

Oral Health Status of School-Aged Children in South Carolina

Christine Veschusio, MA, RDH, Director
Division of Oral Health
SC Department of Health and Environmental Control

Amy Brock Martin, Dr.P.H., Deputy Director
SC Rural Health Research Center
Arnold School of Public Health
University of South Carolina



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Learning Objectives of Panel

1. Describe three different approaches states have used to conduct state-wide oral health screenings using the Basic Screening Survey as a guide.
2. Describe trends in children's indicators at state and national levels and discuss considerations when comparing national and state data for these indicators
3. Describe how the BSS has been used to track oral health status of young children and older adults



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Overview

- Overview of BSS Process in SC
- Principle Findings from the 2007/2008 OHNA
- Additional Surveillance Opportunities
- Lessons Learned
- Conclusion



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Overview - Doing Surveillance for the Sake of Surveillance? *NOT!*

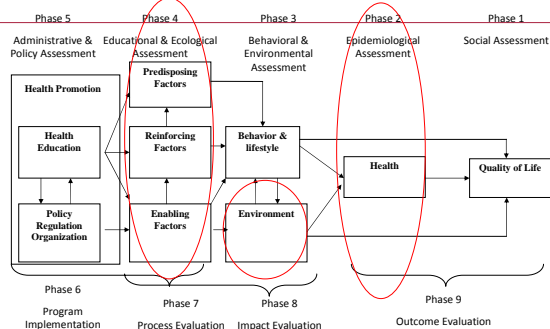
- Why do we need the data?
- How will we use the data?
- How does the OHNA fit into the State Oral Health Plan and contribute to its evaluation?



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Theoretical Framework – SOHP & OHNA



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What Would Enhance the BSS Data

- Oral Health Status (Epidemiological Assessment) – captured by BSS
 - ◆ Sealants
 - ◆ Caries Experience
 - ◆ Untreated Caries
 - ◆ Treatment Urgency
 - ◆ Various demographic variables
- Availability of Providers (Environmental Assessment) – captured by HPSA designations in Area Resource File
 - ◆ Dental Health Professional Shortage Areas
- Moderators of Access (Ecological Assessment - Enabling and Predisposing Factors) – captured by linking with Medicaid claims & Public School data
 - ◆ Medicaid enrollment
 - ◆ Free and Reduced Lunch (poverty proxy)
 - ◆ Race/ethnicity (income and/or access proxy)
 - ◆ School in 'rural' area (income and/or access proxy)



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Introduction

- The Oral Health Needs Assessment is conducted every 5 years by CDC Cooperative Agreement recipients.
- A standardized instrument from ASTDD is used.
- Screenings were conducted by DOH staff and school sealant program partners
- 5,734 children were screened in 73 schools in 39 school districts during the fall and spring semesters of the 2007-2008 school year.

Screening Protocol

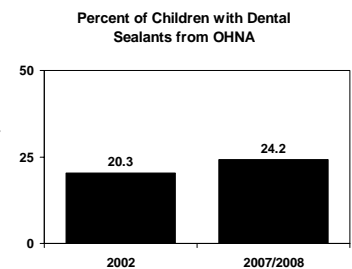
- 618 schools with 102,628 K-5 and 3rd grade children
- Schools with <20 students enrolled in K-5 and/or 3rd grade were removed
- Sampling frame was stratified by DHEC region
- Within region, probability sample of schools was selected with stratification by:
 - ◆ rural/urban status
 - ◆ percent of children eligible for free/reduced lunch program
- If region had 60 + schools, 10% of schools were selected.
- If region had <60 schools, 6 schools were selected

Results

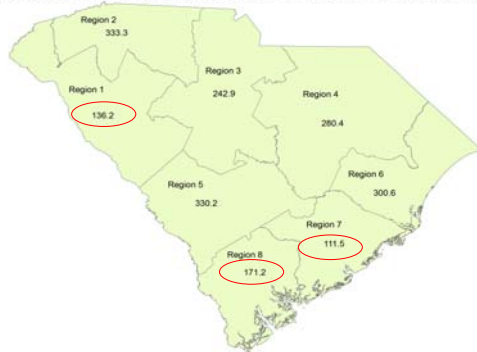
- All data were examined by:
 - ◆ Race (Hispanic data missing 20% of the time)
 - ◆ Gender
 - ◆ Age
 - ◆ Grade
 - ◆ Medicaid enrollment status (matched to data at ORS)
 - ◆ Free & reduced lunch status (matched to data at ORS)
 - ◆ Rural/urban school location (created by SCRHRC)
 - ◆ Dental HPSA (created by SCRHRC)
 - ◆ DHEC region (created by SCRHRC)

Sealants

- No differences detected for:
 - ◆ Race
 - ◆ Age
 - ◆ Gender
 - ◆ Free & Reduced Lunch Participation
 - ◆ Rural-Urban location of school
- Medicaid Enrollment
Children enrolled in Medicaid more likely to have sealants than other children.

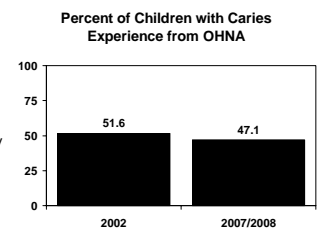


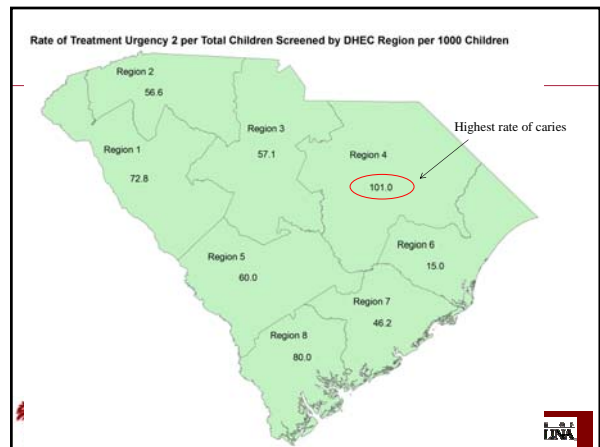
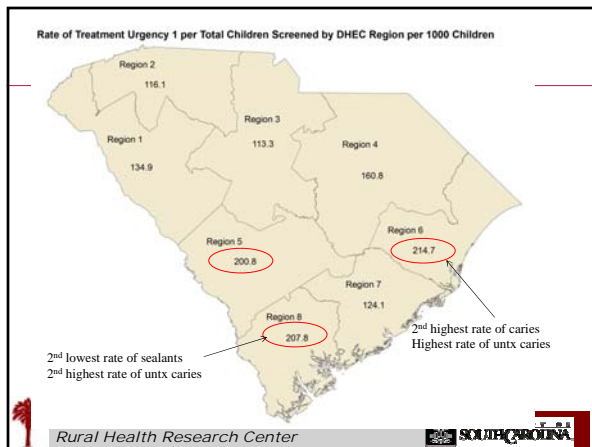
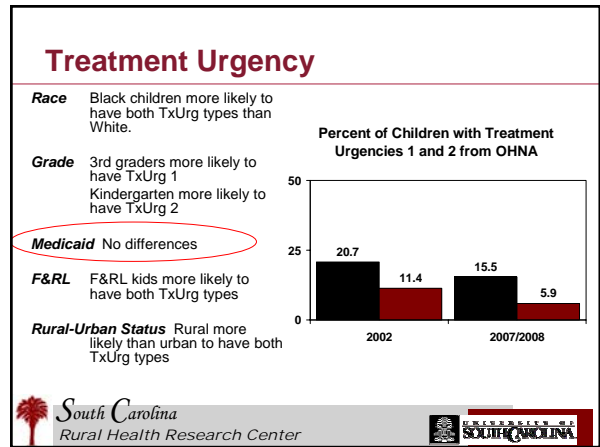
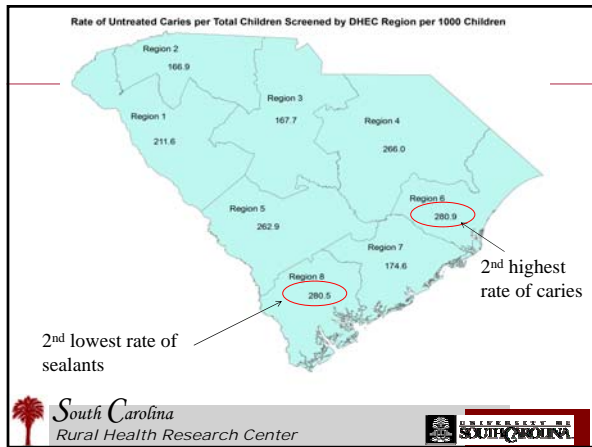
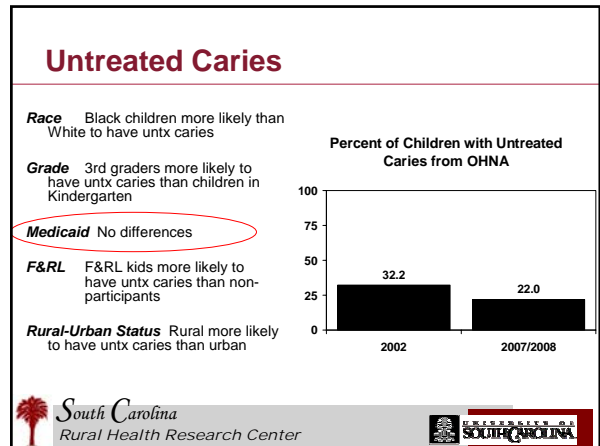
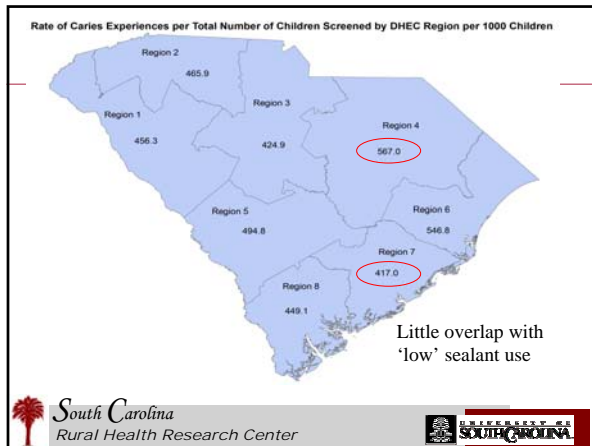
Third Grade Sealant Rate per Total Number of 3rd Graders Screened by DHEC Region per 1000 Children



Caries Experience

- Race Black children more likely to have caries than White.
- Grade 3rd graders more likely to have caries than children in Kindergarten
- Medicaid Medicaid kids more likely to have caries than others
- F&RL F&RL participants more likely to have had caries than non-participants
- Rural-Urban Status Rural more likely to have caries than urban





Additional Surveillance Opportunities

- OHNA/BSS yielded lots of "whys."
- School Nurse Survey (87% response rate)
 - ◆ Dental partnerships
 - Most have public health or private dentist partners
 - ◆ Types of services provided
 - Lots of cleaning and preventive care
 - ◆ Barriers to referral completion
 - Parents & Payment!
 - ◆ Policy/practice implications:
 - Education for parents
 - Enabling services for children
 - Partnership development for school nurses



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Lessons Learned

- Having a theoretical framework gives you 'rhyme and reason.'
- Ideal to hire your own screeners
- Certain information best verified by matching to secondary data sources
- Plan ahead for use of the data



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Summary of the SC Experience

- Sealant use isn't great
- Caries experience, untreated caries, and treatment urgency are on the decline, **with some exceptions.**
- School nurses are critical links in the oral health system
- How do we empower the system?



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Contact information



▪ Thank you for your attention and questions!

Amy Martin, Dr.P.H.
Deputy Director
SC Rural Health Research Center
220 Stoneridge Drive, Suite 204
Columbia, SC 29201

803-251-6317 (telephone)
803-251-6399 (fax)
amy-ka@mailbox.sc.edu (Dr. Martin)



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