



14.

The Teen Years

THE TEEN YEARS may be the most eventful period of any time in your life — physically, biologically, and emotionally. The transition and growth that you experience as an adolescent can compare in importance with perhaps only one other event in your life — that of being born.

From an age standpoint you are called *teen-agers*. Perhaps it would be more accurate to call you *tween-agers*. You are not children nor quite adults. You are

betwixt and between the periods of childhood dependence and adult independence — between the time when your life is controlled by adults and the time when you control it with full responsibility for yourselves as men, women, and parents.

The fitness and vigor that can come through good food and good nutrition are never more important to you than they are now. If you are a boy, your nutritional requirements will be the highest of any time in your life. If you are a girl, your requirements are higher than ever before, although they will be this high or higher when you are an expectant mother and when nursing your baby. Your food and your nutrition in these transition years will have far-reaching effects on your health in the years ahead.

You now have a great deal of control over what you eat and what you supply to your body for its growth and fitness. The job of meeting your responsibilities and enjoying your privileges will take on new meaning when you understand your food needs in relation to your progress in growth.

WHAT TO EXPECT

The Road Map of Growth tells you something of what to expect as you are becoming a young adult. To an extent you inherit a timetable for achieving your adult form with muscles and curves and length and width, so you may travel toward your adult stature faster or slower than other teen-agers. You are likely to go through stages when you seem to grow only “up” or only “out,” times when your hands and feet are too big for the arms and legs they are attached to. There

ROAD MAP OF GROWTH

The ages here are from statistics. Think of yourself as an "individual," not as a "statistic." These changes may happen to you one, two, or even three years earlier or later than shown here.

When boys are 12 to 15
years

and

When girls are about 11
years

They start their fast-
growing years

When girls are between
11 and 14 years

They are taller and heav-
ier than boys of the same
age

When boys are 14 years
and
When girls are 12 years

They are likely to make
their greatest gains in
height

When boys are about 15
and 16 years

They are now taller and
heavier than girls

After boys are in their
early 20's

and

After girls are 16

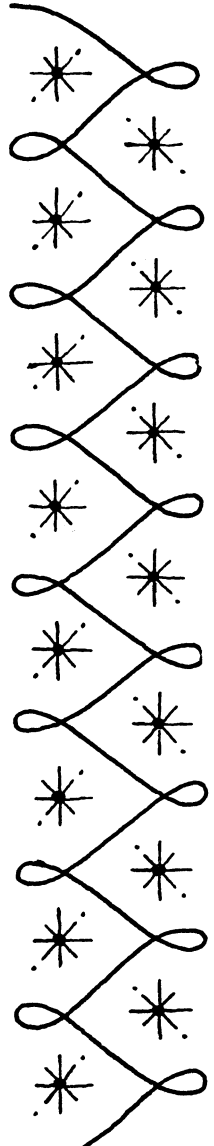
They don't grow much
taller

After boys are in their
early 20's

and

After girls are 18

They don't add much
more weight, unless they
add too much fat



are times when there is too much of you in some spots and not enough in others. Fortunately, these uneven stages are temporary.

Part of Nature's plan for your adult size and shape is inherited from your ancestors. This is called your body build. It is the framework on which you develop the rest of you. Whether you reach the full height possible in Nature's plan for you and whether you achieve the proportions of a fine physique and figure depend on you and your environment. In your environment food is always one of the most important items, and one about which you now can have a great deal to say.

As growth slows down, Nature turns her attention to making firmer muscles, heavier, more compact bones, and to adding substance to other tissues.

Remember, this is only a road map of growth. It is not an exact timetable.



A PHYSICAL GROWTH RECORD FOR TEEN-AGERS

As a teen-ager you probably want a standard with which you can compare your own size and growth rate. The charts on pages 147 and 148 are for this purpose. They have been made from the results of scientific studies of many boys and girls as they grew from 4 to 18 years. The figures shown are for the years from 11 to 18.

Looking at either of the charts you will see:

1. Ages are shown in 6-month intervals along the top and bottom.
2. Height is marked in inches along the right and left sides of the upper portion.
3. Weight is marked in pounds along the right and left sides of the lower portion.
4. There are 5 zones for the heights at each age from 11 to 18. These are shown in different colors and labeled Tall, Moderately Tall, Average, Moderately Short, and Short.
5. There are 5 zones for the weights at each age. Each zone is labeled to correspond to a similar height zone and is shown in the same shading. For example, Moderately Heavy corresponds to Moderately Tall, and both are shown in the same color. Do you see that the zones of weight are wider than the zones of height? This suggests that normally boys and girls of the same age vary more in weight than in height.



These charts are a safe guide for normal growth of boys and girls during their teen years because they allow for individual differences in body build and growth rate.

YOUR OWN GROWTH RECORD

To keep this record of your own physical growth:

1. Locate your age across the top of the appropriate chart.
2. Find your height along the left side.
3. Follow these figures toward the center until they meet.
4. Mark this point.

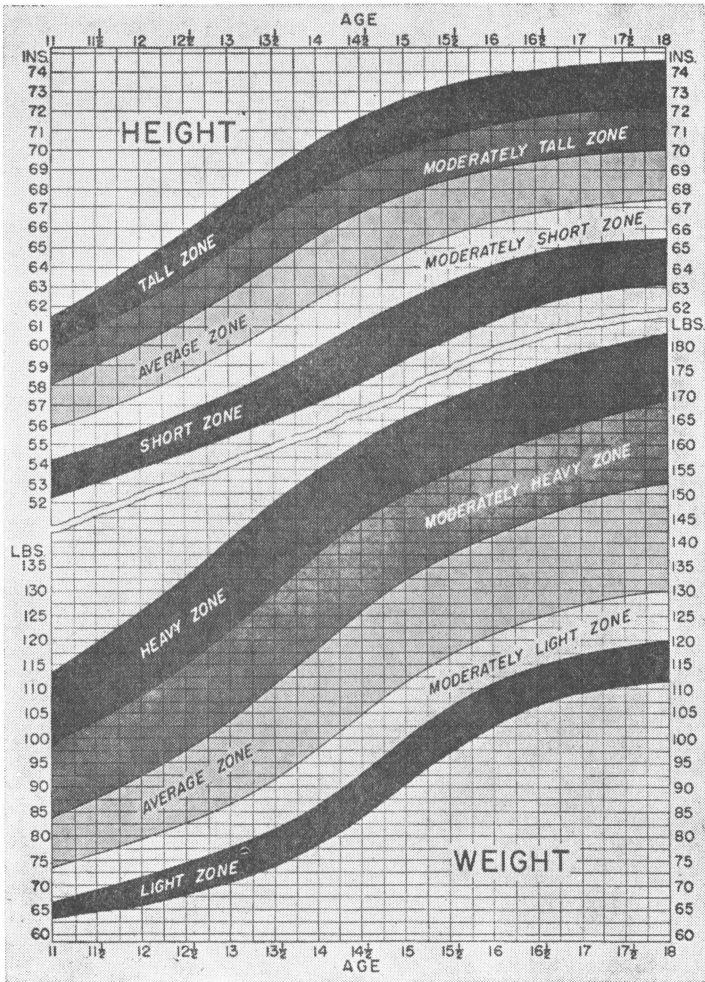
Now you have found your height zone. In the same way locate and mark your weight. Are you about average size? Are you taller or shorter, heavier or lighter? If your height places you in the Short Zone, then is your weight in or near the Light Zone? If your height places in the Moderately Tall Zone, then is your weight in or near the Moderately Heavy Zone? If so, you probably have the average proportions for your size — neither quite angular nor really stocky.

The Record is most useful and interesting to you if you mark your height and weight on it every three or six months. During the fast-growing years your height

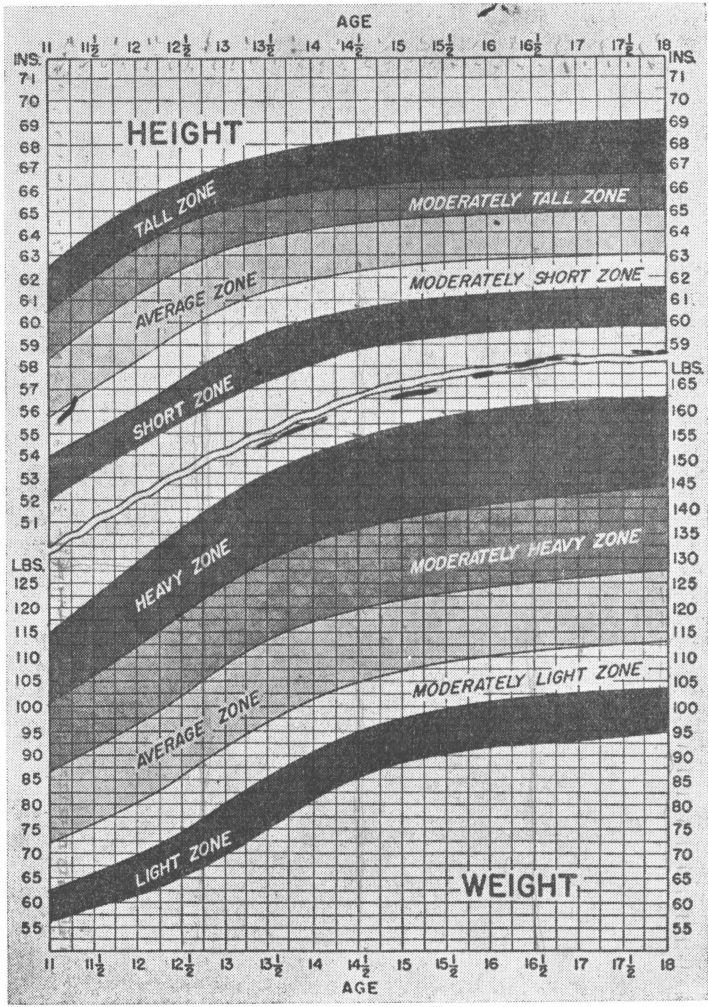


The Physical Growth Record has been prepared by the Joint Committee on Health Problems in Education of the National Education Association and American Medical Association, using data prepared by Howard V. Meredith, State University of Iowa. Individual copies of the Record are available at small cost from the American Medical Association, 535 North Dearborn Street, Chicago 10, Illinois. The Record is reproduced by courtesy of the Joint Committee.

BOYS



GIRLS



and weight may change zones. When you were 11 or 12 you may have been in the Average Zones in height and weight. Now perhaps you have grown into the Moderately Tall and Moderately Heavy Zones. Or you may be a person who grows more slowly, and you may have changed to the Short and Light Zones.

If your height and weight stay in different zones for several months or a year, you probably will want to talk to your family doctor about your Record. You need this judgment as to the reason for the difference. For instance, if your height continues in the Average Zone but your weight climbs into the Moderately Heavy Zone, your doctor may find that you have a heavier-than-average, or stocky, build. Then it would be only normal for your height and weight to be in slightly different zones. You are developing the proportions that suit *your* framework. This is heredity playing its part.

On the other hand, your doctor may find that you really have an average build but that you are becoming a little too heavy for *your* build. You're chubby. In that case he'll probably advise you to try to keep from gaining in weight as fast as you have been doing until you grow taller. If you follow his advice, your height and weight will gradually approach corresponding zones and your proportions will improve.

Your doctor can tell you whether you are the "bean-pole" type or whether you are actually underweight and need to add more weight to your framework.

The important thing is that you and your physique and figure grow to attractive proportions, whether you are short or tall, with small bones or large, until you reach the size that heredity planned for you.



NUTRIENTS AND FOOD

If you look at the Recommended Dietary Allowances on page 87, you will see that teen-age boys need much more food energy and more of every nutrient, except iron and vitamin D, than girls of the same age. They need more of everything, except calcium, when they are 16 to 19 years old and doing their fastest growing, than they did at 13 to 15 years old. The girls, however, grow their fastest when they are 13 to 15 years old, and their needs are as great or greater then than when they are 16 to 19 years old.

The Daily Food Guide makes a suitable framework for your food choices, but you must add considerably to the minimum amounts listed in order to provide enough for your growth and maturation. The Milk Group and the Vegetable-Fruit Group need special attention from you. This is not because these two food groups are more important than the other two or can replace them. It is because the Milk and Vegetable-Fruit Groups are most likely to be in short supply in the diets of teen-agers.

You now need 4 cups of milk or its equivalent each day. You need more second servings than the adults, and often the size of servings should be larger for you. You have more free choices in additional foods than the adults because your calorie budget is larger than theirs usually is.

The servings that you need every day from the four food groups have been arranged into a Basic Menu for three meals. This is a pattern you can follow in choosing the food that becomes you. The Basic Menu does

not list all of the foods that you need. It is only a foundation on which you can build your total food intake for the day — a foundation for your fitness and figure.

Snacks are a popular part of your eating and social pattern. Consider them as part of your daily food supply. Be careful that you don't make them into full meals unless you can afford the calories. If you can afford the calories, be sure you include foods from your Daily Food Guide. Many foods with lone-wolf calories will satisfy your appetite without satisfying your needs for body-building materials. The girls should not be eating as much as the boys, even at parties and picnics. Sometimes they may need to skip dessert at the evening meal and save those calories for the date or party snack in the evening.

One of the disadvantages of using sweets for snacks is that the sugar which is left on and around the teeth can cause decay. If you can't always brush your teeth after eating candy or other sweet foods and beverages, learn to rinse your mouth thoroughly as soon as possible after eating them.



BASIC MENU PATTERN FOR TEEN-AGERS

This pattern is not a complete daily menu. It is an assortment of foods that will supply the major part of your needs for good nutrition. To this you can add other foods to round out your meals, or to use for snacks, and to satisfy your calorie need.

Food Group	Number of Servings*		Example of the Kind of Food
	Boy	Girl	

BREAKFAST

Vegetable-Fruit			
A good source of vitamin C	1	1	Orange juice
Bread-Cereal	2	1	Ready-to-eat cereal
			Toast for the second serving
Meat	½	½	Egg—one
Milk	1	1	Milk—one cup

LUNCH OR SUPPER

Meat	1	½	Luncheon meat
Bread-Cereal	4	2	Bread for sandwiches
Vegetable-Fruit	1	1	Cabbage slaw or apple
Milk	1	1	Milk—one cup

DINNER

Meat	2	1	Roast beef
Vegetable-Fruit			
A good source of vitamin A	1	1	Carrots
Other	2	1	Potato
	1	1	Vegetable or fruit salad
Bread-Cereal	2	1	Rolls
Milk	1	1	Milk—one cup

Some time during the day use an additional cup of milk in some form—either milk to drink, in milk shakes, or ice cream, or in cheese or cooked foods. Also use some butter or margarine, and other fat (see Chapter 10, Fats in Food).

The servings that are listed for the boy will supply between 1,800 and 2,200 Calories, and for the girl, between 1,400 and 1,800 Calories, depending upon the particular kinds of foods chosen.

*The size of servings is given in the Daily Food Guide section, beginning on page 91.



CALORIE GUIDES

Your calorie requirement depends chiefly on your rate of growth, your activity level, and your size. Activity and size have been discussed in Chapter 4 on Activity and Calories, and here are some figures to show your calorie needs during the teen years. These figures are dependable guides but they are not rigid rules.

Age	Calories Per Pound Per Day	
	Boys	Girls
13 to 15 years	29	24
16 to 19 years	26	20

Although boys 16 to 19 years need fewer calories per pound than when they were 13 to 15 years, their total daily calorie need is greater because they weigh more.

To calculate your daily calorie need, multiply the pounds you weigh by the calories suggested as your need for your age. If you are more active or have a larger body build than most teen-agers, you will need a few more calories. If you are less active or have a very small frame, you will need a few less calories. How many calories does a "few more" or a "few less" mean? Usually, about 10 per cent more or less than the averages or guides.



EXERCISE

Every normal teen-ager needs exercise — a goodly amount of it. Through exercise you train your muscles to respond readily with strength and grace to the directions you send them consciously or automatically. When the structural parts of your body work together harmoniously, the result is coordination, efficiency, and

rhythm, in contrast to wasteful effort and awkwardness. Muscles, like people, need practice in learning to work together smoothly and efficiently.

You can get considerable exercise from your ordinary daily routine — especially if you walk several blocks to school or work, help around the house and yard, walk up and down a few flights of stairs, and generally take advantage of opportunities to walk or exercise.

This amount of exercise, however, is seldom enough to develop and train the muscles that help you move with ease and hold you in attractive shape. You need other regular exercise which uses all your muscles. Choosing active forms of recreation such as swimming, roller skating, dancing, and bowling is ideal.



Girls are likely to drop out of active sports when they are in the teens and confine themselves to sedentary, indoor activities. Such inactivity interferes with developing good muscle coordination, grace, strength, and stamina. It also increases the possibility of your becoming overweight, because the less active you are, the fewer calories you use and the less food energy you need.

If your situation does not seem to offer opportunity for enough activity, other than walking, consider the setting-up or daily-dozen type of exercise done in the privacy of your bedroom. These are fine because you can set your own schedule for a regular daily training period. Ask your health education teacher or your physician about exercises for your personal use. Certain exercises are particularly helpful in correcting a figure defect, such as poor posture or an awkward gait.

You are likely to need more sleep than when you were a pre-teen. Your body is working harder and faster at the job of growing a bigger and more physiologically mature *you*. Also, you are encountering many new experiences, making vital decisions, and taking serious responsibility for yourself and often for others too. Fatigue, especially when it is chronic, can interfere with your body's ability to convert food into energy and build new tissues. It also interferes with your ability to think clearly and enjoy the adventure and challenge of being a teen-ager.

Food, exercise, and sleep are among the most vital ingredients for the *you* you want to be: fine to look at, fine to know, radiating good health, interested in the world around you, and enjoying a life full of meaning and real depth.

This you can achieve. It's up to you.

