

NUTRITION COUNSELING

The Journey Through Caregiving



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Introduction

The purpose of this module is to help community-based organizations prepare family caregivers to care for their elderly loved one who has a chronic disease or disability. It is designed to be tailored to specific training needs and to be a helpful resource to caregivers in their homes.

It is written in a question and answer format from the perspective of the family caregiver. The questions address concerns that caregivers often have.

Because each module was designed to stand alone, some information found in one section may be repeated in another. This repetition was built into each module so trainers will not have to search for relevant information from one module to another.

Transparencies, Microsoft PowerPoint presentations, and activities have been developed for each module. Trainers may choose to use all of these materials in a training session or only one of these references. These materials have been developed to help trainers reinforce the information found in each module.

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❖ NUTRITION FOR SENIOR YEARS

Good nutrition habits never get old they do not go south for the winter and they can never retire. Research has shown that a good diet in later years helps to reduce your risk for chronic disease and helps manage problems you may already have such as high blood pressure (hypertension), high cholesterol, or diabetes.

If you are well-nourished, you will feel better, recover faster from illnesses, spend less time in the hospital, and may be able to live independently longer than those older people who don't eat well.

What are age-related changes that affect nutrition?

Many changes take place as we grow older. These changes are usually just a part of normal aging, are not a sign of illness, and are different just as each person is different. Our senses change. For example, food may taste and smell differently, we may need glasses, and we may find we don't hear as well.

These losses are neither total nor rapid, but they can affect your food and nutritional intake and health status.

- Some loss of vision may give you concerns about cooking, especially using a stove or microwave. Difficulty reading food prices, nutrition labels, or recipes may make grocery shopping, food preparation, and eating very challenging.

Age-related changes that affect eating and nutrition include:

- Vision
- Hearing
- Taste and smell
- Thirst
- Body composition changes

- Loss of hearing may make it more difficult to hear servers in restaurants, at meal sites, or in the grocery store.
- Changes in senses of smell and taste may make eating more challenging. If food doesn't taste appetizing or smell appealing, we don't want to eat it. Older people have fewer taste buds than younger people. Fewer teeth make it more difficult to chew foods. And if chewing is impaired by dentures, this will also reduce the ability to taste.
- Thirst sensation may change. The ability to tell if you have had enough fluids will diminish and may put you at risk for dehydration.

As we age, our body composition changes. We lose muscle tissue, body water, and bone mass, and many of us gain body fat. An important change with aging is that most of us need fewer calories (energy) because our metabolism (the rate the body uses energy) slows down. This happens mainly because of the loss of the muscle tissue, but also because physical activity is often reduced. This means that we need to eat fewer calories to maintain the same weight and to keep from gaining excess weight.

However, even though we may need fewer calories as we age, there are other changes that can increase our need for nutrients. For example, the stomach does not produce as many digestive enzymes so digestion is slowed. This means that we may need to take in more nutrients to absorb the same amount as we did when we were younger.

How does this fit with the need for fewer calories? It means that the nutritional quality of your diet must be kept high. Remember, too, that including physical activity is also very important to keeping healthy. Try to get some physical activity at least 5 days every week.

What are healthy foods for seniors?

It is a challenge to choose a diet that provides enough nutrients while at the same time provides the right amount of calories. So what is the answer? Nutrient density.

Nutrient-dense foods are those that provide vitamins and minerals without too many calories. Nutrient-dense foods include fruits, vegetables, plain breads and cereals (as opposed to pastries and other high fat, high sugar baked goods), low-fat dairy products, lean meats, poultry and fish and low-fat meat substitutes such as dried beans, peas, lentils, fish, eggs, and low-fat cheese. These foods should form the basis of your diet.

What is the Senior Food Guide Pyramid?

The Senior Food Guide Pyramid can help guide your food choices for breakfast, lunch, dinner, and snacks. Choosing a variety of nutrient-dense foods from each group is very important. This Senior Pyramid is a modification of the original Food Guide Pyramid, and takes into account the special needs of older adults.

The base of the Pyramid is Fluids. Seniors should try to consume eight 8-ounce glasses every day. Plain water is the best choice but other liquids such as fruit juice, milk, and decaffeinated coffee and tea are also fine. We'll talk more about fluids later.

The Bread, Cereal, Rice and Pasta Group: at least six servings every day. In this group, choose whole grain breads and cereals, fortified breakfast cereals, rice and pasta. This group is very important because it makes up the bulk of the diet for older adults and provides much of the

energy. Take a look at your handout for what counts as one serving from the bread, cereal, rice and pasta group.

The Fruit Group: at least two servings per day. In this group choose fruits that are yellow, orange, or red in color, and consider eating the whole food, rather than juice, in order to get fiber. Take a look at your handout for what counts as one serving from the Fruit Group.

The Vegetable Group: at least three servings per day. In this group choose vegetables that are deeply colored. Dark green, orange and yellow fresh, frozen or canned vegetables provide vitamin C, folic acid, vitamin A and dietary fiber. Cruciferous vegetables like cabbage, broccoli, beets, and kale are also good choices. Try them in smaller portions if you do not tolerate them well. Take a look at your handout for what counts as one serving from the Vegetable Group.

The Milk, Yogurt, and Cheese Group: at least three servings per day. It is recommended to have three servings from this group to provide calcium, vitamin D (in fortified liquid milk only), protein, and riboflavin, a B vitamin. It is important to choose low-fat or fat free dairy products because research shows that older people can benefit from limiting their intake of saturated fat and cholesterol, both found in milk fat. Take a look at your handout for what counts as one serving from the Milk, Yogurt, and Cheese Group.

The Meat, poultry, Fish, Dry Beans, Eggs and Nuts Group: at least two servings (2-3 oz is one serving) are recommended each day. In this group, variety and leanness are important. Some older adults may need to consider the ability to chew and the ease of preparation. Take a look at your handout for what counts as one serving from the Meat, Poultry, Fish, Dry Beans, Eggs, and Nuts Group.

The Fat and Sugar Group has no requirements. These are extras, which in moderation can help food taste good. But remember, they are not nutrient dense. When choosing a fat, it is a good idea to use liquid or soft types rather than harder fats such as lard, stick margarine or butter. Take a look at your handout for what counts as one serving from the Fats, Snacks, and Sweets Group to help you keep track of this group.

You also will see a flag at the top of the pyramid to remind us that some seniors may need more of these nutrients- Calcium, Vitamin D, and Vitamin B12. The best way to get them is from food, but sometimes a vitamin-mineral supplement is needed. Talk to your doctor or dietitian about taking supplements. Taking them may not be safe for everyone.

What are important nutrients for seniors?

Several nutrients are of special concern as we grow older: Calcium, Vitamin D, Vitamin B12. Fiber and fluids are also very important parts of our diet.

Calcium is a concern as we age, especially for bone health, but also for its role in heart health and possibly colon cancer. Think about adding another serving of milk, yogurt, or other calcium-rich foods, such as broccoli, kale, mustard greens, pinto beans, salmon and sardines canned with the bone, and soy products like tofu to your daily intake. Fortified orange juice and fortified breakfast cereals can also help. To meet your goal of 1200 milligrams per day, start with at least three servings from the milk group, and add calcium from foods such as vegetables and dry beans.

Vitamin D requirements increase as we age. Sunshine does help the process of making vitamin D in your body but your skin's ability to produce

vitamin D decreases with age. Try to get your face in the sun for 20 minutes each day you are able. Fortified low fat or fat-free milk is an excellent source of vitamin D. Your goal is 400 IU per day if you are between 51 and 70 and 600 IU if you are over 70 years of age. Because vitamin D can be toxic at high levels, speak with your doctor or a dietitian before you take a supplement.

Vitamin B12 is found in animal foods such as milk, yogurt, fish, poultry, and meats, but it's estimated that 10 to 30 percent of older people may have difficulty absorbing it because of decreases in stomach digestive juices. Vitamin B12 is important not only for healthy blood (preventing anemia) but also for proper nerve function. People older than 50 can help meet their vitamin B12 needs by eating foods fortified with B12, such as breakfast cereals. Before taking a supplement it is important to talk with your doctor.

Fiber (the parts of fruits, vegetables and grains that are not digested) not only helps keep you regular, it may also help lower your cholesterol, control blood sugar, and reduce your risk for heart disease and certain cancers. A varied diet of whole grains, such as 100 percent whole-wheat bread, whole-grain muffins or rolls, and brown rice, along with fruits, vegetables, and cooked beans and lentils can help you reach the recommended goal of 20 to 35 grams of dietary fiber every day. Check out nutrition labels to see how much is in different foods. Remember too that drinking enough liquids is important when increasing the fiber you eat.

As we age we need more **fluids and water**. Drinking too few fluids can lead to dehydration, elevated body temperature, and nausea. Fluids are especially important if you are taking medications. Even though your body may need more water, you may not feel thirsty. Try to drink eight glasses of

fluids a day even if you don't feel thirsty. Water is best but fluids can come from drinking 100% fruit juices, milk, and other beverages, and from foods such as soups and fruit. Decaffeinated beverages are the best choice as those with caffeine may have a slight dehydrating effect. If you do drink regular coffee or tea, do so in moderation.

What should I do if my loved one doesn't like eating alone?

If you or other older adults eat alone, make it more enjoyable- pamper yourself and pay special attention to meal preparation. Be creative and enjoy!

Tips to add some mealtime sparkle:

- Eat by a window and use your best dishes for every day.
- Eat a lunch in the park or on your patio.
- Use frozen prepared dinners for added variety and convenience.
- Treat yourself to a meal out.
- Invite a friend to a potluck dinner.
- Attend the nutrition program for the seniors and enjoy meals in the community.
- Prepare a new (nutrient dense) recipe each week and invite friends over for a tasting party.

❖ FOOD SAFETY FOR SENIORS

How many of you have ever had the flu? How many have ever had food poisoning? Chances are most people have had a case of foodborne illness, as food poisoning is commonly called. In fact, the Centers for Disease Control and Prevention (CDC) reported in 1999 that each year about 76 million people get sick, 325,000 people are hospitalized, and 5,000 people die of foodborne illness.

In this lesson we will explore the reasons certain groups of people are more at risk of foodborne illness, we'll learn how to protect others and ourselves from foodborne illness.

Why are Seniors at risk for foodborne illness?

As we age there is a normal decline in our immune system, which helps our bodies fight illness. Chronic disease and surgeries, which are more common among older people, also can affect our ability to resist bacteria because the body's defenses may be weakened as the body tries to recover.

The digestive tract changes as we age. Stomach acid is a first defense against bacteria and foodborne illness. During aging, there's a normal decrease in stomach acid, which increases our chances of infection if we consume contaminated food or water. Taking antacids can also affect stomach acidity. Also, the digestive process slows as we age, which could allow disease-causing organisms to stay in the digestive system longer.

Appetites may decrease among seniors for a variety of reasons, which could lead to malnutrition. A balanced diet helps keep our immune systems functioning effectively. Medication side effects, illness, physical disabilities and depression are linked with risk of malnutrition among seniors. Regular exercise can help counteract this process. The Surgeon General recommends at least 30 minutes of moderate physical activity on five or more days of the week.

Why are Seniors at risk for foodborne illness?
<ul style="list-style-type: none">▪ Immune system declines with age▪ Chronic diseases and surgery can decrease body's ability to fight infections▪ Stomach becomes less acidic▪ Digestion slows▪ Malnutrition is more common

Who else is at risk for foodborne illnesses?

If you are a grandparent, your grandchildren are at risk of getting foodborne illness because their immune systems, which help protect them from getting sick, are still immature. Foodborne illness can lead to serious dehydration among children. Along with the elderly, children are more apt to die from foodborne illness. One food that infants age one or younger should never be fed is raw honey. This sweetener contains inactive forms of bacteria called “spores” that are linked to “infant botulism,” which can be life threatening.

Who’s most at risk of foodborne illness?

- Infants and young children
- Pregnant women
- Immune-compromised
- Seniors

People who are unhealthy- whose immune systems aren’t working at normal levels- also are at risk of foodborne illness. Included in this group are cancer patients, people who have had surgery recently, and those with AIDS. Often, cancer patients cannot eat fresh fruits and vegetables because their immune systems are not able to handle the bacteria on fresh produce.

What are symptoms of foodborne illnesses?

The symptoms of foodborne illness are very similar to those associated with the flu, and they vary depending on which “bug” is responsible. Vomiting, diarrhea, cramps, fever, headache, blood or pus in stool, and exhaustion are common symptoms. Sometimes illness can occur in under 30 minutes or within four hours, but other times it may take days or even weeks for symptoms to appear. Most cases of foodborne illness last

only a day or two but some can last a week or even longer. Some types of foodborne illness are even linked to development of arthritis and other chronic ailments.

Handling food safely is important regardless of our age. For most healthy people, foodborne illnesses are neither long-lasting nor life-threatening. However, they can be severe in seniors.

What do I do in the case of a foodborne illness?

If you suspect that you or a family member has foodborne illness, follow these general guidelines:

- Preserve the evidence. If a portion of the suspect food is available, wrap it securely, mark “DANGER” and refrigerate it. Save all the packaging materials, such as cans or cartons. Write down the food type, the date, and time consumed, and when the symptoms started. Save any identical unopened products.
- Seek treatment immediately.
- Call the local health department if the suspect food was served at a large gathering, from a restaurant or other foodservice facility, or if it is a commercial product.
- Call the FDA Consumer Food Information Line at (800-FDA-4010) if you have questions.

What should Seniors NOT eat?

Some foods are riskier than others for seniors, but it may depend on how much you eat and on how healthy you are. These foods are best avoided by seniors because they've been linked to illness.

Seniors should avoid these foods whenever possible:

- Raw or unpasteurized milk and cheeses
- Soft cheeses including Feta, Brie, Camembert, and Blue-veined
*Cheeses that are OK include: hard or processed cheeses, cream cheese, cottage cheese
- Raw or lightly cooked eggs including batters, sauces, and beverages that may include uncooked egg
- Raw meat, poultry and fish
- Alfalfa sprouts
- Unpasteurized fruit and vegetable juices

Bacteria are killed by heat, so it's especially important that seniors and other at-risk groups eat thoroughly cooked foods or food that has been "pasteurized" or heat-treated for safety. Home-pressed apple juice, for example, should be heated to at least 160 degrees to kill bacteria and then refrigerated. By law, all unpasteurized juice sold in grocery stores carries a warning label.

What if I want to reheat some leftovers?

You may wish to reheat your meal, whether it was purchased hot and then refrigerated or purchased cold initially.

- Heat thoroughly to 165 degrees F until hot and steaming.
- Bring gravy to a rolling boil.
- If heating in a microwave oven, cover food and rotate dish so it heats evenly. Inadequate heating in the microwave can contribute to illnesses. Consult your owner's manual for complete instructions.

What if someone else is preparing the food?

Eating out can be lots of fun, but you need to be just as careful as you are at home. What are some food safety “rules” to think about when you dine away from home?

Always check the restaurant for cleanliness. A dirty dining room is likely an indication of a dirty kitchen. If you’re given a choice for doneness of meat, “well done” is the safe thing to say. Many restaurants no longer serve “sunny side up” eggs due to food safety concerns. If you have leftovers and you won’t be able to refrigerate the food within two hours, it’s safest for you to leave the food at the restaurant. If you usually have leftovers you could bring a cooler with ice to transport your food home during warm weather.

Rules for eating out safely:

1. Look for cleanliness of the entire restaurant.
2. Avoid the same foods at a restaurant as you would at home.
3. Always order your food “well done.”
4. Refrigerate “doggie bags” within 2 hours.
5. Reheat leftovers to at least 165° degrees until hot and steaming.

What steps can I take that will help food safety?

With all the news reports about food safety issues, it may seem there's nothing left to eat. Food safety is really about using your common sense and avoiding unnecessary risks.

Four steps to food safety:

- Clean
- Separate
- Cook
- Chill

Clean

Hand-washing is the single most important way to prevent the spread of infection, according to the Centers for Disease Control and Prevention (CDC). To wash your hands, wet with water and rub briskly with soap for 20 seconds. Rinse with running water again.

In commercial foodservice businesses, cleaning involves four steps: washing, rinsing, sanitizing, and air-drying. Use hot soapy water to wash counter tops and utensils before moving to a new product. Cleaning removes food and dirt, but “sanitizing” takes cleaning a step further by reducing the number of bacteria present. You can make your own sanitizing solution (1 teaspoon chlorine bleach per quart water), but re-make it every time you use it because it loses its effectiveness with time and use. Dishwashers also are excellent cleaning devices.

You may have noticed all the “anti-bacterial” products available, including dish, hand and laundry soaps, sponges, bathroom cleaners and many others. Anti-bacterial products are controversial. Some groups are criticizing the products, saying they may be linked to development of “super bugs”- bacteria that resist common antibiotics. Research has shown that plain soap and water can go a long way in preventing foodborne illness, so it may be in everyone's best interest to choose the “regular” products.

Cutting boards are a source of contamination in the kitchen. Cutting boards made of plastic or other non-absorbent materials are the best to use. If possible, use separate cutting boards for meats and vegetables. Regardless of the type, cutting boards should be thoroughly cleaned and sanitized after use.

Try to use paper towels as much as possible to clean up spills. If you always use cloth towels, wash them often in your wash machine. When washing fruits and vegetables, rinse in running water and use a small brush if needed or appropriate.

Separate- Don't Cross Contaminate

Cross contamination is the scientific term for how bacteria can be spread from one food product to another. Starting in the grocery store, separate raw meat from the rest of the items in your cart. In the refrigerator, store fresh meat away from fresh food and be cautious that juices from thawing meat do not contaminate ready-to-eat foods. Cross contamination is a common mistake that consumers- and professional food handlers-make.

What are some ways bacteria can be spread throughout a kitchen?

- Dishrags and sponges
- Cutting boards used to cut up meat before salad ingredients
- Kitchen shears to open meat packages before salad bags
- Handling pets before preparing food
- Putting grilled food back on the plate/pan that held raw meat
- Thawing meat above ready-to-eat foods in the refrigerator

Cook

For many years the recommendation has been to cook meat until juices run clear or to cook meat a certain number of minutes per pound. Now food safety experts recommend using food thermometers to check the internal temperature of foods to gauge doneness. For example, some research has shown that ground beef can appear done but be less than 160 degrees. To make sure your food is cooked properly, follow the guidelines on the next page.

Thoroughly cook foods as follows:

Raw Food	Internal Temp
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Ground Products

Hamburger	160°F
Beef, veal, lamb, pork	160°F
Chicken, turkey	165°F

Beef, Veal, Lamb- Roasts & Steaks

Medium-rare	145°F
Medium	160°F
Well-done	170°F

Pork- Chops, Roast, Ribs

Medium	160°F
Well-done	170°F
Ham, fresh	160°F
Sausage, fresh	160°F

Poultry

Chicken (whole & pieces)	180°F
Duck	180°F
Turkey (unstuffed)	180°F
Whole	180°F
Breast	170°F
Dark meat	180°F
Stuffing (cooked separately)	165°F

Eggs- Fried, poached, yolk & white are firm

Casseroles	160°F
Sauces, custards	160°F

(This chart has been adapted for home use and is consistent with consumer guidelines from U.S. Department of Agriculture (USDA) and U.S. Food & Drug Administration (FDA).)

Chill

Improper cooling is a leading cause of foodborne illness outbreaks. Cool temperatures slow down the growth of most types of bacteria. Leftover perishable food should be quickly placed in the refrigerator. Cut-up fruit should be kept cold (below 41 degrees). Discard any perishable foods left at room temperature longer than two hours.

Ways to cool foods fast:

- Cool in shallow containers no more than 2 inches deep for thick foods.
- Put container on an ice bath in the sink and stir.
- Cut up pieces of meat like roasts, turkey, and ham into smaller pieces.
- Unwrap leftover foil-wrapped baked potatoes before refrigerating.

Foods should never be “cooled down” on the counter top before being placed in the refrigerator. This practice dates to the time of iceboxes when putting in hot food would melt the ice. Our modern appliances can handle the temperature change.

Tips for safe handling of fruits and vegetables:

- Wash hands with warm water and soap for at least 20 seconds before and after handling food, especially fresh whole fruits and vegetables and raw meat, poultry, and fish. Clean under fingernails, too.
- Rinse raw produce in warm water. Don't use soap or other detergents. If necessary- and appropriate- use a small scrub brush to remove surface dirt.
- Use smooth, durable, and nonabsorbent cutting boards that can be cleaned and sanitized easily.
- Wash cutting boards with hot water, soap, and scrub brush to remove food particles. Then sanitize the boards by putting them through the automatic dishwasher or rinsing them in a solution of 1 teaspoon (5 milliliters) of chlorine bleach to 1 quart (about 1 liter) of water. Always wash boards and knives after cutting raw meat, poultry or seafood and before cutting another food to prevent cross-contamination.
- Store cut, peeled, and broken-apart fruits and vegetables (such as melon balls) at or below 41 degrees Fahrenheit (5 degrees Celsius)- that is, in the refrigerator.

❖ RESOURCES

Activities

1. Have attendees write down, prior to the lesson, what they ate the day before. After the lesson have them evaluate their own intake against the Senior Food Guide Pyramid.
2. Have attendees work together to write one or two days of menus, including snacks, that meet the Senior Food Guide Pyramid recommendations.
3. Set up samples of juice, cereal, and other foods to practice determining serving sizes, or use food models if available from the Extension Office.

Additional resources available

- Suggested Aging Series videos for use with this lesson available from the County Extension office include:
 - Meal Planning (4:40 minutes)
 - 5-A-Day (4:04 minutes)
 - Healthy Snacking (3:23 minutes)
 - Food Labels (4:10 minutes)
 - Saving Time and Money (4:20 minutes)
 - Exercise (3:38 minutes)

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