# QUALITY NUTRITION promotes healthy skin

Proper nutrition can help support strong skin and muscles, which can help prevent pressure injuries and promote healing if a pressure injury occurs.

### **Quality nutrition is comprised of:**



#### Calories

Adequate calories help maintain muscle mass and weight.



#### Protein

Protein repairs and maintains tissue and muscle, which can help pressure injuries heal.



#### Amino Acids

Arginine is a conditionally essential amino acid that is critical for wound healing.



#### Water

Proper hydration carries nutrients throughout the body.



#### **Vitamins & Minerals**

Many vitamins and minerals are associated with healing.

The 2019 International Clinical Practice Guideline (CPG)<sup>1</sup> highlights 4 keys to prevention & treatment of pressure injuries via good nutrition

#### 1. PREVENTION

- Validated malnutrition screening
- Early intervention
- Flexible nutrition planning

#### 2. INTERVENTION

- Food first
- Fortified foods for increased nutrients
- Oral nutritional supplements (ONS)

#### 3. COLLABORATION

- Timely collaboration
- Plan to achieve clinical goals
- Adapt to medical changes

#### 4. ACTION

- Albumin or prealbumin are NOT sensitive measures of nutrition status
- Provide high-protein snacks
- Expand flavors to increase intake

REFERENCE: 1. European Pressure Ulcer Advisory Panel, National Pressure Injury Advisory Panel and Pan Pacific Pressure Injury Alliance. Haesler E, ed.

Prevention and Treatment of Pressure Ulcers/Injuries: Clinical Practice Guideline: The International Guideline.

Prevention and Ireatment of Pressure Ulcers/Injuries: Clinical Practice Guideline: The International Guideline EPUAP/NPIAP/PPPIA; 2019.

Educational materials produced by Abbott in collaboration with NPIAP.





## What matters regarding nutrition intervention?

#### **Prevention Matters**

#### **Conduct screening & assessment**

- Nutrition screening should be conducted for those at risk of pressure injury (4.1')
- Comprehensive nutrition assessments should be conducted for adults screened to be at risk for malnutrition and at risk of a pressure injury, and for all adults with a pressure injury (4.2')

#### **Pediatric pressure injury prevention**

- Age-appropriate nutrition screening and assessment should be conducted for neonates and children at risk of pressure injuries (4.14\*)
- Fortified foods, age-appropriate nutritional supplements, or enteral or parenteral nutrition support should be considered for neonates and children with or at risk of pressure injuries who have inadequate oral intake (4.15°)

#### **Intervention Matters**

#### **Increase protein & calories**

- Provide 30-35 kcalories/kg body weight/day for adults with pressure injuries who are malnourished/at risk of malnutrition (4.6°)
- Provide 1.25-1.5 g protein/kg body weight/day for adults with pressure injuries who are malnourished/at risk of malnutrition (4.7\*)
- If nutritional requirements can't be achieved by normal dietary intake, offer calorie- and protein-fortified foods and/or nutritional supplements to the usual diets of adults at risk of pressure injury and are malnourished/at risk of malnutrition (4.8')

#### Use oral nutritional supplements

- Provide high-calorie, high-protein arginine, zinc, and antioxidant oral nutritional supplements or enteral formulas to adults with a Category/Stage 2 or greater pressure injury and are malnourished/at risk of malnutrition (4.10°)
- Add high-calorie, high-protein nutritional supplements to the usual diets of adults with pressure injuries who are malnourished/at risk of malnutrition, if nutritional requirements cannot be achieved by normal dietary intake (4.9\*)

#### **Collaboration Matters**

#### Discuss care preferences & goals

- Benefits and harms of enteral or parenteral feeding to support overall health should be discussed in the context of care preferences and goals with adults with pressure injuries who can't meet nutritional requirements through oral intake, despite nutrition interventions (4.12°)
- Benefits and harms of enteral or parenteral feeding to support overall health should be discussed in the context of care
  preferences and goals with those at risk of pressure injuries who can't meet nutritional requirements through oral intake
  despite nutrition interventions (4.11')

#### **Action Matters**

#### **Personalized nutrition plans**

- Develop and implement individualized nutrition care plans for those with/at risk of a pressure injury and who are malnourished/at risk of malnutrition (4.3')
- For those at risk of pressure injuries and malnourished or at risk of malnutrition:
  - Optimize energy intake (4.4°)
  - Adjust protein intake (4.5°)
- Provide and encourage adequate water/fluid intake for those with/at risk of pressure injury when
  it's compatible with goals of care and clinical conditions (4.13\*)

\*Consumption of liquid ONS contributes to meeting water/fluid requirements.

REFERENCE: 1. European Pressure Ulcer Advisory Panel, National Pressure Injury Advisory Panel and Pan Pacific Pressure Injury Alliance. Haesler E, ed.

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EPUAP/NPIAP/PPPIA; 2019.





# The 2019 International CPG recommends oral nutritional supplements containing arginine and micronutrients starting with Stage 2 pressure injuries<sup>1</sup>

	Stage 1	Stage 2	Stage 3	Stage 4
Calories	30-35 kcalories/ kg/day BW	30-35 kcalories/ kg/day BW	30-35 kcalories/ kg/day BW	30-35 kcalories/ kg/day BW
Protein	1.25-1.5 g/kg BW	1.25-1.5 g/kg BW	1.25-1.5 g/kg BW	1.25-1.5 g/kg BW
Arginine		YES	YES	YES
Zinc		YES	YES	YES
Antioxidants		YES	YES	YES
	Supplementation: Consider supplementation for at least 4 weeks			
Implementation Considerations	Hydration: Consider providing 30mL fluid /kg BW*			
	Monitor: Adjust diet when clinical condition changes			

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