

Design Guide for Performance Indicators

Districts should define 5-10 indicators per standard, which together will allow a school/district to determine students' proficiency on that standard. Indicators should be specific enough to be measurable at a grade span or course level, while as a set, allow multiple pathways for students to demonstrate proficiency.

Criteria	Weaker Statements	Stronger Statements
<p>Alignment</p> <p>To what extent do the statements align with and describe the essential skills within the relevant graduation standard?</p>	<ul style="list-style-type: none"> Individually, define knowledge and skills which are not essential to the graduation standard; Taken together, the indicators fail to define the essential skills and knowledge within the graduation standard. 	<ul style="list-style-type: none"> Use precise, descriptive language to define the essential skills and knowledge that demonstrate proficiency in the graduation standard; Taken together, the indicators define the essential skills and knowledge within the graduation standard.
<p>Transfer</p> <p>Do the statements describe knowledge, and skills that can be applied across multiple disciplines and that will be of value beyond a particular point in time?</p>	<ul style="list-style-type: none"> Describe topics that are only relevant to or applicable within a unit, textbook, resource, course, or program; Focus on factual content without connecting the statements to enduring cross-curricular and content-specific skills. Are “nice to know” but not essential for students to learn if they are going to succeed in the next unit, course, or grade level. 	<ul style="list-style-type: none"> Require students to develop an understanding of relationships among principles, theories, and/or concepts; Require students to develop and demonstrate skills and knowledge that will endure throughout their education, professional careers, and civic lives. Answers the question: “What do we want students to remember, understand, and be able to do several years from now, perhaps long after they have forgotten the details?”

Criteria	Weaker Statements	Stronger Statements
<p>Cognitive Demand</p> <p>Does the statement encourage higher order thinking, deep conceptual understanding and transferable skill acquisition?</p>	<ul style="list-style-type: none"> Require only basic recall and lower-level cognitive skills, such as identifying, defining, summarizing, or listing; Do not require the application of knowledge to diverse or novel problems, texts, or situations. 	<ul style="list-style-type: none"> Require students to demonstrate higher-order cognitive skills such as reasoning, analyzing, planning, interpreting, hypothesizing, investigating, or creating; Require the application of knowledge to diverse or novel problems, texts, or situations.
<p>Assessment Facilitation</p> <p>Are the statements measurable? To what extent does the statement encourage multiple and varied types of assessment?</p>	<ul style="list-style-type: none"> Fail to describe in precise and understandable language what will be measured; Are so discrete and numerous that it would be unmanageable for a teacher to grade and track all of them, or to support complex reasoning / higher order thinking. Suggest that a single task or activity can be considered a valid demonstration of proficiency. Are so complex that the details associated within the indicator are unmanageable and challenging to assess as a whole. 	<ul style="list-style-type: none"> Help define the specific knowledge and skills that will be assessed and measured; Are detailed enough to give the student helpful direction; Are more fine-grained than graduation standards, but broad enough to be assessed with a complex summative assessment task; Allow for multiple and varied options for students to demonstrate evidence of learning.



Protocol

Developing Performance Indicators

PURPOSE

To identify 5–10 performance indicators for each content area graduation standard

TIME

3–4 hours

ROLES

Facilitator, timekeeper, notetaker

MATERIALS

- A. Proficiency-Based Learning Simplified graphic
- B. Locally developed content-area graduation standards
- C. National- and state-level standards documents
- D. Sample graduation standards and performance indicators for the content area
- E. Cognitive taxonomies (e.g., Revised Bloom's Taxonomy, Marzano's New Taxonomy, or Webb's Depth of Knowledge)
- F. Design Criteria Chart
- G. Chart paper and markers or projector and laptop(s)

PROCESS:

- A. Review your locally developed content-area graduation standards to confirm agreement on the content and language. Review the Proficiency-Based Learning Simplified graphic to clarify for the group that the focus of this session is at the Performance Indicator level. Then, determine how this phase of the process will be conducted. It can be done in small groups whereby each group works on one content-area graduation standard and aligns the supporting performance indicators to that graduation standard. It can also be done collectively. (15 min.)
- B. Review the Design Criteria Chart independently and then discuss as a group. (15 min.)
- C. Using national and/or state standards documents in a specific content area, reviewers should mark performance indicators that they believe are essential components of the particular graduation standard they are working on. It is appropriate to reference the sample set of performance indicators available by content area. Reviewers should feel free to combine or revise performance indicators for clarity and proper alignment to the relevant graduation standard. Special attention should be paid to aligning the cognitive verbs of performance indicators with those of the graduation standard. Refer to one of the cognitive taxonomy reference tools. (60 min.)
- D. Share the identified performance indicators in round robin fashion until all possible performance indicators for the relevant graduation standard have been stated. Write the proposed performance indicators on chart paper, project for the group to view, or view within a shared online document. (10–15 min.)
- E. If there are more than ten performance indicators, discuss as a group any that do not meet one or more criteria for performance indicators as suggested in the Design Criteria Chart. Could any of the performance indicators be combined without losing meaning and value? Eliminations from the list should be discussed and considered collectively. (10–15 min.)



- F. Discuss as a group the agreed-upon list of performance indicators (referring to the Design Criteria Chart as needed). (30–60 min.)
- Are the performance indicators measurable?
 - Do the performance indicators suggest assessment? If so, what types?
 - Is each performance indicator what we want students to understand and be able to do several years from now, perhaps long after they have forgotten the details?
 - Is there clear alignment between the graduation standard(s) and the performance indicator and does the performance indicator lead to the demonstration of student learning?

If working as a full group, move on to the next graduation standard and follow steps 3-6, continuing the cycle until performance indicators have been agreed upon for each standard, then move on to step 7 to summarize the collective work (approx. 20 min). If working in small groups, when all have identified the performance indicators for their graduation standards, move to step 7 as a full group to share and agree upon the work presented by each small group. (Approx. 60 min.)

- G. Review the proposed performance indicators for each graduation standard, and discuss any concerns or questions. (20–60 min., depending on the process used for identifying performance indicators)
- H. Debrief the process. What worked well? What could we improve on for next time? (5 min.)
- I. The next step in the process: Align or develop assessments to performance indicators and/or graduation standards.

Social Studies Graduation Standard 2

CIVIC ENGAGEMENT

Apply the attributes of a responsible and involved citizen to affect a real world issue based on a local need. (MLR, A2 + A3)

Fifth-Grade Performance Indicators	Eighth-Grade Performance Indicators	High School Performance Indicators
<p>A. Make and present a real or simulated decision related to the classroom, school, community, or civic organization by identifying needs and applying appropriate and relevant social studies knowledge and skills, including research skills, and other relevant information. (MLR A2 B, A3)</p> <p>B. Provide examples of how people influence government and work for the common good. (MLR B2 C)</p> <p>C. Contribute equitably to collaborative discussions, examine alternative ideas, and work cooperatively to share ideas; individually and collaboratively develop a decision or plan. (MLR A2 A; CCSS SL 5.1, 5.3)</p>	<p>A. Make and present a real or simulated decision related to the classroom, school, community, civic organization, Maine, or beyond by identifying needs and applying appropriate and relevant social studies knowledge and skills, including research skills, and other relevant information. (MLR A2 B, A3)</p> <p>B. Analyze how people influence government and work for the common good. (MLR B2 D)</p> <p>C. Develop and present decisions or plans, orally and in writing by:</p> <ul style="list-style-type: none">• contributing to collaborative discussions that examine alternative ideas; and• considering the pros and cons of these ideas; and• thoughtfully recognizing the contributions of other group members. (MLR A2 A; CCSS SL 8.1, 8.3)	<p>A. Make and present a real or simulated decision on an issue related to the classroom, school, community, civic organization, Maine, United States or international entity by applying appropriate and relevant social studies knowledge, research and ethical reasoning skills. (MLR A2 B, A3)</p> <p>B. Evaluate how people influence government and work for the common good. (MLR B2 E)</p> <p>C. Develop and present, orally and in writing, individual and collaborative decisions and plans by:</p> <ul style="list-style-type: none">• contributing multiple points of view;• prioritizing the pros and cons of those ideas;• building on ideas of others and sharing in an attempt to sway the opinions of others. (MLR A2 A; CCSS SL 1, SL 3)

Performance Indicators -- Middle School

- a Develop models to describe the atomic composition of simple molecules and extended structures. (MS-PS1-1)
- b Analyze and interpret data on the properties of substances before and after the substances interact to determine if a chemical reaction has occurred. (MS-PS1-2)
- c Gather and make sense of information to describe that synthetic materials come from natural resources and impact society. (MS-PS1-3)
- d Develop a model that predicts and describes changes in particle motion, temperature, and state of a pure substance when thermal energy is added or removed. (MS-PS1-4)
- e Develop and use a model to describe how the total number of atoms does not change in a chemical reaction and thus mass is conserved. (MS-PS1-5)
- f Plan an investigation to provide evidence that the change in an object's motion depends on the mass of the object. (MS-PS2-2)
- g Ask questions about data to determine the factors that affect the strength of electric and magnetic forces. (MS-PS2-3)
- h Construct and present arguments using evidence to support the claim that gravitational interactions are attractive and depend on the masses of interacting objects. (MS-PS2-4)
- i Conduct an investigation and evaluate the experimental design to provide evidence that fields exist between objects exerting forces on each other even though the objects are not in contact. (MS-PS2-5)