# Nutrition after chemotherapy and radiation for head and neck cancer

Good nutrition is important while you are recovering from the side effects of your treatment for head and neck cancer. You may have:

- a dry mouth
- taste changes
- difficulty chewing or swallowing

These side effects have made it hard or impossible to eat during the last weeks of treatment. For this reason, you have been using a feeding tube to give your body the calories, protein and fluid that it needs every day.

Now that you have finished your treatment, your side effects will begin to improve.

The goal is to get back to eating a regular diet so your feeding tube can be removed.

This information will help you get back to eating a regular diet. It gives suggestions for foods that may be easier to eat with each side effect. It also gives guidelines to help you slowly decrease the amount of supplement you take through your feeding tube. This is done by increasing the amount of food you can eat by mouth. When you can eat enough to maintain your weight and you are no longer using your feeding tube, it will be removed.\*

<sup>\*</sup> Unless you need surgery after treatment.

### Dry mouth

#### How long will my dry mouth last?

The amount of time the feeling of dry mouth or thick saliva will last depends on the area that was radiated and how much radiation you were given. For most people, dry mouth will slowly improve a few weeks to a few months after treatment. In some cases, the feeling of dryness in your mouth may never go away completely.

#### What types of foods can I try eating when my mouth is dry?

Try adding fluids to dry foods, choosing moist foods and sipping on water or other fluids while you are eating.

#### Foods to try:

- Drink 8 or more cups of non-caffeinated drinks every day such as non-acidic juices (apple, peach, grape, pear), milk (flavoured, soy, rice) or water.
- Take a few sips of liquid after each mouthful of food to help wash food down.
- Use a straw when drinking thicker drinks such as supplements, smoothies or milkshakes.
- Try soft, moist foods such as:
  - stews
  - casseroles
  - soups
  - macaroni and cheese
  - oatmeal or cream of wheat
  - egg or tuna salad
  - scrambled or soft poached eggs
  - canned fruit with cottage cheese
  - pudding or yogurt

- To help thin out your saliva, try tart foods such as:
  - ice tea with lemon
  - pineapple
  - mandarin oranges
  - sherbert
- Try popsicles or ice chips to moisten your mouth temporarily.
- Use butter or margarine on vegetables or bread.
- Use gravy, sauces or cream soup on meat or chicken.
- Dunk dry foods in any liquid such as milk (flavoured, soy, rice), hot cocoa or even soups and sauces.

#### Foods to limit:

- Dry foods such as:
  - tough meat
  - raw vegetables
  - pretzels and chips
  - muffins
  - breads and crackers
- Sugary and sticky foods such as:
  - dried fruit
  - candies and chocolates
  - honey, thick syrup
  - jams and jellies
  - gum or candies sweetened with sugar
- Hot, spicy and acidic foods such as chilli, tacos or salsa.
- Food and drinks with caffeine such as coffee, teas, colas and chocolate.
- Beer, wine and alcoholic drinks.

### Taste changes

#### How long will these taste changes last?

Some people can taste foods slightly about 2 weeks after finishing treatment. The sense of taste may continue to get better very slowly. The changes in taste may last for 2 to 6 months after treatment. For some people, only part of the sense of taste comes back.

## What types of food can I try eating while I have taste changes?

You may have to try different types of foods in order to find flavours you enjoy.

#### If your food tastes different such as metallic, bitter or sour:

- Try tart foods such as citrus juices, cranberry juice, pickles or relish.
- Try food at cold or at room temperature.
- Try different sources of protein rich foods such as:
  - milk (flavoured, soy, rice)
  - pea or lentil soups
  - baked beans
  - canned tuna or salmon
  - cheese, hummus spreads
  - eggs or quiche
  - yogurt
- Marinate meat, chicken and fish to help mask the bitter taste.

#### Marinades include:

orange or lemon juice
BBQ sauce

vinegarsoy sauce

- sweet and sour sauce - beer

- wine

- Try applesauce, cranberry sauce, or red pepper jelly on meat or chicken.
- Eat fresh or frozen vegetables rather than canned.
- Use plastic utensils and glass or ceramic cooking vessels rather than metal to decrease metallic taste.

#### If you food has little or no taste:

- Try different types of spices and seasonings on vegetables, meat, chicken or fish such as:
  - garlic
  - basil
  - oregano
  - thyme
  - rosemary
  - chilli powder
  - tarragon
- Try strong flavoured foods such as:
  - pizza
  - spaghetti or lasagne
  - barbecued foods
  - cured meets
  - mild salsa
  - pickles or olives
  - chocolate
- Add extra flavour to foods with condiments such as BBQ sauce, mustard, ketchup or soy sauce.
- Try enhancing the taste of meals by alternating bites of different types of food.

#### Other suggestions for taste changes:

- If the taste of food is too strong, try cold foods such as:
  - cheese and crackers
  - cottage cheese with fruit
  - chicken, salmon or egg salad
  - sandwiches
  - yogurt
  - pudding or custard
- If milk products taste different, try adding chocolate or strawberry syrup.
- If you don't like the taste of water, try adding a lemon or orange slice, or mix with some fruit juice.
- If foods taste salty, try adding extra sugar.
- If foods taste too sweet, try adding a pinch of salt.
- Suck on sugar free flavoured candies (such as lemon or mint) or chew sugar free gum to help get rid of unpleasant tastes following a meal.

### Difficulty chewing or swallowing

### When will I be able to chew and swallow foods normally again?

Radiation therapy to the head and neck can cause your mouth and throat to become painful and raw. You may also have sores in these areas that make it hard to chew and swallow. Usually, throat pain clears up between 3 and 6 weeks after you finish treatment.

Radiation may also cause swelling of your throat, making it harder to swallow. The swelling may go away a few weeks after treatment. However, it can last for many months depending on the area that was radiated and how much radiation you were given. Your doctor will monitor the swelling in your throat at follow up visits.

## My mouth is too sore to chew and swallow normally. What types of foods can I try eating?

You may find it easiest to start off on a full fluid diet.

#### Foods and drinks in a full fluid diet include:

- Fluids such as water, apple juice, grape juice, fruit nectars, tea, ginger ale or broth.
- Milk and milk products including ice cream, sherbet, milkshakes, yogurt, pudding or cream soups.
- Nutrition supplements such as Carnation Breakfast Anytime with homogenized milk, Ensure Plus, Boost Plus or Resource.
- Jell-O.
- Cream of wheat.

When you feel you are ready to have solid foods, start with soft, moist foods.

#### Try eating a variety of different soft, bland food such as:

- macaroni and cheese
- tender chicken, beef or fish
- pasta and rice
- casseroles
- scrambled eggs
- pancakes
- oatmeal or other cooked cereals
- soft cold cereals in milk (Rice Krispies, Corn Flakes, Special K)
- mashed potatoes
- soft or pureed fruits and vegetables
- applesauce
- cottage cheese
- custard
- gelatine
- smoothies
- soft cookies or baked goods dunked in milk
- Moisten foods by adding broth, soup, margarine or butter, sauces or gravy.
- Finely chop, grind or blenderize meat and poultry if they are difficult to swallow.
- Try eating popsicles and freezing different fruits such as banana pieces, peach slices, mandarin orange segments or grapes.
  Very cold foods may feel better on your throat.

Certain types of foods may irritate your throat.

#### Avoid foods such as:

- Tart, acid foods such as oranges, grapefruit, lemon, lime and tomatoes.
- Dry or rough foods that may scratch your mouth such as dry toast, crackers or hard rolls.
- Hard, crunchy foods such as popcorn, nuts, chips or raw vegetables.
- Irritating condiments such as pepper or pepper sauces, salsa, pickles, horseradish and vinegar.
- Very hot, spicy foods such as tacos or chilli.
- Alcoholic beverages, tobacco and commercial mouthwashes may also irritate your mouth and throat.

## It's hard for me to swallow because of the swelling in my throat. What types of foods can I try eating?

You may have to experiment with different foods until you find some that you can swallow. Try starting off with fluids and then moving to soft, moist foods (see above food lists).

Other suggestions for eating when your throat is swollen include:

- Blenderize foods you like such as meat, poultry, fish, pasta, rice, fruit and vegetables without skins or seeds.
- Buy pureed food, such as baby food in supermarkets.

As the amount of swelling decreases, try more solid foods such as:

- Eggs, ground meat, fish and soft breads with spreads (cheese spread, tuna salad, egg salad).
- Different types of grains, such as:
  - soft breads
  - cold cereals
  - graham crackers
  - pancakes and waffles
  - pasta and rice
- Soft fruits such as canned fruits or bananas.
- Soft desserts such as pudding, ice cream or soft cookies and cakes.
- Use a blender or food processor to chop foods that are too hard to chew. Use milk, fruit or vegetable juices to make the food easier to swallow.

#### Who can I contact if I have questions or concerns?

Contact your home care dietitian or cancer centre dietitian if have questions or concerns.

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**Juravinski Cancer Centre** 699 Concession Street Hamilton, Ontario L8V 5C2 905-387-9495

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