Data Use Professional Development Series

201 Day 8
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Welcome back!
Agenda

Today

Welcome/Overview
Implementation Progress
Implementing and Assessing a High-Impact Strategy
Visual Data Displays
Break
Data Walls
RI Growth Model
Lunch
Intersection Analysis
Data Conversations with Parents
Break
Action Research
Sustainability Planning
Implementation Planning
Wrap-Up/Evaluations
Objectives

By the end of Day 8, SDLTs will be able to:

• Articulate the importance of implementing and assessing a High-Impact Strategy in a Cycle of Inquiry.
• Articulate a process for reading and creating visual displays.
• Engage in Data Conversations with parents.
• Articulate how Intersection Analysis can be used in schools.
• Identify next steps in Action Research plan.
• Create a Sustainability Plan for sustaining this work in Year 2.
• Plan for Day 10 SDLT Share.
Create a timeline illustrating the pathway of your work so far this year:

- Where did you begin?
- What is one “critical incident” or turning point in your work thus far?
Cycle of Inquiry

- Reflect and Share Results
- Identify Pattern of Need
- Validate
- Determine Root Cause
- Strategize
- Act
- Analyze
- Reflective Practice
- Reflective Practice
- Reflective Practice
- Create Action Plan
- Select High-Impact Strategy
- Brainstorm Strategies
- Implement Strategy
- Data Conversations
Implementing and Assessing a High-Impact Strategy

Act Stage

• With whom did you implement the high-impact strategy?
• When and how did you implement? At which checkpoints did you adjust implementation?
• How did you assess effectiveness? What measures/assessments did you use?
• Did your high-impact strategy work? How do you know?
• What are your next steps?
How do you “make meaning” of a visual data display?

What steps can you take to understand a data display?
Turnkey Exercise
Reading a Visual Data Display
Turnkey Exercise

Choosing a Data Display

- What kind of data is displayed?
- What is the data display’s purpose?
- Why do you think the author chose this type of data display to represent this information?
CBM Passage Reading Fluency

Correctly Read Words per Minute

Weeks of Instruction

Weeks:

1  2  3  4  5  6  7  8

Correctly Read Words per Minute:

70  75  80  85  90
# Types of Data Displays

<table>
<thead>
<tr>
<th>Type</th>
<th>Purpose</th>
<th>Sample Questions</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Bar Graph</strong></td>
<td>• Compares quantities in particular categories or groups</td>
<td>• What percentage of students in each grade level achieved proficiency?</td>
</tr>
<tr>
<td></td>
<td>• Displays relationships</td>
<td>• How do female students compare to male students?</td>
</tr>
<tr>
<td><strong>Line Graph</strong></td>
<td>• Shows changes in data over time at equal intervals</td>
<td>• How did the fourth graders from Wilson Elementary perform on the NECAP over the last 5 years?</td>
</tr>
<tr>
<td></td>
<td>• Displays trends over time such as performance or growth</td>
<td>• How has an intervention over the last 8 weeks increased the number of words a student can read per minute?</td>
</tr>
<tr>
<td><strong>Pie Chart or Circle Graph</strong></td>
<td>• Compares parts of a whole</td>
<td>• What is the relative distribution of student scores across performance levels in Ms. Park’s class?</td>
</tr>
<tr>
<td></td>
<td>• Shows percentages or proportions of data as it relates to the whole</td>
<td></td>
</tr>
<tr>
<td><strong>Scatter Plot</strong></td>
<td>• Shows relationship between two different measures</td>
<td>• What is the correlation between a student’s grade on a unit assessment and her NECAP score?</td>
</tr>
</tbody>
</table>
Fall 2012 NECAP Reading Tests
Choosing a Data Display

How do you choose a data display to represent your own data?

- What type of data do you want to display?
- What is the purpose? What is the “story” of the data?
- What type of data display is the best way to represent this story?
Summary

- The Act stage of the Cycle of Inquiry raises important questions for educators to consider.
- It is important for educators to choose the appropriate type of data display to tell the story of their data.
Data Walls
Classroom Data Walls

Classroom Data Walls should:

• Be regularly updated
• Encourage action
• Celebrate student accomplishments
• Focus on growth
Rhode Island Growth Model
RI Growth Model

Where can I go for more information?

• Principal

• RIGM website:
  – www.ride.ri.gov/RIGM
  – RIGM FAQs
  – Resources
  – The Rhode Island Growth Model for Teachers Webinar Series
Summary

- A data wall encourages a collaborative look at data.
- The Rhode Island Growth Model is a powerful source of information.
Lunch
Triangulation and Intersection Analysis

**Triangulation** is “analyzing other data to illuminate, confirm, or dispute what you learned through your initial analysis — you will be able to identify your problem with more accuracy and specificity.”

**Intersection Analysis** is investigating the different dimensions of data to “look more closely and understand each piece of information we gather about a school.”


Intersection Analysis

Demographic

Attendance, grade level, ethnicity, gender, etc.

Student Learning

Standardized test results, GPA, curriculum assessments

Perception

Surveys, questionnaires, observations

“People act in congruence with what they believe, perceive, or think about different topics.” (Bernhardt)

School Process

Data that describe instructional practices, strategies, programs, scheduling

# Two-Way Intersections

<table>
<thead>
<tr>
<th>Intersections</th>
<th>Can Tell Us</th>
</tr>
</thead>
<tbody>
<tr>
<td>Demographics by Student Learning</td>
<td>If subgroups of students perform differently on student learning measures</td>
</tr>
<tr>
<td>Demographics by Perceptions</td>
<td>If subgroups of students are experiencing school differently</td>
</tr>
<tr>
<td>Demographics by School Processes</td>
<td>If all students are represented in the different programs offered by the school</td>
</tr>
<tr>
<td>Student Learning by School Processes</td>
<td>If different programs are achieving similar student learning results</td>
</tr>
<tr>
<td>Student Learning by Perceptions</td>
<td>If student perceptions of the learning environment have an impact on their results</td>
</tr>
<tr>
<td>Perceptions by School Processes</td>
<td>If people are perceiving programs and processes differently</td>
</tr>
</tbody>
</table>
## Three-Way Intersections

<table>
<thead>
<tr>
<th>Intersections</th>
<th>Can Tell Us</th>
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</thead>
<tbody>
<tr>
<td>Demographics by Student Learning by Perceptions</td>
<td>The correlation between demographic factors and attitudes about student learning</td>
</tr>
<tr>
<td>Demographics by Student Learning by School Processes</td>
<td>The relationship between different subgroups of students participating in specific programs, as measured by subgroup learning results</td>
</tr>
<tr>
<td>Demographics by Perceptions by School Processes</td>
<td>What programs different students like best, or the relationship among different programs and student attitudes</td>
</tr>
<tr>
<td>Student Learning by School Processes by Perceptions</td>
<td>The relationship between the processes students prefer and learning results</td>
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</tbody>
</table>
## Four-way Intersections

<table>
<thead>
<tr>
<th>Intersections</th>
<th>Can Tell Us</th>
</tr>
</thead>
<tbody>
<tr>
<td>Demographics by Student</td>
<td>What processes or programs have the strongest relationship with different</td>
</tr>
<tr>
<td>Learning by Perceptions by School</td>
<td>subgroups of students’ learning according to student perceptions and as</td>
</tr>
<tr>
<td>Processes</td>
<td>measured by student learning results</td>
</tr>
</tbody>
</table>
Using Questions to Drive Intersection Analysis

For each intersection:

• Generate a question that targets the heart of each intersection.
• Determine what data we would need to answer these questions.
• Be ready to share your table’s best data question.
Techniques for Data Conversations

- Positive Presumptions
- Paraphrasing
Data Conversations with Parents
Summary

• Intersection Analysis is useful when examining large aggregate data sets.

• Data Conversations can be used in various contexts and with multiple stakeholders, including parents, to foster transparency.
Break
Action Research and Sustaining Data Use in Your School
Looking Ahead
Taking Stock

Where are we?

<table>
<thead>
<tr>
<th>What?</th>
<th>So What?</th>
<th>Now What?</th>
</tr>
</thead>
<tbody>
<tr>
<td>What happened?</td>
<td>Why was it critical?</td>
<td>How does this tie into your plan for next year?</td>
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</table>

What? So What? Now What?
Action Research Scenarios

School 1

School 2

School 3

School 4
Sustainability Plan

1. Action Research Project Plan
2. Implementation Plan
3. Resources and Supports
4. District-Wide Sustainability Plan
Engaging in Action Research is one way to address a high-stakes Pattern of Need in our school.

The Action Research plan can serve as a way to sustain and spread the skills and concepts from Data Use Professional Development.
Implementation Planning
# Days 6, 8, 9 & 10

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<th>Day 9</th>
<th>Day 10</th>
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<td>Welcome/Overview</td>
<td>On-Site Visit</td>
<td>Asking Powerful Questions</td>
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<tr>
<td>Implementation Progress</td>
<td>Implementation Progress</td>
<td>Agenda to be determined with your coach</td>
<td>Coaching and Facilitation</td>
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<td>Correlation/Causation</td>
<td>Implementing and Assessing a</td>
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<td>SDLT Share</td>
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<td>Triangulation</td>
<td>High-Impact Strategy</td>
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<td>Sustainability planning</td>
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<td>Effort/Impact</td>
<td>Visual Data Displays</td>
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<td>Data Questioning</td>
<td>Break</td>
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<td>Assessment Literacy</td>
<td>Data Walls</td>
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<td>Evaluating Assessments</td>
<td>RI Growth Model</td>
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<td>Data Conversations with</td>
<td>Lunch</td>
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<tr>
<td>Students</td>
<td>Intersection Analysis</td>
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<tr>
<td>Using Data to Create</td>
<td>Data Conversations with</td>
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<td>Flexible Small Groups for</td>
<td>Parents</td>
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<td>Differentiation</td>
<td>Break</td>
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<tr>
<td>Aggregate Data</td>
<td>Action Research</td>
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<tr>
<td>Implementation Planning</td>
<td>Sustainability Planning</td>
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<td>Wrap-Up/Evaluations</td>
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Wrap-Up