lifting medical devices such as tubes, masks, splints or braces to assess the underlying skin.

- f. Assess for evidence of candidiasis or bacterial infection.
- g. Assess for evidence of contact dermatitis (e.g., itching or burning in areas corresponding to a product, device, lotion, cream).
- h. Assess for changes in skin texture/turgor (e.g., dryness, thickness). Assess for changes in skin temperature (warmth) when compared to the surrounding skin (assess using back of fingers).
- i. Assess for consistency of any reddened areas, such as bogginess (soft) or induration (hard).
- j. Assess areas such as bruises or discolouration of the skin caused by blood leaking into the subcutaneous tissues, hematomas, blisters, excoriation or rashes.

4a. Document the Braden Risk Assessment

Document as per health authority/agency policy using one of the following:

- The Braden Risk & Skin Assessment Flow Sheet(BRSAFS) Page 1 (see <u>Appendix A)</u>, or
- The 24-hour Patient Care flow sheet the Braden Risk Assessment section,
- The hospital electronic charting system the Braden Risk Assessment section.

Steps to follow:

- i. Record the Braden subscale scores into the appropriate boxes.
- ii. Calculate the total risk score by adding the subscale scores together to achieve a score between 6 and 23.
- iii. Use the total score to determine a level of risk. Clients scoring 18 or less are considered to be at slight risk of developing a pressure injury. The lower the score, the greater the risk for pressure injury.

Low risk: 15 - 18
Moderate risk: 13 - 14
High risk: 10 - 12
Very High risk: 9 or less

- iv. If there are specific skin and/or wound concerns document in the Client Progress/Nursing Notes and the Wound Assessment & Treatment Flow Sheet.
- v. Ensure the date, month, year, and initials are complete.
- vi. Subscale scores are to be used to develop care plan interventions.
- vii. **Note:** Clients with additional risk factors such as advanced age, hypotension, hemodynamic instability, fever, and prolonged ICU/CCU stay, severity of illness, comorbid conditions such as diabetes mellitus, peripheral vascular disease, and obesity can increase pressure injury risk beyond the score indicated on the Braden Scale.

4b. Document the **Skin Assessment** using one of the following:

Document as per health authority/agency policy using one of the following:

- The Braden Risk & Skin Assessment Flow Sheet(BRSAFS) Page 2 (see <u>Appendix B</u>), or
- The 24-hour Patient Care flow sheet the Braden Risk/Skin Assessment section, or
- The hospital electronic charting system the Braden Risk/Skin Assessment section.

Steps to follow:

- i. Identify if overall Head-to-Skin check is done.
- ii. Identify if areas of high risk have been noted.
- iii. Identify if skin folds were assessed.
- iv. Identify if skin, under/around a medical device were assessed.
- v. Identify if mucosal membranes were assessed (if devices in place).
- vi. If there is skin and/or wound concerns, document in the client Progress/Nursing Notes and the paper Wound Assessment & Treatment Flow Sheet or electronic wound assessment
- vii. Ensure the date, month, year, and initials are complete.

Determine Level of Pressure Injury Risk

- Determine level of pressure injury risk based upon the client's overall assessment data and the ageappropriate Braden score. If the client's Braden Scale score is 18 or less the client is at risk and interventions must be put in place.
- 2. Using the Braden sub-scale scores, which are 2 or less, determine individualized interventions.
 - a. Established pressure injury prevention 'intervention bundles' may be used in some settings, as per agency policy.
 - b. Validate the client/family willingness and ability to participate in the care plan.

Interventions

Based on the overall Braden Risk assessment scores, the individual risk assessment subscale scores determine a plan of care in conjunction with the client/family. The plan of care incorporates client concerns, treatment of risk factors for skin breakdown, interventions, both general and specific to Braden subscales, put into place (see Appendix C: Braden Scale Interventions Guide and Prevention of Pressure Injury Guideline) intended and unintended outcomes, client education and discharge plans, if indicated.

- 1. For clients with a Braden score **19 or greater** continue to conduct a head-to-toe Skin Assessment as per the following schedule, or as per the agency policy.
 - a. Emergency Room: At least every 12 hours.
 - b. ICU/CCU: At least every 12 hours.
 - c. Operating Room (OR): Complete preoperatively and postoperatively.
 - d. Acute Medical/Surgical Units: Daily or according to agency policy and standards
 - e. Sub-Acute/Rehabilitation Units: With bathing.
 - f. Community Care: With any deterioration and/or change in client's condition.
 - g. Residential Care: With bathing.
 - h. Complete a Braden Scale risk assessment if the following occurs:
 - i. (e.g., day surgery/day procedures).
 - ii. If the client condition has changed,
 - iii. If the client has been transferred to/from another care setting, if the client has been hospitalized including day surgery procedures
- 2. For clients at risk (Braden score 18 or less)
 - a. Repeat the Braden Risk assessment and the Skin assessment following this schedule:
 - i. Emergency Room: Every shift.
 - ii. ICU/CCU: Every shift.
 - iii. Acute Medical/Surgical Units: Every shift
 - iv. Sub-Acute Medical/Transitional/Discharge Planning/Activation Units: Every shift
 - v. Rehabilitation Units: Daily
 - vi. Community Care: At every visit within the first 3 weeks, then transition to quarterly based on documented clinical assessment.⁶⁴
 - vii. Residential Care: Weekly then transition to interRAI PURS for scheduled monitoring
 - viii. Complete a Braden Scale risk assessment if the following occurs:
 - o If the client condition has changed,
 - o If the client has been transferred to/from another care setting, or
 - o If the client has been hospitalized or had a day surgery procedure.
 - b. Refer to the Prevention of Pressure Injury Guideline DST and the Braden Intervention Guide for prevention interventions.
 - c. Refer to the interdisciplinary team members as needed.
 - d. Refer to Product Information Sheets (PISheet) for information regarding devices, prophylactic dressings, and support surfaces.

Discharge Planning/Care Transitioning

- 1. Discharge planning is needed for the client who is at risk, who currently has a pressure injury, and who is being transferred to another unit (e.g., from the PARR/PACU to a surgical unit), or transitioning to or from another care setting (e.g., acute, community, or residential care).
- 2. Ensure the receiving unit or facility is aware of the client's current Head-to-Toe skin assessment findings and the overall Braden Risk Assessment score and sub-scores which have put the client at risk. Provide a client care plan which includes the pressure prevention intervention strategies currently in place.

Client Clinical Outcomes

The intended client clinical outcomes are the goals of the care plan developed in collaboration with the interprofessional team, the client and family.

- 1. Intended
 - a. The client's risk of pressure injury is identified.
- 2. Unintended
 - a. The client's develops an avoidable pressure injury.
 - b. The client develops an unavailable, medical-device related pressure injury or a mucosal membrane pressure injury.

Quality Assurance Indicators

The following quality assurance indicators could be used by the Health Authority/Agency/Facility to ensure that the Braden Risk and Skin Assessments were put into place:

- 1. The client's Braden Risk and Skin Assessment was completed on admission.
- 2. Reassessment of the client's pressure injury risk was completed based upon the client's total risk score and the care setting schedule.
- 3. The Braden subscale scores were used to determine the prevention interventions.

Documentation

- 1. Document initial and ongoing Braden Risk Assessment Scores and Head-to-Toe skin assessment, BRSAFS, care plan, client clinical outcomes, and care plan revisions as per agency policy.
- 2. Document the pressure injury education topics (i.e., prevention strategies) and written materials discussed and detail any materials given to the client/family.
- 3. If the client develops a pressure injury of any stage report the 'safety event' as per health authority or agency guidelines.

Definitions

Braden Risk & Skin Assessment Flow Sheet (Adults) (BRSAFS) - This 2-page flowsheet is used to document the Braden Risk assessment for adults within the Province of BC.

Braden Risk & Skin Assessment Flow Sheet (Children) (BRSAFS-Q) - This 2-page flowsheet is use for children within the Province of BC.

Children - Clients are considered children if they are 17 years and under.

Clients - Recipients of care; in the community-client, residential care-resident, and in acute care-patient.

Note: This is a controlled document. A printed copy may not reflect the current, electronic version on the CLWK website (www.clwk.ca). Any document appearing in paper form should always be checked against the electronic version prior to use; the electronic version is always the current version. This DST has been developed as a guide to support nursing practice in British Columbia, however it is not a substitute for education, experience & the use of clinical judgment November 2017

Procedure/Documentation: Braden Risk & Skin Assessment in Adults

- **Friction** The resistance to motion in a parallel direction relative to the common boundary of two surfaces; such as repetitive foot movements against the bedding causing skin breakdown.
- **Hemodynamic instability** A state where the circulatory system is not able to adequately perfuse the tissues and the client requires pharmacologic or mechanical support to maintain a normal blood pressure or adequate cardiac output. It is due primarily to hypovolemia, sepsis and cardiac problems.
- Intervention Bundle A pressure injury/ulcer intervention bundle incorporates those best practices, which if done in combination, are likely to lead to better client outcomes. A bundle includes a comprehensive skin assessment, documented standardized pressure injury risk assessment, specific care planning for the population (e.g., intensive care unit-ICU / critical care units CCU) and specific implementation strategies to address areas of risk.2
- **Pressure** The amount of force per unit of surface area.
- Pressure Injury An area of "localized damage to the skin and/or underlying soft tissue usually over a bony prominence or related to a medical or other device. The injury can present as intact skin or an open ulcer and may be painful. The injury occurs as a result of intense and/or prolonged pressure or pressure in combination with shear. The tolerance of soft tissue for pressure and shear may also be affected by microclimate, nutrition, perfusion, comorbidities and condition of the soft tissue"; these injuries are staged as Stage 1 to Stage 4, Unknown and Deep Tissue Injury.
- **Shear** A mechanical force that moves underlying bony structures in an opposite direction to overlying tissue resulting in tissue ischemia and ulceration often accompanied by undermining and possibly tunnelling and/or deep sinus tracts beneath the ulcer.

References/Bibliography

Please refer to the reference list in the Guideline: Prevention of Pressure Injuries in Adults & Children

Document Creation/Review

This guideline is based on the best information available at the time of its revision. Provincial Interprofessional Skin and Wound Committee relies on evidence, expert consensus and avoids opinion-based statements where possible.

Created By	British Columbia Provincial Intraprofessional Skin and Wound Committee in collaboration with Occupational Therapists, Physiotherapists and Wound Clinicians from across all Health Authorities
Publication Date	January 2012
Revision Date(s)	December 2014, November 2017
Review Date (s)	

Appendix A: Braden Risk & Skin Assessment Flow Sheet (page 1 of 2) (link to printable Flowsheet)



Braden Risk & Skin Assessment Flowsheet

Form ID: Rev: July 2017 Page: 1 of 2

Braden Scale for Predicting Pressure Sore Risk														
Sensory Perception Ability to respond meaningfully to pressure related discomfort	Unrespons flinch, or g due to dim conscious OR	etely Limited sive (does not moan, rasp) to painful stimuli, inished level of ness or sedation willby to feel pain over	2 Very Limited Responds only to painful stimul. Cannot communicate discomfort except by moaning or restlessness, OR Has a sensory impairment which limits the ability to feel pain or discomfort over 1/2 of body			3. Slig Respo cannot s, discon OR Has so which	Slightly Limited Responds to verbal commands but cannot always communicate discomfort or need to be turned,				4. No impairment Responds to verbal commands, has no sensory defloit which would limit ability to feel or voice pain or discomfort.			
Moisture Degree to which skin is exposed to moisture	Skin is kep by perspire Dampness	ntly Moist of moist almost constantly ation, urine, etc. is detected every time noved or turned.	2. Very Molst Skin is often but not always moist. Linen/ continent briefs* must be changed once a shift			Skin is requiri	Occasionally Moist Skin is occasionally moist, requiring an extra linen/continent briefs* change approximately once a day				Rarely Moist Skin is usually dry; linen only requires changing at routine intervals			
Activity Degree of physical activity	Bedfas Confined t	o bed	Chairfast Ability to walk severely limited or nonexistent. Cannot bear own weight and/or must be assisted into chair or wheelchair			Walks for very without of each	Walks Occasionally Walks occasionally during day, but for very short distances, with or without assistance. Spends majority of each shift in bed or chair.				Walks Frequently Walks outside room at least twice a day and inside room at least once every two hours during waking hours			
Mobility Ability to change and control body position	Does not r changes ir position wi	etely immobile make even slight n body or extremity thout assistance	 Very Limited Makes occasional slight changes in body or extremity position but unable to make frequent or significant changes independently 			in Makes change positio	Slightly Limited Makes frequent though slight changes in body or extremity position independently				No Limitations Makes major and frequent changes in position without assistance			
Nutrition Usual food Intake pattern	eats more offered. Ea protein (m day. Takes take a liqu OR Is NPO an	oor s a complete meal. Rarely than 1/3 of any food ats 2 servings or less of eat or dairy products) per s fluids poorly. Does not id dietary supplement, d/or maintained on clear V's for more than 5 days	Probably inadequate Rarely eats a complete meal and generally eats only about 1/2 of any food offered. Protein intake includes only 3 servings of meat or dairy products per day. Occasionally will take dietary supplement, OR Receives less than optimum amount of liquid diet or tube feeding			Eats or total of es or dairy Occasi Will usu offered OR is on a regime	or dairy products) each day. Occasionally will refuse a meal, but will usually take a supplement when offered, OR Is on a tube feeding or TPN				4. Excellent Eats most of every meal. Never refuses a meal. Usually eats a total of 4 or more servings of meat and dairy products. Occasionally eats between meals. Does not require supplementation.			
Friction and Shear Copyright. Barbara Bradon and	moving. sheets is bed or ch maximum or agitati	moderate to maximum as Complete lifting without sil Impossible. Frequently sil nair, requiring frequent rep n assistance. Spasticity, con leads to almost constai	ding against ides down in ositioning wi ontractures, nt friction.	em equires mi in probable ets, chair, s relatively of the tim	nuires minimum assistance. Moves I and has complet elatively good position in the time but occasionally				pparent Problem In bed and in chair independently s sufficient muscle strength to lift up tely during move. Maintains good in bed or chair.					
		er for each section in							detern	nine Risk I	evel			
Determine Level of Risk	DOWNEY													
Score Level of R 15-18 L = Low	isk	Sensory P	Time											
13-14 M = Mode	rate	Consory 1					 		+	_	+	+		
10 -12 H = High			Moisture				-		+	_		+		
9 or less VH = Very	High		Activity						╀					
Consider clients with the following		Mobility						ـــــ			+			
Consider clients with the following conditions to be more likely to be at			Nutrition						—	\perp		\perp		
higher risk:		Friction and Shear												
Existing skin breakdown Age greater than or equal to 75 yrs Total Ri		sk Score												
	Diastolic pressure less than 60		sk Level											
	Hemodynamically unstable		Notes				\vdash		+	_	+	1		
Fever		See Progress/Nursing (Check box if required)	140(68				l		1					
PVD/Diabetes		Initials												
Obesity			IIIIIIIIII											

Please turn page over to see Head-to-Toe Skin Assessment Flowsheet

Note: This is a controlled document. A printed copy may not reflect the current, electronic version on the CLWK website (www.clwk.ca). Any document appearing in paper form should always be checked against the electronic version prior to use; the electronic version is always the current version. This DST has been developed as a guide to support nursing practice in British Columbia, however it is not a substitute for education, experience & the use of clinical judgment November 2017

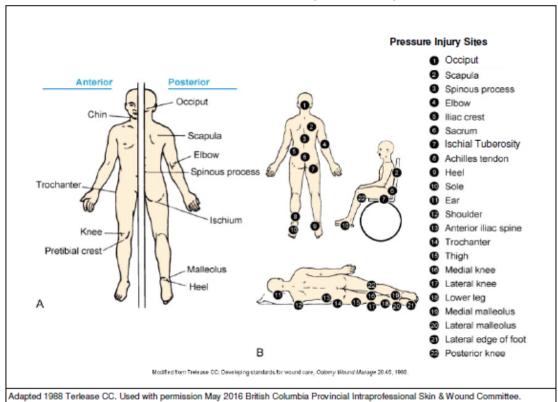
Appendix B: Braden Risk & Skin Assessment Flow Sheet (page 2 of 2)



Braden Risk & Skin Assessment Flowsheet

Page: 2

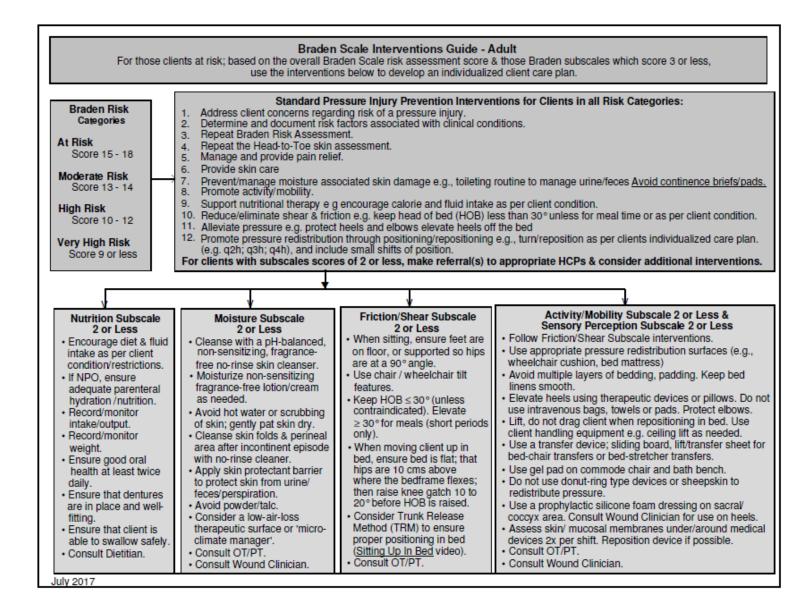
Skin Assessment Flowsheet (Head-to-Toe)



DD/MM/YY						
Time						
	Overall Head-to-Toe Skin Check Done (Y/N)					
	Areas at High Risk for Injury Checked:					
	Occiput (Y/N)					
	Sacral / coccyx (Y/N)					
	Bilateral Ischial tuberosities (Y/N)					
	Bilateral Achilles tendon / heel (Y/N)					
	Bilateral medial / lateral malleolus (Y/N)					
Remember to check skin folds, beneath medical device (bbes, splints, etc) & mucous membranes - describe as needed	Skin folds: (Y/N/NA)					
	Medical Device: (Y/N/NA)					
	Mucous Membranes: (Y/N/NA)					
	Other: (Y/N/NA)					
	Refer to WATFS if wound present (Check box if required)					
	See Progress Notes/Nursing Notes (Check box if required)					
	Initials					

Please see the Braden Interventions Guide for the subscale specific interventions

Appendix C: Braden Scale Interventions Guide (link to education resource)



Note: This is a controlled document. A printed copy may not reflect the current, electronic version on the CLWK website (www.clwk.ca). Any document appearing in paper form should always be checked against the electronic version prior to use; the electronic version is always the current version. This DST has been developed as a guide to support nursing practice in British Columbia, however it is not a substitute for education, experience & the use of clinical judgment November 2017