

Health, Physical Education, Family and Consumer Sciences

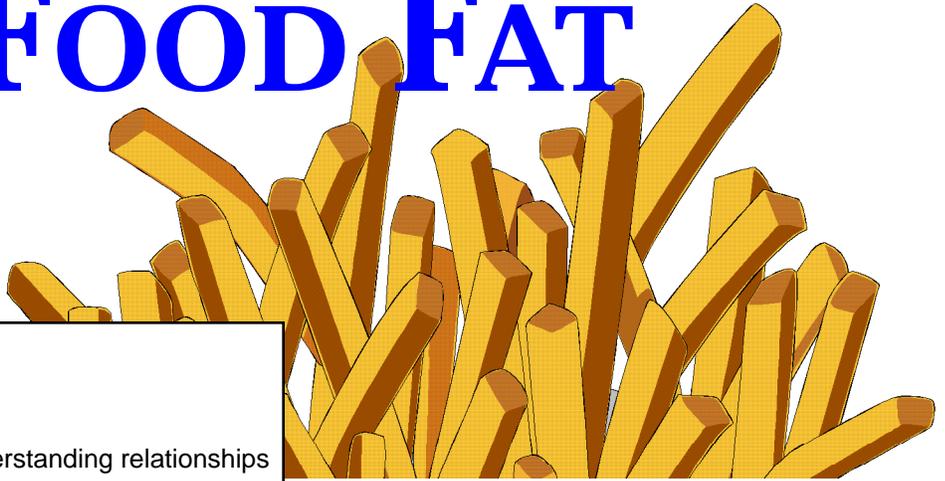
Resource Guide

PART II.1

Food Fat.....	2
Creation of an Educational Toy, Game, or Story.....	5
Budgeting: Can You Make It Out In The Real World?	8
Final Project: Food and Nutrition Class	14

Note: This document is a work in progress. Parts II and III, in particular, are in need of further development, and we invite the submission of additional learning experiences and local performance tasks for these sections. Inquiries regarding submission of materials should be directed to: The Health, Physical Education, and Family and Consumer Sciences Resource Guide, Room 681 EBA, New York State Education Department, Albany, NY 12234 (tel. 518-474-5922).

FOOD FAT



HEALTH
PE
F&CS
1

▲ understanding relationships among diet, health, and physical activity

This is a high interest activity that can be part of a larger unit, an introductory activity, or a lesson by itself.

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Mynderse Academy

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Seneca Falls, NY 13148

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Grades 9-12

Name of snack _____

Serving size _____

Calories per serving _____

Fat (grams) per serving _____

% of Calories from fat _____

Calculated by: $\frac{\text{fat grams} \times 9 \text{ calories}}{\text{total calories}}$

of Minutes to run or walk (circle)
to burn off these calories _____

In the past, this activity has been included in the Food and Nutrition classes, but this year it is a part of an interdisciplinary unit for Health, Physical Education, and Family and Consumer Science students combining Heart Health, Aerobics, and Healthy Food Choices.

The purpose of Food Fat is for teenagers to evaluate snack foods dealing with calories and fat and to use this information to make informed and wise food choices.

Students will be able to identify the amount of fat in common snack foods, and graphically see the fat in a container by measuring the equivalent of the food fat with shortening. Students can also determine what kind and amount of physical exercise would be needed to burn off the same number of calories from this snack food.

Students should have a general knowledge of nutrition and should be able to read a food label or nutrition chart. In some instances, students will need to perform basic math skills such as changing a fraction to a percent when calculating percent of calories from fat and simple multiplication or division to determine the length of exercise time to burn off snack food.

One class period is needed for the completion of the activity, with additional time on another day for formal sharing of results and processing of the activity.

Teacher

What The Students Do:

Using a snack food label or information from a nutrition chart, students work individually or in pairs to determine the following information:

- serving size
- calories per serving
- grams of fat
- percent of calories from fat

Continue working in pairs to determine the amount of food fat in each snack. Use shortening to represent the food fat equivalent (approximately 1 tsp. of shortening = 4 gms. of food fat) and measure that amount into a labeled container. (Wash any measuring equipment.)

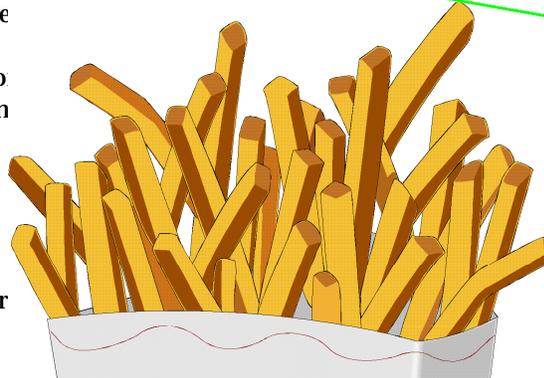
Use a chart with calorie usage to determine how long a typical student would need to walk or run to burn off the calories from the snack. This information is also placed on an index card.

Report results and compare the amount of fat in common snack foods. Discuss whether their snack food was a good, fair, or poor snack choice based on fat and calories. Predict if this project will influence snack choices in the future and why by completing the assessment

After approximately two to three weeks, complete the written assessment again to determine if healthier snack choices were being made.

Blueberry Bagels
1 bagel
190 calories
2 gms fat
10% calories from fat
Walk for 38 minutes
(avg. 143 pounds)

Corn Chips
Serving Size - 1/4 oz. bag
Calories - 190
Total Fat - 12 gms
% Calories from Fat - 60%
Need to Walk 36 min. to burn 190 calories
(based on someone weighing 143 lbs)



French Fries
37-1" pieces
140 calories
30% Calories from fat
6 gms. fat
Run for 15 min.

What The Teachers Does:

Assign different snacks to each student or pair of students. Provide reference materials such as nutritional charts for snacks from fast food restaurants and other charts indicating calorie expenditures for exercising such as running and walking.

Assist students needing individual help and facilitate reporting/discussion.

Provide access to a sink and detergent for washing measuring spoons.

V. Assessment Tools and Techniques

Students could be graded for completion of the classroom project and from the classroom discussion.

An individual written assessment could also be given from students' responses to the following questions:

1. What did you or others learn from this classroom activity?
2. How can this activity help you or other teenagers make healthier food choices?
3. What are at least 10 healthy food choices for snacks that are low in fat?
4. Write a brief statement about your snack habits, whether they usually include foods high or low in fat, and what you could do to improve your snack habits, if applicable.

Guide for rating class project:

3-completed all required info. for index card	2-completed most required info. for index card	1-completed little required info. for index card
3-all information accurate	2-most information accurate	1-little information accurate
3-measured shortening accurately	2-measured shortening but was off a little	1-measured shortening but was not close
3-shared information with class	2-shared most of information with class	1-shared little information with class

Guide for rating written assessment:

3-explained 5 or more things learned	2-explained 3 - 4 things learned	1-explained 1 -2 things learned
3-clearly articulated how project could help improve snack choices	2-explained, but was not clear how project could help improve snack choices	1-tried but was not able to articulate how project could help improve snack choices
3-listed 8-10 healthy snacks	2-listed 6-8 healthy snacks	1-listed 3-5 healthy snacks
3-statement included snack assessment information	2-statement included most of snack assessment information	1-statement included some of snack assessment information

Assessment

REFLECTION

This activity actively engages the students to determine fat content in foods and can be personalized when students analyze their most frequent or popular snack items. *The drawback with any awareness activity is that, despite an understanding of information, a behavior change or making better choices is not a guaranteed result.* Therefore, this activity could be enhanced with additional reinforcement activities, heart disease issues, and by stressing the relationship of exercise and health.

Creation of An Educational Toy, Game, or Story

HEALTH
PE
F&CS
2

▲ describe safe and appropriate toys and activities

Laurie Skinner

Palmyra-Macedon Central

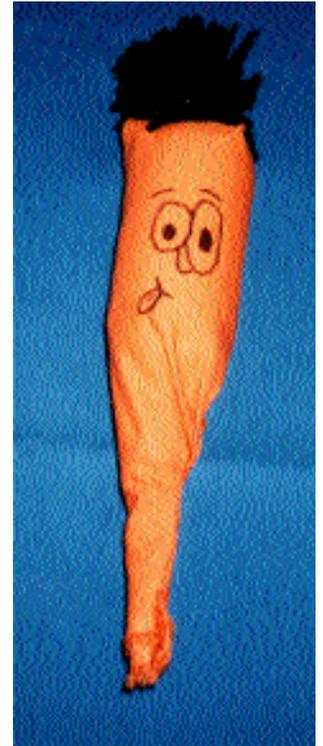
Palmyra-Macedon Middle School

163 Hyde Parkway

Palmyra, NY 14522

315-597-3450

Grade 7



The instructions are to create a toy, game, or story suitable for a young child from birth to six years.

It is helpful to have some examples of toys, games, and stories for reference.

This project is not expensive.

Items can be created with things found around the home such as clean socks for a puppet, cardboard for a puzzle, construction paper for a book, etc.

This activity is part of a child care and development unit in the seventh grade.

It is a homework assignment—student are given a week to 10 days to complete it.

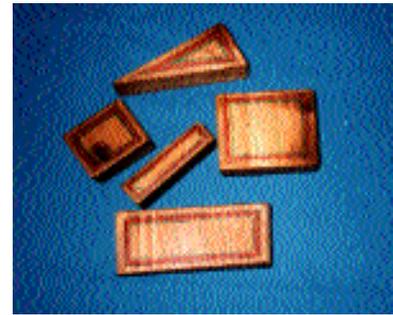
Students have studied growth, development, and play of children in this age range in other lessons.





ASSESSMENT

Does It Work?



- puppet** Does the "mouth " stay on the fingers?
- puzzle** Do the pieces link together?
- game** Does it have clear, easily followed directions?
- blocks** Can they be used to build with?
- mobile** Is the design on all sides and does it hang well?
- story book** Does it read smoothly and is the theme appropriate?
- color book** Are both primary and secondary colors shown?
- letter book** Does the book have both upper and lower case letters and an appropriate picture?
- number book** Does the book have the number (1), word written out correctly (one), and a picture representation?

Educational Toy, Game or Story Evaluation

Name _____
Date _____ Period _____

Student:

- Age for which the project is designed _____.
- Value of project for the child (What will child learn?) _____

SELECTING A GOOD TOY -Place a check mark for each question in the appropriate column.

Points T = Teacher S = Student	4 Excellent		3 Good		2 Fair		1 Poor	
	T	S	T	S	T	S	T	S
1. Does it work? (see criteria)								
2. Is it safe? No loose pieces No small pieces that could come off easily No sharp edges or staples								
3. Is it sturdy, durable, well constructed?								
4. Is it easily cleaned?								
5. Is the color lasting and harmless?								
6. Can it be used in different ways?								
7. Is it designed to meet specific needs for the child's age? Can he/she use and develop his/her skills with this toy?								
8. Is the cost reasonable?								
Total Points								
Teacher Total								
Student Total								

Comments:

Educational Toy, Game or

Name Kelly

Story Evaluation

98

Date _____ Period A

Student:

1. Age for which the project designed 3-4 yr. olds

2. Value of project for the child (What will child learn?) eye hand coordination, shapes, letters, color skills

Do NOT write below.

* * * * *

SELECTING A GOOD TOY

31

Points	4 Excellent	3 Good	2 Fair	1 Poor
1. Does it work? <i>Good you have primary & secondary colors Very neatly done</i>	✓			
2. Is it safe?	✓			
3. Is it sturdy, durable, well-constructed?	✓			
4. Is it easily cleaned?		✓		
5. Is the color lasting and harmless?	✓			
6. Can it be used in different ways?	✓			
7. Is it designed to meet specific needs for the child's age? Can he/she use and develop his/her skills with this toy?	✓			
8. Is the cost reasonable?	✓			
Total Points	28	3		



Comments:

REFLECTION

I use former students' work for examples to encourage students. Magazines, catalogues, and child development texts have examples as well. Students do need encouragement and reminders.

REFLECTION:
REFLECTION:

Budgeting:

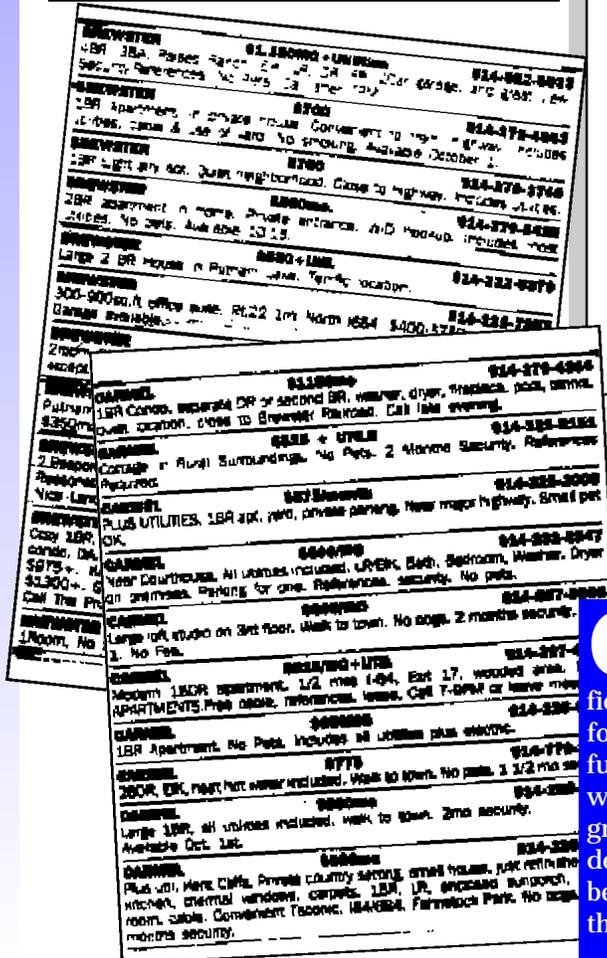
Can You Make It Out In The Real World?



HEALTH
PE
F&CS
1

▲ budget time and money by developing a financial plan

This is a unit taught immediately following lessons on principles of money management, and preceding financial awareness for post-secondary education.



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Brewster Central Schools

Henry H. Wells Middle School

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Grade 8

Students have five 40-minute periods to:

One - Select a job from local classified ads advertising employment opportunities for students with a high school diploma and no further training. Compute, on a net income worksheet, their take home pay based on their gross monthly salary, minus the standard deductions from their paycheck. This figure becomes the amount they have to work with for their monthly budget.

Administrative Assistant - training program, work on commission, flexible hours. Starting salary \$1,400 per month. No Benefits.

Administrative Assistant - some experience p
5 sick days per year. Profit sharing plan a
Some overtime expected. Good phone skills r

Marketing Representative - need outgoing, e

It is obvious from the work on the sheets that this student considered several alternatives when selecting groceries, and made adjustments to his flexible expenses in order to meet the requirements of the assignment.

Teacher

Single _____

Roommate _____

Position: Gas Station Attendant

Hourly Wage: \$6.00

ESTIMATE GROSS INCOME:

Hourly Wage 6 x number of hours worked 40 = 240 x 4 weeks
= \$960 (Monthly Gross Income)

CALCULATE NET INCOME

Income taxes = 15 percent (Gross income x .15)

\$144.00

Social Security = 6 percent (Gross income x .06)

\$57.60

Total Taxes withheld:

\$201.60

Other deductions

\$20.00

201.60
20.00

Gross income minus taxes and other deductions = Net Income

Find your net income: GROSS INCOME
MINUS TAXES
MINUS DEDUCTIONS
NET INCOME

BUDGET SHEET #1

960 The following is a shopping list of food two people would need to prepare three meals a day for one week. If you are single, divide your total by two.

ITEM	PRICE
1 package spaghetti	<u>2.00</u>
1 package cereal	<u>1.20</u>
2 cans spaghetti sauce	<u>2.40</u>
1 lb. potatoes	<u>.95</u>
1 dozen eggs	<u>1.19</u>
1 gallon milk	<u>2.69</u>
1 loaf bread	<u>.79</u>
1/2 lb. butter	<u>.75</u>
2 cans orange juice	<u>1.20</u>
1 jar of jam	<u>1.29</u>
1 chicken	<u>3.00</u>
1 lb. hamburger meat	<u>2.00</u>
1 lb. apples	<u>1.00</u>
4 oranges	<u>1.00</u>
2 bananas (1 lb.)	<u>1.00</u>
1 head lettuce	<u>.50</u>
1 instant dinner (Hamburger Helper, etc.)	<u>1.19</u>
1 lb. ...	<u>1.00</u>

Two - Fill out grocery prices by comparison shopping the food ads.

Students need to understand checking and savings accounts, loans and use of credit, insurance, paycheck deductions, and job benefits.

The following is a shopping list of food two people would need to prepare three meals a day for one week. If you are single, divide your total by two.

ITEM	PRICE
1 package spaghetti	<u>2.80</u>
1 package cereal	<u>1.20</u>
2 cans spaghetti sauce	<u>2.40</u>
1 lb. potatoes	<u>45</u>
1 dozen eggs	<u>1.19</u>
1 gallon milk	<u>2.69</u>
1 loaf bread	<u>79</u>
1/2 lb. butter	<u>75</u>
2 cans orange juice	<u>1.20</u>
1 jar of jam	<u>1.29</u>
1 chicken	<u>3.00</u>
1 lb. hamburger meat	<u>2.00</u>
1 lb. apples	<u>1.00</u>
4 oranges	<u>1.00</u>
2 bananas (1 lb.)	<u>1.50</u>
1 head lettuce	<u>1.19</u>
1 instant dinner (Hamburger Helper, etc.)	<u>1.49</u>
1 lb. green beans	<u>65</u>
1 can corn	<u>8</u>
1 package cookies	<u>1.00</u>
1 bag potato chips (1/2 lb.)	<u>1.00</u>
1 package pudding	<u>59</u>
3 large bottles coke	<u>2.70</u>
1 lb. pork chops	<u>1.99</u>
2 packages sandwich meat (bologna, salami, ham, etc.)	<u>2.61</u>
1 package cheese	<u>3.00</u>
Extras: (flour, sugar, seasoning, etc.)	<u>5.00</u>
GROCERY COST OF FOOD FOR ONE WEEK:	<u>48.-</u>
(Multiply by 4)	
GROCERY FOOD EXPENSE FOR ONE MONTH (Divide by 2 for your share)	<u>192.60</u> <u>96.30</u>
EATING OUT:	<u>10.00</u>
TOTAL FOOD EXPENSE FOR ONE MONTH:	<u>106.30</u>

Flexible Expenses:

Household items-(Misc. items)	<u>10.60</u>
Food (total from other side of page)	<u>106.30</u>
Clothing	<u>40 10.00</u>
Personal Care (shampoo, etc.)	<u>7.75</u>
Medical Care	<u>80</u>
Transportation (gas, oil, or carfare)	<u>60</u>
Recreation	<u>200</u>
Gifts (Christmas, birthdays, etc.)	<u>8</u>
Misc. (pets, hobbies, etc.)	<u>10</u>
TOTAL FLEXIBLE EXPENSES	<u>447</u> <u>292.65</u>

Three -Discuss and decide how the remaining flexible expenses will be incurred.

Five

-Complete a budget summary showing that expenses are less than their income.

BUDGET SHEET #4

A-

MONTHLY BUDGET

Gross Income

\$ 960.00

Minus taxes & other deductions

221.60

Net Income

\$ 738.40

Estimated Expenses

Fixed Expenses

Rent

350

Car Upkeep

Car Insurance

Life Insurance

Car Payment

Utilities

30.00

Installment Debt
(Furnishings)

30.00

Education

20.00

Emergency Fund

(Furnishings on
Computer)

\$ 10.00

Apartment
TOTAL FIXED EXPENSES

\$ 440.00

Flexible Expenses

Household Supplies

Total Food Expenses

Clothing

Personal Care

Medical Care

Gas and Oil
(Transportation)

Recreation

Gifts

Miscellaneous
(pets, hobbies,
etc.)

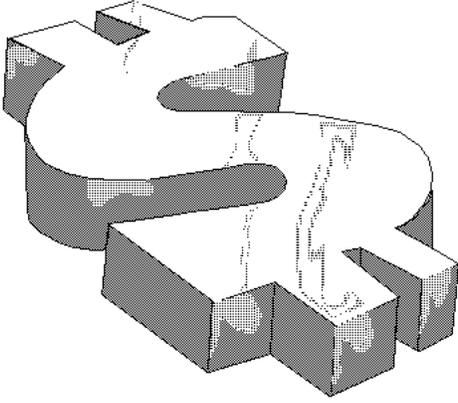
TOTAL FLEXIBLE EXPENSES

292.65

TOTAL EXPENSES

732.65

Teachers have to:



Compile a list of classified ads and verify that employers will take high school graduates. Compile a list of apartments and house rentals available in the area. This does take time but, when completed, the sheets can be reused with updates as needed.

Explain flexible expenditures and discuss the research that will be needed to determine how much would need to be spent on clothing, recreation, etc., for the month.

Form groups of students, as needed to find apartments to rent and to share fixed expenses.

ASSESSMENT

If the summary sheet shows less money expended than earned, the students have met the standard of managing their personal resources by creating a workable financial budget.

A black square icon with a white dollar sign and the word "Assessment" in white text.

REFLECTION

The budgeting unit is presented to a diverse group of mixed ability students. All students seem to be able to grasp the concepts and are motivated to participate in this preliminary step toward independence.

A vertical green bar with the word "REFLECTION:" in white, bold, uppercase letters, and the word "REFLECTION:" in white, italicized, uppercase letters below it.

FINAL PROJECT: FOOD AND NUTRITION CLASS

HEALTH
PE
F&CS
1

- ▲ plan a balanced diet/use new technologies to prepare foods
- ▲ identify ways to meet basic needs of family members
- ▲ apply decision making to health-related dilemmas

This project lets an instructor know if students can really feed themselves nutritiously for low cost.

Teacher

All students need to have the skill, so it applies to everyone in the class.

Teacher

Jo-Ann Rascoe

Plattsburgh High School

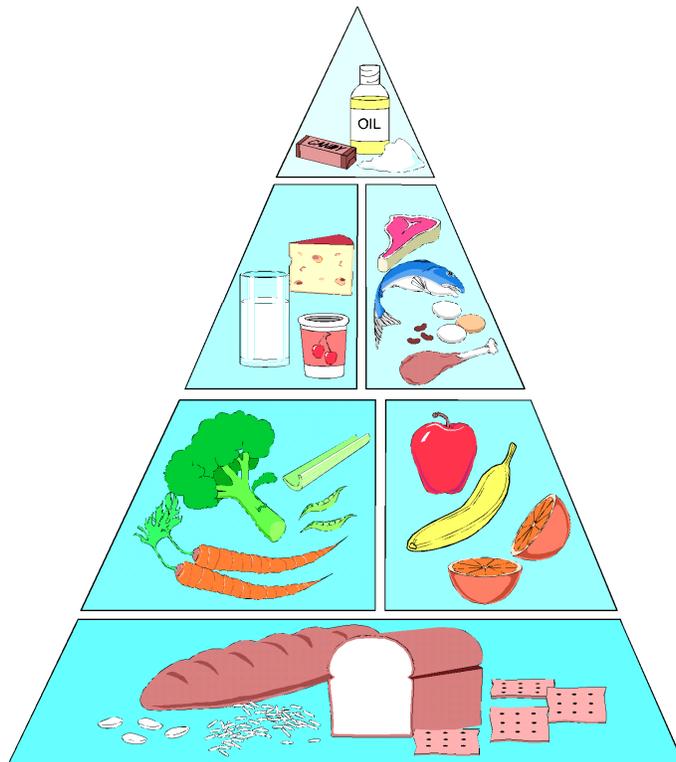
1 Clifford Drive

Plattsburgh, NY 12901

518-561-7500

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Grades 9-12



will use an understanding of the of good nutrition to plan appro-pts for themselves and others. This hands-on activity that has stu-ecision-making process and their ution, including the dietary food pyramid, to plan a week's ost menus.

**complete the project
nts need:**

- flyers
- ipons
- ewspaper advertisements for food
- amily Economic Review
- information from the United
- tates Department of Agriculture

**Cost of Food at Home Estimated for Food Plans at Four Cost Levels,
February 1997, U.S. Average¹**

SEX-AGE GROUPS	COST FOR 1 WEEK				COST FOR 1 MONTH			
	Thrifty plan	Low-cost plan	Moderate-cost plan	Liberal plan	Thrifty plan	Low-cost plan	Moderate-cost plan	Liberal plan
FAMILIES:								
FAMILY of 2²:								
20-50 years	56.80	71.60	88.20	109.80	246.10	310.20	382.10	475.50
51 years and over	53.50	68.90	85.00	101.80	231.60	298.10	368.10	441.00
FAMILY OF 4:								
Couple, 20-50 years and children—								
1-2 and 3-5 years	82.40	103.10	126.00	154.90	357.30	446.70	545.80	671.30
6-8 and 9-11 years	94.80	121.40	151.30	182.30	410.80	526.10	655.50	790.10
INDIVIDUALS³								
CHILD:								
1-2 years	14.80	18.10	21.20	25.70	64.10	78.60	92.00	111.50
3-5 years	16.00	19.90	24.60	29.40	69.50	86.10	106.40	127.50
6-8 years	19.70	26.40	32.80	38.20	85.50	114.30	142.30	165.70
9-11 years	23.50	29.90	38.30	44.30	101.60	129.80	165.80	192.10
MALE:								
12-14 years	24.40	33.80	41.90	49.30	105.50	146.70	181.70	213.80
15-19 years	<u>25.10</u>	34.90	43.40	50.10	108.80	151.10	188.00	217.20
20-50 years	27.10	34.70	43.30	52.40	117.60	150.30	187.40	227.00
51 years and over	24.50	33.10	40.70	48.80	106.10	143.30	176.20	211.40
FEMALE:								
12-19 years	<u>24.30</u>	29.20	35.40	42.70	105.10	126.50	153.30	185.10
20-50 years	24.50	30.40	36.90	47.40	106.10	131.70	160.00	205.30
51 years and over	24.10	29.50	36.60	43.70	104.40	127.70	158.40	189.50

¹ Assumes that food for all meals and snacks is purchased at the store and prepared at home. Estimates for the thrifty food plan were computed from quantities of foods published in *Family Economics Review*, 1984, No. 1. Estimates for the other plans were computed from quantities of foods published in *Family Economics Review*, 1983, No. 2. The costs of the food plans are estimated by updating prices paid by households surveyed in 1977-78 in USDA's Nationwide Food Consumption Survey. USDA updates these survey prices using information from the Bureau of Labor Statistics: "CPI Detailed Report", table 4, to estimate the costs for the food plans.

² Ten percent added for family size adjustment. See footnote 3.

³ The costs given are for individuals in 4-person families. For individuals in other size families, the following adjustments are suggested:

* 1-person—add 20 percent; 2-person—add 10 percent; 3-person—add 5 percent; 5- or 6-person—subtract 5 percent; 7- (or more) person—subtract 10 percent.

This file may be accessed on CNPP's home page at: <http://www.usda.gov/fcs/cnpp.htm>

Issued April 1997

25.10	24.30
x 1.20	x 1.20
<u>30.12</u>	<u>29.16</u>

Procedure

Using the *Final Project and Exam Form* and the latest information from the USDA indicating their average cost of food at home on a thrifty plan, the students prepare a one-week menu plan including breakfast, lunch, dinner, and a snack. The menu must meet the *Dietary Guidelines Food Pyramid* and overall nutrient density. A market order must also be prepared that stays within the allotted spending plan.

Transparency
Master 12-1

Dietary Guidelines

Chapter 12



1. **Eat a variety of foods** including fruit, vegetables, whole grain products, dairy products, lean meat, poultry, fish, and beans.
2. **Maintain your ideal weight** by exercising regularly and by limiting fats and sugars.
3. **Avoid too much fat and cholesterol** by eating lean meat, poultry, fish, and legumes; limiting eggs, butter, margarine, and whole milk dairy products; and avoiding fried foods.
4. **Choose foods high in starch and fiber** by eating whole grain bread, cereals, and pasta and by substituting fruits, vegetables, nuts, or plain popcorn for sugary or high fat snacks.
5. **Avoid too much sugar** by eating fewer sweets, including those that contain brown sugar, raw sugar, honey, or maple syrup.
6. **Avoid too much salt** by using less salt in cooking and at the table, limiting salty foods such as pretzels and potato chips, and reading product labels for hidden sources of salt and sodium.
7. *Alcohol moderation*



FINAL PROJECT AND EXAM - FOOD AND NUTRITION

FORMAT

NAME Jane

DAY - (Start With Sunday) - Female \$25.32 - Male - \$26.04

Be sure to include amounts of foods on menus and be fairly specific. For example, if you had a tomato on your tossed salad, that would not only count as a vegetable, but as a vitamin A serving as well.

Breakfast- Toasted Eng. Muffin
with peanut butter
3/4 cup orange juice

Lunch- Chicken Sandwich
(1 slice chicken (leftover from Baked chicken breast)
(2 slices wheat bread 1 tsp. mustard)
Carrot sticks (1 carrot)
1 Cup skim milk

Dinner-
1 Cup spinach/lettuce salad
with 1 tbs. italian dressing
2 Cups spaghetti with 1/2 Cup spaghetti sauce
1 Cup skim milk
garlic bread (leftover hamburger bun with garlic powder)
and italian dressing (2 tsp)

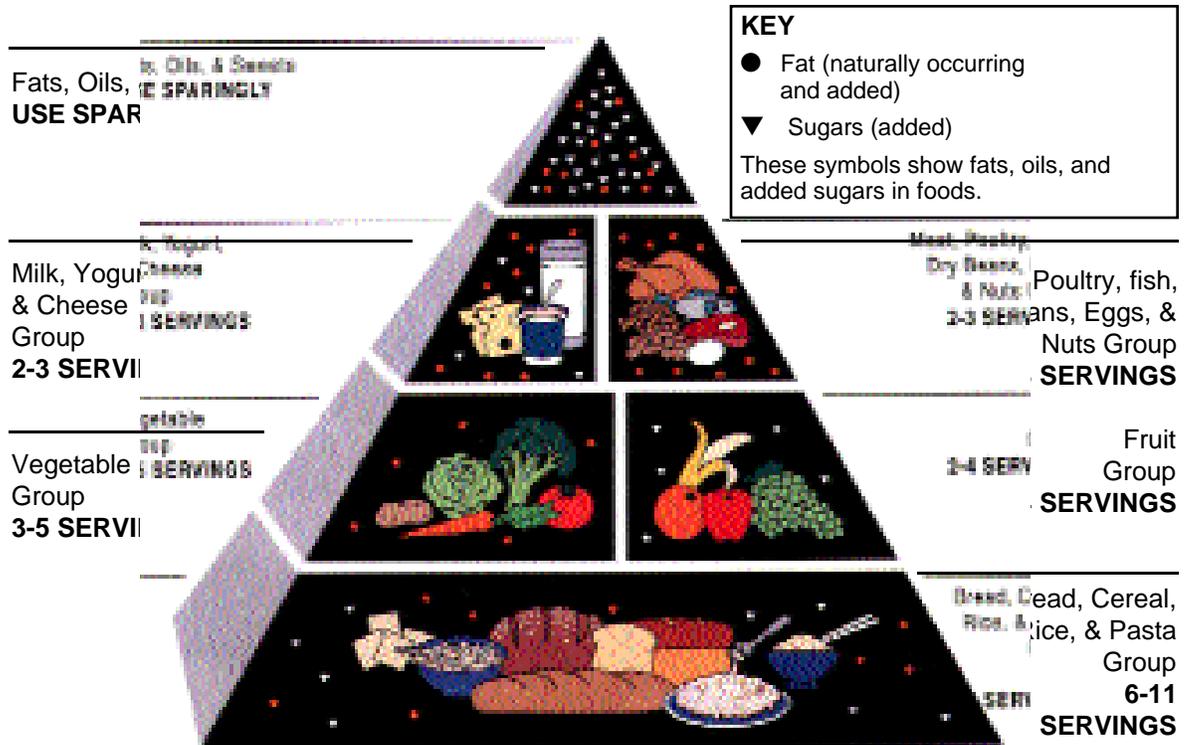
Snack-
Apple

Milk - Dairy	<u>2</u>	Two points for each - 84 points
Meat- protein	✓	variety - 6 points
Bread and grain	<u>10</u>	grocery list - 10 points
2 Fruit and 3 vegetable	<u>2/3</u>	100 points
Vit. A & C	✓	
Fat and sodium	<u>OK</u>	

Other possible meals from the chicken on the market order that is left over

- Stuffed chicken breast
- Baked breast slices (1 saved for sandwich)
- BBQ Chicken wings
- STIR FRY & Salad from thighs
- Baked chicken legs
- Soup - (bones - wing-tips)

Food Guide Pyramid



One class day per week for the last month of the course is used to provide guidance and instruction using newspaper ads, sale flyers, etc., as students work on their plans. Information on the cost of food at home for the thrifty plan can be obtained from the USDA's *Family Economic Review*.



ASSESSMENT

Serving sizes are those referenced on the Food Pyramid.