

I have cut and pasted some info from webs for your review of Backward Design

What is Backward Design?

From the ASCD book *Understanding by Design*

By Grant Wiggins and Jay McTighe

Teachers are designers. An essential act of our profession is the design of curriculum and learning experiences to meet specified purposes. We are also designers of assessments to diagnose student needs to guide our teaching and to enable us, our students, and others (parents and administrators) to determine whether our goals have been achieved, that is, did the students learn and understand the desired knowledge?

Like other design professions, such as architecture, engineering, or graphic arts, designers in education must be mindful of their audiences. Professionals in these fields are strongly client centered. The effectiveness of their designs corresponds to whether they have accomplished their goals for the end users. Clearly, students are our primary clients, given that the effectiveness of curriculum, assessment and instructional designs is ultimately determined by their achievement of desired learnings.

As with other design professions, standards inform and shape our work. The architect, for example, is guided by building codes, customer budget, and aesthetics. The teacher as designer is similarly constrained. We are not free to teach any topic we choose.

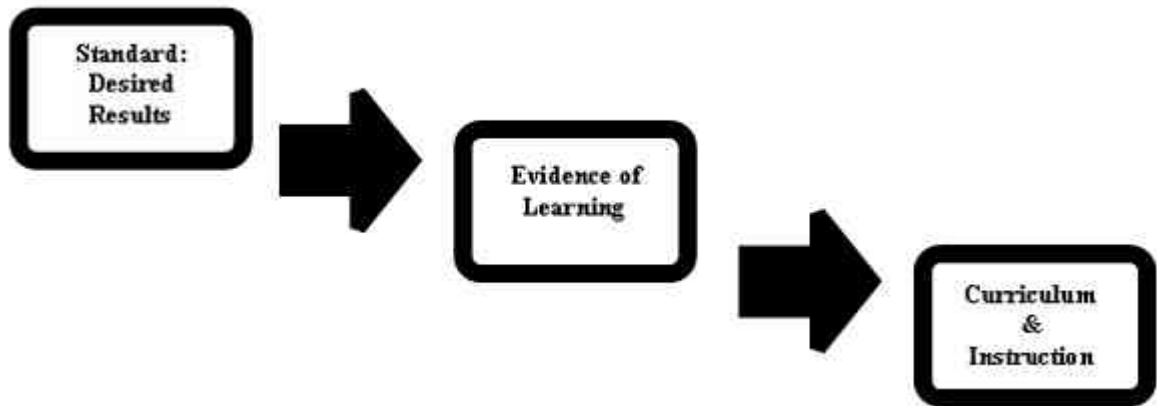
Rather we are guided by national, state or institutional standards that specify what students should know and be able to do. These standards provide a framework to help us identify teaching and learning priorities and guide our design of curriculum and assessments. In addition to external standards, we also consider the needs of our students when designing learning experiences. For example, students interests, development levels, and previous achievements influence our designs.

ARE THE BEST CURRICULAR DESIGNS “BACKWARD”?

How, then, do these design considerations apply to curriculum planning? We use curriculum as a means to an end. We focus on a particular topic (e.g., racial prejudice), use a particular resource (e.g., *To Kill a Mockingbird*), and choose specific instructional methods (e.g., Socratic seminar to discuss the book and cooperative groups to analyze stereotypical images in films and on television) to cause learning to meet a given standard (e.g., the student will understand the nature of prejudice, and the difference between generalizations and stereotypes).

Why do we describe the most effective curricular designs as “backward”? We do so because many teachers begin with textbooks, favored lessons, and time-honored

activities rather than deriving those tools from targeted goals or standards. We are advocating the reverse: One starts with the end – the desired results (goals or standards) –and then derives the curriculum from the evidence of learning (performances) called for by the standard and the teaching needed to equip students to perform.



Backwards Design from Standards to Lesson Plans



The Siskiyou County Office of Education ([SCOE](#)) has developed a Standards Implementation Project to "*increase the academic achievement of all students*" through the use of standards-based curriculum design (Holmes and Murphy-Shaw, 2000). To achieve their goals, SCOE promotes the use of "backwards design" when developing lesson plans (Holmes, 2001). Wiggins and McTighe (1999) is a key source for this process.

The first and most important aspect of backwards design is to become familiar with the Standards for the grade level and curriculum area being taught. The California Department of Education ([CDE](#)) has these Standards available in *.pdf format (see [CDE Standards](#)) for five core curriculum areas.

After the standard and benchmarks have been selected, the next step is to design an assessment that will measure the students' understanding of the standard. You will need to decide how you are going to measure student understanding (test or quiz, self-assessment, performance, product) of the selected standard. Bloom's Taxonomy (knowledge, comprehension, application, analysis, synthesis, evaluation) is a nice tool to use to help design assessments or you can utilize the many "performance verbs" offered by Wiggins and McTighe (1999) under the following categories: explanation, interpretation, application, perspective, empathy, and self-knowledge.

Once you have selected the standard and determined the acceptable evidence that will demonstrate student achievement, then you can develop a lesson plan that will provide students with the opportunity to reach the desired objectives.

Wiggins and McTighe (1999) utilize the "WHERE" approach in this stage of the process.

W stands for students knowing **Where** they are heading, **Why** they are heading there, **What** they know, **Where** they might go wrong in the process, and **What** is required of them.

H stands for **Hooking** the students on the topic of study.

E stands for students **Exploring** and **Experiencing** ideas and being **Equipped** with the necessary understanding to master the standard being taught.

R stands for providing opportunities for students to **Rehearse**, **Revise**, and **Refine** their work.

E stands for student **Evaluation**.

The rewarding part of the process comes next with the implementation of the lesson plan in the classroom. Any necessary changes or additions can be incorporated into your modified lesson plan.

After students have had the opportunity to learn the selected Standard, the students will need to be assessed to determine if they have successfully reached the desired goal. The student assessment can also be used to modify the original lesson plan.

References

Holmes, Karen and Marian Murphy-Shaw. More Than Aligned - One County's Journey. Building Success Conference, August 10, 2000.

Wiggins, Grant and Jay McTighe. Understanding by Design. Alexandria, VA: Association for Supervision and Curriculum Development. 1999

Indicators of Teaching for Understanding

by Jay McTighe and Eliot Seif

What does "teaching for understanding" look like? What would we expect to see in an Understanding by Design classroom? The following list of observable indicators includes items developed by Grant Wiggins, Jay McTighe, and Elliott Seif, as well as items suggested by participants in an October 23 workshop on Teaching for Understanding offered by Jay McTighe and Elliott Seif at the 2000 ASCD Teaching and Learning Conference in Tampa, Fla.

Feel free to use or adapt the list as needed to guide classroom observation, coaching or mentoring, peer visitation, self-assessment, and professional development.

We welcome your feedback. Please e-mail ideas for using the indicators, additional items that should be included, and any questions and suggestions to this site.

The unit or course design

- Reflects a coherent design -- big ideas and essential questions clearly guide the design of, and are aligned with, assessments and teaching and learning activities.
- Makes clear distinctions between big ideas and essential questions, and the knowledge and skills necessary for learning the ideas and answering the questions.
- Uses multiple forms of assessment to let students demonstrate their understanding in various ways.
- Incorporates instruction and assessment that reflects the six facets of understanding -- the design provides opportunities for students to explain, interpret, apply, shift perspective, empathize, and self-assess.
- Anchors assessment of understanding with authentic performance tasks calling for students to demonstrate their understanding and apply knowledge and skills.
- Uses clear criteria and performance standards for teacher, peer, and self-evaluations of student products and performances.
- Enables students to revisit and rethink important ideas to deepen their understanding.
- Incorporates a variety of resources. The textbook is only one resource among many (rather than serving as the syllabus).

The teacher

- Informs students of the big ideas and essential questions, performance requirements, and evaluative criteria at the beginning of the unit or course.
- Hooks and holds students' interest while they examine and explore big ideas and essential questions.
- Uses a variety of strategies to promote deeper understanding of subject matter.

- Facilitates students' active construction of meaning (rather than simply telling).
- Promotes opportunities for students to "unpack their thinking" -- to explain, interpret, apply, shift perspective, empathize, or self-assess (incorporates the six facets of understanding).
- Uses questioning, probing, and feedback to stimulate student reflection and rethinking.
- Teaches basic knowledge and skills in the context of big ideas and explores essential questions.
- Uses information from ongoing assessments as feedback to adjust instruction.
- Uses information from ongoing assessments to check for student understanding and misconceptions along the way.
- Uses a variety of resources (beyond the textbook) to promote understanding.

The learners

- Can describe the goals (big ideas and essential questions) and performance requirements of the unit or course.
- Can explain what they are doing and why (i.e., how today's work relates to the larger unit or course goals).
- Are hooked at the beginning and remain engaged throughout the unit or course.
- Can describe the criteria by which their work will be evaluated.
- Are engaged in activities that help them to learn the big ideas and answer the essential questions.
- Are engaged in activities that promote explanation, interpretation, application, perspective taking, empathy, and self-assessment (the six facets).
- Demonstrate that they are learning the background knowledge and skills that support the big ideas and essential questions.
- Have opportunities to generate relevant questions.
- Are able to explain and justify their work and their answers.
- Are involved in self- or peer-assessment based on established criteria and performance standards.
- Use the criteria or rubrics to guide and revise their work.
- Set relevant goals based on feedback.

In the classroom environment

- The big ideas and essential questions are central to the work of the students, the classroom activity, and the norms and culture of the classroom.
- There are high expectations and incentives for all students to come to understand the big ideas and answer the essential questions.
- All students and their ideas are treated with dignity and respect.
- Big ideas, essential questions, and criteria or scoring rubrics are posted.
- Samples or models of student work are made visible.
- Exploration of big ideas and essential questions is differentiated, so some students are able to delve more deeply into the subject matter than others.