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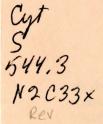
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Calories, Fat, and Cholesterol In Your Food

SEP 27 1991

Harriet Kohn, Extension Nutrition Specialist

STACKS

Estimating how many calories and how much fat and cholesterol you are eating each day is one step in getting the recommended amounts to help reduce the risk of heart disease and some types of cancer.

RECOMMENDATIONS FROM THE AMERICAN HEART ASSOCIATION

Calories - the level to attain or maintain a healthy weight.

Total Fat - 30 percent of total daily calories or less (except for children under two who need more).

Saturated Fat - limit to less than 10 percent of total daily calories.

Cholesterol - 300 mg or less per day.

Directions for figuring the calories (CAL), total fat (T.F.), saturated fat (S), monounsaturated (M), polyunsaturated fat (P), and cholesterol (CHOL) for one day's diet.

1. Put a heading on a lined sheet of paper as follows:

Food and Amount CAL T.F. S

2. Using the food tables in the centerfold, plan one day's menu including foods and amounts for one person. (Or, write down what you ate in the last 24 hours making reasonable substitutions if you can't find the exact food.) Copy the calories (CAL), total fat (T.F.), saturated fat (S) monounsaturated fat (M), polyunsaturated fat (P), and cholesterol (CHOL) for each food. Total the figures.

3. Analyze the results. Total fat should be no more than 30 percent of the calories. The saturated fatty acids should be 10 percent or less of the calories since they tend to raise the cholesterol level in the blood. The following table can help you figure the maximum grams of total fat and maximum grams of saturated fat per day in relation to calories per day.

To figure how many grams of fat would equal 30 percent of your total calories, multiply your total calories by .30 and

1080	Calories Per Day	Total Fat (30% of Cal) grams	Saturated Fatty Acids (10% of Cal) grams
	100	3	sa Justinus 1 marriag
	1000	33	11
	1200	40	13
	1400	47	16
	1600	53	18
	1800	60	20
	2000	67	22
	2200	73	24
	2400	80	27
	2600	87	29
	2800	93	31
	3000	100	33

divide the product by 9 (the number of calories in 1 gram of fat). For example: 2000 calories x .30 = 600 + 9 = 67 grams. To figure 10% of your total calories in grams of fat use .10 instead of the .30 above. Example: 2000 calories x .10 = 200 +9 = 22 grams.

The American Heart Association recommends about equal amounts of saturated, monounsaturated, and polyunsaturated fatty acids. Polyunsaturated acids are needed to supply linoleic acid which must be obtained from food. Up to 10 percent of the calories should come from polyunsaturated fatty acids.

The calories should be at a level to attain or maintain desirable weight.

Note: When the grams of saturated (S) plus the monounsaturated (M) and polyunsaturated (P) fatty acids are added together the sum will often be less than the total fat since complete information about fatty acid content of foods is not available at this time.

- 4. Add the cholesterol column. For people with a predisposition to heart disease 300 mg or less per day is suggested.
- 5. Plan another menu, or revise the first one, to be within the fat and cholesterol recommendations listed above. Remember, fat and calories tell only part of the nutritional picture. Many other factors need to be considered in planning nutritious meals.





Calories, Fat and Cholesterol in Selected Foods

CAL = Calories Key:

T.F. = Total Fat in grams S = Saturated Fat in grams

M = Monounsaturated Fat in grams

P = Polyunsaturated Fat in grams

CHOL = Cholesterol in mg tr = trace

28.35 grams = 1 ounce

-= lack of data

Values are rounded to nearest whole number. Arranged mostly from least to most total fat in each sub-group. Foods in shaded areas have added sugar and/or fat.

VEGETABLE GROUP

	CAL	T.F.	S	M P	CHOL
Vegetables - Plain					
Leafy greens, cabbage, celery, cucumber,					
peppers, zucchini, and					
other low starch					
vegetables. Varies per					
serving, about 1 c	15	tr	tr	tr t	r 0
Carrots, onions, tomato					
and other med starch					
veg. Varies per serving	,				
about 1/2 c	25	tr	tr	tr t	r 0
Potato, baked or boiled					
1 (100g)	110	tr	tr	tr t	r 0
Sweet potatoes 1 small					
(114g)	115	tr	tr	tr t	r 0
Corn, peas, winter squash	,				
white potatoes and					
other high starch veg.					
1/2 (80g)	80	1	tr	tr t	r 0

Vegetables - Fat Added						
Mashed potatoes with mi	k					
and margarine						
1/2 c (105 g)	113	5	1	2	1	2
Potato chips 10	105	7	2	1	4	(
Potato salad 1/2c (125g)	180	11	2	3	5	85
French fried potatoes						
20 strips (100 g)	320	16	5	3	8	(

Olives, green 4 med (13g) 15

FRUIT GROUP

	CAL	T.F.	S	M	P	CHOL
Fruits - Plain						
Fresh, froz, can, fruit,						
unsw, 1 sm serv	40	tr	tr	tr	tr	0
Fresh, fruit by piece						
1 med, or 1/2 lg	80	tr	tr	tr	tr	0
Avocado 1/2 (43g)	76	8	1	5	1	0
manufacture and an end						

Fruits - Sugar Added Fruit in heavy syrup 100 0 1/2 (129 g) tr tr tr

BREADS, CEREALS, RICE AND PASTA GROUP

	CAL	T.F.	S	M	P	CHOL
Bread and Cereals - Plain	n					
Popcorn, air-popped, no						
added fat 3 c	90	tr	tr	tr	tr	0
Dry cereal such as puffed						
wheat or puffed rice						
(unsw) 1 c (14g)	60	tr	_	_	_	0
Bread, any plain kind						
(avg) 1 sl	70	1	tr	tr	tr	0
Cereal, cooked (avg)						
1/2 c (120g)	70	1	tr	tr	tr	0
Spaghetti, cooked 1 c	197	1	tr	tr	tr	0
Rice, Brown, cooked,						
1/2 c	109	1	tr	tr	tr	0
Rice, White, cooked, 1/2 c	132	tr	tr	tr	tr	0
Saltine crackers 4	50	1	tr	tr	tr	4
Rolls, frankfurter or						
hamburger 1 (40g)	115	2	1	1	1	tr
Dinner roll 1 2 1/2" diam						
(28g)	85	3	1	1	1	tr

Bread and Cereals - Fat	and Su	igar A	dded			
Dry cereal, added sugar						
1 ounce (28g)	100	1	tr	tr	tr	0
Muffin - 1 plain (3" diam) 120	4	1	2	1	28
Pancakes 2 cakes (4" dian	1)120	4	1	2	1	32
Biscuit, baking powder						
1 (28g)	100	5	1	2	1	tr
Waffle 7" diam	205	8	3	3	2	59
Popcorn, popped with						
veg oil 3 c	165	9	2	4	3	0
Cookies						
Brownies 1 sm (25g)	100	4	2	2	1	14
Choc sandwich 4	195	8	2	4	2	0
Choc chip 4	180	9	3	3	3	5
Oatmeal cookies 4	245	10	3	5	3	2
Cakes						
Angelfood 1/12 cake	125	tr	tr	tr	tr	0
Cup cake 1 med (35g)	120	4	2	2	1	19
Choc layer 1 wedge	235	8	4	3	1	37
Donut, cake type 1 (50g)	210	12	3	5	3	20
Plain sheet cake 1 piece						
(86g)	315	12	3	5	3	61
Danish pastry 4" diam						
(57g)	220	12	4	5	3	49
Pies (9" diam)						
Custard 1/6	330	17	6	7	3	169
Blueberry 1/6	380	17	4	7	5	0
Pumpkin 1/6	320	17	6	7	3	109
Apple 1/6	405	18	5	7	4	0

MILK, YOGURT AND CHEESE GROUP

	CAL	T.F.	S	M	P	CHOL
Milk Plain 1 c (245g)						
Skim	90	1	tr	tr	tr	5
Buttermilk	100	2	1	1	tr	9
Low fat (1%)	100	2	2	1	tr	10
Yogurt, plain, low fat	145	4	2	1	tr	14
Low fat (2%)	125	5	3	1	tr	18
Whole	150	8	5	2	tr	33
Evaporated whole	340	19	12	6	1	74
Cheese - Plain						
Uncreamed cottage 1/2c	65	1	tr	tr	tr	10
Creamed cottage 1/2c	120	5	3	1	tr	17
Mozzarella, part skim						
1 oz (28g)	80	5	3	1	tr	15
Swiss 1 oz (28g)	105	8	5	2	tr	26
Cheddar, American						
1 oz (28g)	115	9	6	3	tr	30
Cream 1 oz (28g)	100	10	6	3	tr	31
Milk-Cheese - Fat and/o	r Sugar	Adde	d			

Milk-Cheese - Fat and/o	r Sugai	· Adde	d			
Yogurt, fruit flav 1/2c	115	2	1	1	tr	5
Soft serve (3% fat) 1/2c	115	3	2		tr	7
Ice milk 1/2 c	95	3	2	1	tr	9
Choc pudding 1/2 c	150	4	2	1	tr	14
Vanilla pudding 1/2	145	4	2	1	tr	15
Ice cream (11% fat) 1/2 c	135	7	4	2	tr	30
Choc or van shake 10oz	283	9	5	2	tr	3

MEAT, POULTRY, FISH, DRY BEANS, EGGS AND NUTS GROUP

Meat - Plain							
Beef, cooked 3 oz (85g)							
Beef, composite of							
trimmed retail cuts,							
lean only (all grades)	180	8	3	3	tr	73	
Beef, composite of							
trimmed retail cuts,							
lean and fat (all grades)	232	15	6	6	1	74	
Beef round, lean, roasted	145	5	2	2	tr	69	
Beef heart, lean, braised	150	5	1	1	1	164	
Sirloin steak, lean, broiled	162	6	2	2	tr	76	
Beef chuck, braised	178	6	2	3	tr	86	
Hamburger, extra lean	217	14	5	6	1	71	
Hamburger, lean	231	16	6	7	1	74	
Hamburger, regular	246	18	7	8	1	76	
Liver, beef, pan fried	185	7	2	1	1	410	
Beef, brisket, whole, lean	185	9	3	4	tr	79	
Prime rib, lean, roasted	248	17	7	7	1	69	
Rib-eye steak, lean and							
fat, broiled	261	19	8	8	1	70	
Veal, composite of retail							
cuts, lean, 3 oz (85g)	166	6	2	1	1	100	
Lamb, Leg, roasted,							
lean 3 oz (85g)	162	7	2	3	tr	76	
Pork, composite retail cuts	,						
lean, cooked 3 oz (85g)	198	11	4	5	1	79	
Bacon 3 sl (19g)	110	9	3	5	1	16	
Sausage, brown & serve							
2 links (26g)	100	10	3	4	1	18	

Meat, Poultry, Fish, Dry B	eans, l	Eggs an	d Nut	s Grou	p - coi	ntinued
Charles See See See			S	M		CHOL
Chop, loin, pan fried, lean						
2.4 oz (67g)	180	11	4	5	1 -	72
Frankfurter 1 (45g)	145	13	5	6	1	22
Poultry - Plain						
Chicken breast, (1/2)						
roasted flesh only						
3 oz (86g)	140	3	1	1	1	73
Turkey						
White meat (no skin) 3 oz (85g)	135	3	1	1	1	59
Dark meat (no skin)	133	3	n Alp	m, lis		39
3 oz (85g)	160	6	2	1	2	72
Fish 3 oz (85g)						
Flounder or sole, baked	99	1	tr	tr	tr	58
Cod, broiled	89	1	tr	tr	tr	47
Tuna, water pack	116	1	tr	tr	tr	35
Shrimp, broiled	84	1	tr	tr	tr	166
Lobster, boiled	83	1	tr	tr	tr	61
Clams, canned	83	1	tr	tr	1	61
Crab, imitation, made from surimi	87	atogr.	feel a	sem ii	a drawn	17
Crab, Alaska King, boiled	82	1	tr	tr	tr	45
Salmon, canned	120	5	1	2	2	34
Egg - Plain, Raw, lg						
Egg white 1 (33g)	16	tr	0	0	0	0
egg yolk 1 (17g)	65	6	2	2	1	213
Whole egg, without						
shell 1 (50g)	80	6	2	2	1	213
Beans 1 c						
Cooked, common varieties	3					
such as Great Northern	210	505				•
& Pea (180g) Canned pork & beans,	210	1	tr	tr	1	0
tomato sauce(255g)	310	7	2	3	1	10
	310	B. B. B. B. S.			Marie Ton	
Nuts Shredded coconut		and the same				
1/4 c (23g)	116	8	7	tr	tr	0
Sunflower seeds 1 oz (28g		14	2	3	9	0
Peanut butter 2 tbsp (32g)		16	3	8	5	0
Peanuts 1/4 c (36g)	208	18	2	9	6	0
Walnuts, chopped	***		La Se			
1/4 c (30g)	192	19	2	4	12	0
Meat, Poultry, Fish and	Beans	- Fat A	dded			
Tuna canned in oil						
3 oz (85g)	169	7	1	3	2	15
Fish sticks, fried 3oz						
(85g)	228	9	3	4	3	93
Shrimp, breaded, fried	206	11	2	3	3	150
Fish fillet, battered and	011					
fried, 3 oz. (91g)	211	- 11	3	2	6	31
Chicken, breaded and fried, dark meat,						
2 pieces, 5 oz. (148g)	430	27	7	11	6	165
Chicken, breaded and						
fried, light meat,						
2 pieces, 6 oz. (163g)	494	30	8	12	7	149

MIXED FOODS

	CAL	TF	S	M	P	CHOL
Pizza with cheese, 1 slice						
(49g)	109	3	1	1	tr	7
Pizza with pepperoni,						
1 slice (53g)	135	5	2	2	1	- 11
Beef and veg stew 1 c						
(245g)	220	11	4	5	1	71
Chili con carne with bean	S					
1 c (255g)	340	16	6	7	1	28
Burrito with beans, 2						
(217g)	448	14	7	5	1	5
Taco salad (1 1/2 c)						
in shell	279	15	7	5	2	44
Taco, 1 small (171g)	370	21	11	7	1	57
Canned Soups (ready to	eat) 1 c	(244g)				
Beef noodle	85	3	1	1	1	5
Split pea	165	3	1	1	tr	0
Cream of mushroom	130	9	2	2	4	2

					FA		TION GROUP RS AND ALCOHOL						
	CAL	T.F.	S	М	P	CHOL		CAL	T.F.	s	М	P	СНО
Vegetable fats 1 tbsp (14g)						Heavy cream	50	6	4	2	tr	21
Whipped topping, Non of Margarine, imitation	lairy15	1	1	tr	tr	0	Butter Chicken	100 115	11 13	7 4	3 6	1 3	31 11
(40%) fat	50	5	1	2	2	0	Lard	115	13	5	6	2	12
Margarine, soft liq oil							Beef tallow	115	13	6	5	1	14
first ingred	100	11	2	4	5	0	Sugars and Jams 1 tbsp	(20g)					
Margarine, reg	100	11	2	5	4	0	White	45	0	0	0	0	0
Veg shortening	120	13	3	- 6	3	0	Brown	50	0	0	0	Ŏ	0
Vegetable oils 1 tbsp (1	140)						Molasses	45	0	0	0	0	0
Safflower					10		Pancake syrup	60	0	0	0	0	0
	125 120	14 14	1	2 8	10 5	0	Honey	65	0	0	0	0	0
Canola (rapeseed) Corn	120	14	1 2	3	8	0	Jams and preserves	55	tr	0	tr	tr	0
Soybean	120	14	2	3	7	0	Soft Drinks 12oz						
Cottonseed	120	14	4	3	7	0		105				•	
Peanut	120	14	2	7	5	0	Gingerale	125 160	0	0	0	0	0
Olive	120	14	2	10	1	0	Colatype Fruit flavored soft drink	170	0	0	0	0	0
Palm	120	14	7	5	1	0		170	U	v			v
Palm kernel	120	14	11	2	tr	0	Candy 1 oz (28g)						
Coconut	120	14	12	1	tr	0	Caramels	115	3	2	tr	tr	1
Salad Dressings 1 tbsp	(140)						Milk chocolate	145	9	6	3	tr	6
			200				Choco covered peanuts	155	11	4	4	2	5
French, low cal	25 60	2 5	tr 1	1	tr	0	Alcoholic Beverages						
Mayonnaise type French, reg	70	6	2	1	3	0	Table wine 3 1/2 fl oz	80	0	0	0	0	0
Italian	70	7	1	2	4	0	Dessert wine 3 1/2 fl oz	140	0	0	0	0	0
Mayonnaise	99	11	2	3	6	8	Gin, rum or vodka	140	U	v	•	v	, v
		••			J	•	whiskey (86 proof)						
Animal Fats 1 Tbsp (14	lg)						1 1/2 fl oz	105	0	0	0	0	0
Half & half cream	20	2	1	1	tr	6	Beer 12 fl oz	150	0	0	Ö	ő	
Sour cream, cultured	25	3	2	1	1	5			dio in	8 333			

References: Nutritive Value of Foods, USDA, Home and Garden Bulletin No. 72, 1986.

Composition of Foods: USDA Handbook Series 8, No. 5-21, 1975-1990.

Fat Facts

- Fats, proteins and carbohydrates (starches and sugars) are the three nutrients that provide energy to the body. The remaining nutrients vitamins, minerals and water do not contribute calories. Dietary fiber contributes bulk but not calories.
- Fat has the most calories of all the energy-yielding nutrients at nine calories per gram. Protein and carbohydrate have four calories per gram each. Alcohol, another source of calories, has seven per gram.
- Dietary fats are made up of polyunsaturated, monounsaturated, and saturated fatty acids.
- The major polyunsaturated fatty acid is called linoleic acid. Linoleic acid is not made in the body in large enough quantities and must be obtained in food. Linoleic acid is needed in the functioning of cells and various body processes
 - The major monounsaturated fatty acid is oleic acid.
- Saturated fatty acids tend to raise the cholesterol level in the blood. Saturated fatty acids, studies show, raise blood cholesterol levels more so than dietary cholesterol. Polyunsaturated fatty acids tend to lower blood cholesterol levels. Some studies suggest that monounsaturated fatty acids may also help to lower cholesterol levels in the blood.
- Fats in foods usually contain all three types of fatty acids polyunsaturated, monounsaturated, and saturated - but one may be in larger amounts.
- Vegetable oils usually have less saturated fatty acids than animal fats. Exceptions to this are coconut oil and palm kernel oil which are highly saturated.
- How liquid or soft a fat is can help you to remember the degree of unsaturation. Fats which are liquid at room temperature tend to have more poly- and monounsaturated fatty acids than saturated fatty acids. Corn oil is high in polyunsaturates and olive oil is mostly monounsaturated. The harder the fat at room temperature the more saturated fatty acids it has.
- The body needs some cholesterol and manufactures it. Adults do not need cholesterol from food. Infants and children under the age of two need to obtain some cholesterol from food.
- Margarine which has liquid vegetable oil as the first ingredient is higher in polyunsaturated fat than the ones that say "partially hardened fat" first.

Margarine has the same number of calories as butter, i.e. 100 calories per tablespoon.

- A tablespoon of fat has 100 to 120 calories. To reduce both fat and calories in food, skim fat from gravies, cut fat from meat before cooking, use less fat in recipes.
- The type of fat can often be altered in recipes or recipes can be chosen to provide the type of fatty acids desired. For example, recipes are available to make pie crust with a vegetable oil, that is a good source of polyunsaturated fat, rather than hydrogenated vegetable fat which has more saturated fatty acids.
- Fat is low in nutrients in proportion to its calories. It
 is advisable, therefore, to limit fat in the diet so that more
 vegetables and fruits and other nutrient dense foods can be
 included.
- Limiting the fat intake helps to keep the total calories of the diet lower.
 - To figure the percent of calories from the fat on a food

label use the following example and substitute the real numbers from the food label.

Example: The food label says one portion of food contains 10 grams of fat and 300 calories.

10 grams fat x 9 (calories in 1 gram) = 90 calories 90 calories + 300 (calories in 1 portion) = 30% of calories from fat

Cholesterol Facts

· Why all the concern about cholesterol in food?

The amount of cholesterol in food is thought to affect the level of cholesterol in the blood. Too high a blood level of cholesterol may predispose an individual to cardiovascular disease. A high amount of dietary cholesterol may increase an already elevated blood level of cholesterol. A high intake of saturated fatty acids will also raise blood cholesterol levels.

- What else besides high intakes of dietary cholesterol, saturated fat and total fat contribute to increases in blood cholesterol level?
 - Too little dietary fiber.
 - Gaining weight.
 - Lack of exercise.
 - Stress.
 - Smoking.
 - · How can the total blood cholesterol be lowered?
- 1. Reduce the amount of total fat to 30 percent of calories or less.
- 2. Eat no more than 10 percent of calories from saturated fatty acids.
- 3. Reduce the amount of cholesterol taken in foods. Some studies indicate 300 mg or less of dietary cholesterol should be consumed.
 - 4. Maintain normal weight or lose weight if overweight.
- 5. Eat adequate amounts of fiber. The fiber found in beans and oat bran as well as fruits and vegetables tend to lower blood cholesterol.
- How can high density lipoprotein (the good cholesterol) be raised?
 - 1. Exercise regularly.
 - 2. Stop smoking.

Note: If the blood cholesterol level remains high, less than 200 mg/day of dietary cholesterol and less than 7 percent of calories from saturated fat may be needed to lower blood cholesterol.

- Plant foods do not contain cholesterol. Examples of plant foods are fruits, vegetables, grains and beans.
- Cholesterol is found only in food from the animal kingdom. These foods include meat, poultry, eggs, butter, milk, cheese, and fish.
- Organ meats liver, heart, kidney, and brains -are especially high in cholesterol.
- Egg yolks are among the highest sources of cholesterol. Egg whites contain no cholesterol.
- If you decide to limit your intake of cholesterol remember that you can select from a large variety of foods. Although there is no need to eliminate whole classes of foods, there may be a need to limit portion sizes.

Glossary

CALORIES: These measure the energy value of the food you eat as well as the energy your body uses for activities and for maintaining body processes.

FIBER: All the components of a food (carbohydrates, cellulose, hemicellulose gums, and pectin together with lignin, the noncarbohydrate "woody" substance in plants) that are not broken down by enzymes in the human digestive tract to produce small molecular compounds which are then absorbed into the blood stream.

CHOLESTEROL: A waxy fat-like substance found in all animal tissues. It is used in many of the body's chemical processes and is manufactured by the body. Food provides additional cholesterol. Too much cholesterol (hypercholesterolemia) in the circulation encourages the development of heart and blood vessel diseases. Cholesterol is manufactured by the body from all foods, and it is present in foods of animal origin such as meat, fish, poultry, egg yolks, whole milk, and dairy products. Egg yolks and organ meats are concentrated sources of cholesterol.

SATURATED FATS: Usually solid at room temperature, this group of fatty substances is found in foods of animal origin such as whole milk dairy products - cream, milk, cheese, and ice cream. The streaking in red meat (marbling) and fat along the edges of meat are examples of saturated fat. Saturated fats raise the cholesterol level of the blood. Completely hydrogenated fats are saturated. A few saturated fats are of vegetable origin - coconut, coconut oil, and palm kernel oil.

POLYUNSATURATED FATS AND OILS: These are usually liquid oils of vegetable origin. Oils such as corn, cottonseed, safflower, sesame seed, soybean, and sunflower seed are high in polyunsaturated fat. They are recommended for the fat-modified diet because they tend to lower the level of cholesterol in the blood.

MONOUNSATURATED FATS: Monounsaturated fats lower blood cholesterol. Canola (rapeseed) and olive oils are examples of monounsaturated fats. More research is needed on the affect monounsaturated fats have on blood cholesterol.

HYDROGENATED FATS: These are fats and oils changed from their natural liquid form to become more solid, such as most margarines and shortenings. They may be partially or almost completely hydrogenated. Avoid completely hydrogenated oils; they resemble saturated fats. Many margarines contain partially hydrogenated oils and may be acceptable if they contain twice as much polyunsaturated as saturated fat.

TRIGLYCERIDE: Most fat in food is in the form of triglyceride. It is the major component of fatty tissue. Also, it is present in blood plasma and, together with cholesterol, forms the plasma lipids. Triglyceride in plasma is derived from the fats consumed in food or is made in the body from other energy sources like carbohydrates. Calories not used immediately by tissues are converted to triglyceride and transported to fat cells for storage. Release of these triglycerides from fatty tissue stores is regulated by hormones and meets the needs for energy between meals.

LIPOPROTEINS: A combination in the blood consisting of lipid (fat) and protein molecules bound together. Since lipids do not dissolve in the blood, they must circulate in the form of lipoproteins.

LOW DENSITY LIPOPROTEINS (LDL): These are lipoproteins which carry most of the cholesterol in your body. An elevated LDL cholesterol level is a major risk factor for coronary heart disease. LDL is referred to as the "bad" cholesterol.

HIGH DENSITY LIPOPROTEINS (HDL): Like LDL, HDL is a protein carrier of cholesterol in the body. But the high density lipoproteins are thought to transport cholesterol out from the body's tissues to the liver where it can be excreted in bile. It is this presumed function which may explain the role of high density lipoproteins as protective against the development of atherosclerosis. HDL is referred to as the "good" cholesterol.

OBESITY: Increased body weight because of too many calories and excess fat. This puts a strain on the heart and increases the chance of developing two major heart attack risk factors - high blood pressure and diabetes.

RISK FACTOR: Characteristics which are associated with an increased risk of developing coronary heart disease. These include high blood pressure (hypertension), elevated blood cholesterol and other lipid levels (hyperlipoproteinemia), cigarette smoking, obesity, diabetes, and a family history of heart disease.

Adapted from the American Heart Association