

The Crucial Role of Nutrition in the Prevention and Treatment of Cancer

Le rôle de la nutrition dans la prévention et le traitement du cancer



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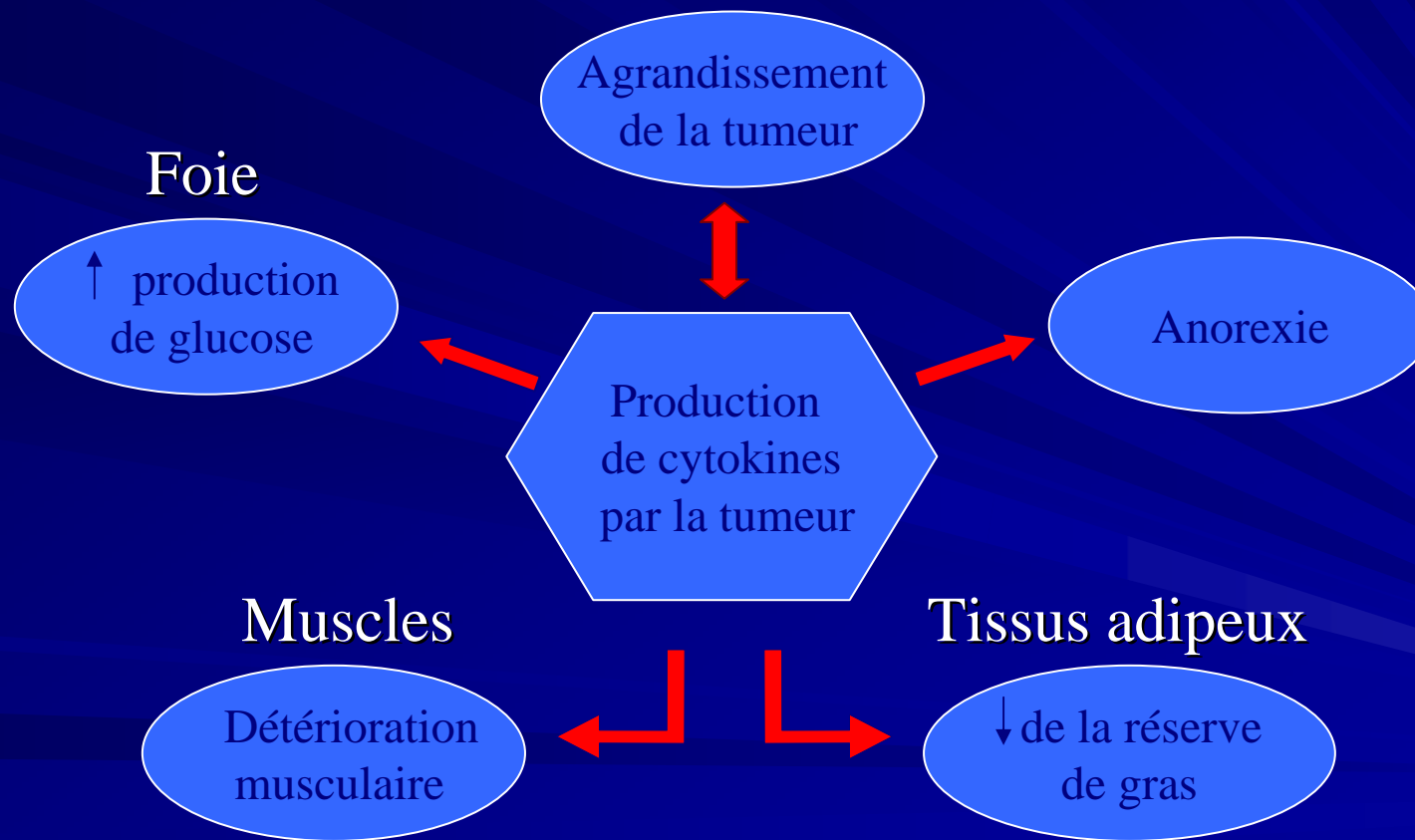


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Outline of Presentation

- Effects of cancer on metabolism and nutrition
- Effects of cancer treatment on nutritional status
- Screening of cancer patients for nutritional issues
- Role of dietitian in oncology rehab and nutritional plans
- Case study

Effets du cancer sur le métabolisme et la nutrition



C'est à dire...



Métabolisme



Dépenses d'énergie

La chirurgie



- 60 % des patients diagnostiqués auront à subir une chirurgie
- Les patients souffrants de malnutrition ont un risque plus élevé de morbidité et de mortalité
- L'emplacement de la chirurgie peut avoir des conséquences graves sur la nutrition

La chimiothérapie

- Les symptômes les plus souvent retrouvés:
 - Anorexie
 - Altération du goût
 - Satiété précoce
 - Nausée
 - Vomissement
 - Xérostomie
 - Mucosite
 - Diarrhée ou constipation

La radiothérapie

- Dépendant de l'emplacement de la radiothérapie, cela peut interférer avec l'ingestion, la digestion et l'absorption des nutriments
- Ces effets secondaires peuvent commencer 2 à 3 semaines après la thérapie et durer aussi longtemps
- Le problème peut s'avérer chronique

But de la nutrition clinique

- Prévenir ou corriger les déficiences alimentaires
- Préserver la masse musculaire
- Aider le patient à tolérer le traitement
- Minimiser les effets secondaires et les complications
- Maintenir l'énergie
- Aider dans le rétablissement et la guérison
- Maximiser la qualité de vie

Nutritional Screening

- % weight loss over a period of time
- Adipose and muscle reserves
- Laboratory values
- Symptoms of the patient from cancer treatment
- Dysphagia (oral and/or pharyngeal)
- Tube feedings
- Screening tool

Role of the Dietitian

Nutritional Evaluation:

- Results of screening
- BMI
- Usual and actual food intake
- Calculation of energy and protein needs
- Level of dysphagia
- Tolerance to tube feeding
- Nutritional plan

Nutritional Plan

Weight Loss

- Goal is weight gain if underweight
- Goal is weight maintenance during treatment (even if overweight)
- Weight loss prior to surgery in a controlled way

Nutritional Plan

Anorexia

- Small frequent meals
- Energy and protein dense foods
- High calorie breakfast meal
- Avoid strong odours
- Cold instead of hot foods
- Frequent rinsing of mouth to ↓ after-taste
- High calorie nutritional supplements
- Emphasize food preferences
- Encourage social aspect of eating

Nutritional Plan

Taste Changes

- Use plastic utensils and glass pots
- Emphasize food preferences
- Cold or room temperature foods
- Season foods with herbs and spices
- Use tart foods and fluids to cover metallic tastes
- Use extra salt and/or sugar
- Try other protein foods besides meat
- Eat meat with a sugary food
- Add flavourful sauces to bland foods
- End the meal with a sweet dessert

Nutritional Plan

Early Satiety

- 6 small “snacks” throughout the day
- Energy and protein dense foods
- Add extra calories at meals
- Avoid low calorie foods and drinks
- Drink between meals
- Nutritional supplements as needed
(Med Pass Program)

Nutritional Plan



Nausea / Vomiting

- Small frequent meals / half portions
- Use dry foods to settle the stomach
- Cold or room temperature foods that are easy to digest
- Remain sitting 1 hour after eating
- Sip fluids during the day for electrolytes
- Drink through a straw
- Suck on peppermint candies

Nutritional Plan

Xerostomia (dry mouth)

- Use extra sauces with meals
- Avoid dry foods
- Maintain good oral hygiene
- Sip on water regularly or suck on ice cubes
- Eat sugary foods to stimulate saliva production
- Use a straw to drink

Nutritional Plan

Mucositis (mouth sores)

- Maintain good oral hygiene
- Eat soft foods and add extra sauces to dry foods
- Avoid temperature extremes
- Avoid acidic and spicy foods
- Avoid commercial mouthwashes that contain alcohol

Nutritional Plan

Diarrhea

- Re-hydrating solution
- Avoid lactose, insoluble fiber, gas-forming foods
- Increase intake of soluble fiber
- Avoid high sugar foods and sugar substitutes (sorbitol)



Constipation

- Increase intake of insoluble fiber
- Drink 8-10 glasses of water per day
- Increase physical activity if possible



Nutritional Plan

Dysphagia

- Modified textures and consistencies

Tube feedings

- Tolerance to rate and volume
- Choosing appropriate formula
- Combination with p.o. intake

Nutritional Plan

Digestion/Absorption problems

- Eat 6 small meals/snacks
- Avoid high sugary foods
- Avoid high fat meals
- Specialized nutritional supplements

Nutritional Plan

Group Nutrition Sessions

- 2 part session - English and French
- Written documents / tasting foods
- Selecting appropriate candidates
- Families invited to attend
- Challenges

Nutritional Plan

Part 1:Canada's Food Guide in detail

Part 2:

- Cancer fighting recommendations
- ✓ Limit marinated, smoked, fried, processed and salty foods
- ✓ Limit red meat and alcohol in excess
- ✓ Quit smoking
- ✓ Maintain healthy weight and exercise regularly
- ✓ Eat plenty of fruits and vegetables

Nutritional Plan

- Cancer fighting foods:
 - Cabbage family
 - Garlic family
 - Soy foods
 - Turmeric and Curcumin
 - Green tea
 - Berries/Pomegranate/Grapes
 - Omega-3 fats
 - Tomatoes
 - Citrus fruits
 - Dark chocolate
 - Red wine

Référence

Béliveau, R., Gingras, D.

Les aliments contre le cancer

2005 Éditions du Trécarré

Foods that Fight Cancer

2006 McClelland & Stewart Ltd

Case Study

References

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