## Recommended Weight and Body Fat Contents

In 1942, Louis Dublin, a statistician at Metropolitan Life Insurance Company, grouped some four million people who were insured with Metropolitan Life into categories based on their height, body frame (small, medium or large) and weight. He discovered that the ones who lived the longest were the ones who maintained their body weight at the level for average 25 -year-olds.

These Metropolitan Life tables became widely used for determining recommended body weights. In 1942, the tables gave "ideal body weights." In 1959, they were revised and became "desirable body weights." And in 1983, they were revised once again, this time called "height and weight tables." The weights given in the 1983 tables are heavier than the 1942 tables because, in general, heavier people live longer today.

Experts have criticized the validity of these tables for several reasons:

1) Insured people tend to be healthier than uninsured people.
2) Frame size was never consistently measured.
3) The people who were included were predominantly white and middle-classed.
4) Some persons were actually weighed, some were not.
5) Some wore shoes and/or clothing, some did not.
6) The tables do not consider percentage of body fat or distribution, which are now known to be important factors in longevity.

Many experts say the 1942 tables are more accurate because they indicate lower "ideal weights." Many experts support the use of the 1983 tables, citing that these are the latest statistical sampling of such matters. The American Heart Association recommends using the 1959 tables rather than the newer tables that suggest somewhat higher weights. This Guide shows you the 1959 tables.

Some experts criticize the Metropolitan Life tables stating that they are okay for persons in their forties, but that the numbers are too heavy for younger persons and too light for older persons. For this and other reasons, NutriBase shows you recommended body weights from four sources: the 1959 Metropolitan Life Insurance chart, the U.S. National Center for Health Statistics, North American Association for the Study of Obesity, and the U.S. Department of the Army. NutriBase displays the heights and weights from these charts, showing you the entries that are appropriate for your sex, height, frame size, and age.

The Metropolitan Life chart is organized by sex and body frame size (small, medium, or large frame) and all the other charts are sex and age-graded except for the North American Association for the Study of Obesity, which lists weights by sex only.

## Weight Charts for Women

| Metropolitan Life Insurance Company, 1959 - Females |  |  |  |
| :---: | :---: | :---: | :---: |
| Height | Small Frame | Medium Frame | Large Frame |
| 4'09" | 90-97 | 94-106 | 102-118 |
| 4'10" | 92-100 | 97-109 | 105-121 |
| 4'11" | 95-103 | 100-112 | 108-124 |
| 5'00" | 98-106 | 103-115 | 111-127 |
| 5'01" | 101-109 | 106-118 | 114-130 |
| 5'02" | 104-112 | 109-122 | 117-134 |
| 5'03" | 107-115 | 112-126 | 121-138 |
| 5'04" | 110-119 | 116-131 | 125-142 |
| 5'05" | 114-123 | 120-135 | 129-146 |
| 5'06" | 118-127 | 124-139 | 133-150 |
| 5'07" | 122-131 | 128-143 | 137-154 |
| 5'08" | 126-136 | 132-147 | 141-159 |
| 5'09" | 130-140 | 136-151 | 145-164 |
| 5'10" | 133-144 | 140-155 | 149-169 |


| US National Center for Health Statistics - Females |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Height | 18-24 Yrs | 25-34 Yrs | 35-44 Yrs | 45-54 Yrs | 55-64 Yrs |
| 4'10" | 114 | 123 | 133 | 132 | 135 |
| 4'11" | 118 | 126 | 136 | 136 | 138 |
| 5'00" | 121 | 130 | 139 | 139 | 142 |
| 5'01" | 124 | 133 | 141 | 143 | 145 |
| 5'02" | 128 | 136 | 144 | 146 | 148 |
| 5'03" | 131 | 139 | 146 | 150 | 151 |
| 5'04" | 134 | 142 | 149 | 153 | 154 |
| 5'05" | 137 | 146 | 151 | 157 | 157 |
| 5'06" | 141 | 149 | 154 | 160 | 161 |
| 5'07" | 144 | 152 | 156 | 164 | 164 |
| 5'08" | 147 | 155 | 159 | 168 | 167 |


| North American Association for the <br> Height | Study of Obes <br> Height | All Ages | $5^{\prime} 05^{\prime \prime}$ |
| :--- | :--- | :--- | :--- |


| US Army - Females |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Height | 17-20 Yrs | 21-27 Yrs | 28-39 Yrs | 40+ Yrs |
| 4'10" | 104 | 107 | 110 | 113 |
| 4'11" | 107 | 110 | 114 | 117 |
| 5'00" | 111 | 114 | 117 | 121 |
| 5'01" | 115 | 118 | 121 | 125 |
| 5'02" | 119 | 123 | 126 | 130 |
| 5'03" | 123 | 126 | 130 | 134 |
| 5'04" | 126 | 130 | 134 | 138 |
| 5'05" | 130 | 134 | 138 | 142 |
| 5'06" | 135 | 139 | 143 | 147 |
| 5'07" | 139 | 143 | 148 | 151 |
| 5'08" | 143 | 147 | 151 | 156 |
| 5'09" | 147 | 151 | 155 | 160 |
| 5'10" | 151 | 156 | 160 | 165 |

## Weight Charts for Men

| Metropolitan Life <br> Height | Insurance Company, <br> Small Frame | 1959 - Male <br> Medium Frame | Large Frame |
| :--- | :---: | :--- | :--- |
| $5^{\prime} 01^{\prime \prime}$ | $105-113$ | $111-122$ | $119-134$ |
| $5^{\prime} 02^{\prime \prime}$ | $108-116$ | $114-126$ | $122-137$ |
| $5^{\prime} 03^{\prime \prime}$ | $111-119$ | $117-129$ | $125-141$ |
| $5^{\prime} 04^{\prime \prime}$ | $114-122$ | $120-132$ | $128-145$ |
| $5^{\prime} 05^{\prime \prime}$ | $117-126$ | $123-136$ | $131-149$ |
| $5^{\prime} 06^{\prime \prime}$ | $121-130$ | $127-140$ | $135-154$ |
| $5^{\prime} 07^{\prime \prime}$ | $125-134$ | $131-145$ | $140-159$ |
| $5^{\prime} 08^{\prime \prime}$ | $129-138$ | $135-149$ | $144-163$ |
| $5^{\prime} 09^{\prime \prime}$ | $133-143$ | $139-153$ | $148-167$ |
| $5^{\prime} 10^{\prime \prime}$ | $137-147$ | $143-158$ | $152-172$ |
| $5^{\prime} 11^{\prime \prime}$ | $141-151$ | $147-163$ | $157-177$ |
| $6^{\prime} 00^{\prime \prime}$ | $145-155$ | $151-173$ | $166-187$ |
| $6^{\prime} 01 "$ | $149-160$ | $155-173$ | $166-187$ |
| $6^{\prime} 02^{\prime \prime}$ | $153-164$ | $160-178$ | $171-192$ |
| $6^{\prime} 03^{\prime \prime}$ | $157-168$ | $165-183$ | $175-197$ |


| US National Center for Health Statistics - Male |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Height | 18-24 Yrs | 25-34 Yrs | 35-44 Yrs | 45-54 Yrs | 55-64 Yrs |
| 5'02" | 130 | 139 | 146 | 148 | 147 |
| 5'03" | 135 | 145 | 149 | 154 | 151 |
| 5'04" | 139 | 151 | 155 | 158 | 156 |
| 5'05" | 143 | 155 | 159 | 163 | 160 |
| 5'06" | 148 | 159 | 164 | 167 | 165 |
| 5'07" | 152 | 164 | 169 | 171 | 170 |
| 5'08" | 157 | 168 | 174 | 176 | 174 |
| 5'09" | 162 | 173 | 178 | 180 | 178 |
| 5'10" | 166 | 177 | 183 | 185 | 183 |
| 5'11" | 171 | 182 | 188 | 190 | 187 |
| 6'00" | 175 | 186 | 192 | 194 | 192 |
| 6'01" | 180 | 191 | 197 | 198 | 197 |
| 6'02' | 185 | 196 | 202 | 204 | 201 |


| Nort | ssociatio | udy of | ales |
| :---: | :---: | :---: | :---: |
| Height | All Ages | Height | All Ages |
| 5'00" | 122 | 5'09" | 161 |
| 5'01" | 126 | 5'10" | 166 |
| 5'02" | 131 | 5'11" | 171 |
| 5'03" | 135 | 6'00" | 175 |
| 5'04" | 139 | 6'01" | 179 |
| 5'05" | 144 | 6'02" | 184 |
| 5'06" | 148 | 6'03" | - |
| 5'07" | 152 | 6'04" | - |
| 5'08" | 157 | - | - |


| US Army - Males |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Height | 17-20 Yrs | 21-27 Yrs | 28-39 Yrs | 40+ Yrs |
| 5'00" | 132 | 136 | 139 | 141 |
| 5'01" | 136 | 140 | 144 | 146 |
| 5'02" | 141 | 144 | 148 | 150 |
| 5'03" | 145 | 149 | 153 | 155 |
| 5'04" | 150 | 154 | 158 | 160 |
| 5'05" | 155 | 159 | 163 | 165 |
| 5'06" | 160 | 163 | 168 | 170 |
| 5'07" | 165 | 169 | 174 | 176 |
| 5'08" | 170 | 174 | 179 | 181 |
| 5'09" | 175 | 179 | 184 | 186 |
| 5'10" | 180 | 185 | 189 | 192 |
| 5'11" | 185 | 189 | 194 | 197 |
| 6'00" | 190 | 195 | 200 | 203 |
| 6'01" | 195 | 200 | 205 | 208 |
| 6'02" | 201 | 206 | 211 | 214 |

## No Consensus

One look at the charts will make it obvious that there simply is no consensus as to what "ideal body weight" should be. In reality, it is actually different for every individual and is dependent on health, body fat content and distribution, musculature, age, activity, metabolism, and a host of other factors that are not simple to measure accurately. For these reasons, you and your physician or dietitian must decide what your ideal weight should be. You probably have an idea what that weight is. Start conservatively. And if you reach your target weight and still feel you need to trim off additional weight, you always have option to set a new target goal.

| Body Fat Content | Chart for Women and Men |  |
| :--- | :--- | :--- |
| Body Type | Female | Male |
| Athlete | $<17 \%$ | $<10 \%$ |
| Lean | $17-22 \%$ | $10-15 \%$ |
| Normal | $22-25 \%$ | $15-18 \%$ |
| Above Average | $25-29 \%$ | $18-20 \%$ |
| Overfat | $29-35 \%$ | $20-25 \%$ |
| Obese | $35+\%$ | $25+\%$ |

