

TOTS Brief

THE OKLAHOMA TODDLER SURVEY



OKLAHOMA TODDLERS: NUTRITION AND PHYSICAL ACTIVITY

OKLAHOMA FAST FACTS

Good nutrition and regular physical activity aid in growth, healthy development, and lifelong wellbeing for children.¹ Additionally, nutrition and physical activity play a role in reducing the risk of a child developing conditions such as obesity, heart disease, cancer, and other chronic diseases and subsequent health problems.²

Toddlers are impressionable and eager to learn. Therefore, this stage of development is a great time to nurture positive attitudes toward healthy behaviors.

This Brief looks at The Oklahoma Toddler Survey (TOTS) data from 2012-2015. Mothers of two-year-olds were asked about their child's daily nutrition and physical activity. Their answers were then compared to national recommendations³ for this age group. These standards determined the percent of Oklahoma toddlers that were at, above, or below the recommendations.

Nutrition

Mothers were asked about the number of times per day their two-year-old consumed the following items: fruits, vegetables or salad, whole grains, whole milk, 2% milk, and 100% juice. Figure 1 shows the percent of Oklahoma two-year-olds that were at, above, or below the nutritional intake recommendations for the aforementioned items (with at and above being combined). The recommendation for fruit intake at this age was 2-4 servings daily. Just over 80% of Oklahoma toddlers met this recommendation.

The daily recommendation for vegetables was 3-5 servings and for grains it was 6-11 servings (with at least half of these being whole grains). Only around one in four Oklahoma toddlers (24.4%) were at or above the recommendation for vegetable intake and just under half (46.7%) were at or above the recommended intake of whole grains.

Whole milk was consumed at least one time daily for almost 69% of Oklahoma toddlers and nearly 62% of Oklahoma toddlers drank 2% milk at least once daily, although low and fat free milk was the national standard.

The recommendation for 100% fruit juice was for two-year-olds to have no more than 4-6 ounces daily. Eighty-four percent of Oklahoma toddlers had juice at least once daily.

80.2%

Percent of toddlers who ate fruit 2 or more times daily

24.2%

Percent of toddlers who ate vegetables at least 3 times daily

46.7%

Percent of toddlers who had whole grains at least 3 times daily

84%

Percent of toddlers who had 100% fruit juice 1 time or more daily

68.9%

Percent of toddlers who drank whole milk at least once daily

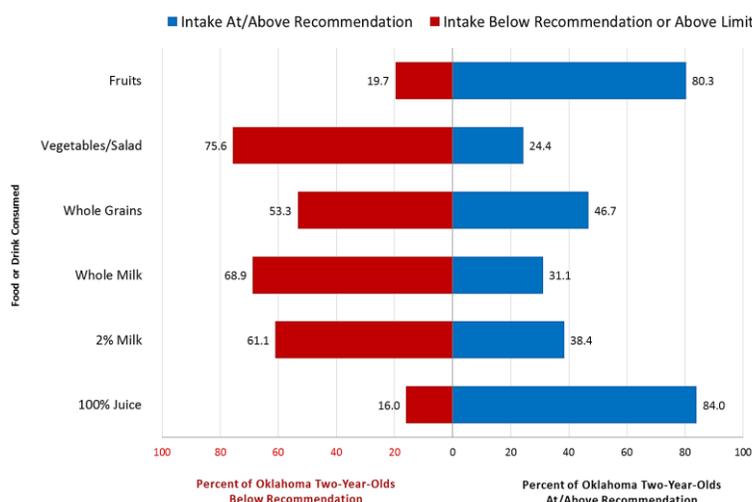
61.1%

Percent of toddlers who drank 2% milk at least once daily

91.3%

Percent of toddlers who received at least 60 minutes of physical activity daily

Figure 1. Daily Nutritional Intake of Oklahoma Two-Year-Olds Compared to National Recommendations, TOTS 2012-2015



"I feel it is a constant battle in this world to make healthy choices."
-TOTS mom

The Oklahoma Toddler Survey (TOTS) is an ongoing, two-year follow-back survey to the Oklahoma Pregnancy Risk Assessment Monitoring System (PRAMS) survey. Monthly, TOTS samples between 125 to 175 mothers with live infants who responded to PRAMS. Mothers are sent a TOTS survey the month their child turns two-years-old. They receive up to three mail surveys in either English or Spanish seeking their participation. Follow-up phone interviews for non-respondents are conducted.

The unweighted response rate for 2012-2015 data was 64.8% (n=7,131; excluding women ineligible to complete TOTS). Data were weighted to represent the two-year-old's birth cohort for those years. Prevalence rates were calculated using SAS callable SUDAAN.

Special assistance for this Brief was provided by: Binitha Kunnel, MS; Ayesha Lampkins, MPH; Nancy Bacon, MS, RD/LD, CDE; and Peggy Byerly, MS.

Funding was made possible by the Maternal and Child Health Bureau, Department of Health and Human Services, Maternal and Child Health Services Title V Block Grant, grant number is B04MC30635.

This publication was issued by the Oklahoma State Department of Health (OSDH), an equal opportunity employer and provider. A digital file has been deposited with the Publications Clearinghouse of the Oklahoma Department of Libraries. Copies have not been printed but are available for download at www.health.ok.gov. | Issued March 2018

REFERENCES

- American Psychological Association. (2017). *Changing Diet and Exercise for Kids*. Accessed from <http://www.apa.org/topics/children/healthy-eating.aspx>
- Centers for Disease Control and Prevention. (n.d.) *Promoting Healthy Eating and Physical Activity for a Healthier Nation*. Accessed from <https://www.cdc.gov/healthyyouth/publications/pdf/ppp-ch7.pdf>
- American Academy of Pediatrics. (2011). *Bright Futures: Nutrition*. 3rd edition.
- Daniels, S. R., & Greer, F. R. (2008). *Lipid Screening and Cardiovascular Health in Childhood*. *Pediatrics*, 122(1), 198-208. doi:10.1542/peds.2008-1349
- U.S. Department of Agriculture. (May 2012). *Healthy Tips for Picky Eaters*. Accessed from <https://cookingforkids.ok.gov/uploads/resources/HealthyTipsforPickyEaters.pdf>
- American Academy of Family Physicians. (July 2017). *Nutrition Tips for Kids*. Accessed from <https://familydoctor.org/nutrition-tips-for-kids/>

Physical Activity

Mothers were asked how much total time did their two-year-old spend in physically active play on a typical day. This could include organized play (such as an activity led by an adult) or unorganized play (such as playing outside, climbing, running, or riding a tricycle).

The recommendation is for children this age to get at least 60 minutes of physical activity daily.³

Just over 91% of Oklahoma toddlers were reported as getting daily physical activity of at least one hour (data not shown).

Physical Activity and Nutrition

Overall, there were no differences in daily minutes of physical activity between toddlers who were at or above selected food recommendations and those who were below them. However, toddlers who ate the minimum recommended daily amount of vegetables and whole grains were slightly more likely to get at least one hour of daily physical activity than those who did not (Figure 2).

Limitations

This Brief is not without limitations. TOTS asked about the number of times per day a food item or drink was consumed, whereas national

recommendations were based on servings. Also, recall bias may have affected the accuracy of responses for the nutrition questions.

It should also be noted that in 2008 the recommendations for milk consumption changed. They stated that for children ages 1 to 2, whole milk was still appropriate but children ages 2 and over should transition into low-fat (1%) or fat-free (skim) milk instead.⁴ TOTS response choices for this question did not include the low-fat or fat-free options.

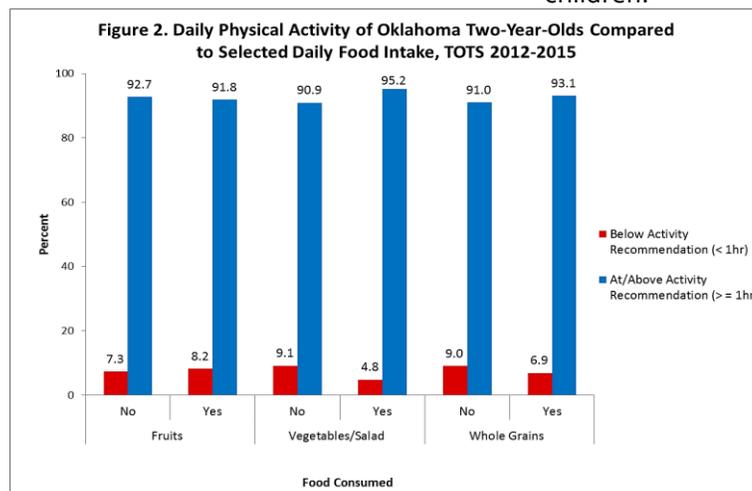
Additional Considerations

ChooseMyPlate.gov developed tips for parents to make mealtime for children healthy and pleasant. They included:⁵

- Encouraging, but never forcing the child to eat.
- Letting the child help shop for and prepare food.
- Eating family meals together at the table.
- Serving child-size portions.

For physical activity, two-year-olds should be encouraged to participate in supervised physical activity outdoors and indoors.³ Safety should also be taken into consideration.

Healthy habits learned as a child are more likely to persist throughout the lifespan.⁶ Therefore, parents, providers, programs, and policies should all work to improve opportunities that benefit children.



FOR MORE INFORMATION

Visit www.health.ok.gov – keyword “TOTS”

TO SIGN-UP TO RECEIVE FUTURE TOTS BRIEFS

Click [here](#)