

**Indicator Domain: OUTCOME**

**Indicator C.8. Percentage of Kindergarten Children with Dental Caries Experience (Treated or Untreated Tooth Decay)**

Source: Association of State and Territorial Dental Directors (ASTDD), [Basic Screening Survey](#) (BSS)

**1. Description**

Percentage of kindergarten children with dental caries experience (treated or untreated tooth decay)

- **Numerator:** Number of kindergarten children screened with treated or untreated tooth decay
- **Denominator:** Number of kindergarten children screened

**2. Framework Domain**

**Outcome**

- Health status: The health state of a person or change in health state resulting from health care

**3. Level of Reporting**

This is a state-level, population-based surveillance measure of the burden of oral disease among kindergarten children.

**4. Data Source**

Clinical screening examinations using the BSS tool developed by ASTDD.

**5. Data Elements**

Critical Data Elements	
Kindergarten BSS	
Children screened	
Dental caries experience	
Available Stratification Elements	
Race/ethnicity	<u>Option 1</u> Non-Hispanic White Hispanic and Non-Hispanic other Unknown/missing  <u>Option 2</u> Hispanic Non-Hispanic White Non-Hispanic Black Non-Hispanic other Unknown/missing

Excerpted from *Oral Health Quality Indicators for the Maternal and Child Health Population: User Guide and Technical Specifications* ©2020 by National Maternal and Child Oral Health Resource Center, Georgetown University, and Dental Quality Alliance.

## 6. Measure Guidance

- **Data-collection year.** Indicate the school year of the most recent kindergarten BSS. Also indicate when the next survey is planned.
- **Adjustment for sampling methodology.** Data should be adjusted for the complex sampling scheme, following guidance provided by ASTDD.<sup>41</sup>

## 7. Measure Calculation: Detailed Specification

### A. Denominator

**Step 1:** Identify the number of children screened in the state during the most recent kindergarten BSS.

**YOU NOW HAVE THE DENOMINATOR (DEN) COUNT: Children screened in the state during the most recent kindergarten BSS**

### B. Numerator

**Step 1:** Determine the subset of the denominator (number of children screened) who were identified as having any caries experience in the **primary or permanent** dentition (treated decay or untreated decay):

- a. If treated decay=YES, OR
- b. If untreated decay=YES, then include in numerator; STOP processing.
- c. If a OR b is not met (i.e., if treated decay=no AND untreated decay=no), then do not include the child in the numerator

**YOU NOW HAVE THE NUMERATOR (NUM) COUNT: Children screened in the state during the most recent kindergarten BSS who have caries experience**

### C. Denominator Exclusions/Exceptions

Exclude children from the denominator with:

- a. Missing variables for **both** treated decay and untreated decay
- b. Treated decay=NO **and** untreated decay=missing
- c. Treated decay=missing **and** untreated decay=NO

### D. Reporting Stratifications

- a. Race/ethnicity (Hispanic, Non-Hispanic White, Non-Hispanic Black, Non-Hispanic other race, Non-Hispanic multiple race, unknown/missing)

**Note:** If data limitations necessitate, race categories can be collapsed as: Non-Hispanic White, Hispanic and Non-Hispanic other race, and unknown/missing

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<sup>41</sup>Association of State and Territorial Dental Directors. 2017. [Guidance on How to Analyze Data from a School-Based Oral Health Survey](#). Reno, NV: Association of State and Territorial Dental Directors.

## E. Measure Score

Report:

- a. Number of individuals excluded from denominator, unweighted
- b. Number in denominator (after exclusions), unweighted sample count
- c. Number in numerator, unweighted sample count
- d. Number in denominator, weighted
- e. Number in numerator, weighted
- f. Measure score (NUM/DEN), weighted, with 95% confidence interval
- g. Measure score, weighted, stratified by [reporting stratification] with 95% confidence intervals and unweighted denominator count
- h. Whether positive or passive consent is used and the response rate

## 8. Limitations

BSS tools were developed by ASTDD to help state and local public health agencies monitor the burden of oral disease at a level consistent with *Healthy People* objectives. BSS tools were not designed to measure small changes in disease levels and are probably not appropriate for use in oral health research.<sup>42</sup>

The BSS is typically conducted at a recommended interval of every 5 years within a state. Consequently, this outcome indicator will not be updated annually.

If a state uses positive consent, the information is representative only of children whose families returned a consent form. ASTDD encourages states to use passive (opt-out) consent.

## 9. Additional Notes

Additional information on the BSS is available [online](#).

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<sup>42</sup> Association of State and Territorial Dental Directors. 2017. [The Basic Screening Survey: A Tool for Oral Health Surveillance Not Research](#). Reno, NV: Association of State and Territorial Dental Directors.