

Procedure/Documentation: Braden Risk & Skin Assessment in Adults

Developed by the BC Provincial Interprofessional Skin and Wound Committee in collaboration with Occupational Therapists, Physiotherapists & Wound Clinicians from:



<u>Title</u>	Procedure/Documentation: Braden Risk & Skin Assessment - Adults
<u>Practice Level</u>	<ul style="list-style-type: none"> • Health care professionals in accordance with health authority/agency policy. • Clients at risk for pressure injuries and moisture associated skin breakdown require an interprofessional approach to provide comprehensive, evidence-based assessment and treatment. This clinical guideline focuses on the interprofessional team providing client care.
<u>Background</u>	<ul style="list-style-type: none"> • The Braden Risk Assessment Scale <ul style="list-style-type: none"> • 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: <ul style="list-style-type: none"> • Preventive interventions and the • Probability that a pressure injury will occur. • Subscale Braden assist in determining the: <ul style="list-style-type: none"> • 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.
<u>Indications for Use</u>	This procedure has been developed to determine an adult client's risk developing a pressure injury.
<u>Bookmarks</u>	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 Appendix A: Braden Risk & Skin Assessment Flow Sheet pg.1 Appendix B: Braden Risk & Skin Assessment Flow Sheet pg.2 Appendix C: Braden Scale Interventions Guide
<u>Related Documents</u>	Guideline: Prevention of Pressure Injury in Adults & Children 2017 Flow Sheet: Braden Risk & Skin Assessment Flow Sheet (BRASFS) Guide: Braden Scale Interventions Guide Guideline: Assessment and Treatment of Pressure Injuries in Adults & Children (2017 version pending) E-Learning Module: Pressure Injury Prevention

Assessment, Documentation and Determination of Level of Pressure Injury Risk

Assessment

1. 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:
 - i. 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 bony 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 boggy (soft) or induration (hard).
- j. Assess areas such as bruises or discoloration 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 [Appendix A](#)),
or
- The 24-hour Patient Care flow sheet – the Braden Risk Assessment section,
or
- 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 [Appendix B](#)),
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

1. Determine level of pressure injury risk based upon the client's overall assessment data and the age-appropriate 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.

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, co-morbidities 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	1. Completely Limited Unresponsive (does not moan, flinch, or grasp) to painful stimuli, due to diminished level of consciousness or sedation OR Limited ability to feel pain over most of body	2. Very Limited Responds only to painful stimuli. 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. Slightly Limited Responds to verbal commands but cannot always communicate discomfort or need to be turned, OR Has some sensory impairment which limits ability to feel pain or discomfort in 1 or 2 extremities	4. No Impairment Responds to verbal commands, has no sensory deficit which would limit ability to feel or voice pain or discomfort.
Moisture Degree to which skin is exposed to moisture	1. Constantly Moist Skin is kept moist almost constantly by perspiration, urine, etc. Dampness is detected every time patient is moved or turned.	2. Very Moist Skin is often but not always moist. Linen/continent briefs* must be changed once a shift	3. Occasionally Moist Skin is occasionally moist, requiring an extra linen/continent briefs* change approximately once a day	4. Rarely Moist Skin is usually dry; linen only requires changing at routine intervals
Activity Degree of physical activity	1. Bedfast Confined to bed	2. Chairfast Ability to walk severely limited or nonexistent. Cannot bear own weight and/or must be assisted into chair or wheelchair	3. Walks Occasionally Walks occasionally during day, but for very short distances, with or without assistance. Spends majority of each shift in bed or chair.	4. 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	1. Completely Immobile Does not make even slight changes in body or extremity position without assistance	2. Very Limited Makes occasional slight changes in body or extremity position but unable to make frequent or significant changes independently	3. Slightly Limited Makes frequent though slight changes in body or extremity position independently	4. No Limitations Makes major and frequent changes in position without assistance
Nutrition Usual food intake pattern	1. Very Poor Never eats a complete meal. Rarely eats more than 1/3 of any food offered. Eats 2 servings or less of protein (meat or dairy products) per day. Takes fluids poorly. Does not take a liquid dietary supplement, OR Is NPO and/or maintained on clear liquids or IV's for more than 5 days	2. 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	3. Adequate Eats over half of most meals. Eats a total of 4 servings of protein (meat 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 regimen, which probably meets most of nutritional needs.	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	1. Problem Requires moderate to maximum assistance in moving. Complete lifting without sliding against sheets is impossible. Frequently slides down in bed or chair, requiring frequent repositioning with maximum assistance. Spasticity, contractures, or agitation leads to almost constant friction.	2. Potential Problem Moves feebly or requires minimum assistance. During a move skin probably slides to some extent against sheets, chair, restraints or other devices. Maintains relatively good position in chair or bed most of the time but occasionally slides down.	3. No Apparent Problem Moves in bed and in chair independently and has sufficient muscle strength to lift up completely during move. Maintains good position in bed or chair.	

Copyright, Barbara Braden and Nancy Bergstrom, 1988. Reprinted with permission. All rights reserved. Adapted with permission of B. Braden.

Insert number for each section in correct box and add up column for Total Score; then determine Risk level									
Determine Level of Risk	DD/MM/YY								
Score	Level of Risk	Time							
15 -18	L – Low	Sensory Perception							
13 -14	M – Moderate	Moisture							
10 -12	H – High	Activity							
9 or less	VH – Very High	Mobility							
Consider clients with the following conditions to be more likely to be at higher risk:		Nutrition							
Existing skin breakdown		Friction and Shear							
Age greater than or equal to 75 yrs		Total Risk Score							
Diastolic pressure less than 60		Risk Level							
Hemodynamically unstable		See Progress/Nursing Notes (Check box if required)							
Fever		Initials							
PVD/Diabetes									
Obesity									

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

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



Braden Risk & Skin Assessment Flowsheet

Skin Assessment Flowsheet (Head-to-Toe)

Pressure Injury Sites

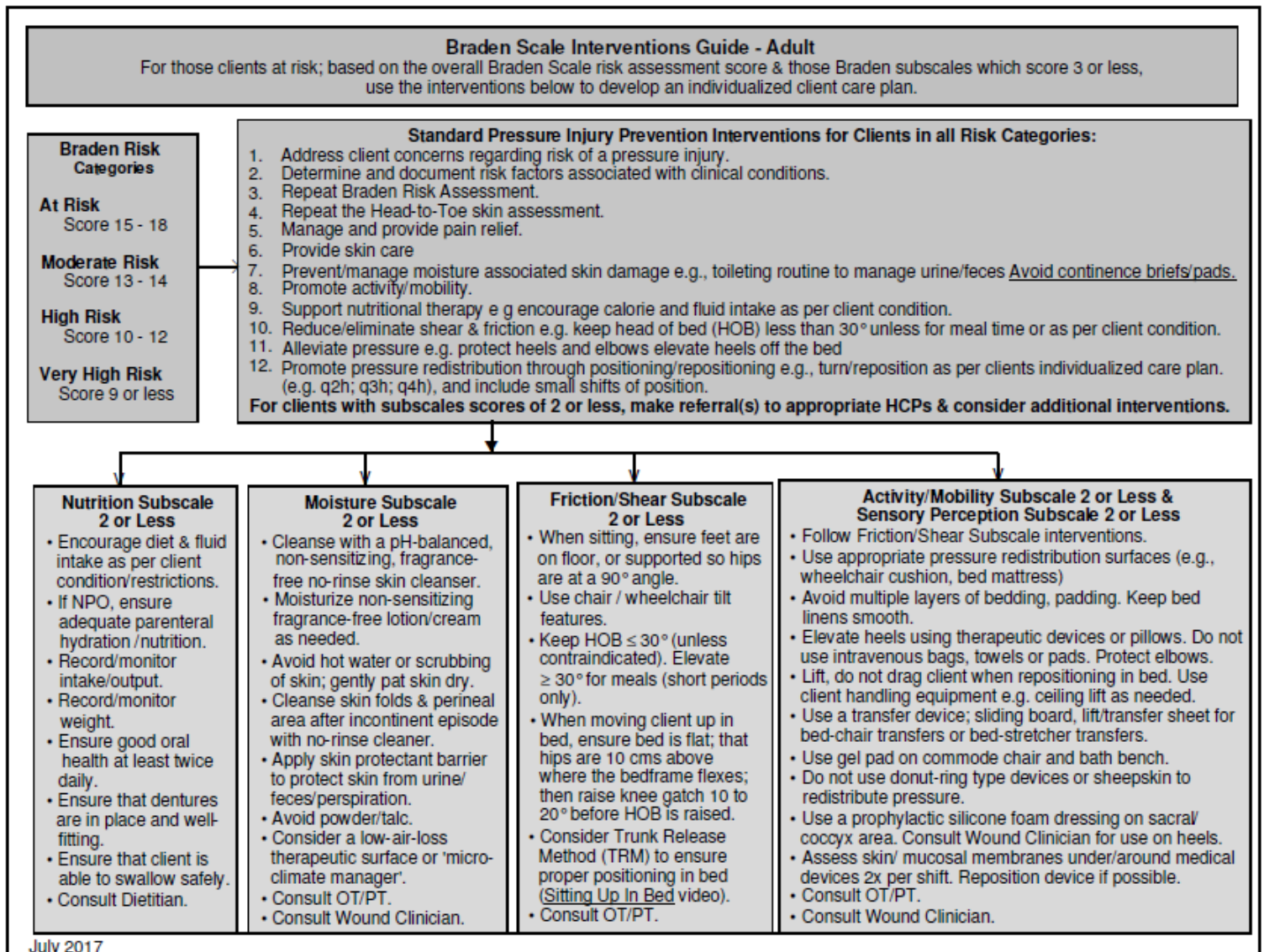
- 1 Occiput
- 2 Scapula
- 3 Spinous process
- 4 Elbow
- 5 Iliac crest
- 6 Sacrum
- 7 Ischial Tuberosity
- 8 Achilles tendon
- 9 Heel
- 10 Sole
- 11 Ear
- 12 Shoulder
- 13 Anterior iliac spine
- 14 Trochanter
- 15 Thigh
- 16 Medial knee
- 17 Lateral knee
- 18 Lower leg
- 19 Medial malleolus
- 20 Lateral malleolus
- 21 Lateral edge of foot
- 22 Posterior knee

Adapted 1988 Terlese CC. Used with permission May 2016 British Columbia Provincial Intraprofessional Skin & Wound Committee.

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 (tubes, 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](#))



July 2017