

A-life

'Nutritional Value'

Learning Objective:

- To begin to understand the nutritional values of different food
- To begin to understand the information supplied on a food label
- To understand the concept of 'recommended daily values'

Success Criteria:

- ✓ I can recognise that all foods carry differing nutritional values
- ✓ I am beginning to understand the information supplied on a food label
- ✓ I understand that there are 'recommended daily values' for our diets

Curriculum Links:

Science - Humans and other animals
PSHE - health and hygiene

No. of Children: 30

Age group: Years 5-6

Time: 1 hour

Resources:

Ready prepared nutritional value 'top trump' cards (*created by ezzysunlight TES website*)
Blank 'top trump' cards
Nutritional value explanation prompts
A range of packages showing nutritional values

Introduction:

- In small groups, provide the children with a range of packaging containing different nutritional value labels, alongside the explanation sheet.
- Allow the children to discuss what they can find out from the packaging and labels.
- Explain to the children what information the different sections give us and explain what is meant by 'recommended daily allowances'.

Main Activity:

- Hand out the nutritional value top trump cards and allow pupils to play the game in pairs.
- Remind pupils that there are some values that you want to be high (protein, carbohydrates) and some need to be low (salt, sugar).

- Hand out the blank nutritional value top trump cards.
- Using previous research into nutritional values of food (possible homework) and the packaging from earlier, gather the nutritional values for different foods. Create a brainstorm or planning board.
- Ask pupils to fill in the nutritional values for different foods they find onto the blank template. Pupils can draw or print pictures of the various foods for the bottom box of the top trump card.
- Allow the children to work together in pairs or small groups to gather information if they are struggling to find the information on their own.







Plenary:

- Select several children to play their version of top trumps with another member of the class or the class teacher.
- Discuss with the children what they have found out about nutritional values and recommended daily allowances.
- Discuss with pupils whether they found the labels difficult or easy to read and understand.

Differentiation:

- The activity can be completed in small groups or pairs if children are struggling with ideas.
- A prompt sheet of some nutritional values could be provided to help those finding it difficult to glean the information from the packages.
- Prior work to this task could be set, allowing children time to research the different values of foods. This could be done as an ICT lesson or as homework.
- Pupils could colour-code their top trumps, showing the values that are good to be high, and those which should be low.

Nutritional Top Trumps

Cooked Salmon (100g)		Carrots (100g)		Cheddar Cheese (100g)	
Calories	206	Calories	35	Calories	403
Fat	12g	Fat	0g	Fat	33g
Carbohydrate	0g	Carbohydrate	8g	Carbohydrate	1g
Protein	22g	Protein	1g	Protein	25g
Fibre	0g	Fibre	0g	Fibre	0g
Iron	2%	Iron	5%	Iron	4%
Calcium	1%	Calcium	3%	Calcium	72%
Vitamin C	6%	Vitamin C	4%	Vitamin C	0%
					
Brown rice (100g)		Burger King burger (100g)		Rice Krispies (100g)	
Calories	111	Calories	274	Calories	387
Fat	1g	Fat	15g	Fat	1g
Carbohydrate	23g	Carbohydrate	19g	Carbohydrate	85g
Protein	3g	Protein	17g	Protein	0g
Fibre	2g	Fibre	1g	Fibre	1g
Iron	2%	Iron	16%	Iron	1%
Calcium	0%	Calcium	6%	Calcium	1%
Vitamin C	0%	Vitamin C	1%	Vitamin C	46%
					

Full cream milk (100g)

Calories	60
Fat	3g
Carbohydrate	5g
Protein	3g
Fibre	0g
Iron	0%
Calcium	11%
Vitamin C	0%



Baked potato (100g)

Calories	100
Fat	0g
Carbohydrate	23g
Protein	2g
Fibre	2g
Iron	2%
Calcium	1%
Vitamin C	25%



Chilli con carne (100g)

Calories	121
Fat	2g
Carbohydrate	11g
Protein	7g
Fibre	10g
Iron	14%
Calcium	4%
Vitamin C	0%



Broccoli (100g)

Calories	35
Fat	0g
Carbohydrate	7g
Protein	2g
Fibre	3g
Iron	4%
Calcium	4%
Vitamin C	108%

Pasta (100g)

Calories	126
Fat	0g
Carbohydrate	28g
Protein	3g
Fibre	5g
Iron	1%
Calcium	0%
Vitamin C	0%

Peas (100g)

Calories	78
Fat	0g
Carbohydrate	14g
Protein	5g
Fibre	5g
Iron	8%
Calcium	2%
Vitamin C	17%



Scrambled egg (100g)

Calories	167
Fat	12g
Carbohydrate	2g
Protein	11g
Fibre	0g
Iron	7%
Calcium	7%
Vitamin C	0%



Grapefruit (100g)

Calories	42
Fat	0g
Carbohydrate	11g
Protein	1g
Fibre	2g
Iron	0%
Calcium	2%
Vitamin C	52%



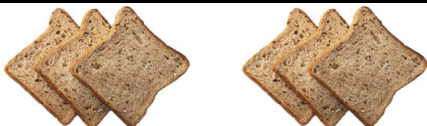
Apple (100g)

Calories	52
Fat	0g
Carbohydrate	14g
Protein	0g
Fibre	2g
Iron	1%
Calcium	1%
Vitamin C	8%



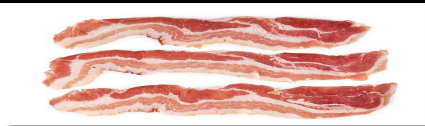
Brown bread (100g)

Calories	266
Fat	4g
Carbohydrate	48g
Protein	11g
Fibre	4g
Iron	19%
Calcium	14%
Vitamin C	0%



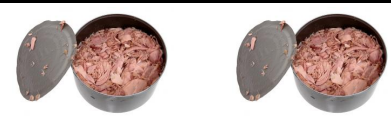
Fried bacon (100g)

Calories	533
Fat	40g
Carbohydrate	1g
Protein	38g
Fibre	0g
Iron	8%
Calcium	1%
Vitamin C	0%



Tinned tuna (100g)

Calories	128
Fat	3g
Carbohydrate	0g
Protein	24g
Fibre	0g
Iron	5%
Calcium	1%
Vitamin C	0%



Corned beef (100g)

Calories	192
Fat	26g
Carbohydrate	0g
Protein	30g
Fibre	0g
Iron	21%
Calcium	1%
Vitamin C	0%



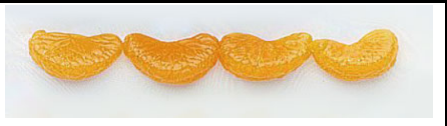
Kiwi (100g)





Calories	61
Fat	1g
Carbohydrate	15g
Protein	1g
Fibre	3g
Iron	0%
Calcium	3%
Vitamin C	155%



Oranges (100g)

Calories	47
Fat	0g
Carbohydrate	12g
Protein	1g
Fibre	2g
Iron	1%
Calcium	4%
Vitamin C	89%



Burger King chips (100g)		Fried onion rings (100g)		White bread (100g)	
Calories	331	Calories	346	Calories	266
Fat	17g	Fat	17g	Fat	3g
Carbohydrate	42g	Carbohydrate	44g	Carbohydrate	51g
Protein	4g	Protein	5g	Protein	8g
Fibre	3g	Fibre	3g	Fibre	2g
Iron	7%	Iron	0%	Iron	21%
Calcium	0%	Calcium	13%	Calcium	15%
Vitamin C	1%	Vitamin C	0%	Vitamin C	0%
					
Avocado (100g)					
Calories	160				
Fat	15g				
Carbohydrate	9g				
Protein	2g				
Fibre	7g				
Iron	3%				
Calcium	1%				
Vitamin C	17%				
					

Blank Top Trumps Cards

Calories		Calories		Calories	
Fat	g	Fat	g	Fat	g
Carbohydrate	g	Carbohydrate	g	Carbohydrate	g
Protein	g	Protein	g	Protein	g
Fibre	g	Fibre	g	Fibre	g
Iron	%	Iron	%	Iron	%
Calcium	%	Calcium	%	Calcium	%
Vitamin C	%	Vitamin C	%	Vitamin C	%
Calories		Calories		Calories	
Fat	g	Fat	g	Fat	g
Carbohydrate	g	Carbohydrate	g	Carbohydrate	g
Protein	g	Protein	g	Protein	g
Fibre	g	Fibre	g	Fibre	g
Iron	%	Iron	%	Iron	%
Calcium	%	Calcium	%	Calcium	%
Vitamin C	%	Vitamin C	%	Vitamin C	%

Calories		Calories		Calories	
Fat	g	Fat	g	Fat	g
Carbohydrate	g	Carbohydrate	g	Carbohydrate	g
Protein	g	Protein	g	Protein	g
Fibre	g	Fibre	g	Fibre	g
Iron	%	Iron	%	Iron	%
Calcium	%	Calcium	%	Calcium	%
Vitamin C	%	Vitamin C	%	Vitamin C	%
Calories		Calories		Calories	
Fat	g	Fat	g	Fat	g
Carbohydrate	g	Carbohydrate	g	Carbohydrate	g
Protein	g	Protein	g	Protein	g
Fibre	g	Fibre	g	Fibre	g
Iron	%	Iron	%	Iron	%
Calcium	%	Calcium	%	Calcium	%
Vitamin C	%	Vitamin C	%	Vitamin C	%
Calories		Calories		Calories	
Fat	g	Fat	g	Fat	g
Carbohydrate	g	Carbohydrate	g	Carbohydrate	g
Protein	g	Protein	g	Protein	g
Fibre	g	Fibre	g	Fibre	g
Iron	%	Iron	%	Iron	%
Calcium	%	Calcium	%	Calcium	%
Vitamin C	%	Vitamin C	%	Vitamin C	%

NUTRITION INFORMATION			
Serving Size		Serving Unit	
Avg Quantity		Per Serving	Per 100ml
%DV			
ENERGY	246kJ	819kJ	
PROTEIN	0.8g	2.6g	
FAT, Total	5.7g	19.0g	9%
-Saturated Fat	4.0g	13.4g	18%
-Trans Fat	0.03g	0.1g	
-Polyunsaturated	0.03g	0.1g	
-Monounsaturated	0.03g	0.1g	
-Cholesterol	20mg	66.6g	7%
CARBOHYDRATE	1.2g	4.1g	0%
-Sugars	1.0g	3.3g	
-Dietary Fibre	0g	0g	
SODIUM	10mg	32mg	1%
CALCIUM	35.1mg	117mg	
POTASSIUM	45.6mg	151mg	

Start Here
Check Serving Size

Check Calories

Limit These Nutrients

Get Enough of These Nutrients

Nutrition Facts	
Serving Size 1/2 cup (114g) Servings Per Container 4	
Amount Per Serving	
Calories 90	Calories from Fat 30
	% Daily Value*
Total Fat 3g	5%
Saturated Fat 0g	0%
Cholesterol 0mg	0%
Sodium 300mg	13%
Total Carbohydrate 13g	4%
Dietary Fiber 3g	12%
Sugars 3g	
Protein 3g	
Vitamin A 270%	Vitamin C 10%
Calcium 2%	Iron 4%
*Percent Daily Values are based on a 2,000 calorie diet. Your daily values may be higher or lower depending on your calorie needs:	
	Calories 2,000 2,500
Total Fat	Less than 65g 80g
Sat Fat	Less than 20g 80g
Cholesterol	Less than 300mg 300mg
Sodium	Less than 2,400mg 2,400mg
Total Carbohydrate	300g 375g
Dietary Fiber	25g 30g

Quick Guide to % Daily Value

5% or less is low
20% or more is high

Footnotes

Nutrition guide

Per 100g	Healthier Eat more often 😊	OK Eat in moderation 😐	Least healthy Limit intake 😞
Total fat	3g or less	3g - 20g	20g or more
Saturated fat	1.5g or less	1.5g - 5g	5g or more
Sugar	5g or less	5g - 15g	15g or more
Sodium	120mg or less	120mg - 600mg	600mg or more

Choose foods with more than 4g of fibre per serve.



Examine the Facts

Follow 3 easy steps for healthful food choices

1. Count calories.

Look at the serving size, the number of servings and total calories per package.

2. Check these for the heart.

Keep saturated fat, cholesterol and sodium to a minimum (less than 5% daily value). Keep trans fat to 0.

3. Is this nutritionally valuable?

Get enough fiber and other nutrients.

Nutrition Facts

Serving Size 1/4 cup (36g)	
Servings Per Container: 9	
Amount per serving	
Calories 60	Calories from Fat 0
% Daily Value	
Total Fat 0g	0%
Saturated Fat 0g	0%
Trans Fat 0g	
Cholesterol 0mg	0%
Sodium 15mg	1%
Total Carbohydrate 22g	7%
Dietary Fiber 14g	56%
Sugars 1g	
Protein 7g	
Vitamin A 0%	Vitamin C 0%
Calcium 4%	Iron 15%

(% Daily Values are based on a diet of other people's secrets.)

Eating too many calories per day is linked to being overweight, obesity and the development of certain chronic diseases

Eating too much fat, saturated fat, trans fat, cholesterol or sodium may increase your risk for chronic diseases

Eating enough fiber and nutrients can improve your health and help reduce your risk for some diseases

Daily Value – how a food fits into a daily plan:
 - 5% or less is low
 - 20% or more is high

Skim Milk	Compare	Whole Milk
Nutrition Facts Serving Size 1 cup (240 mL) Servings Per Container: 4 <hr/> Amount per serving Calories 40 Calories from Fat 4 % Daily Value <hr/> Total Fat 0.5g 1% Saturated Fat 2g 4% Cholesterol 4.5mg 9% Sodium 105mg 2% Total Carbohydrate 11g 4% Dietary Fiber 2g Sugars 10g Protein 8g <hr/> Vitamin A 12% Vitamin C 4% Calcium 30% Iron 1% Vitamin D 25% Vitamin B12 10%	more calories more total fat more saturated fat more cholesterol less sodium	Nutrition Facts Serving Size 1 cup (240 mL) Servings Per Container: 4 <hr/> Amount per serving Calories 140 Calories from Fat 10 % Daily Value <hr/> Total Fat 8g 16% Saturated Fat 5g 10% Cholesterol 30mg 6% Sodium 110mg 2% Total Carbohydrate 11g 4% Dietary Fiber 2g Sugars 10g Protein 8g <hr/> Vitamin A 25% Vitamin C 4% Calcium 29% Iron 1% Vitamin D 25% Vitamin B12 10%

Daily Dietary Goals for Good Health:

- Total fat 15-30% calories
- Saturated fat Less than 10% calories
- Trans fat Keep trans fat to 0
- Cholesterol Less than 300 mg a day
- Sodium Less than 2,000 mg a day

- Total carbohydrate 55-75% calories
- Protein 10-15% calories
- Fruits & vegetables 5-9 servings per day (1 pound)
- Dietary fiber Greater than 25 g per day

Source: Dietary Guidelines for Americans, WHO/FAO Technical Report Series 918, Geneva 2003, Institute of Medicine, American Heart Association, American Diabetic Association, www.fda.gov