## -PROGRAM INSTRUCTION-

Texas Department of Aging and Disability Services (DADS) - Access and Intake Division

| TITLE: | Nutrition Standards <br> Dietary Reference Intakes and <br> Dietary Guidelines for Americans | NUMBER: | AAA-PI 314 |
| :--- | :---: | :--- | :---: |
| SECTION: | Area Agencies on Aging | APPROVAL: | Betty Ford |
| ISSUE DATE: | $4 / 1 / 11$ | REVISION <br> DATE: | N/A |
| RELEVANT <br> CITATIONS: | OAA§339(2)(A)(i)-(iii); 40 TAC §85.302 |  |  |
| DISTRIBUTION: | $\square$ Executive Director $\boxtimes$ Director $\square$ Fiscal Director $\boxtimes$ AAA Section Staff |  |  |

This program instruction provides menu and meal planning requirements for Area Agencies on Aging (AAA) and Nutrition Providers to assure compliance with the Older Americans Act of 1965 (OAA), as amended in 2006, Title III C, Sec. 339 (2)(A)(i) - (iii). This program instruction replaces AAA-TA 302. These guidelines shall be incorporated into all requests for proposals, bids, contracts, and open solicitations for meals.

## BACKGROUND:

OAA requirements are based on the scientific evidence that indicates adequate nutrition is necessary to maintain cognitive and physical functioning; to prevent, reduce and manage chronic disease and disease related disabilities; and sustain health and quality of life. These requirements ensure the provision of safe and nutritious meals that:

1) Comply with the most recent Dietary Guidelines for Americans (DGA) jointly issued and updated every five years by the United States Departments of Agriculture (USDA) and Health and Human Services (DHHS), and
2) Provide to each eligible individual
a. a minimum $331 / 3 \%$ of the Dietary Reference Intakes (DRI) established by the Food and Nutrition Board of the Institute of Medicine of the National Academy of Sciences if the project provides one meal per day;
b. a minimum $662 / 3 \%$ of the DRI if the project provides two meals per day; and
c. 100 percent of the DRI if the project provides three meals per day.

## PURPOSE:

These menu and meal planning requirements update and align with the most recent DGA and DRI to support increasing fruits, vegetables, potassium and whole grains, reducing the sodium content of the meals substantially over time, and controlling fat and calorie levels in the meals.

## PROCEDURES:

The AAAs are responsible for ensuring that meals served by nutrition providers meet these requirements. All meals including site prepared, catered, frozen, shelf-stable (non-perishable) or chilled/cold meal (box lunch) must meet the DGA and DRI requirements. Meals meeting these requirements are considered allowable meals and reported as eligible for reimbursement and Nutrition Services Incentive Program cash.

## Menu Development

Menus shall be developed with the advice and expertise of:

1) a dietitian or other individual with equivalent education and training in nutritional science, or if such an individual is not available, an individual with comparable expertise in the planning of nutritional services; or
2) other individuals knowledgeable with regard to food service management, menu planning and nutrition for older adults.

Menus shall be developed with input from nutrition consumers. Input can be obtained through any of the following:

1) menu committees
2) product sampling
3) food preference surveys
4) satisfaction focus groups
5) comment cards
6) other methods that reflect consumer input into the menu planning process

A variety of food and preparation methods, including color combinations, texture, size, shape, taste, and appearance shall be included in meal planning.

## Menu Review, Approval and Documentation

1) Menus shall be reviewed and approved prior to meal service as meeting the requirements provided in this Program Instruction (PI) by a dietitian who is licensed in the State of Texas (Licensed Dietitian) or registered with the Commission on Dietetic Registration (CDR), American Dietetic Association (Registered Dietitian), or have a baccalaureate degree with major studies in food and nutrition, dietetics, or food service management.
2) Documentation of menu review and approval shall be kept on file to include:
a. approved menus and dates menus are served;
b. signature of dietitian with Texas license or CDR registration number;
c. date of menu approval by the dietitian;
d. Computer Nutrient Analysis if applicable; and
e. approved allowable substitutions.

## Menu Substitutions

Any menu substitutions made to an approved menu shall be comparable in nutrient content to the original menu. All menu substitutions shall be documented and recorded with the menu as served. Approval of the substitution will be made by a dietitian prior to meal service or selected from a list of food substitutes for each food group that has been approved by a dietitian.

## Nutritional Adequacy

## Methods of Compliance

Nutrition Providers must demonstrate compliance with the DGA and DRI requirements by documentation using one of the following methods:

1) Computer Nutrient Analysis Software; or
2) Texas Model for Menu Planning.

Menus shall be planned and meals evaluated for meeting nutritional requirements using either of these two methods. Use of a computerized nutrient analysis rather than Texas Model for Menu Planning helps to ensure nutritional adequacy of meals and increases menu planning flexibility.

## Computer Nutrient Analysis:

1) Computer Nutrient Analysis is the process by which the menu is evaluated through analyzing the nutrient content of all foods offered to ensure that meals meet the specific standards as specified in the Target Nutrient Requirements chart (Table A).
2) Target Nutrient Requirements chart identifies key nutrients that shall be tracked for maintenance and improvement of long-term health among older adults served by the Nutrition Program. The Target Nutrient Requirements chart provides the Compliance Range per meal based on one-third of the DRI. Although meals shall be planned to attain these values, other nutrients essential for good health should also be considered. The nutrients in the Target Nutrient Requirements chart shall be tracked for compliance purposes. Calories and protein values shall be attained on a daily average. Vitamin A, vitamin C, calcium, sodium, potassium, and fiber shall be averaged over the number of serving days per week by each nutrition site.
3) For a nutrition provider or a nutrition site serving less than five days per week the vitamin $A$, vitamin C, calcium, sodium, potassium and fiber will be averaged over the number of serving days per week by each nutrition site. For example: if a nutrition provider or a nutrition site serves meals three days during a week, the required target nutrients will be averaged over the three days of meal service. For two-day meal service, the required target nutrients will be averaged over the two days of service.
4) The Compliance Range column in the chart is provided for approval and monitoring of the nutritional adequacy of menus. This range is for one meal for one day. When two meals are served to a nutrition consumer, the Target Nutrient Requirements and Compliance Ranges are doubled for a combined total; when three meals are served the Target Nutrient Requirements and Compliance Ranges are tripled for a combined total. The Computer Nutrient Analysis software program utilized to document nutritional adequacy should include the USDA National Nutrient Database for Standard Reference, standardized recipes, plus accurate nutrition data from vendors and manufacturers.

## Texas Model for Menu Planning

1) The Texas Model for Menu Planning chart (Table B) is a tool that shall be used to identify the types and amounts of foods that are recommended to meet specific nutritional requirements when Computer Nutrient Analysis software is not used.
2) All meals planned using the Texas Model for Menu Planning shall also incorporate the instructions provided within the chart.
3) Foods shall not be classified twice when using the Texas Model for Menu Planning. For example: a food item that is included in one or more food group type, may only be used once in the meal as meeting a requirement under the Texas Model for Menu Planning.
4) Limit foods high in sodium. Include foods high in potassium, vitamin C, and fiber daily.
5) Provide foods high in vitamin A three times per week if the nutrition provider or nutrition site serves five or more days per week. Provide foods high in vitamin A two times per week for nutrition providers or nutrition sites serving fewer than five days per week.

## Standardized Recipes

Standardized recipes will be used in the planning and preparation of menu items to ensure that nutrients documented by the Computer Nutrient Analysis or the Texas Model for Menu Planning are met.

A standardized recipe is one that has been repeatedly tested for consistency, quality, and yield therefore using the same procedures, equipment, and ingredients will produce the same product with consistent nutrient content each time prepared.

## Menu Service Options

## Frozen Meals

Frozen meals shall meet the nutritional values required either using the Computer Nutrient Analysis or Texas Model for Menu Planning. Frozen meals may be provided in areas where daily delivery is limited, for weekend meal services, or to enable home delivered meal programs to offer more menu choices. Frozen meals may also be used at congregate sites in rural areas where participation is low and other food service options are not feasible. Such meals will be heated and served at the site. Approved waivers are required for nutrition providers serving frozen meals

## Chilled Meals

Chilled meals or cold plate meals shall meet the nutritional values required either using the Computer Nutrient Analysis or Texas Model for Menu Planning. Chilled meals or cold plate meals may include the terms "box lunch" or "sack lunch." To be considered a chilled meal or cold plate meal all food items included must require refrigeration. Chilled meals or cold plate meals may be used to offer more menu choices. Approved waivers are required for nutrition providers serving chilled meals.

## Menu Choice

Menu choice using a selective menu can increase participant satisfaction by offering choices for one or more food items. The nutrition provider may offer the consumer the choice of entrée, choice of food items within the meal or choice of two or more distinct and complete menus. All menu choices will comply with the meal requirements provided in this PI. If more than one menu item is offered, the food item with the lowest nutrient value will be counted toward meeting the meal requirement.

## Shelf-stable

Shelf-stable meals do not require refrigeration, are non-perishable and are usually provided as emergency meals and as an option for holiday meals. However, shelf-stable meals that are provided as a part of a scheduled regular meal service must comply with the meal requirements provided in this PI. The meals must meet the nutritional values required either using the Computer Nutrient Analysis or Texas Model for Menu Planning.

## Emergency Meals

Emergency meals are provided on a temporary basis when regular meal service is not an option.
Emergency meals generally consist of shelf-stable items that do not require refrigeration and can be consumed at room temperature if necessary due to power outages. Emergency meals do not need to comply with the meal requirements provided in this PI. Defined as Health Maintenance emergency meals may be funded through a number of funding sources such as Title III-B.

## Special Dietary Needs

1) Culturally or ethnic appropriate meals-Every effort will be made to accommodate the cultural, religious or ethnic preference of the population served, when feasible and appropriate. Meals must meet the menu planning guidelines as provided in this PI.
2) Modified Meals alter the regular menu and still meet the menu planning guidelines as provided in this PI. The types and amounts of all items must conform to the regular menu pattern. Modifications may include consistency and/or texture, reduced sodium, fat, cholesterol,
carbohydrate and/or calories. The eligible consumer along with their physician is responsible for determining whether the regular or modified menu would meet and not jeopardize their health needs.
3) Therapeutic Meals change the meal pattern significantly by either limiting or eliminating one or more menu items, or by limiting the types of foods allowed thus resulting in a meal that does not meet the meal requirements of this PI. Therapeutic meals may be provided only under the direction and supervision of a dietitian with a written diet order from the participant's physician and on record in the participant's file.
4) Medical Nutritional Supplements are foods for special dietary uses that appropriately address individual nutrition needs. Nutritional supplements (e.g., canned formulas, powdered mixes, food bars or puddings) may be available to participants based on documented, assessed need and funding sources available. Medical Nutritional Supplements are products defined as Health Maintenance and may be funded through Title III-B.

## Nutrient Needs of Older Adults

Certain nutrients although not tracked for compliance, are still vital for health and well-being and may be lacking in the diets of older individuals. In addition to the Target Nutrient Requirements provided in this PI, menus/meals should be planned to include rich sources of vitamins B6, B12, E, folate, magnesium, and zinc. When possible, foods fortified with vitamin $D$ should be included into the meals through sources such as milk products or juice fortified with vitamin D. Nutrition education in addition to the meal should reinforce the message that nutrient dense foods should be included in the diets of older adults.

## Implementation

To ensure consistency among all nutrition programs, DADS recommends AAAs in conjunction with their Nutrition Providers develop an implementation plan to ensure compliance by October 1, 2011. AAA Directors should ensure this program instruction is shared with all nutrition providers.

Please direct any questions regarding the information contained in this program instruction to the Department's Help Desk at T3AHelp@dads.state.tx.us.

## List of Attachments

Table A: Target Nutrients
Table B: Texas Model for Menu Planning

## Table A

| Target Nutrient Requirements <br> Computer Analysis of Nutrients |  |  |
| :---: | :---: | :---: | :---: |
|  | DRI Target Values <br> Per Meal | Compliance Range <br> One Meal |
|  | Daily Averaged |  |  |
| calories (Kcal) | $600-750$ calories (Kcal) | $600-1000$ calories (Kcal) |
| protein | 20 grams or higher | 20 grams or higher |
| Averaged Over The Number of Days of Meal Service Per Week |  |  |
| fat (\% of Total Calories) | $25-30 \%$ of total calorie or less | $30 \%$ of total calories or less |
| vitamin A | $250-300$ micrograms (ug) | 250 ug or higher |
| vitamin C | $25-30$ milligrams (mg) | 25 mg or higher |
| calcium | 400 milligrams (mg) or higher | 400 mg or higher |
| sodium | $800-1,000$ milligrams (mg) | 1,200 mg or less |
| potassium | 1,500 milligrams (mg) or |  |
| higher | 1,200 mg or higher |  |
| fiber | 7 grams (gm) or higher | 7 gm or higher |

## Table B

## TEXAS MODEL FOR MENU PLANNING

Minimum Requirements Model to meet $1 / 3$ of DRI and US Dietary Guidelines for America Based on combination of the USDA Food Guide and DASH Eating Plan.

| Food <br> Group <br> Type | Minimum Number of Servings |  |  | Serving Information |
| :---: | :---: | :---: | :---: | :---: |
|  | Total servings for the meal if only one meal is provided | Total servings for the day if 2 meals per day are provided. | Total servings for the day if 3 meals per day are provided. |  |
| Lean Meat <br> And <br> Meat <br> Alternatives | 3 oz equivalents | $\begin{gathered} \hline 4-6 \mathrm{oz} \\ \text { equivalents } \end{gathered}$ | $\begin{gathered} \hline 6-8 \mathrm{oz} \\ \text { equivalents } \end{gathered}$ | 1 oz. Meat and Meat Alternate Equivalents: <br> - 1 oz cooked lean beef, veal, pork, lamb, chicken, turkey, or fish <br> - 1 egg <br> - $1 / 2$ cup cooked legumes (Legumes or beans can be counted as a meat alternate or as a vegetable but cannot be counted as both in meeting the meal pattern requirement.) <br> - 1 oz low-fat natural cheese (such as Swiss, cheddar, Muenster, parmesan, mozzarella) and processed American cheese (Cheese can be counted towards Milk or Milk Alternative but cannot be counted as both in meeting the meal pattern requirement) <br> - $1 / 2$ cup tofu (bean curd) <br> - $1 / 4$ cup low-fat cottage cheese <br> - 1 oz canned tuna or salmon (packed in water) |

## INSTRUCTIONS:

## Provide:

- Meats low in fat. Meats should be oven baked, broiled, grilled or roasted
- Fish as frequently as feasible because fish is a good source of protein and omega-3 fatty acids.

Limit:

- Processed, smoked, cured meat, or a high sodium content meat or meat alternate to no more than one 3 oz serving per week. Examples: cold cuts, ham, hot dogs, canned tuna or salmon and sausage.
- Cheese to no more than 3 oz per week because of high sodium content.

| TEXAS MODEL FOR MENU PLANNING |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Minimum Number of Servings |  |  | Serving Information Serving Sizes |
| Food <br> Group <br> Type | Total Servings for the meal if only one meal is provided | Total Servings for the day if 2 meals per day are provided. | Total Servings for the day if 3 meals per day are provided. |  |
| Fruits <br> And <br> Vegetables | 2-3 | 6 | 8 | - $1 / 2$ cup cooked, canned, or chopped raw vegetables and fruits <br> - 1 cup-leafy raw vegetable such as lettuce or spinach <br> - $3 / 4$ cup $100 \%$ fruit or vegetable juice <br> - 1-whole fruit such as medium apple, banana or orange <br> - $1 / 8$ melon <br> - $1 / 2$ grapefruit <br> - $1 / 4$ cup dried fruit <br> Starchy Vegetables: <br> - 1 small potato or $1 / 2$ large potato <br> - $1 / 2$ cup sweet potatoes or yams <br> - $1 / 2$ cup corn kernels, winter squash, peas, or lima beans |
| INSTRUCTIONS: <br> Provide Foods Sources High in: <br> vitamin A - a minimum of three (3) times per week if the nutrition provider or nutrition site serves five or more days per week OR two (2) times per week for the nutrition provider or nutrition site serving fewer than five days per week. <br> Examples: apricots, beet greens , broccoli, cantaloupe, carrots, cherries (red, sour), chili peppers (red), greens, green asparagus, nectarines, peaches, peas, peppers (sweet red), purple plums (canned), prunes, squash (winter), spinach, sweet potatoes, tomatoes, and pumpkin (dark green or orange vegetables), and vegetables (mixed) vitamin C - daily, Examples: asparagus, broccoli, brussel sprouts, cabbage, cantaloupe, cauliflower, grapefruit/juice, greens, honeydew melon, okra, orange/juice, peppers- sweet red and green, pineapple/juice, potatoes (baked, broiled, steamed), potatoes (instant with vitamin C fortified), spinach, strawberries, sweet potatoes, tangerines, tomatoes, turnip greens, and vegetable juice (low sodium) <br> Potassium - daily, Examples: apricots, bananas, beans, broccoli, cantaloupe, carrots, cucumber, lima beans, oranges, potatoes, raisins, spinach, sweet potatoes, tomatoes and watermelon <br> Fiber - daily, examples: beans or legumes, berries, fruits with skin, greens peas, potatoes/skin, squash/skin <br> Limit: <br> - Juice to one serving per meal <br> - Starchy vegetables to no more than one serving per meal <br> - Canned vegetables with sodium/salt to one serving per meal <br> - Canned soups/ bouillon with sodium |  |  |  |  |

## TEXAS MODEL FOR MENU PLANNING

| Food Group Type | Minimum Number of Servings |  |  | Serving Information Serving Sizes |
| :---: | :---: | :---: | :---: | :---: |
|  | Total Servings for the meal if only one meal is provided | Total Servings for the day if 2 meals per day are provided. | Total Servings for the day if 3 meals per day are provided. |  |
| Grains | 2 | 4 | 6 | - 1 or 1 oz equivalent bread or grain product <br> - $1 / 2$ cup cooked cereal, pasta, noodles <br> - $1 / 2$ cup cooked rice <br> - $3 / 4$ cup dry cereal <br> - 1 slice of bread <br> - $1 / 2$ English muffin, bun, small bagel, or pita bread <br> - 1-6-inch tortilla <br> - $11 / 4 "$ square cornbread <br> - 1-2" diameter biscuit or muffin <br> - 4-6 crackers <br> - $3 / 4$ cup ready-to-eat cereal |

INSTRUCTIONS:

## Provide:

- Whole grain products are encouraged. At least one-third of the grain servings provided under this Food Group Type should be from a whole grain fiber rich source. Examples include: brown rice, bran or bran enriched food, or whole grain bread or product.


## Limit:

- Quick breads such as cornbread, biscuits, and muffins due to a higher fat and sodium content should be limited to once per week.

| TEXAS MODEL FOR MENU PLANNING |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Minimum | Number of | f Servings |  |
| Food Group Type | Total servings for the meal if only one meal is provided | Total <br> servings for the day if 2 meals per day are provided. |  | Serving Information Serving Sizes |
| Milk <br> Or <br> Milk <br> Alternate | 1 | 2 | 3 | - 1 cup vitamin D fortified skim, $1 \%$ or $2 \%$ low fat <br> - 8 oz low fat yogurt (vitamin D fortified preferred) <br> - 1 cup soy beverage fortified with vitamin D and calcium <br> - $11 / 2$ oz natural cheese <br> - 2 oz processed cheese <br> - 1 cup pudding made with fortified milk <br> - 1 cup calcium/vitamin D fortified juice |

INSTRUCTIONS:

## Limit:

- Natural and processed cheese and unfortified yogurt as a alternate since these products are not vitamin D fortified

Desserts
Optional

## INSTRUCTIONS:

## Provide:

- Nutrient rich desserts that include fruit, whole grains, low-fat milk products, or products with limited sugar to count toward meeting the appropriate food group required servings. (e.g., apple crisp with oatmeal topping, low-fat pudding, canned fruit, gelatin with fruit, ice cream, or frozen yogurt).


## Limit:

- Desserts such as cakes, pies, cookies to once per week if one meal per day is served.

| TEXAS MODEL FOR MENU PLANNING |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Minimum Number of Servings |  |  | Serving Information Serving Sizes |
| Food Group Type | Total servings for the meal if only one meal is provided | Total servings for the day if 2 meals per day are provided. | Total servings for the day if 3 meals per day are provided. |  |
|  | Optional |  |  | - 1 teaspoon soft margarine made from unsaturated oils <br> - 1 teaspoon oil (Olive, peanut, canola, safflower, corn, sunflower, soy and cottonseed) <br> - 1 Tbsp mayonnaise <br> - 2 Tbsp salad dressing |
| or Fats | No more than 1 serving | No more than 2 servings | $\begin{gathered} \hline \hline \text { No more } \\ \text { than } 3 \\ \text { servings } \end{gathered}$ |  |

## INSTRUCTIONS:

## LIMIT:

- Total fat to no more than $30 \%$ of total calories by providing an oil or fat serving only to enhance the flavor or presentation of the meal.

ELIMINATE: ALL sources of trans fat from the meal planning.

## *Other Foods

## Optional

- Low fat gravies, sauces, condiments, mustard and catsup

INSTRUCTIONS:
*Other foods - optional to make up additional calories as needed Use only low or lower sodium and lower fat products
Utilize optional other foods to enhance the flavor of the meal or to help maintain holding temperatures.

## Limit:

- Foods high in sodium.
(Canned soup/bouillon, prepared cooking sauces, pickles, olives, processed foods, salted foods, soy sauce).

