

# Changes in Early Elementary Curricula Selection Following MTSS Trainings

Linnea Swanson, MA, Brandon Ee, BA, Amanda Witte, PhD, Rebecca Overfield, MA, & Abril Rangel-Pacheco, MA, University of Nebraska - Lincoln



## Introduction

- The Nebraska Department of Education (NDE) trains district educators to implement the Nebraska Multi-Tiered Systems of Support (NeMTSS) framework with fidelity to address academic, behavioral, and social-emotional needs of K-2 students.
- Many factors, such as selection of evidence-based curricula are key components of effective MTSS implementation.
- NeMTSS training emphasizes the importance of selecting these curricula and evaluating their quality.
- This study examines the impacts of NeMTSS training on evidence-based curricula selection in early elementary school, specifically for K-2 English Language Arts (ELA) and Math curricula.

## Methods

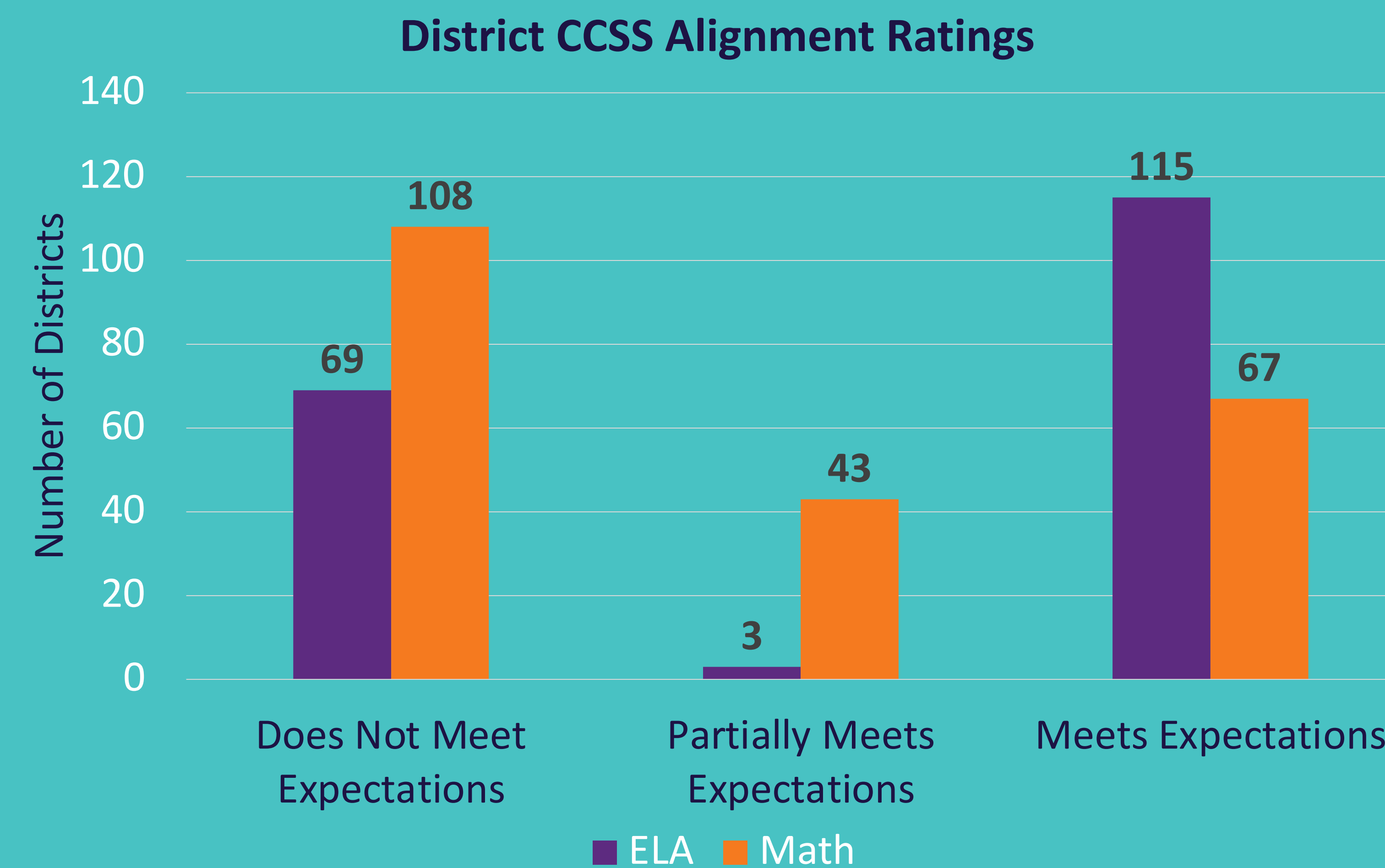
- Data was gathered from 244 Nebraska school districts, including 226 districts reporting curricula for K-2 ELA and Math.
- The NeMTSS team records dates school districts attend **NeMTSS training**. Data is coded:
  - Single-level Codes:** 0 (*No Training*) and 1 (*Attended Training*).
  - Multi-level Codes:** 0 (*No Training*) to 4 (*Attended 4 days of training*).
- District K-2 curricula from the 2020-2021 school year were drawn from sources within the NDE:
  - Instructional Materials Questionnaire (IMQ): reports **curricula** used by school districts each year. Curricula for (ELA) and Math were coded based on alignment with Common Core State Standards (CCSS) designated by EdReports.org: 1 (*Does Not Meet Expectations*) to 3 (*Meets Expectations*).

### Analyses

- Descriptive statistics, independent samples t-tests, and bivariate correlations were run to analyze the relationship between NeMTSS training and CCSS alignment for districts across the state of Nebraska.

## Research Questions:

- Does participation in NeMTSS training predict use of evidence-based curricula?
- Is there a relationship between the number of NeMTSS trainings attended and CCSS alignment?



### Independent Sample T-Test Results

|      | No Training |       | Training |       | Df  | t      | p    | Cohen's d |
|------|-------------|-------|----------|-------|-----|--------|------|-----------|
|      | M           | SD    | M        | SD    |     |        |      |           |
| ELA  | 1.83        | 1.262 | 1.89     | 1.185 | 224 | -.373  | .154 | -.050     |
| Math | 1.69        | .903  | 1.84     | .923  | 222 | -1.237 | .532 | -.165     |

### Pearson Correlation Coefficients

|                     | MTSS Training | ELA CCSS Alignment | Math CCSS Alignment |
|---------------------|---------------|--------------------|---------------------|
| MTSS Training       | 1             |                    |                     |
| ELA CCSS Alignment  | -.042         | 1                  |                     |
| Math CCSS Alignment | .025          | -.028              | 1                   |

Note. No correlations were significant.

[Linnea.swanson@huskers.unl.edu](mailto:Linnea.swanson@huskers.unl.edu)

## Results

- Out of the 244 Districts in the state of Nebraska, 129 Districts (52.9%) have participated in at least one day of NeMTSS Trainings since 2017.
- Descriptive statistics indicate that more districts have CCSS aligned curricula for ELA compared to Math for early elementary students.
- For ELA curricula, there were no significant differences in CCSS alignment scores between districts who have attended NeMTSS trainings ( $M=1.89, SD=1.19$ ) and districts who have not attended trainings ( $M=1.83, SD=1.26$ ).
- For Math curricula, there were no significant differences in CCSS alignment scores between districts who have attended NeMTSS trainings ( $M=1.84, SD=.92$ ) and districts who have not attended trainings ( $M=1.69, SD=.90$ ).
- Correlations between the number of trainings attended and CCSS alignment were not significant.

## Discussion

- Due to lower CCSS alignment of math curricula, particular attention should be paid toward selection of evidence-based math curricula for early elementary education.
- Previous research has demonstrated that outcomes associated with transitioning to an MTSS framework can take 2-4 years or more to be observed. Thus, implementation is a multi-year process and significant outcomes may take several years to be observed. It is essential to continue to evaluate the impacts of NeMTSS trainings over time.