



An Introduction to the Delaware Recommended Curriculum

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What is the purpose of the Delaware Content Standards?

The unifying objective of the 1995 State of Delaware Curriculum Framework Content Standards in English/Language Arts, Mathematics, Science, Social Studies, Visual and Performing Arts, World Languages, Physical Education, Health, and Family and Consumer Sciences is the transition of young people into informed, resourceful workers and lifelong learners who participate actively and successfully in 21st century society. The Delaware Content Standards state the essential knowledge and skills, as well as the bodies of understanding which students must attain as a result of their public school education, and the standards specific to the quality of work necessary for students to be deemed proficient in a given content area.

The Curriculum Framework supports students' development in solving problems, gathering and using resources, working collaboratively, and assuming responsibility for their actions so that Delaware students will be able to succeed in a highly challenging academic and competitive work environment as adults. Effective adults must be able to problem-solve, form reasoned opinions, use technology, participate in a global society, and engage in life-long learning.

Separate standards for each content area are not intended to imply that content areas should be taught in isolation, but rather to suggest each content area's unique contribution to an understanding of the world. Integrated learning experiences help students conceptualize both the boundaries and the relationships among content areas. The individual standards should be viewed as building blocks which can be combined in any number of ways to create a solid foundation for effective citizenship and participation in 21st century society.

The 1995 Curriculum Framework in each content area included perspectives on how curriculum should be planned, sequenced, integrated, and implemented in Delaware classrooms. Each content area provided illustrations of quality teaching/learning events which could be used to guide students' attainment of the standards and sample activities which could be used to assess students' proficiency. The Delaware Content Standards are broad statements of what students should know by the end of their public education. Grade-level expectations (GLEs) and end-of-cluster expectations clarify what students should know, understand and be able to do within a particular content area by the time they have completed each grade or the highest grade in the cluster (for example, at the end of grade 3), respectively. The Content Standards are not meant to define a chapter in a text, a unit of instruction, or specific topics of study.

What is the purpose of the Standards Clarifications?

The Delaware Content Standards Clarifications provide an overview of the intent of the content standards, descriptions of the key goals for each of the standards, rationales for each standard, and examples of what each standard does and does not mean in each content area.

The Clarifications document informs teachers about the meaning of the standards and suggests ideas for how teachers might help students to uncover the meaning of the

standards. Teachers, schools, and school districts can use the document to guide the process at the local level of creating grade-level syllabi, to develop transfer tasks that demonstrate understanding, and to design aligned units of instruction. The Clarifications document is a tool for alignment of curriculum, instruction, and assessment to the state standards.

How are the Delaware Content Standards and the Standards Clarifications organized?

To guide teachers' development of aligned grade-level curriculum, instruction, and assessment, the Clarifications documents provide new components – overarching Enduring Understandings, overarching Essential Questions, and Grade-Level Expectations (GLEs). These components will give educators additional information and guidance for aligned grade-level and unit-level curriculum design.

Overarching Enduring Understandings are key ideas within a content area that cut across all grade-levels and across specific topics (e.g., “Perception is influenced by one’s environment, experience, and individual characteristics.”).

Overarching Essential Questions are broad and deep questions with no one right answer – they are central to the content area study and cut across grade levels and across topics (e.g., “How do experiences alter perceptions and vice versa?”).

Grade-level Expectations explain how well the students should know a content standard and to what extent they should demonstrate understanding of that standard at a particular grade level.

The Standards Clarifications Documents are one component of the Delaware Recommended Curriculum.

What is the Delaware Recommended Curriculum?

The Delaware Recommended Curriculum provides models for educators to follow and the resources needed to effectively align Delaware Content Standards, classroom instruction, classroom (formative) assessment, and state (summative) assessment. It may be helpful to think of the Recommended Curriculum as a toolbox that teachers can use to develop classroom instructional units and assessments that will meet the needs of their students, while aligning with expectations in the standards.

Delaware Recommended Curriculum Design Teams used the existing state standards, revised standards components (GLEs) and the published work of the 1995 Curriculum Framework Commission to identify important concepts and principles for standards-aligned curriculum development.

The following Goals, Big Idea, Enduring Understandings, and Essential Questions¹ guided the development of the Standards Clarifications and other Recommended Curriculum components. Clarifying the standards started with a foundational assumption that a backward design approach can help educators in Delaware strategically plan to improve education.

Goals of the Delaware Recommended Curriculum

- **Increase the percentage of students meeting Delaware standards in cooperation with districts and schools, thereby improving student readiness for post-secondary education and work**
- **Clarify expectations of students for teachers, students, parents, administrators, and the community**
- **Provide a model for local schools and districts of the process of designing an aligned framework of curriculum, instruction, and assessment**
- **Encourage local districts to develop assessments, curriculum, and instructional units *on their own* to foster student achievement of the Delaware Content Standards**

Big Idea for the Delaware Recommended Curriculum

- Alignment of curriculum, instruction, and assessment to the Delaware Content Standards promotes student understanding and success in 21st century society.

Enduring Understandings for the Delaware Recommended Curriculum

Educators will understand that:

- Aligning curriculum, instruction, and assessment in Delaware classrooms will successfully prepare students for assessments measuring the transfer of knowledge in critical thinking and application, including the DSTP.
- Assessments should center on students demonstrating transfer rather than selecting correct answers through recognition or recall. This type of assessment (transfer tasks) will require a rethinking of instruction. New instructional methods will require new tools. Teaching for understanding helps students to achieve the concepts found in the Delaware content standards.
- Integrated learning experiences help students conceptualize both the boundaries and the relationships among the content areas. The individual standards are building blocks which can be combined in any number of ways to create a solid foundation for effective citizenship.
- Understanding how students learn is fundamental to curriculum design. Students may have difficulty learning because the learning environment does not complement their learning needs. These students can often be successful if the environment is altered. It is the responsibility of educators to promote success for each student, regardless of learning styles or needs.

¹ The Delaware Department of Education consulted with Grant Wiggins, co-author of *Understanding by Design*, to backward design for components of the Statewide Recommended Curriculum. The UbD framework provides broad explanations, examples, and materials for backward design of curriculum. UbD is not the only backward design framework; others have been published and may be used to achieve similar results.

- Teachers in Delaware schools require examples of and training in *backward design* of curriculum to ensure standards alignment in classrooms.

Essential Questions for the Delaware Recommended Curriculum

- How can the components of the Delaware Recommended Curriculum help teachers and schools understand, create, and deliver aligned curriculum, instruction, and assessment?
- What kind of curricula and learning principles will ensure students' success in the 21st century workplace and post-secondary education?
- What professional development can model alignment and *backward design* for Delaware teachers?

How can the components of the Delaware Recommended Curriculum help teachers and schools understand, create, and deliver aligned curriculum, instruction, and assessment?

The Delaware Recommended Curriculum will inform teachers about the meaning of the standards in each content area and provide teachers with models of high-quality curriculum components -- without providing a list of content to cover. Teachers, schools, and school districts can use these documents and models as tools to create grade-level syllabi, develop grade-level transfer tasks, and design instructional units. Teachers and districts have the freedom to develop local curriculum components that are aligned to state standards. Districts may choose to create curriculum design teams composed of teachers that should use the Recommended Curriculum components as models to develop or revise local curriculum, assessments, and instructional units.

Components of the Delaware Recommended Curriculum will enable students to achieve the Content Standards through rigorous Big Idea instruction anchored on the Enduring Understandings, Essential Questions, and Transfer Challenges.

- **Content Standards** describe what students should know and be able to do. These are the desired results for every Delaware public school student.
- **Standards Clarifications** provide an overview of the intent of the content standards, descriptions of the key goals for each of the standards, rationale for each standard, and examples of what each standard does and does not mean.
- **Grade-level Expectations** describe to what extent students should understand and be able to achieve at a specific grade level. Grade-level Expectations are directly linked to specific content standards and are aligned with the Delaware Student Testing Program (DSTP).
- **Big Ideas** reflect a core idea in a particular content area, or several content areas, and yield great depth and breadth of insight into the subject. Studying a big idea across grades and content areas will likely cause a student to make connections across time and space about its meaning, relevance, and importance. Examples of Big Ideas inherent in Delaware Content Standards include: Change, Interdependence, Patterns, Systems, Environment, Communication, and Investigation.

- **Enduring Understandings** provide specific insights about big ideas that with which students should leave school. They are the specific inferences, based on the content standards, which have lasting value beyond the classroom. They are central to a discipline, applicable from K-12, addressed with differing levels of sophistication at different grade levels, and are transferable to new situations. An example of an Enduring Understanding would be the statement: “Governments are structured to address the basic needs of the people in a society.”
- **Essential Questions** derive from the benchmarks, and frame the teaching and learning. They point toward key issues and ideas, suggesting meaningful and provocative inquiry into the content. Essential Questions have more than one answer. They promote inquiry, stimulate thought, and spark more questions. They set the stage for higher-order thinking and problem-based learning that promote the transfer of knowledge to new situations. An example of an Essential Question would be: “To what extent can people predict the consequences from human alterations to the physical environment?”
- **Model Grade-level Syllabi** provide an informal learning contract between the teacher and students that describes class learning goals; methods, activities, and assessments for achieving the goals; teacher grading policies in support of the goals; classroom rules that enhance success and the likelihood of student achievement of the goals; and other pertinent information.
- **Model Grade-level Assessments** are examples of thorough and methodical summative assessments (transfer tasks) that analyze student accomplishment against specific goals and criteria. **Transfer Tasks** demonstrate a wise use of knowledge and skill, on one’s own, using good judgment, with minimal cues and prompting, such as deciding in an important situation *what* to do, *when*, *how*, and *why*. Transfer tasks provide credible answers to common questions like “Why are we learning this? What does it help you to do?” Assessment tasks that measure a GLE or benchmark will require students to *do* the subject, to have his or her abilities tested *out there* in the real world.
- **Model Instructional Units** are examples of units of study focusing on a major topic, process, or resource and typically lasts a few days to a few weeks. Instructional units contain formative and summative classroom assessments (using a variety of assessment techniques) and aligned instructional activities. Activities are designed to ensure students learn the concepts, skills, and content necessary to be successful. The model units will have **Unit Understandings** and **Unit Questions** that are contextual, derived from the enduring understandings and essential questions, and are grade-level and unit specific. They will demonstrate how and why a big idea is evident in a particular time and place.

As Wiggins and McTighe (2005) state, “Lessons, units, and courses should be logically inferred from the results sought, not derived from the methods, books, and activities with which we are most comfortable.” Curriculum should focus on Big Ideas with clear purposes and learning should be measured against clear goals. Curriculum should not be sequential content coverage or a series of unfocused and/or unconnected activities.

What curriculum learning principles will ensure students' success in the 21st century workplace and post-secondary education?

Delaware schools are preparing our students to live in the 21st century. New kinds of problems to be solved and new developments in technology have changed the nature of the world which Delaware students will enter after graduation. Today's graduates will have the freedom to make decisions that affect their lives and the lives of others.

However, their decision-making will be complicated by the fact that they face a greater number of choices with each decision they make. Those graduates will enter a 21st century society that redefines itself almost daily, where they will compete for high-quality jobs with people from many nations, work collaboratively, set goals, accept responsibility, and solve problems that will require the ability and confidence to reason and communicate.

Understanding global cultural contexts is critical to preparation for 21st century society. Colleagues in school and the workplace will come from all corners of the earth, espouse the tenets of every religion, and carry on the traditions of hundreds of different cultures. The advent of the Internet and other information technologies has resulted in globalization of local cultures, businesses, and post-secondary education. Delaware public schools should provide opportunities for development of the understandings, knowledge, skills, and dispositions necessary for daily life, post-secondary education, and the workplace. The increasing breadth and complexity of human society requires a curriculum that develops the capacity for life-long learning.

It is not possible to accurately predict all issues students may face in the future. However, students who learn how and when to appropriately apply knowledge and skills across content areas will be prepared to handle future challenges. By promoting understanding, not just recall and recognition, and by providing students opportunities to practice the use of skills and knowledge in real-world contexts; students learn to transfer discrete skills and knowledge across settings and situations. Learning through practice in real-world situations increases the likelihood that students will successfully deal with new and different challenges.

Learning in Delaware classrooms should be active rather than passive. The transfer of factual knowledge through formal presentation will always be necessary, but the Delaware content standards also require an emphasis on critical analysis, problem-solving, and application of knowledge. Learning should be guided by the search to answer questions. A teacher should use open-ended questions that have no definite right or wrong answers to invite the open debate and discussion that is most conducive to understanding. Instruction should be developed from problem situations and enhanced using the resources relevant to each content area and each standard within the content area. Students should be able to choose the appropriate skills and knowledge to demonstrate understanding; analyze, evaluate, and synthesize issues; apply learning to new contexts or situations; and investigate, conjecture, verify their findings, and solve problems. Opportunities to teach the standards in depth should be identified in the curriculum. Assessments should center on students demonstrating proficiencies and

transferring concepts into new contexts rather than recognizing or recalling correct answers.

Students will:	Rather than:
<ul style="list-style-type: none"> • engage in authentic and purposeful activities; • be instructed using materials appropriate to their individual and developmental needs; • be active participants in gathering information from a variety of sources; • engage in integrated and meaningful communication; • be assessed through ongoing instructional activities which require them to solve problems, gather and use resources, work collaboratively, and assume responsibility for their learning; • access, organize, and communicate information using modern technology; • experience a multicultural perspective; • reflect on their own development and set goals for their learning; • be constructive and critical members of a community of lifelong learners. 	<ul style="list-style-type: none"> • engage in skill and drill exercises isolated from meaningful application; • be limited to a narrow range of content; • work through prepackaged programs or materials assigned regardless of their individual needs; • be passive recipients of information from teachers and textbooks; • consistently engage in activities that focus on each content area separately; • be tested with measures that assess the mastery of isolated facts or skills; • be limited to the use of paper and pencil; • be exposed to a single perspective only; • always accept goals set by others without critical evaluation; • perceive learning as a series of unrelated events limited to school settings.

What professional development can model alignment and *backward design* for Delaware teachers?

Classroom teachers are at the heart of education. Their vision and appropriate use of the Delaware Recommended Curriculum will determine the ultimate success of the systemic reform initiative. The school should be the unit of change. Extensive staff development for teachers, administrators, and paraprofessionals in content, pedagogy, and the process of creating a curriculum should be ongoing and deliverable by the state, districts, and schools for the purpose of creating learning communities for teachers.

Training and other forms of teacher support must be provided to make the adoption of this curriculum a reality. Creating new units or assessment tasks that require transfer will be extremely challenging. It requires time for research and reflection, input from content-area experts, the creation of learning communities within the professional staff of

a school or district, and the opportunity to test ideas in the classroom. Staff development needs to be emphasized, and institutions which train teachers will have to review their own practices in light of the standards and the Recommended Curriculum.

The Delaware Recommended Curriculum Design Teams used the backward design process to create the curricular components for their content area. Schools and districts that use a similar process should receive similar results – an integrated curriculum that is aligned to the Delaware Content Standards and dedicated to the education of students for the 21st century.

Backward design of curriculum has three stages:

- 1) Identification of desired results;
- 2) Determination of acceptable evidence; and,
- 3) Planning of learning experiences and instruction.

Using a *backward design* approach to curricular design helps to ensure alignment with the standards.

1) Identification of desired results

For Delaware, the desired results are student achievement of the Delaware Content Standards and benchmarks.

2) Determination of acceptable evidence

Next, educators determine what student work and/or performances provide evidence that students have achieved the desired results. Educators examine the standards, overarching enduring understandings and essential questions, and GLEs to develop summative classroom and grade-level transfer tasks.

Transfer is the appropriate use of knowledge and/or skills in a new or different context. Transfer is not repetition of situations practiced in the classroom. Transfer is not recall or recognition. Transfer occurs when a student's learning in one situation influences performance in new situations. Successful transfer means that students can perform well with minimal or no prompting, guiding, or cueing by teachers (Wiggins & McTighe, 2005).

Students learn content and skills in school so that they can apply them in their personal lives and eventually in the workplace. The goal of transfer is for students to know when and how to apply knowledge and skills independently. Assessing for transfer involves having students demonstrate their understanding by appropriately applying knowledge and skills in a situation different from those they experienced during classroom learning.

These are complex assessments that are designed to show understanding and transfer. Summative assessments should demonstrate what a student knows and/or is able to do, why the student knows it and/or why what they did was appropriate, and the ability to use the knowledge and/or skill in a new situation and/or context.

3) Planning of learning experiences and instruction

Once summative assessments/transfer tasks have been developed, then and only then, educators plan the learning experiences and activities that will allow students to achieve the goals set forth in the summative assessment. Teaching for transfer involves teaching students new knowledge and skills and giving them opportunities to practice transfer using this new knowledge and skills in various authentic situations, ultimately aimed toward helping students reach understanding.

In this stage, educators determine:

- what knowledge, skills, processes, and strategies students need to achieve the goal;
- what content needs to be taught;
- how students should be taught;

Formative, assessments are developed at this time. The purpose of the formative assessments is to guide instruction and provide feedback on student progress in relation to the desired results. Educators should use this assessment data to adjust instruction, if necessary, according to student needs. Formative assessments may measure discrete skills and/or knowledge as the building blocks of understanding. They also may measure concept attainment and facets of understanding.

Understanding can be revealed through different kinds of evidence. Students might explain theories or justify their responses; interpret evidence to make meaning from it; apply knowledge effectively in a new context from which it was learned; gain perspective from examining other points of view; develop empathy; self-assess thoughts, actions, and feelings (Wiggins and McTighe, 2005).