

# Physical Activity, Nutrition and Obesity in North Carolina

Last updated December 2009

## Quick Facts on Overweight and Obesity

### Adults

In 2008, nearly **two-thirds** (65.7%) of adults in North Carolina were either overweight or obese.<sup>1</sup>

From 2001 to 2008, the proportion of North Carolina adults who were overweight or obese increased from 58.8% to 65.7%.<sup>2</sup> That's an increase of more than **1,006,894 adults**,<sup>3</sup> or the estimated outdoor crowd at President Obama's 2009 inauguration.<sup>4</sup>



### Children and Youth



In 2008, North Carolina ranked **14<sup>th</sup>** in the nation in childhood overweight and obesity for youth ages 10 to 17.<sup>5</sup>

In 2008, almost **one-third** (32.8%) of youth ages 10 to 17 in North Carolina were either overweight or obese.<sup>6</sup>

From 2001 to 2007, the proportion of high school students who were overweight or obese increased from 27.2% to 29.9%.<sup>7</sup>

That's an increase of nearly **25,000 students**,<sup>8</sup> or enough to fill **325 school buses**.<sup>9</sup>

Despite the medical advances of the past 100 years, our children's **life expectancy will likely decrease** due to overweight and associated diseases.<sup>10</sup>

#### For more information:

[www.eatsmartmovemorenc.com/Data/Data.html](http://www.eatsmartmovemorenc.com/Data/Data.html)

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#### DEFINING OVERWEIGHT & OBESITY

##### **Body Mass Index (BMI):**

$$\frac{(\text{weight in pounds} \times 703)}{(\text{height in inches})^2}$$

##### **Overweight:**

Adults, BMI 25.0–29.9  
Children, BMI 85<sup>th</sup> to <95<sup>th</sup> percentile

##### **Obese:**

Adults, BMI  $\geq 30$   
Children, BMI  $\geq 95^{\text{th}}$  percentile

### Comparison of North Carolina to the United States (2007 and 2008 when available)

A positive sign (+) indicates a higher prevalence for N.C. than the U.S. A negative sign (-) indicates a lower prevalence for N.C. than the U.S.

	<u>N.C.</u>	<u>U.S.</u>	<u>Year</u>	
<b>Overweight and Obesity</b>				
Overweight and obese adults <sup>11</sup>	65.7%	63.2%	2008	+
Overweight and obese high school students <sup>12</sup>	29.9%	28.8%	2007	+
<b>Physical Activity</b>				
Adults* getting the recommended amount of physical activity <sup>13</sup>	44.0%	49.5%	2007	-
<b>Breastfeeding**</b>				
Mothers who initiated breastfeeding <sup>14</sup>	61.0%	64.6%	2008	-
Infants who were breastfed for at least 6 months <sup>15</sup>	21.3%	25.4%	2008	-
<b>Fruit and Vegetable Consumption</b>				
Adults getting 2+ servings of fruits and 3+ servings of vegetables per day <sup>16</sup>	10.8%	14.0%	2007	-
Adolescents getting 2+ servings of fruits and 3+ servings of vegetables per day <sup>17</sup>	6.0%	9.5%	2007	-

\* National comparison data for children and youth meeting daily recommended physical activity data is not available (only five of seven days).

\*\* This breastfeeding data is limited to mothers and infants enrolled in the Special Supplemental Nutrition Program for Women, Infants and Children (WIC).

### Comparison of 2001 to Present (2007 or 2008, depending on available data)

A positive sign (+) indicates an increase over time. A negative sign (-) indicates a decrease.

<b>Physical Activity in North Carolina</b>			
Adults* getting the recommended** amount of physical activity <sup>18</sup>	<u>2001</u>	<u>2007</u>	
	42.4%	44.0%	+
<b>Breastfeeding in North Carolina ***</b>			
Mothers who initiated breastfeeding <sup>19</sup>	<u>2001</u>	<u>2008</u>	
	52.6%	61.0%	+
Infants breastfed for at least six months <sup>20</sup>			
	16.6%	21.3%	+
<b>Fruit and Vegetable Consumption in North Carolina</b>			
Adults getting 5+ servings of fruits and vegetables per day <sup>21</sup>	<u>2001</u>	<u>2007</u>	
	25.5%	21.6%	-
Adolescents getting 5+ servings of fruits and vegetables per day			
	17.8%	14.8%	-

\* Recommended physical activity data is not available for children and youth until 2005.

\*\* "Recommended" is defined as moderate physical activity for 30 or more minutes per day, five or more days per week OR vigorous physical activity for 20 or more minutes per day, three or more days per week.

\*\*\* This breastfeeding data is limited to mothers and infants enrolled in the Special Supplemental Nutrition Program for Women, Infants and Children (WIC).

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- <sup>1</sup> North Carolina Department of Health and Human Services, Division of Public Health, State Center for Health Statistics, *Behavioral Risk Factor Surveillance System Data*, 2008. Available at [www.schs.state.nc.us/SCHS/brfss/2008/](http://www.schs.state.nc.us/SCHS/brfss/2008/). Accessed November 30, 2009.
- <sup>2</sup> North Carolina Department of Health and Human Services, Division of Public Health, State Center for Health Statistics, *Behavioral Risk Factor Surveillance System Data*, 2008. Available at [www.schs.state.nc.us/SCHS/brfss/2008/](http://www.schs.state.nc.us/SCHS/brfss/2008/). Accessed November 30, 2009.
- <sup>3</sup> U.S. Census Bureau estimates for the adult population of North Carolina in 2000 and 2007. Available at <http://factfinder.census.gov/>. Accessed November 30, 2009. Based on a 2000 denominator of 6,085,266 and a 2008 denominator of 6,978,737.
- <sup>4</sup> Based on satellite images. Available at [http://en.wikipedia.org/wiki/Inauguration\\_of\\_Barack\\_Obama](http://en.wikipedia.org/wiki/Inauguration_of_Barack_Obama). Accessed November 30, 2009.
- <sup>5</sup> Trust for America's Health. *F as in Fat: How Obesity Policies are Failing in America*, 2009. Washington, DC: Trust for America's Health; 2008. Available at [www.healthyamericans.org](http://www.healthyamericans.org). November 30, 2009.
- <sup>6</sup> North Carolina Department of Health and Human Services, Division of Public Health, State Center for Health Statistics, *North Carolina Child Health Assessment and Monitoring Program Data*, 2008.
- <sup>7</sup> N.C. Healthy Schools, *North Carolina Youth Risk Behavior Survey Data*, 2007. Available at [www.nchealthyschools.org/data/yrbs/](http://www.nchealthyschools.org/data/yrbs/). Accessed November 30, 2009.
- <sup>8</sup> North Carolina Department of Public Instruction, State Board of Education, *North Carolina Public Schools Statistical Profile 2007*. Available at [www.dpi.state.nc.us/fbs/resources/data/](http://www.dpi.state.nc.us/fbs/resources/data/). Accessed November 30, 2009.
- <sup>9</sup> Based on a 77 passenger school bus.
- <sup>10</sup> Olshansky SJ, Passaro DJ, Hershow RC, Layden J, Carnes BA, Brody J, Hayflick L, Butler RN, Allison DB, Ludwig DS. A Potential Decline in Life Expectancy in the United States in the 21st Century. *New England Journal of Medicine*. 2005;352: 1135–37.
- <sup>11</sup> Centers for Disease Control and Prevention, National Center for Chronic Disease Prevention and Health Promotion, *Chronic Disease Indicators State Profile*, 2007. Available at <http://apps.nccd.cdc.gov/BRFSS/display.asp?cat=OB&yr=2007&qkey=4409&state=US> Accessed November 30, 2009.
- <sup>12</sup> Centers for Disease Control and Prevention. *Youth Risk Behavior Surveillance – United States, 2007*. Surveillance Summaries, June 6, 2008. MMWR 2008; 57(No. SS-4).
- <sup>13</sup> Centers for Disease Control and Prevention, National Center for Chronic Disease Prevention and Health Promotion, *Chronic Disease Indicators State Profile*, 2007. Available at <http://apps.nccd.cdc.gov/cdi/Default.aspx>. November 30, 2009.
- <sup>14</sup> North Carolina Department of Health and Human Services, Division of Public Health, Nutrition Services Branch, *Pregnancy Nutrition Surveillance System Data*, 2008. Available by request from NC Division of Public Health. Accessed November 30, 2009.
- <sup>15</sup> North Carolina Department of Health and Human Services, Division of Public Health, Nutrition Services Branch, *Pediatric Nutrition Surveillance System Data*, 2008. Available at [www.nutritionnc.com/nutrsurv.htm](http://www.nutritionnc.com/nutrsurv.htm). Accessed November 30, 2009.
- <sup>16</sup> State Indicator Report on Fruits and Vegetables, 2009, 2007 data. Available at [www.fruitsandveggiesmatter.gov/health\\_professionals/statereport.html](http://www.fruitsandveggiesmatter.gov/health_professionals/statereport.html). November 30, 2009.
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- <sup>18</sup> North Carolina Department of Health and Human Services, Division of Public Health, State Center for Health Statistics, *Behavioral Risk Factor Surveillance System Data*, 2007. Available at [www.schs.state.nc.us/SCHS/data/brfss.cfm](http://www.schs.state.nc.us/SCHS/data/brfss.cfm). November 30, 2009.
- <sup>19</sup> North Carolina Department of Health and Human Services, Division of Public Health, Nutrition Services Branch, *Pregnancy Nutrition Surveillance System Data*, 2008. Available by request from NC Division of Public Health. Accessed November 30, 2009.
- <sup>20</sup> North Carolina Department of Health and Human Services, Division of Public Health, Nutrition Services Branch, *Pediatric Nutrition Surveillance System Data*, 2008. Available at [www.nutritionnc.com/nutrsurv.htm](http://www.nutritionnc.com/nutrsurv.htm). Accessed November 30, 2009.
- <sup>21</sup> North Carolina Department of Health and Human Services, Division of Public Health, State Center for Health Statistics, *Behavioral Risk Factor Surveillance System Data*, 2001, 2007. Available at [www.schs.state.nc.us/SCHS/data/brfss.cfm](http://www.schs.state.nc.us/SCHS/data/brfss.cfm). November 30, 2009.