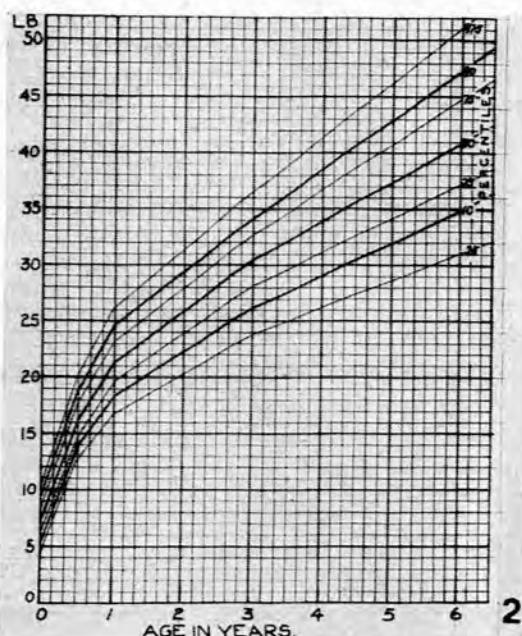
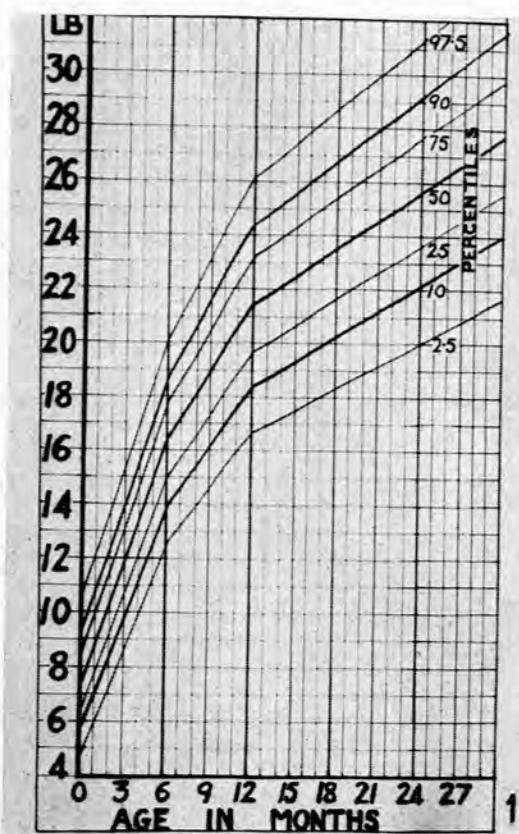


WEIGHT CHARTS OF COLOURED INFANTS AND PRE-SCHOOL CHILDREN

ISOBEL ROBERTSON, B.A., M.B., Ch.B., D.P.H., *Maternal and Child Welfare Officer, City Health Department, Cape Town*



Weight charts have been prepared from the known weights of normal Coloured infants and pre-school children seen at child-welfare centres, crèches, and nursery schools in Cape Town.

To ensure that these charts represent the normal range of weights for Coloured children, 400 children were chosen, all of whom were in good health and from families with incomes above the poverty datum line. This excludes malnourished children.

Each child's weight was recorded at successive ages. From these weights percentiles were calculated and charts prepared (Figs. 1 and 2). The charts are presented as a series of percentile lines, the 50 percentile representing the mean, and the 2.5 and 97.5 percentile lines the very uncommon limits of the normal. Incidentally, these limits are exactly twice the standard deviation on either side of the mean.

The percentile chart published by the Children's Medical Center, Boston,* has been reduced to the same scale for comparison. The rate of growth shown on the Boston chart is somewhat greater than that shown for Coloured children (Fig. 3).

An example of how the charts can be used to demonstrate the state of nutrition and rate of growth is shown in Fig. 4.

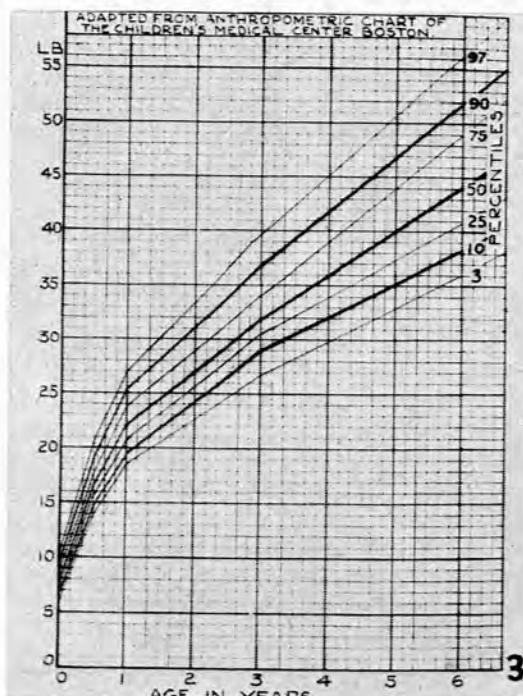
It is submitted that these percentile charts should be used as a standard for assessing the rate of growth and nutritional state of Coloured infants and pre-school children.

* Anthropometric Weight Chart—The Children's Medical Center, Boston.

Fig. 1. Percentile weight chart for Cape Coloured infants.

Fig. 2. Percentile weight chart for Cape Coloured children from birth to 6 years.

Fig. 3. Percentile weight chart for American children from birth to 6 years.



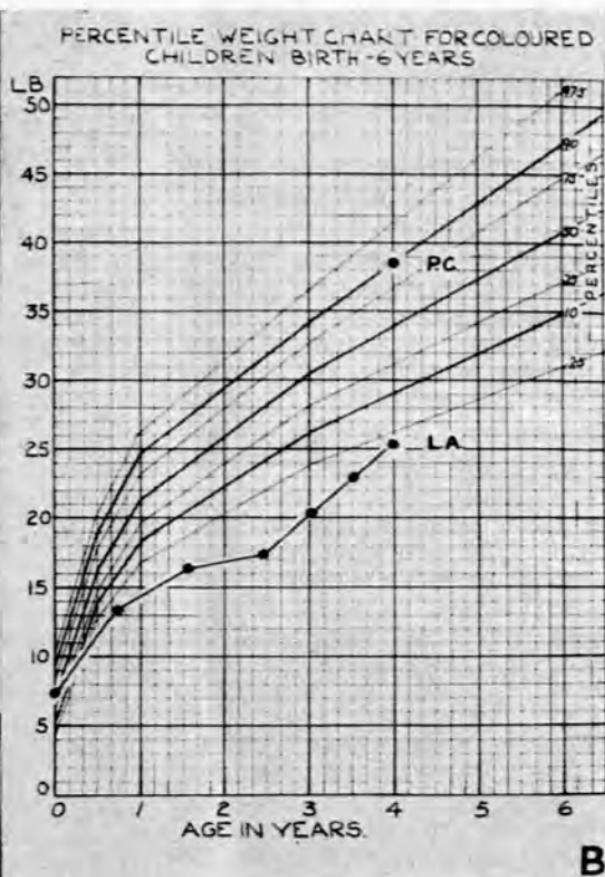


Fig. 4. Example of the use of the percentile chart. A. P.C. (left) and L.A. (right) are both 4 years of age. B. P.C.'s weight has been plotted on the percentile chart, and falls on the 90 percentile line, i.e. well above average weight. L.A., on account of severe malnutrition from early infancy to 2½ years, reflects weight well outside the 2·5 percentile line, i.e. severely underweight. From the age of 2½ years L.A. has had milk added to her diet, and has shown a marked increase in the rate of gain in weight for the last 1½ years, which is clearly shown on the chart. At this rate of growth L.A. will soon regain normal weight and may even approach P.C.