CT League of Innovative Schools
Winter Meeting

Assessing in a Mastery-Based Learning System

@GreatSchoolsP
February 5, 2019
Today’s Facilitator

From the Great Schools Partnership

Ted Hall, Senior Associate

@GreatSchoolsP
Opening Activity
Give and Take
Session Outcomes:

- Learn and participate in an opening activity “Give and Take”
- Reminders about the League of Innovative Schools and upcoming events
- Review a series of documents linked to assessment in a mastery-based learning system
- Understand the importance of formative assessment
- Explore the link between summative assessment and unit design
- Meet as a school team to continue your work
- Give and receive feedback with other school teams
AGENDA

Welcome and opening activity “Give and Take”

Review of agenda and reminders about the LIS

“Document Pass” activity involving assessment

Break

Formative Assessment

Role of summative assessments in unit planning

Lunch

**Team Time** to work on next steps and frame a question

Sharing and feedback among school teams

Closing and feedback
Norms for Our Work

Respect Time
Allow Others Sufficient “Air Time”
Listen Well
Respect Differences
Assume Good Intentions
Encourage and Support Risk-Taking for Learning
Stay Focused on the Work
Freely Attend to Personal Needs
Foster Good Humor
Maintain Confidentiality When Needed
What is the League of Innovative Schools?

• Founded in 2011, the League of Innovative Schools is a regional professional learning community for schools.

• Member schools are committed to educational equity, student-centered learning, and ongoing improvement.

• Currently, 166 schools from all six New England states participate in the League of Innovative Schools.
The League of Innovative Schools is founded on three core beliefs:

• Educators create great schools.
• Every school can improve.
• Collaboration drives success.
How does the League of Innovative Schools work?

• By connecting educators
• By spreading good ideas
• By accelerating improvement
## Upcoming Events

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<tr>
<th>Date</th>
<th>Event</th>
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<tbody>
<tr>
<td>Mon/Tue</td>
<td>School Redesign in Action Conference</td>
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<td>March 25/26</td>
<td>Norwood, MA</td>
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<td>Wednesday</td>
<td>Irving Robbins Middle School</td>
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<td>May 1</td>
<td>Farmington</td>
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</tbody>
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Document Pass Activity
<table>
<thead>
<tr>
<th>Document Name</th>
<th>What I notice</th>
<th>What I wonder</th>
<th>Useful for your school’s work?</th>
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Groups of 6

• 20 minutes—read, take notes, & pass
• 15 minutes—share within group
• 5 minutes—individual reflection—what will I bring back to my team?
Break
come back
at 10:30
Debrief Activity Questions?
Building a Mastery-Based Learning System
The Role of Formative Assessment
Building Proficiency Systems Graphic

Communicate Progress

Plan at the School + District Level

Teach + Assess

Design for Learning

Reflect + Refine

Stages + Tasks

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Something to think about.....
“When the cook tastes the soup, that’s formative assessment.

When the customer tastes the soup, that’s summative assessment.”

- Paul Black
Formative Assessment Defined

“….a sequence of moves that invite a positive, ongoing relationship between teachers and their students.”

—Brent Dukor, “Formative Assessment in Seven Good Moves.” Educational Leadership, 71:6, March 2014
Our Central Question

How can we better design our units, our classroom practices, our school schedules, and resources to create numerous opportunities for students to receive quality feedback?
What makes formative assessment powerful?
My Favorite No

https://www.teachingchannel.org/videos/class-warm-up-routine
My Favorite No

https://www.teachingchannel.org/videos/class-warm-up-routine
Talk to a partner about how this teacher’s approach to her students is similar/different to the one you experienced as a math student.
Formative Assessment

1. Learning Target
2. Student Response
3. Adjust/Modify Instruction if Necessary
4. Teacher, Peer and/or Self Interpretation or Diagnosis
Sarah Hagan’s classroom, Drumright, Oklahoma
It’s not formative assessment if it doesn’t inform instruction!
Giving Useful Feedback is Critical
Giving Useful Feedback is Critical

“The statement is a multifaceted piece that looks over all dimensions of why they were choosing to revolt, and anticipating every objection and attacking them beforehand.”

“The statement is a multifaceted piece that looks over all dimensions of why they were choosing to revolt, and anticipating every objection and attacking them beforehand.”

awk!
Think about an example of feedback (for either piece of work) that is **specific**, **understandable**, **descriptive**, **value neutral**, and **prompts a response**. Talk with a partner.

“The statement is a multifaceted piece that looks over all dimensions of why they were choosing to revolt, and anticipating every objection and attacking them beforehand.”
Effective Formative Assessment

• Is Specific
• Is Relevant
• Is Understandable
• Is Descriptive
• Is Value Neutral
• Is Tied to the Learning Target
• Includes Varied Approaches
• Prompts a Response
• Is Timely
Useful Formative Assessment is Timely

“As in many other areas of life, timing is everything (or at least important) when giving feedback.... Providing immediate feedback can encourage students to practice, and it helps them make connections between what they do and the results they achieve. (Clariana & Koul, 2006; Shute, 2008).”

<table>
<thead>
<tr>
<th>Tools for Formative Assessment</th>
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<tr>
<td>Techniques to Check for Understanding</td>
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</tbody>
</table>

| **Index Card Summaries/Questions** | Periodically, distribute index cards and ask students to write on both sides, with these instructions: (Side 1) based on our study of (unit topic), list a big idea that you understand and word it as a summary statement. (Side 2) Identify something about (unit topic) that you do not yet fully understand and work it as a statement or question. |
| **Hand Signals** | Ask students to display a designated hand signal to indicate their understanding of a specific concept, principal, or process: - I understand_________ and can explain it (e.g., thumbs up). – I do not yet understand ___________ (e.g., thumbs down). – I’m not completely sure about ___________ (e.g., wave hand). |
| **One Minute Essay** | A one-minute essay question (or one-minute question) is a focused question with a specific goal that can, in fact, be answered within a minute or two. |
| **Analogy Prompt** | Periodically, present students with an analogy prompt: (A designated concept, principle, or process) is like _______________ because __________________________. |
| **Web or Concept Map** | Any of several forms of graphical organizers which allow learners to perceive relationships between concepts through diagramming key words representing those concepts. [http://www.graphic.org/concept.html](http://www.graphic.org/concept.html) |
| **Misconception Check** | Present students with common or predictable misconceptions about a designated concept, principle, or process. Ask them whether they agree or disagree and explain why. The misconception check can also be presented in the form of a multiple-choice or true-false quiz. |
| **Student Conference** | One on one conversation with students to check their level of understanding. |
| **3-Minute Pause** | The Three-Minute Pause provides a chance for students to stop, reflect on the concepts and ideas that have just been introduced, make connections to prior knowledge or experience, and seek clarification. |
| - I changed my attitude about... |
| - I became more aware of... |
| - I was surprised about... |
What school wide practices will enable teachers to effectively utilize formative assessment?

Formative Assessment: A Systems Approach

www.youtube.com/watch?v=J8DQugVxHv0
Formative Assessment: A Systems Approach
Talk to a partner about how this school’s approach can help you and your school.
Time for Re-Teaching, Revising + Re-Learning

- Student- or teacher-run Writing and Math Centers
- Flexible grouping using student achievement data
- Daily intervention or targeted learning blocks
- Scheduled before- or after-school sessions
- Make up time during school vacations
- Classes designed with time embedded for re-teaching
Formative Assessment: A Systems Approach: Final Questions to Consider

• What practices do we currently use in our school that promote a systemic approach to formative assessment?

• What are possible steps toward a more systemic approach to formative assessment?
Questions?
Lunch!
Where does the summative assessment fit into unit design?
How is designing a mastery-based unit different from what I’m already doing?
Stages of Traditional Design
Planning and Implementation

Design Relevant Instruction
learning experiences and formative feedback

Determine Acceptable Evidence
How students will demonstrate learning

Define Desired Results
What students will know and be able to do
Stages of **Backward Design**

**Planning**

1. **Define Desired Results**
   - What students will know and be able to do

2. **Determine Acceptable Evidence**
   - How students will demonstrate learning

3. **Design Relevant Instruction**
   - Learning experiences and formative feedback
Stages of **Backward Design**

**Planning**

1. **Define Desired Results**
   - Graduation Standards
   - Performance Indicators
   - What students will know and be able to do

2. **Determine Acceptable Evidence**
   - Scoring Criteria
   - Summative Assessments
   - How students will demonstrate learning

3. **Design Relevant Instruction**
   - Learning Experiences
   - Formative Assessment
   - Learning experiences and formative feedback
Stages of **Backward Design**

**Planning & Implementation**

1. **Define Desired Results**
   - What students will know and be able to do

2. **Determine Acceptable Evidence**
   - How students will demonstrate learning

3. **Design Relevant Instruction**
   - Learning experiences and formative feedback

**Planning**

**Implementation**

**Reflection**
## Unit Overview

<table>
<thead>
<tr>
<th>Unit Title</th>
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<tbody>
<tr>
<td>Teacher</td>
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<tr>
<td>Grade Level/Course</td>
<td></td>
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<tr>
<td>Length/Dates</td>
<td></td>
</tr>
<tr>
<td>Unit Summary</td>
<td>Provide 2-4 sentences describing the main ideas, content and skills of the unit.</td>
</tr>
</tbody>
</table>

## Stage 1: Desired Results

<table>
<thead>
<tr>
<th>Competency(ies)</th>
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<tbody>
<tr>
<td>List the Graduation Competencies, Guiding Principles, or Cross-Curricular Skills this unit will address.</td>
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<tr>
<td>Stage</td>
<td>Descriptors</td>
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</tbody>
</table>
| **Stage One – Desired Results** | Competencies are identified  
• Cross-curricular competencies addressed and assessed in this unit are identified,  
• Content-area competencies addressed and assessed in this unit are identified.  
Primary Performance Indicators are identified  
• These are the indicators that will be addressed and assessed in this unit.  
Secondary Performance Indicators are identified  
• These are the indicators that may be reviewed, but are not summatively assessed.  
Essential Questions and Enduring Understandings are identified  
• Questions are open-ended, authentic, elicit multiple responses, and promote student engagement,  
• Understandings are big ideas that are transferable across content areas.  
Knowledge and Skills are identified  
• Performance indicators are broken down into statements clarifying what a student should KNOW and what a student should BE ABLE TO DO as a result of this unit.  |
| **Stage Two – Evidence of Student Learning** | Scoring Criteria  
• Assess identified primary performance indicators,  
• Are task neutral,  
• Increase in level of complexity and cognitive demand,  
• Give students a clear indication of what knowledge and skills they must demonstrate to meet the primary performance indicators.  
Pre-assessments are identified  
• These help identify what students already know and can do.  
Summative assessments are identified  
• These are varied, rigorous, relevant and align with identified competencies,  
• These describe what performance task(s) a student might do to demonstrate learning,  
• These align with and can be scored using the task neutral scoring criteria.  |
Stage One
Desired Results
STAGE 1: Defining Desired Results

Define Desired Results
- Graduation Standards
- Performance Indicators
  - What students will know and be able to do

Determine Acceptable Evidence
- Scoring Criteria
- Summative Assessments
  - How students will demonstrate learning

Design Relevant Instruction
- Learning Experiences
- Formative Assessment
  - learning experiences and formative feedback
### Stage 1: What’s Worth Understanding?

#### Stage One

Where are we headed?

What are our desired goals and outcomes?

What matters about what we are learning?

<table>
<thead>
<tr>
<th>Stages</th>
<th>Teacher Considerations</th>
<th>Student Considerations</th>
<th>Instructional Planning</th>
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<tbody>
<tr>
<td></td>
<td>What matters about what we are learning?</td>
<td>What do I need to learn and why</td>
<td>What is the essential question?</td>
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<tr>
<td></td>
<td>Identify related standards and indicators</td>
<td>What makes this important or useful?</td>
<td>How is this going to be relevant to students?</td>
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<tr>
<td></td>
<td>Clarify what students will know and be able to do</td>
<td></td>
<td>How will this get to the heart of the discipline?</td>
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</tbody>
</table>
Stage Two
Evidence of Student Learning
STAGE 2: Evidence of Student Learning (assessment design)

Define Desired Results
- Graduation Standards
  - Performance Indicators
  - What students will know and be able to do

Determine Acceptable Evidence
- Scoring Criteria
  - Summative Assessments
  - How students will demonstrate learning

Design Relevant Instruction
- Learning Experiences
- Formative Assessment
  - learning experiences and formative feedback
### Stage 2: How Will Students Show Understanding?

#### Stage Two

**How will students demonstrate understanding?**

**What does quality evidence look like?**

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<tbody>
<tr>
<td></td>
<td>Select and develop scoring criteria</td>
<td>In what ways do I have choice over how I represent my learning?</td>
<td>Share and discuss quality work through exemplars and scoring criteria</td>
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<td>Design summative assessments</td>
<td>What does quality work look like?</td>
<td>Identify what students already know.</td>
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<td>How will I know what they already know?</td>
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<td>What will the pre-assessment entail?</td>
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Stage Three
Instructional Design
Define Desired Results

Graduation Standards Performance Indicators

What students will know and be able to do

Determine Acceptable Evidence

Scoring Criteria Summative Assessments

How students will demonstrate learning

Design Relevant Instruction

Learning Experiences Formative Assessment

Learning experiences and formative feedback

STAGE 3: Instructional Design
## Stage 3: What Promotes Engagement, Equity, & Mastery?

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<th>Stages</th>
<th>Teacher Considerations</th>
<th>Student Considerations</th>
<th>Instructional Planning</th>
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<tbody>
<tr>
<td><strong>Stage Three</strong></td>
<td>- Where can students have voice and choice?</td>
<td>- What is the essential question?</td>
<td>- What will make the materials and activities engaging and accessible to all students?</td>
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<tr>
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<td>- What supports and extensions will be provided to ensure success for all students?</td>
<td>- What makes the concept real and compelling?</td>
<td>- How will I use data to inform my instruction?</td>
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**Stage Three**
What learning experiences promote engagement, equity, personalization, and rigor?

How will students and teachers monitor learning progress along the way?
Achievable chunks of learning that collectively reflect the performance indicators:

- What students should know and do
- Shared with students
- Monitored through formative feedback

For Teacher:
- Keep the end in mind
- Provide insight to improve student achievement;
- Results inform feedback to students and instructional decisions

For Students:
- Allow them to understand track and reflect on learning growth
- Maintain engagement

Focus on learning target
- Vary in length
- Maximize engagement
- Differentiated based on formative assessment results
- Connect learning target(s) to the performance indicator(s) and essential questions
Stage Four
Reflection
STAGE 4: Reflection

Define Desired Results
What students will know and be able to do

Determine Acceptable Evidence
How students will demonstrate learning

Design Relevant Instruction
learning experiences and formative feedback

Planning

Reflection

Implementation
STAGE 4: Reflection

Student Reflection:
Informs learning process and achievement:

• Think about their learning (meta-cognition)
  • What will I remember in five years?
  • When was I most engaged?
  • What do I still need to learn?

• Through the unit and after summative assessment
Reflection Questions

• How realistic is it to expect teachers to do this kind of planning for each of their units?
• To what degree can common planning with teams of teachers improve the ability to use unit design?
Team Time
Feedback

- Use the Quick Fire Consultancy as a protocol for feedback
- 15 minutes per school
- What question do you want answered today?
- Response from other schools
- Repeat
- Come back to the full group ready to share a key insight or question
Teams

- Wallingford and Bolton
- Irving Robbins, Farmington, and Clark Cove
- Stratford and East Haddam
Reflection

Think about:

• How will you use this learning when you return to your school?

• Do you have something to try out when you get back to school tomorrow?

• How will you know if this has an impact in your school?
Exit Index Card

+ What worked well today? (on front of index card)

△ What could have been improved? (on back of index card)
Thank You!

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