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Creating Instructional Rubrics

for Inclusive Classrooms



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Ms. Leon, a middle school teacher in an inclusive classroom, and her students were confused. Ms. Leon was confused because her students' work was far below her expectations for them. Ms. Leon's students were confused because they did not understand what her expectations were. They were also frustrated and disappointed by their grades.

After several family members spoke to her about their children's grades, Ms. Leon decided to work with her students to develop a rubric to evaluate their performance on their next assignment, a

Students' Web sites were to include navigation buttons; appropriate backgrounds; graphics; and readable, edited text. WebQuest entitled Culture Quest (Kelly, 2000; Lynch & Tennille, 2000; see box, "What Is a WebQuest?"). Ms. Leon had heard about WebQuest from colleagues in an Internet-based Listserv that provides teachers with information and resources on using the Internet in classrooms. She also examined several WebQuests and rubrics that were available online.

The goal of the Culture Quest was for students to understand, explore, and research the culture and customs of groups in the United States by visiting teacher-designated Internet sites, interviewing individuals, gathering resources in the media center, and exploring software. Ms. Leon divided the class into groups, and each group was to select and study aspects of a culture (e.g., art, music, symbols, and famous people) and create a Web site. She wanted the students to include a title page with a table of contents, and three to five Web pages that describe two

aspects of the culture the group studied. Their Web sites also needed to include an author page containing student drawings and brief descriptions of the authors, links to Web resources, and a bibliography of resources used. The site was to include navigation buttons; appropriate backgrounds; graphics; and readable, edited text.

Before she assigned students to the Culture Quest project, Ms. Leon worked with them to create a rubric to evaluate the Web sites they would develop. First, she gave them an example of an exemplary Web site developed by a previous class, asked them to examine it, and discussed with them the features of the site that made it outstanding. Next, she gave them a Web site that she considered inadequate and discussed with them the features of the site that were lacking. Together, Ms. Leon and her students listed the ways in which the two Web sites differed, and grouped them into

three categories: content, design, and literacy skills.

Next, Ms. Leon divided the class into groups. She asked each group to create a set of indicators addressing one of the categories, and a scale for judging each indicator in that category, using four levels of performance. Each group then presented their scale to the class and revised it based on the feedback they received from their classmates.

Ms. Leon then took the groups' four levels of performance and produced a rubric, which she reviewed with the whole class. She asked the groups to examine the two Web sites a second time using the rubric, and discussed how they would evaluate the Web sites. Confident that her students understood her expectations and how to use the rubric, she assigned students to their Culture Quest groups, and told them she would evaluate their Web sites using the rubric. As students completed drafts of sections of their Web sites, Ms. Leon and peer reviewers gave them feedback, using the rubric. When groups handed in their final products, confusion and frustration were replaced by understanding and satisfaction because Ms. Leon and her students understood each other's expectations and were satisfied with their products and their grades.

What Do Rubrics Do?

Like Ms. Leon, many teachers are seeking ways to improve student assessment and align their curriculum with state and national standards. One strategy that teachers like Ms. Leon are benefiting from is the use of instructional rubrics that specify the qualities associated with different levels of proficiency for evaluating student assignments (McTighe, 1997; Salend, 2001). Educators using instructional rubrics

Instructional rubrics specify the qualities associated with different levels of proficiency for evaluating student assignments.

What Is a WebQuest?

One type of instructional activity that is becoming more common in classrooms is a WebQuest. A WebQuest is a structured, inquiry-oriented activity in which some or all of the information that learners interact with comes from resources on the Internet or videoconferencing (Dodge, 1997). A well-designed WebQuest contains the following:

- An introduction.
- A task.
- A set of information sources.
- A process for accomplishing the task.
- A method for organizing the information acquired.
- An evaluation tool.
- A conclusion.

WebQuests are almost always group activities and sometimes roles (e.g., archaeologist, historian, reporter) are given to learners. They may be designed around a single discipline or can be interdisciplinary and can be easily related to state standards or general education curricula benchmarks. WebQuests may be short term, requiring one to three class periods, or longer term, taking a week to a month.

A critical aspect of a WebQuest for teachers and students is the evaluation tool. Often the product is a Web site (using Netscape Composer, HyperStudio or another page editor) or PowerPoint presentation. Many examples of WebQuests are available online (www.coe.west.asu.edu) and many use rubrics as an evaluation tool.

assess process, performance, and progress by delineating the various categories associated with assessment tasks and learning activities, the different levels of performance, and the indicators describing each level and then rating student performance on products that show their learning. (See Figure 1, page 10, for examples of rubric categories, levels of performance, and indicators.)

Rubrics also may be used as part of student portfolios to help students, teachers, and family members reflect on student work, identify process and product skills mastered and not mastered, and make suggestions to guide instruction. Because individualized education program (IEP) goals should include benchmarks that relate to students' progress within the general education curriculum, instructional rubrics also can be used to facilitate the IEP process.

What Are the Different Kinds of Rubrics?

Teachers can choose to use holistic or analytic rubrics. Holistic rubrics require

teachers to select one level of performance or rating that best represents the quality of the learning product and are used most frequently with comprehensive assessments related to district, state, or national standards. Conversely, analytic rubrics have several categories of indicators, which are rated separately, allowing teachers to differentiate levels of performance within and among the categories. Analytic rubrics typically are used to provide specific feedback to students to support their learning.

Benefits to Students

The use of instructional rubrics can promote learning and benefit students, teachers, and family members (Andrade, 2000; Schirmer, Bailey, & Fitzgerald, 1999). Instructional rubrics can benefit students by helping them do the following:

- Understand the qualities associated with a specific task or assignment.
- Develop their critical-thinking skills.
- Self-assess their work.

Rubrics also serve as an excellent way for students to receive informative feedback regarding their learning

Level of Performance	Beginning 1	Developing 2	Accomplished 3	Exemplary 4
Category				
Content	The purpose of the site is not stated and is focused on only one aspect of the culture.	The purpose of the site is unclear and is frequent on only one aspect of the culture 2	The purpose of the site is clear and is focused on two aspects of the culture	The purpose of the site is very clear and focused on two aspect of the culture
	Details, examples, illustrations, and images are missing I	Details, examples, illustrations, and images are limited 2	Details, examples, illustrations, and images are included	Details, examples, illustrations, and images are rich
	Two or fewer sources of information base been discussed and referenced	Two to three sources of information have been discussed and referenced	Four or 5 different sources of information are discussed and referenced	Six or more different sources of information have been discussed and referenced
	The site has 3 or less content pages and no authors' page 1	The site has only 4 content pages or no outhor's page.	The site has 5 content pages and an author's page 3	The site has more than 5 content pages and an author's page 4
	Many statements and images are factually incorrect and contain stereotypes	Some statements and images are factually incorrect and contain sterenty pes	Most statements and images are factually correct and free of stereotypes	All statements and images are factually correct and free of stereotypes
Design	The site is missing a title page, table of contents, and navigation buttons.	The site is missing a title page, table of contents, or navigation buttons	The site has a title page, table of contents, and navigation buttons	The site has an innovative title page, table of contents, and is easy to navigate
	The visual aspects of the text and images such as line, color, value, shape, and texture are unappealing and inappropriate.	The visual aspects of the feed and images such as line, color, value, shape, and feeting are either inappealing or inappropriate	The visual aspects of the text and images such as line, color, value, shape and sexture are appealing and appropriate 3	The visual aspects of the text an images such as line, enfort, value shape, and texture are appealing and imaginative.
Indicator	The loycort of the text and images is conflicing to the piewer	The layout of the test and images is sometimes confusing to the viewer	The layout of the text and images is clear to the viewer	The layout of the text and image is clear and helpful to the viewe
	The site is accessible to few pursues with visual or auditory classibilities.	2 The site is accessible to some persons with visual or auditory disabilities 2	The site is secessible to most persons with visual or auditory disabilities	The site is accessible and inviting to persons with visual or auditor disabilities
Literacy Skills	The meaning of much of the text is unclear to the resider	The meaning of some of the text is nuclear to the neader 2	The meaning of most of the text is clear to the render	The meaning of all of the test is very clear to the reader 4
	The site has few new or interesting facts	The site baccome new or interesting facts	The site has several new and interesting facts	The site has many new and interesting 4
	All ideas are not logically connected	Many ideas are not logically connected 2	Many ideas are logically connected 3	All ideas are logically connected
	There are many panetustion, grammar, and spelling errors	There are some penetration, grammar, or spelling errors	There are few punctuation, grammar, or spelling errors	There are no punctuation, grammar, or spelling errors

strengths and needs, which can aid them in assessing and directing their learning (Stanford & Siders, 2001).

Benefits to Teachers

• As Ms. Leon realized, rubrics can help teachers

- Clarify and communicate their expectations.
- Link assessment and instruction.
- Establish standards of excellence.
- Evaluate and grade their students' work.

Because rubrics can make grading more objective and consistent, they can

assist teachers in explaining their grading of student work to family members. Since family members also can use rubrics to assist their children with assignments, sharing rubrics with family members can be a good way to communicate with them and involve them in the learning process.

When students developed and used clear rubrics for scoring their work, confusion and frustration were replaced by understanding and satisfaction.

Guidelines for Using Rubrics

In light of the growing use of rubrics and their benefits for teachers and students, this article presents guidelines that teachers can use to create rubrics with their students. Figure 1 shows a sample analytic, product-oriented rubric that Ms. Leon developed with her students using these guidelines.

Discuss with Others How Performance Is Assessed

Educators can begin to develop instructional rubrics by collaborating with their colleagues to discuss how performance is assessed in their specific disciplines and on specific learning activities. Collaboration between general and special educators also can help link instructional rubrics to students' IEP goals. The following questions can guide the discussion:

- What district, state, or national standards does this learning activity address?
- What IEP goals does the learning activity fulfill?
- How can this learning activity be differentiated to meet the strengths and needs of students (e.g., IEP goals) of the various students in the class?
- What factors should be considered when evaluating the learning activity?
- Is a rubric the best method to assess this learning activity?

The Internet can be an excellent vehicle for interacting with other professionals; it offers resources that can assist educators in developing rubrics. The Internet provides access to a wide range of resources (e.g., databases, documents, reports, and materials) from

around the world, as well as opportunities to exchange information and ideas with colleagues. In addition, many state education departments maintain Web sites that offer access to state standards, curriculum materials, and sample rubrics. For example, Ms. Leon obtained information about rubrics through her participation in the Listserv K12ASSESS-L (http://www.ericae.net/k12assess/) sponsored by the ERIC Clearinghouse on Assessment and Evaluation, which provides a forum for discussions on educational assessment issues in Grades K-12. She also visited several Web sites (e.g., http://www.expage.com/page/ techevalWebsites) that provided sample rubrics for evaluating technology-related projects (for additional resources, see box, "Web Sites on Rubrics").

Examine Sample Assignments to Identify Exemplary Features

Next, teachers collect samples of the assignment that will be evaluated by the rubric. These samples should reflect a range of performance levels so that teachers and students can analyze them to identify the important features of the

As part of student portfolios, rubrics help students, teachers, and family members reflect on student work, identify process and product skills mastered and not mastered, and make suggestions to guide instruction.

learning activity that separate excellent, good, mediocre, and inadequate samples.

For example, Ms. Leon used examples of excellent and inadequate Web sites from her prior classes and asked her students to identify the features associated with effective and ineffective Web pages. The students recognized

Web Sites on Rubrics

http://www.expage.com/page/lebeaurubrics

Offers links to other sites with useful information on rubrics (introduction to rubrics, designing rubrics, sample rubrics, etc.).

http://www.school.discovery.com/schrockguide/assess.html

Provides information on the creation and use of rubrics with additional resources, as well as examples of rubrics.

http://www.ericae.net/faqs/rubrics/scoring_rubrics.htm

Contains definitions of scoring rubrics, and bibliographic and Internet resources on rubrics.

http://www.cesa8.k12.wi.us/tlcf/tips.htm

Offers 10 tips for designing rubrics.

http://www.cotf.edu/ete/teacher/rubrics.html

Offers guidelines for the development of rubrics.

http://www.gc.cc.fl.us/wwwroot/2000faculty/rubrics.htm

Provides a definition and example of rubrics and links to other sites with related resources.

http://www.k-6educatorsca.about.com/aboutcanada/k-educatorsca/cs/rubricbuilders/index.htm

Offers rubric builders for teachers.

http://www.k-6educatorsca.about.com/aboutcanada/canadateachers/cs/rubrics/index.htm

Offers links which lead to examples of rubrics that teachers at the elementary level may find useful.

that the most effective Web sites clearly stated their purpose, gave many examples, were navigated easily, had appealing and imaginative visuals, and were clearly and logically written.

Identify Categories. At this point, it is helpful to examine and group the features to determine the major components of the assignment, and identify the categories the rubric will address. For example, Ms. Leon and her students identified the categories of content, design, and literacy skills. Students were able to list each indicator under one of these three categories. They discovered that visual literacy—the ability to understand and design the visual aspects of media such as layout, images, and navigation—is just as important as understanding the meaning of the text (Hobbs, 1997). Establishing categories also enables teachers and students to identify the additional indicators they might not have listed previously. When Ms. Leon's class first listed indicators, they did not mention how many sources the Web site designers used. Later, however, they realized that the assignment required that multiple sources be used and referenced.

Determine Levels of Performance. To evaluate the quality of each feature in a category, teachers and students must establish levels of performance. Levels of performance are age-appropriate scales for rating students' assignments that usually reflect three or four levels, although more levels are possible. Examples of wording that teachers have used include the following:

- No; no, but; yes, but; yes (Andrade, 2000).
- Below average, average, above average.

A rubric's indicators should be stated in positive terms, and they should be feasible, fair, unbiased, and credible.

- Below expectations, acceptable, proficient, excellent (Finson & Ormsbee, 1998).
- Novice, apprentice, proficient, distinguished.
- No attempt, beginning, emerging, mastery, advanced (Kleinert, Haig, Kearns, & Kennedy, 2000).

Levels of performance also can be phrased in student language, such as "awesome" for "excellent." Teachers often choose to attach points (e.g., 1, 2, 3, 4) to each level of performance to facilitate grading.

For example, for their rubric, Ms. Leon and her class chose the terms beginning, developing, accomplished, and exemplary and assigned four points to the highest level.

Compose a Set of Indicators. After determining levels of performance, teachers and students develop indicators. Indicators are brief statements that describe the specific features that reflect various levels of performance with respect to the identified categories. They serve to define and provide examples of the important features associated with products that demonstrate student learning. A final list of indicators is developed by examining all proposed indicators, deleting irrelevant ones, combining those that overlap, and adding important ones that are missing.

First, Ms. Leon modeled the process by selecting a feature of one of the categories and writing four indicators on the board. Then she guided a discussion by prompting students to identify subtle differences in another feature and asked them to list their own indicators. Next, she asked each of the groups of students to write indicators for one or more of the remaining features under each category.

Make Sure the Rubric Is Understandable, Feasible, Fair, Unbiased, Credible, and Individualized

After teachers and students have created a draft of the rubric, they should examine the rubric as a whole in light of the product they are going to create. The language of the rubric should include wording that students, family members, and other professionals can understand

and should be stated in positive terms. The indicators should be feasible, fair, unbiased, and credible.

For example, Ms. Leon's students wanted to know exactly how many references and Web site pages were required for each level of performance; so Ms. Leon helped by providing specific numbers in the indicators. If some indicators are more important than others, it might be necessary to weight various rubric dimensions to reflect these differences. For example, some teachers assign more points to content than literacy skills, depending on the goals of the assignment and their connection to the learning standards.

Educators also can individualize rubrics to address the unique needs of students, such as their IEP goals. For example, if a student's IEP contains an objective that paragraphs written by the student should include topic sentences, three supporting sentences, and a concluding sentence, these skills might be added to the rubric.

Teach and Encourage Students to Use the Rubric

Before starting the actual assignment, it is helpful to give the students the jointly designed rubric and use it to evaluate two or more assignments of varying quality. This enables students to solidify in their minds those indicators they must include in the assignment and also determine if the rubric is workable. For example, Ms. Leon asked her students to look at different Web sites to see why one was more effective than the other, based on the rubric they had developed.

Once teachers and students finalize the rubric, teachers can encourage students to use the rubric to guide them in working on the assignment. Teachers can schedule time for peer and teacher conferences so students can refer to the rubric to reflect on their work, and identify indicators that are not yet addressed in their assignment.

Teachers also can use the Internet as part of their efforts to communicate with students and families and support their use of the rubric. For example, rubrics and exemplary models can be posted on the Internet so that students and families can access them at their

Rubrics can make grading more objective and consistent and can assist teachers in explaining their grading of student work to family members.

convenience. Since some students and families may not have access to the Internet, alternative communication strategies also should be employed (Salend, 2001).

Evaluate Students' Assignments Using the Rubric

When assignments are completed, teachers can use the rubrics in several ways. Teachers may use them to evaluate the assignment and assign group or individual grades based on the points accumulated. Teachers may ask the students to evaluate their own or others' assignments based on the rubric to encourage peer and self-evaluation. Teachers also may assign a grade based on a combination of their ratings and that of the students.

Evaluate and Revise the Rubric

Rubrics must be continually evaluated and refined if they are to achieve their intended outcomes and be useful to all the audiences for which they are designed. Therefore, it is important to examine the rubric's effect on students, teachers, and other relevant parties. Primarily, the effect of the rubric on student learning should be assessed by examining data related to student learning, such as increased mastery of curriculum standards and IEP goals, changes in students' grades, and improved performance on classroom-based activities and statewide exams.

Information from students, teachers, and family members also can be helpful in examining the overall effectiveness and efficiency of the rubric. For exam-

ple, students and family members can be asked to identify the ways in which the rubric aided and hindered performance. Similarly, teachers can be asked to reflect on the effect of the rubric on the teaching and learning process—including its success as a tool for fostering student performance, assessing students' strengths and learning needs, supporting differentiated instruction, communicating with families, and evaluating and grading student work. Students, family members, and teachers also can provide information to validate successful aspects of the rubric process, as well as pinpoint procedures that need to be revised, and make recommendations for improving the rubric and the rubric

For example, after using the rubric shown in this article, Ms. Leon realized that although it evaluates the final product, it did not evaluate the process the students used to complete the assignment. As a result, she is working on adding a process category that evaluates indicators that relate to group cooperation skills and timelines of work completion.

Final Thoughts

As schools adopt more rigorous learning standards for all students, teachers face many challenges. These challenges include promoting student learning by linking assessment, instruction, student assignments, and grading to academic standards. One strategy for meeting this challenge is the use of instructional rubrics. We hope that the framework presented here, as well as the example of Ms. Leon's work with her class, will be helpful to other educators as they create rubrics to support their students' learning in inclusive settings.

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