

Why You and Your Data Matter: The Importance of and Decisions Made Using (or Waiting for) SCDE Data

Presented To:

District Accounting Systems and Best Practices Study Committee

November 20, 2024



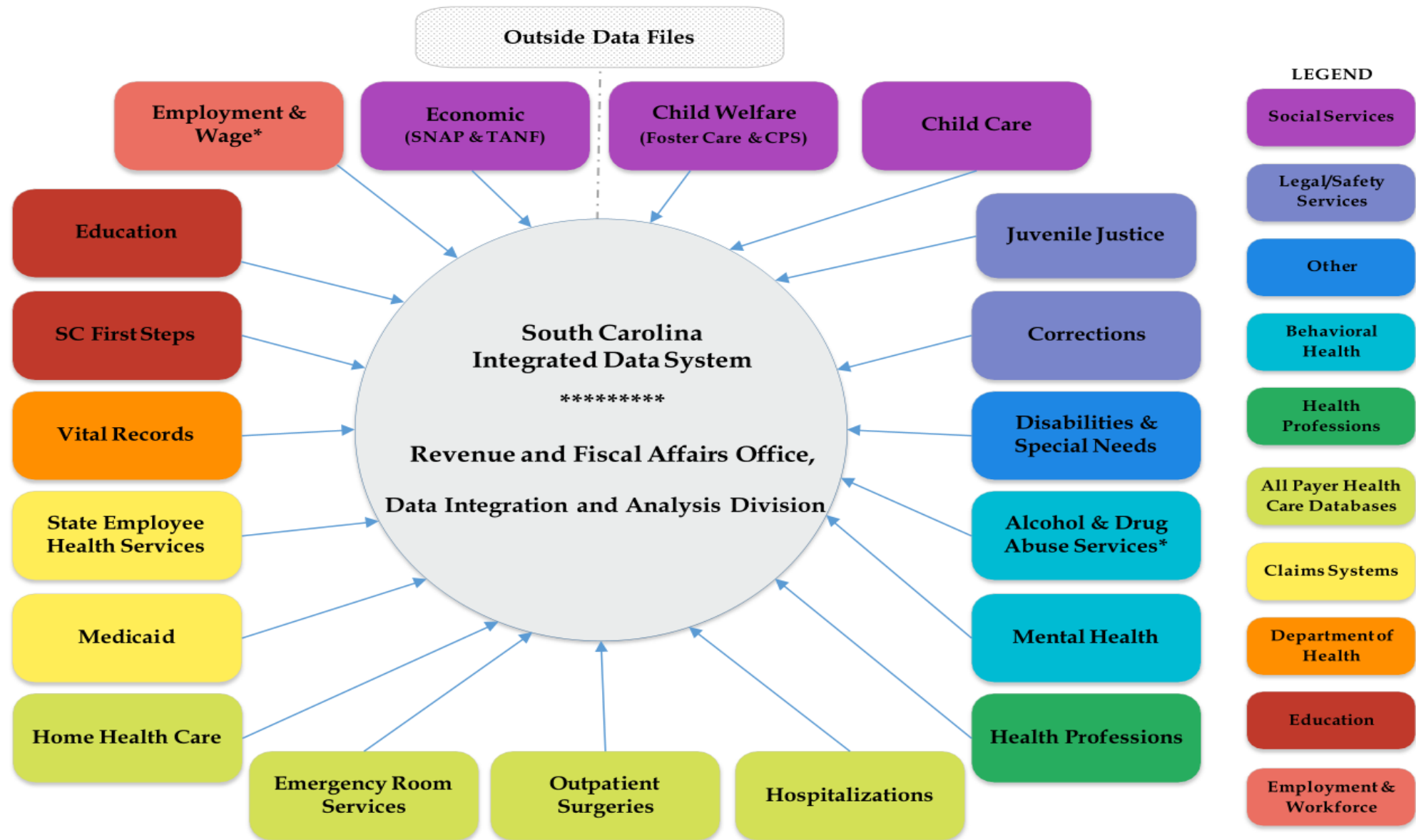
Frank A. Rainwater, Executive Director
South Carolina Revenue and Fiscal Affairs Office
1000 Assembly Street
Rembert Dennis Building, Suite 421
Columbia, SC 29201
(803) 734-3793
www.rfa.sc.gov

Brief Introduction to RFA Data Integration and Analysis

Purpose, People, and Process

- Team of 12 statisticians
- Process developed over time and through experience (trial and error)
- Requires cooperation and support of data owners





Common Data Issues

Purpose

- Focus on answering a question – goal is informed decision making
- Not all data are needed – “drowning in data but starving for information”
- Data are a two-edged sword – data may help or hurt your position

People

- Data are the end result of someone’s effort; need to see the full picture
- Understanding the data and usage as well as transferring institutional knowledge are crucial to providing good information

Process

- Lack of consistency in data collection and reporting – systems limitations are not good
- Expect errors – need reliable process to identify and correct errors before using data
- Need definitions and documentation
- Accounting requirements do not ensure or equal good data

Historical Example – SCDE Data and Informed Decision Making

1993 amendment changing the birth month criteria for starting first grade

- Previously, SC Code of Laws §59-63-20 required students to be age 6 on or before November 1 to enter first grade
- Part II, Section 29 of the FY 1993-94 Appropriations Act amended the date to September 1
- Lots of debate, upset parents
- One Key Factor – during the House debate, members were shown data on readiness test scores for first graders by birth month; the data showed a steady decline in the average score by month from the oldest age (Nov.) to the youngest (Oct.)

Current Examples – General Reports Using SCDE Data

Reports and data visualizations more readily highlight trends and issues or data problems

- Education Funding Dashboard (Proviso 1.3)
 - <https://www.rfa.sc.gov/education-funding-dashboard>
- Education to Workforce Report (SC Code of Laws §59-19-1950)
 - Annual report showing the percentage and earnings of SC public high school graduates in the SC workforce
 - <https://rfa.sc.gov/data-research/education/education-and-workforce>
- Revenue Per Pupil Report (Proviso 1.3)
 - <https://rfa.sc.gov/media/10525>
- SC Coordinating Council for Workforce Development
 - SC public high school graduate outcomes related to post-secondary enrollment and SC workforce

Examples - SCDE Data in Appropriations Act

- Enrollment data
 - Enrollment records linked to Medicaid and other data to determine number of students affected by poverty
 - Enrollment data used to calculate Student to Teacher ratio in State Aid to Classrooms
- Employment data
 - Setting the teacher minimum salary schedule

Other Examples – SCDE Data used in Program Evaluation and Research

- Evaluation of SC First Steps and private 4K programs
- A researcher with the USC Arnold School of Public Health conducted a study to investigate the effect of school-based health centers on the academic outcomes of elementary and middle school students
- A researcher with the Mount Sinai School of Medicine studied the impact of Medicaid Managed Care on the outcomes of children
- A researcher with the University of Chicago examined the impact of youth homelessness as part of a report for the US Housing and Urban Development

Examples of Costly Mistakes with Data

- Incorrect GIS data have resulted in the wrong houses being demolished
- Programming errors led to
 - A Texas school changing ratings from “Met Standard” to “Improvement Required”
 - A lottery vendor issuing millions of dollars of inadvertent lottery tickets in SC
- A NASA spacecraft disintegrating in the atmosphere because different engineers used different metrics

Examples - Current Issues/Questions and Data Needs

- Timeliness of receiving data
 - ADM and teacher counts taking longer
- More data impacting student needs and resource allocation
 - Caseload of special education teachers
- Comparing cost of building maintenance versus cost of construction
 - When does maintenance become too expensive
- Budget and expenditure data at the school level
 - Are funds fairly distributed between schools within a district

Conclusion – Focus on Purpose, People, and Process

Purpose

- It is extremely important to avoid making decisions in a vacuum or based on perception

People

- The best person to ensure accurate data is the person gathering or entering the information
- Need to understand the purpose, use, and significance
- Be aware of the consequences of bad information

Process

- Need uniformity and consistency in definitions and systems
- Prioritize data collection
- At every level of review, ask if the data make sense
 - Don't "just assume" the data are right
 - Don't rely on "this is the way we have always done it"
- The accounting (or existing) data may not be the best; may require additional effort or process

Sense of urgency – start now so data for longitudinal analysis is available soon

Thank You!

Questions?



SOUTH CAROLINA REVENUE AND FISCAL AFFAIRS OFFICE

www.rfa.sc.gov