

Child Overweight and Obesity

DEFINITION

Child overweight and obesity is the percentage of children whose body mass index (BMI) meets the definition for overweight or obese. Children with a BMI at or above the 95th percentile for gender and age are considered to be obese, and children with a BMI between the 85th and 95th percentiles are considered to be overweight or at risk for obesity.¹

SIGNIFICANCE

Children and adolescents who are overweight or obese are at immediate and/or long-term risk of many health problems, including type 2 diabetes, cardiovascular disease, asthma, joint problems, sleep apnea, and other acute and chronic health problems. Over time, these conditions may contribute to a shorter lifespan. They may also experience social and psychological problems, including depression, bullying, and social marginalization. Obese children and youth are also more likely to repeat a grade, be absent from school, and have reduced academic performance than their peers.^{2,3,4}

Nationally, there is a continued upward trend in obesity.⁵ In 2015-2016 in the U.S., the prevalence of obesity in children ages two to 19 was 19% with a significant increase in severe obesity for children ages two to five years.^{6,7}

Prior to 2018, Rhode Island did not have adequate clinical childhood BMI data. A recent study of 65,829 de-identified records with clinical and related billing code data from 2018 found that 13% of Rhode Island children ages two to 17 are overweight and 17% are obese.⁸

The increased prevalence of childhood obesity is the result of complex interactions among many factors, including excess calorie consumption, genes, metabolism, behavior, environment, and culture.⁹ Low consumption of healthy foods, high consumption of sugar-sweetened beverages and energy dense foods, low levels of physical activity, and high levels of screen time are all associated with obesity.¹⁰

Prevention and intervention for at-risk, overweight, and obese children should occur early and at all ages.¹¹ Reducing overweight and obesity will require a comprehensive, multi-system approach.

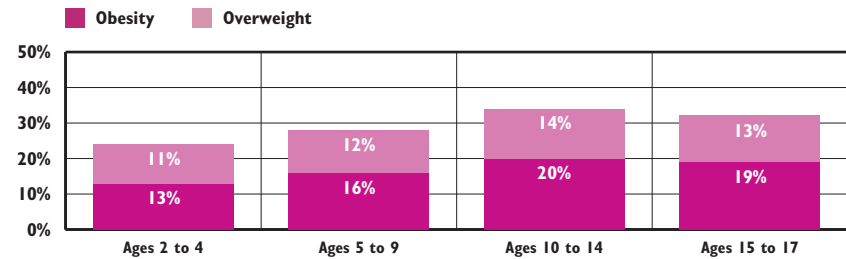
Overweight and Obesity Among Children Age 10-17 (Combined Overweight and Obesity)	
	2017-2018
RI	31%
US	31%
National Rank*	30th
New England Rank**	5th

*1st is best; 50th is worst

**1st is best; 6th is worst

Source: Data Resource Center for Child and Adolescent Health, 2017-2018 National Survey of Children's Health, childhealthdata.org

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Rhode Island Childhood Overweight and Obesity by Age, 2018



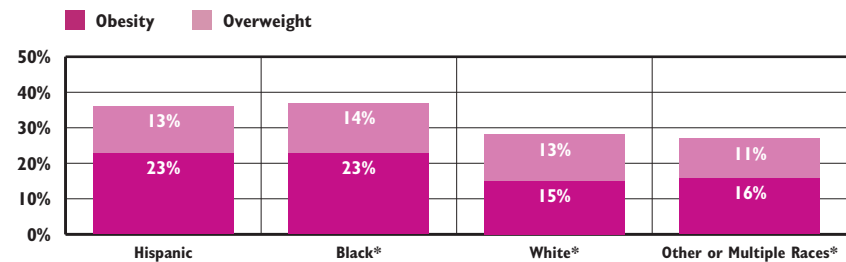
Source: Hassenfeld Child Health Innovation Institute analysis of BMI clinical and billing records of children ages two to 17 in Rhode Island from KIDSNET, Current Care, Blue Cross & Blue Shield of Rhode Island, Neighborhood Health Plan of Rhode Island, and United Healthcare collected by the Department of Health, 2018.

◆ **Thirteen percent of Rhode Island children age two to 17 are overweight and 17% are obese.**¹²

◆ **Older children are more likely to be overweight or obese. Twenty percent of children ages 10 to 14 and 19% of children ages 15 to 17 are obese.**¹³

◆ **Twenty-two percent of children covered by RIte Care are obese compared to 12% of children with private health insurance.**¹⁴

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Rhode Island Childhood Overweight and Obesity by Race/Ethnicity, 2018



Source: Hassenfeld Child Health Innovation Institute analysis of BMI clinical and billing records of children ages two to 17 in Rhode Island from KIDSNET, Current Care, Blue Cross & Blue Shield of Rhode Island, Neighborhood Health Plan of Rhode Island, and United Healthcare collected by the Department of Health, 2018. *Non-Hispanic.

◆ **Hispanic children (13% overweight and 23% obese) and Non-Hispanic Black children (14% overweight and 23% obese) have the highest rates of overweight and obesity.**¹⁵

Table 26. Prevalence of Overweight and Obesity in Rhode Island Children Ages 2 to 17, 2018

CITY/TOWN	% OVERWEIGHT	% OBESE	% OVERWEIGHT AND OBESE COMBINED
Barrington	12.3%	7.6%	20%
Bristol	11.2%	11.9%	23%
Burrillville	14.8%	17.4%	32%
Central Falls	17.6%	33.6%	51%
Charlestown	12.6%	11.8%	24%
Coventry	12.2%	12.9%	25%
Cranston	12.1%	15.8%	28%
Cumberland	14.8%	15.8%	31%
East Greenwich	10.9%	7.4%	18%
East Providence	15.4%	18.5%	34%
Exeter	11.0%	9.3%	20%
Foster	12.7%	9.9%	23%
Glocester	11.7%	11.0%	23%
Hopkinton	11.7%	10.8%	22%
Jamestown	8%^	8%^	16%
Johnston	13.2%	18.1%	31%
Lincoln	13.9%	16.0%	30%
Little Compton	*	*	19%^
Middletown	11.8%	12.4%	24%
Narragansett	14.5%	13.6%	28%
New Shoreham	*	*	20%^
Newport	12.1%	15.0%	27%
North Kingstown	9.2%	11.0%	20%
North Providence	18.9%	16.7%	36%
North Smithfield	14.7%	14.9%	30%
Pawtucket	15.2%	26.5%	42%
Portsmouth	9.0%	9.1%	18%
Providence	11.5%	20.4%	32%
Richmond	11.1%	11.3%	22%
Scituate	10.4%	11.3%	22%
Smithfield	11.0%	13.0%	24%
South Kingstown	13.9%	12.8%	27%
Tiverton	9.9%	13.7%	24%
Warren	14.2%	17.6%	32%
Warwick	13.8%	14.9%	29%
West Greenwich	14.5%	10.0%	24%
West Warwick	12.0%	18.0%	30%
Westerly	11.0%	18.1%	29%
Woonsocket	14.6%	26.5%	41%
Four Core Cities	13%	23%	36%
Remainder of State	13%	14%	27%
Rhode Island	13%	17%	30%



Nutrition and Physical Activity

◆ Nutrition and physical activity are important components of supporting a healthy weight. Many children and adolescents consume diets with too many calories and not enough nutrients.^{16,17} In 2019, 86% of Rhode Island high school students reported eating less than three servings of vegetables a day, the recommended amount.¹⁸ Eighteen percent of Rhode Island high school students reported drinking a sugar sweetened beverage at least once a day.¹⁹

◆ Regular physical activity, including school-based physical education and recess, has been shown to have physical, social, emotional, cognitive, academic, and health benefits.^{20,21} In 2018, 55% of Rhode Island middle school students and 59% of high school students reported less than five days of physical activity in a week.²²

◆ Policy strategies to reduce obesity include improving access to nutritional and affordable foods and beverages, ensuring healthy food in schools, increasing options for physical activity before, during, and after school as well as in early learning programs, and improving access to safe and walkable neighborhoods and recreational areas.²³

Source of Data for Table/Methodology

Hassenfeld Child Health Innovation Institute analysis of BMI clinical and billing records of children ages 2 – 17 in Rhode Island from KIDSNET, Current Care, Blue Cross & Blue Shield of Rhode Island, Neighborhood Health Plan of Rhode Island, and United Healthcare collected by the Department of Health, 2018.

^ The data are statistically unstable and rates or percentages should be interpreted with caution.

* The data are statistically unreliable and rates are not reported and should not be calculated.

Core cities are Central Falls, Pawtucket, Providence, and Woonsocket.

References

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(continued on page 181)