

American Academy of Pediatrics Recommendations for Prevention of Pediatric Overweight and Obesity

The American Academy of Pediatrics (AAP) recommends that periodic measurement of BMI be performed as part of a comprehensive approach to prevention of pediatric overweight.

Health Supervision Recommendations

- 1) Identify and track patients at risk by virtue of family history, birth weight, or socioeconomic, ethnic, cultural, or environmental factors.
- 2) Calculate and plot BMI once a year on all children and adolescents.
- 3) Use change in BMI to identify rate of excessive weight gain relative to linear growth.
- 4) Encourage, support, and protect breastfeeding.
- 5) Encourage parents and caregivers to promote healthy eating patterns by offering nutritious snack, such as vegetables and fruits, low-fat dairy foods, and whole grains; encouraging children's autonomy in self-regulation of food intake and setting appropriate limits on choices; and modeling healthy food choices.
- 6) Routinely promote physical activity, including unstructured play at home, in school, in childcare settings, and throughout the community.
- 7) Recommend limitations of television and video time to a maximum of 2 hours per day.
- 8) Recognize and monitor changes in obesity-associated risk factors for adult chronic disease, such as hypertension, dyslipidemia, hyperinsulinemia, impaired glucose tolerance, and symptoms of obstructive sleep apnea syndrome.

Advocacy Recommendations

- 1) Help parents, teachers, coaches, and others who influence youth to discuss health habits, not body habitus, as part of their efforts to control overweight and obesity.
- 2) Enlist policy makers from local, state, and national organizations and schools to support a healthful lifestyle for all children, including proper diet and adequate opportunity for regular physical activity.
- 3) Encourage organizations that are responsible for health care and health care financing to provide coverage for effective obesity prevention and treatment strategies.
- 4) Encourage public and private sources to direct funding toward research into effective strategies to prevent overweight and obesity and to maximize limited family and community resources to achieve healthful outcomes for youth.
- 5) Support and advocate for social marketing intended to promote healthful food choices and increased physical activity.

Steps to Calculate, Plot, and Interpret BMI for Children and Adolescents

- Step 1: Obtain accurate height and weight measurements
- Step 2: Calculate BMI, using BMI slide wheel, table, or formula:
- Metric: $BMI = (\text{weight in kg}) / (\text{height in meters}) (\text{height in meters})$
- English: $BMI = (\text{weight in lbs} \times 703) / (\text{height in inches}) (\text{height in inches})$
- Step 3: Select the BMI-for-age chart appropriate for child's gender
- Step 4: Plot the BMI value at the intersect with child's age
- Step 5: Identify the percentile line closest to point plotted
- Step 6: Interpret the plotted measurements

Overweight	At or above 95 th percentile of BMI-for-age
At Risk for Overweight	Between 85 th and 95 th percentiles
Normal weight	Between 5 th and 85 th percentiles
Underweight	Below 5 th percentile of BMI-for-age

While rate of change in BMI as a specific risk indicator has not been well defined, an annual increase of 3 or more BMI units may reflect rapid increase in body fat that warrants further evaluation.

- Step 7: Consider further assessment to confirm diagnosis of overweight, identify underlying causes of overweight, and guide management plan

BMI-for-age is a screening tool. Clinical judgment must be applied to determine the need for further assessment. Growth patterns outside normal range should always prompt rechecking of measurements. Children and adolescents determined to be overweight should undergo in-depth assessment for underlying causes and guide management plans.