



Beyond Fairness and Consistency in Grading: The Role of Rubrics in Higher Education

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WHAT IS A RUBRIC?

Student-centered learning demands progressive means of assessment that enable students to view learning as a process to develop and use strategies to meet or exceed assessment expectations. Such **continuous improvement is possible only when students receive continuous, timely, objective, and constructive feedback**. However, most assessment tasks provide little or no information to improve or promote student learning, but instead simply provide test scores or grades that merely quantify performance. Students need to have information about the quality of their work while they work on their assessment tasks and need to comprehend what constitutes good performance. They need to understand what excellent work is and what poor work is and be able to know what they can do to improve.

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An increasing emphasis on formative assessment has fueled a push toward the use of rubrics in higher education as they focus on the criteria for quality of student work.¹ The use of rubrics and scoring guides give students a better understanding of what is being assessed, on what criteria grades are based, and what standards are expected.

Teachers read into the term, rubric, a ‘variety of meanings’² and a ‘series of questions.’³ At its best, a rubric is a carefully wrought expression of the professional judgment of a teacher. In this judgment, the rubric identifies the learning goals and aspirations for performance. A rubric is an assessment tool that explicitly lists the criteria for student work and articulates the levels of quality for each criterion. It is a visual narrative that breaks down the assignment into component parts and provides clear descriptions of the characteristics of the work associated with each component, at varying levels of mastery. In his seminal article on rubrics, Popham was the first to identify the three essential features that a rubric must have: evaluative criteria; quality definitions; and, a scoring strategy.⁴ Evaluative criteria identify the factors that determine the quality of a student’s work. Quality definitions, in turn, provide a detailed description of the skills and knowledge for each level that a student must achieve to reach the suggestive levels of performance to distinguish acceptable from unacceptable responses. The scoring strategy is the use of a rating scale to interpret judgments, and these may be scored either holistically or analytically. Rating scales, if used on their own, have only criteria but no performance level descriptions, and are therefore different from rubrics.⁵ Brookhart provides a clear explanation of how rubrics, checklists, and rating scales include criteria but are different in how the scales are used.⁶

¹Susan M. Brookhart, *How to Create and Use Rubrics for Formative Assessment and Grading* (Alexandria: ASCD, 2013).

²Phillip Dawson, “Assessment Rubrics: Towards Clearer and More Replicable Design, Research and Practice,” *Assessment & Evaluation in Higher Education* 42, no. 3 (2017): 347–360, <https://doi.org/10.1080/02602938.2015.1111294>.

³W. James Popham, “What’s Wrong—And What’s Right—With Rubrics,” *Educational Leadership* 55, no. 2 (1997): 72–75.

⁴Popham, “What’s Wrong—And What’s Right—With Rubrics.”

⁵Brookhart, *How to Create and Use Rubrics for Formative Assessment and Grading*.

⁶Susan M. Brookhart, “Appropriate Criteria: Key to Effective Rubrics,” *Frontiers in Education* 3, no. 22 (2018), <https://doi.org/10.3389/feduc.2018.00022>.

Checklists use a simple yes/no, rating scales use a Likert-scale decision while the rubrics actually describe the performance for each criterion.

Rubrics have different meanings and divergent practices—analytic *vs.* holistic; generic *vs.* task-specific; teacher-centered *vs.* student-centered.⁷ A holistic rubric requires teachers to score the overall process or product without any targeted, specific feedback to students, while an analytic rubric gets teachers to score separate, individual parts of the product or performance first, then sum the individual scores to obtain a total score. Thus, holistic rubrics are primarily used as scoring rubrics, while analytic rubrics are used as instructional rubrics. Another variation to these rubrics is the single-point rubric that only lists the criteria for proficiency but provides space for teachers to identify where students have exceeded expectations, as well as highlight specific areas of concern upon which students need to focus.⁸ Scoring rubrics focus on the product, while instructional rubrics focus on the process. Andrade proposes using instructional rubrics to clarify learning goals, to design the instruction that address these learning goals, to communicate and clarify teacher expectations of these learning goals, to guide the feedback on students' progress toward the learning goals, and to judge the final products in terms of the degree to which the learning goals were met.⁹ Teacher-centered rubrics are primarily for teachers to quickly and objectively assign accurate grades, while student-centered rubrics specifically focus on student learning and achievement.

There are many reasons for using rubrics. To support their summative use, Broad identifies 'legitimacy, affordability, and accountability' as key reasons to use rubrics.¹⁰ Whereas to support their formative use, Reddy and Andrade identify increasing student achievement, improving

⁷ Anders Jonsson, and Gunilla Svingby, "The Use of Scoring Rubrics: Reliability, Validity and Educational Consequences," *Educational Research Review* 2, no. 2 (2007): 130–144; D. Royce Sadler, "Transforming Holistic Assessment and Grading into a Vehicle for Complex Learning," in *Assessment, Learning and Judgement in Higher Education*, edited by Gordon Joughin (Dordrecht: Springer, 2009), 1–19.

⁸ David Balch, Robert Blanck, and David H. Balch, "Rubrics-Sharing the Rules of the Game," *Journal of Instructional Research* 5 (2016): 19–49; Jarene Fluckiger, "Single Point Rubric: A Tool for Responsible Student Self-Assessment," *Delta Kappa Gamma Bulletin* 76, no. 4 (2010): 18–25.

⁹ Heidi G. Andrade, "Teaching with Rubrics: The Good, the Bad, and the Ugly," *College Teaching* 53, no. 1 (2005): 27–30.

¹⁰ Bob Broad, *What We Really Value: Beyond Rubrics in Teaching and Assessing Writing* (Logan: Utah State University Press, 2003).

instruction and evaluating programs as key reasons.¹¹ Recently, the focus of rubrics has shifted gradually away from summative grading to formative purposes. A rubric can provide students with informative feedback on their strengths and weaknesses and prompts them to reflect on their own work. While it can be used as a mechanism to specify and communicate the expectations of an assignment to students, it can also be a secret scoring sheet used only by teachers to assess student work fairly, consistently, and efficiently.

Students generally favor the use of rubrics, whereas teachers tend to resist their use due to their 'limited conception of the purpose of a rubric.'¹² Some teachers do not see the need for a rubric, and many teachers find them to be too specific, too constraining, or too vague. Reddy and Andrade offer hope that 'teachers might be more receptive if they understand that rubrics can be used to enhance teaching and learning as well as to evaluate.'¹³ Among the reasons why students favor the use of rubrics, and in particular instructional rubrics, is because they provide informative feedback about students' strengths and highlight areas for improvement; ultimately, they support learning, good thinking, and the development of understanding and skills.¹⁴

There is a clear need to shift away from teacher-centered, summative rubrics to student-centered, formative rubrics. In this chapter, we will focus primarily on the use of instructional rubrics to achieve this shift. We will first discuss in more detail why rubrics matter, going beyond their use to achieve fair and consistent grading, to their use as instructional scaffolds. We will then identify and provide a framework for the construction of such rubrics before discussing how these rubrics can be most effectively used and how they impact teaching.

¹¹Y. Malini Reddy, and Heidi G. Andrade, "A Review of Rubric Use in Higher Education," *Assessment & Evaluation in Higher Education* 35, no. 4 (2010): 435–448, <https://doi.org/10.1080/02602930902862859>.

¹²Reddy and Andrade, "A Review of Rubric Use in Higher Education."

¹³Reddy and Andrade, "A Review of Rubric Use in Higher Education."

¹⁴Heidi G. Andrade, "Using Rubrics to Promote Thinking and Learning," *Educational Leadership* 57, no. 5 (2000): 13–18.

WHY DO RUBRICS MATTER?

In many Asian universities, including Singapore, professors often come from different cultural backgrounds from their students. Additionally, far from there being a singular Asian culture, there are many different cultures in most Asian university classrooms in part because students travel to other Asian nations for their education but also because so many Asian nations are themselves highly multicultural. **This diversity of the student and teacher population in Asian Universities—culturally, ethnically, socially, and linguistically—makes transparency ever more important to effective teaching.** Winkelmess, Boye, and Tapp argue that transparency in assignment design can overcome inequity in students' educational experiences.¹⁵ The characteristics of transparency and fairness embedded within rubrics make it a valuable tool in diverse higher education contexts such as in Asia.

Rubrics for Monitoring Fairness and Consistency

Rubrics offer the possibility of objective, consistent evaluation minimizing difference in grades even when multiple raters are involved in evaluating student work.¹⁶ In Jonsson and Svingby's review paper on rubrics, they conclude that 'reliable scoring of performance assessments can be enhanced by the use of rubrics, especially if they are analytic, topic-specific, and complemented with exemplars and/or rater training.'¹⁷

¹⁵ Mary-Anne Winkelmess, Allison Boye, and Suzanne Tapp, eds., *Transparent Design in Higher Education Teaching and Leadership: A Guide to Implementing the Transparency Framework Institution-Wide to Improve Learning and Retention* (Stirling: Stylus, 2019).

¹⁶ Mary E. Huba and Jann E. Freed, *Learner-Centered Assessment on College Campuses: Shifting the Focus from Teaching to Learning* (Needham Heights: Allyn and Bacon, 2000); Deborah Crusan, *Assessment in the Second Language Writing Classroom* (Ann Arbor: University of Michigan Press, 2010); Dannelle D. Stevens and Antonia J. Levi, *Introduction to Rubrics: An Assessment Tool to Save Grading Time, Convey Effective Feedback and Promote Student Learning* (Sterling: Stylus, 2013); and Brookhart, *How to Create and Use Rubrics for Formative Assessment and Grading*.

¹⁷ Jonsson and Svingby, "The Use of Scoring Rubrics: Reliability, Validity and Educational Consequences."

Rubrics offer the necessary transparency in providing students with clear, accessible, and understandable benchmarks for developing and judging their work. They clarify teacher's expectations and performance indicators through explicitly stated criteria, and show students how their work will be evaluated and what is expected of them.¹⁸ Students agree that the use of rubrics makes the grading process fair as they can easily verify if they have met the criteria or not.¹⁹ Students further report that they are less anxious and more confident in working on their assignments when expectations are clearly listed in the rubrics.²⁰

Rubrics improve students' self-efficacy by helping students identify the key cognitive skills that they need to develop to excel in the assignment. With these skills identified, students can plan and self-assess their work, and thus rubrics can be important tools in supporting students become self-regulated learners.²¹ However, this transparency in supporting students more effectively deliver what the teacher wants can encourage instrumentalism.²² Kohn argues that this instrumentalism is likely to narrow students' scope and restrict the development of skills beyond what is explicitly stated in the criteria.²³ A potential solution to this dilemma,

¹⁸ Robin Tierney and Marielle Simon, "What's Still Wrong with Rubrics: Focusing on the Consistency of Performance Criteria Across Scale Levels," *Practical Assessment, Research & Evaluation* 9, no. 2 (2004): 1–7; Anders Jonsson, "Rubrics as a Way of Providing Transparency in Assessment," *Assessment & Evaluation in Higher Education* 39, no. 7 (2014): 840–852; and Deborah Crusan, "Dance, Ten; Looks, Three: Why Rubrics Matter," *Assessing Writing* 26 (2015): 1–4.

¹⁹ Heidi G. Andrade and Ying Du, "Student Perspectives on Rubric-Referenced Assessment," *Practical Assessment, Research & Evaluation* 10, no. 5 (2005): 1–11.

²⁰ Andrade and Du, "Student Perspectives on Rubric-Referenced Assessment."

²¹ Ernesto Panadero, "Instructional Help for Self-Assessment and Self-Regulation: Evaluation of the Efficacy of Self-Assessment Scripts vs. Rubrics" (Unpublished PhD diss., Universidad Autónoma de Madrid, 2011); Ernesto Panadero and Anders Jonsson, "The Use of Scoring Rubrics for Formative Assessment Purposes Revisited: A Review," *Educational Research Review* 9 (2013): 129–144; Anastasia Efklides, "Interactions of Metacognition with Motivation and Affect in Self-Regulated Learning: The MASRL Model," *Educational Psychologist* 46, no. 1 (2011): 6–25; and Barry J. Zimmerman, "Self-Regulated Learning and Academic Achievement: An Overview," *Educational Psychologist* 25, no. 1 (1990): 3–17.

²² Harry Torrance, "Assessment as Learning? How the Use of Explicit Learning Objectives, Assessment Criteria and Feedback in Post-secondary Education and Training Can Come to Dominate Learning," *Assessment in Education: Principles, Policy & Practice* 14 (2007): 281–294.

²³ Alfie Kohn, "The Trouble with Rubrics," *English Journal* 95, no. 4 (2006): 12–16.

as noted by Torrance, is to move from summative assessment of learning through formative assessment for learning to experiential assessment as learning.²⁴

Rubrics as Scaffolds for Assessment as Learning

Assessment tasks tend to focus primarily on monitoring and evaluating student learning, but most often provide little or no scaffold to promote learning. Teachers who advocate assessment as learning confirm that **rubrics can teach as well as evaluate**.²⁵ Andrade laments that ‘rubrics used only to assign grades represent not only a missed opportunity to teach but also a regrettable instance of the teacher as-sole-judge-of-quality model that puts our students in a position of mindlessness and powerlessness.’²⁶ Using rubrics, teachers can explicitly list the assessment criteria to enhance the alignment of learning, instruction, and assessment.²⁷ In a student-centered approach, the rubric is shared and at times cocreated with students to support student learning.²⁸ Students can then use rubrics to plan their assessment task, clarify targets, determine and focus effort where needed, identify issues related to the task, regulate the process in the effort to produce high-quality work.²⁹ For example, Broad argues that rubrics ‘may have done more good for writing assessment and the teaching of writing than any other concept or technology’ when used as a scaffold.³⁰

²⁴ Torrance, “Assessment as Learning?”

²⁵ Judith Arter and Jay McTighe, *Scoring Rubrics in the Classroom: Using Performance Criteria for Assessing and Improving Student Performance* (Thousand Oaks: Sage, 2001); Panadero and Jonsson, “The Use of Scoring Rubrics for Formative Assessment Purposes Revisited”; Reddy and Andrade, “A Review of Rubric Use in Higher Education.”

²⁶ Andrade, “Teaching with Rubrics: The Good, the Bad, and the Ugly.”

²⁷ John Biggs and Catherine Tang, *Teaching for Quality Learning at University* (Maidenhead: Open University Press, 2007).

²⁸ Jonsson, “Rubrics as a Way of Providing Transparency in Assessment.”

²⁹ Reddy and Andrade, “A Review of Rubric Use in Higher Education”; Fred C. Bolton, “Rubrics and Adult Learners: Andragogy and Assessment,” *Assessment Update* 18, no. 3 (2006): 5–6.

³⁰ Broad, *What We Really Value*.

Rubrics act as pre-assessment narratives that set clear expectations and visual cues to allow students to plan their response to a task. With standardized criteria of what constitutes good performance clearly stated, students use rubrics as a self-assessment tool to interrogate the assessment and monitor the quality of their own work.³¹ With continued use of rubrics, students quickly start to notice patterns of recurring problems. This self-discovery and critical reflection of their own learning process can lead to self-improvement. In so doing, rubrics become part of a formative, student-centered approach to assessment. Rubrics initiate this approach by communicating and clarifying the teacher's expectations to the students, and thus these explicit expectations can set in motion a process that can lead to improved student performance.

Feedback is the most effective scaffold to improve student work, and particularly when it is targeted at a specific assessment task, given regularly during students' performance of the task or immediately after the completion of the task.³² Feedback is effective only when it contains concrete information on how the highest level of performance can be achieved rather than simply evaluating the current level of work. Huba and Freed suggest that rather than 'emphasizing grades in assessment, the focus should be on descriptive feedback for improvement. Feedback that focuses on self-assessment and self-improvement is a form of intrinsic motivation.'³³ If meaningful feedback is provided in a timely manner, students are motivated to make positive changes in their current and subsequent work. However, the longer the delay in feedback, the less effective the feedback will be on performance.

Providing timely feedback alone is not sufficient; students need to be adequately prepared to use the detailed feedback. Detailed feedback on the rubric is useful in analyzing where students' strengths and weaknesses lie and helps students identify the areas that need work so as to set their own plans for improvement. Feedback should never be provided as a means for a one-time quick fix, but rather be considered as a continuous

³¹ Andrade and Du, "Student Perspectives on Rubric-Referenced Assessment"; Dawson, "Assessment Rubrics: Towards Clearer and More Replicable Design, Research and Practice"; and Sadler, "Transforming Holistic Assessment and Grading into a Vehicle for Complex Learning."

³² Paul Black and Dylan Wiliam, "Assessment and Classroom Learning," *Assessment in Education: Principles, Policy & Practice* 5, no. 1 (1998): 7–74.

³³ Huba and Freed, *Learner-Centered Assessment on College Campuses*, 59.

process with repeated instances of feedback and opportunities to change students' self-perceptions and behavior.³⁴

Maximizing improved student performance through the use of rubrics requires teachers to go beyond being merely prescriptive. Although rubrics set the expectations for a task, it is unwarranted to assume that all students will understand what is expected of them, or how they should approach the task. Torrance argues that students are more likely to succeed when assessment tasks have greater clarity on process, criteria and how the tasks are to be graded, coupled with more detailed assistance from teachers on how to achieve a particular grade or result.³⁵ In that same vein, Rezaei and Lovorn found that without training regarding effective rubric use, reliability or validity will likely not improve.³⁶ Students need help in understanding rubrics and must be taught how to actively use a rubric.³⁷ Discussing with students the techniques that can help them understand how to use different grading tools and engaging them in activities that teach them the benefits of grading tools is necessary for students to use rubrics effectively. A further powerful approach is to cocreate the rubric with the students. Andrade describes the cocreation of a rubric in her own teaching practice.³⁸ The cocreation process begins with discussing strong and weak examples of student work, and then asking the students to 'brainstorm criteria for their own work.' Andrade then uses the resulting list of criteria to draft a rubric, before eliciting comments from the students.³⁹ As pointed out by Huba and Freed, this process helps build consensus about the meaning of the criteria to be used in the rubric. They further note that including 'students' ideas in the final rubric conveys respect for students as people and builds student ownership for learning.'⁴⁰

³⁴ Black and Wiliam, "Assessment and Classroom Learning."

³⁵ Torrance, "Assessment as Learning?"

³⁶ Ali Reza Rezaei and Michael Lovorn, "Reliability and Validity of Rubrics for Assessment Through Writing," *Assessing Writing* 15, no. 1 (2010): 19–39.

³⁷ Reddy and Andrade, "A Review of Rubric Use in Higher Education."

³⁸ Andrade, "Teaching with Rubrics: The Good, the Bad, and the Ugly."

³⁹ Andrade, "Using Rubrics to Promote Thinking and Learning."

⁴⁰ Huba and Freed, *Learner-Centered Assessment on College Campuses*, 170.

HOW TO CREATE THE ELEMENTS OF A HIGH-QUALITY RUBRIC?

Creating rubrics can be both time consuming and conceptually difficult depending on the type of rubric.⁴¹ However, the process for developing a rubric, no matter the type, follows a similar set of steps⁴²: (a) define the learning outcomes of the module; (b) describe the assessment tasks that cover these learning outcomes; and, (c) identify the criteria and standards of performance for these assessment tasks. In starting from the learning outcomes of a course, this process is similar to the backward design approach used in course development and recognizes the importance of alignment with the learning outcomes.⁴³ It is the criteria and standards of performance that constitute the rubric, but formulating these is not a trivial task.

Figure 3.1 details the procedure for rubric development and how it fits into course design by building on the assessment process of Huba and Freed.⁴⁴

In this rubric development procedure, the critical step is to identify the criteria and standards for the rubric. It is rarely necessary to build rubrics from scratch, instead referring to rubric samples can be a first step to developing a new rubric. There are many examples of rubrics that can be found on the web. One good collection is the set of rubrics developed under the VALUE (Valid Assessment of Learning in Undergraduate Education) project by the Association of American Colleges and Universities.⁴⁵ However, such sample rubrics should never be used as is, even when being used for a similar assignment. The practice of ‘adopt and

⁴¹ Balch, Blanck, and Balch, “Rubrics-Sharing the Rules of the Game.

⁴² Craig A. Mertler, “Designing Scoring Rubrics for Your Classroom,” *Practical Assessment, Research and Evaluation* 7, no. 25 (2001); Deborah Allen and Kimberly Tanner, “Rubrics: Tools for Making Learning Goals and Evaluation Criteria Explicit for Both Teachers and Learners,” *CBE Life Sciences Education* 5, no. 3 (2006): 197–203; and Y. M. Reddy, “Effect of Rubrics on Enhancement of Student Learning,” *Journals of Education* 7, no. 1 (2007): 3–17.

⁴³ Grant P. Wiggins and Jay McTighe, *Understanding by Design* (Alexandria: Association for Supervision and Curriculum Development, 2005); Biggs and Tang, *Teaching for Quality Learning at University*.

⁴⁴ Huba and Freed, *Learner-Centered Assessment on College Campuses*, 10.

⁴⁵ Terrel L. Rhodes, ed., *Assessing Outcomes and Improving Achievement: Tips and Tools for Using Rubrics* (Washington: Association of American Colleges and Universities, 2010).

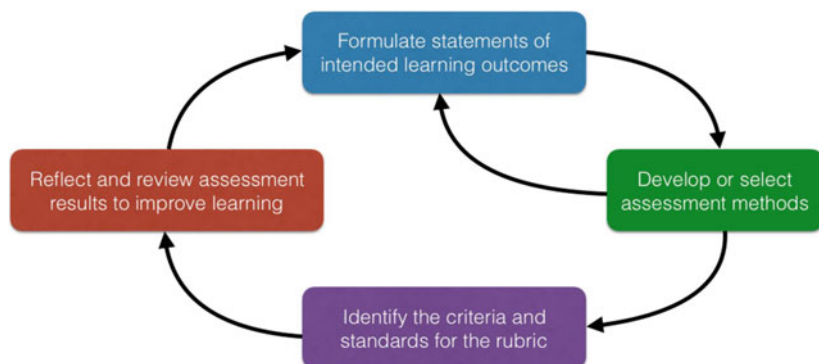


Fig. 3.1 Rubric development as part of course design (adapted from Huba and Freed, 2000)

adapt⁴⁶ can be a useful strategy when faced with the task of developing a rubric. In this approach, a complete working rubric is adopted and then adapted to suit the assessment context. The adaptation process begins by reflecting on the assessment task and the new context for which the rubric is being adapted. This context is twofold: first, the rubric needs to capture what is expected from the students; and second, how the teacher expects to grade the task. In the adaptation, the criteria and standards can be retained, but the performance level descriptions should be adapted to the new context. A rich source for these descriptions can be the feedback provided to students in previous assignments. Most times, teachers end up giving the same or similar feedback to students at various levels of performance, and these consistent evaluative judgments can then be easily translated into the intended proficient standards expected from students.

The rubric development process is never over but always evolving.⁴⁷ **Banerjee et al. recommend regular monitoring and modification of rubrics to ensure reliability, validity, and usability**⁴⁸ Monitoring will include evaluating the degree to which ‘the scale was functioning and in which

⁴⁶ Crusan, *Assessment in the Second Language Writing Classroom*, 72.

⁴⁷ Balch, Blanck, and Balch, “Rubrics-Sharing the Rules of the Game.”

⁴⁸ Jayanti Banerjee, Yan Xun, Mark Chapman, and Heather Elliott, “Keeping Up with the Times: Revising and Refreshing a Rating Scale,” *Assessing Writing* 26 (2015): 5–19, <https://doi.org/10.1016/j.asw.2015.07.001>.

parts.⁴⁹ This requires sense-making sessions with peers and students as partners ‘where they are presented with descriptive facts against each evaluation criteria and are involved in a process of determining how well criteria have been achieved.’⁵⁰ This approach can increase the transparency in evaluation and grading and can form the basis for rubric refinement. Modification of rubrics necessitates a systematic review and revision process. Studies suggest an approach that combines expert intuition, knowledge and experience needs to be employed in the review and revision process.⁵¹ This involves an understanding of success indicators for the assessment task based on evidence from literature, an empirical analysis of past student performance data, and the study of different task samples from the past assignment submissions.

HOW TO USE RUBRICS EFFECTIVELY?

The use of rubrics is not without criticism; many have argued that rubrics can be too subjective, too vague or too detailed, or that they can restrict students’ understanding of learning and their ability to self-regulate.⁵² Poorly designed rubrics can also ‘misdirect student efforts and mis-measure learning.’⁵³ Students need to understand how to approach and react to different practices of using rubrics-based assessments. Teachers can overcome such challenges and support students through careful planning. In this section, we provide some examples of how to make use of rubrics effectively.

⁴⁹ Gerriet Janssen, Valerie Meier, and Jonathan Trace, “Building a Better Rubric: Mixed Methods Rubric Revision,” *Assessing Writing* 26 (2015): 51–66. <https://doi.org/10.1016/j.asw.2015.07.002>.

⁵⁰ Pauline Dickinson and Jeffery Adams, “Values in Evaluation—The Use of Rubrics,” *Evaluation and Program Planning* 65 (2017): 113–116.

⁵¹ Banerjee, Yan, Chapman, and Elliott, “Keeping Up with the Times”; Janssen, Meier, and Trace, “Building a Better Rubric”; and Dickinson and Adams, “Values in Evaluation—The Use of Rubrics.”

⁵² Torrance, “Assessment as Learning?”; Lene Nordrum, Katherine Evans, and Magnus Gustafsson, “Comparing Student Learning Experiences of In-text Commentary and Rubric-Articulated Feedback: Strategies for Formative Assessment,” *Assessment & Evaluation in Higher Education* 38, no. 8 (2013): 919–940; and Brookhart, “Appropriate Criteria: Key to Effective Rubrics.”

⁵³ Brookhart, “Appropriate Criteria: Key to Effective Rubrics.”

Table 3.1 Single-point rubric as an instructional scaffold^a

<i>Assignment criteria</i>	<i>Concerns Areas that need work</i>	<i>Criteria Standards for proficient student performance</i>	<i>Advanced Evidence of exceeding standards</i>
Criteria #1		Description reflecting achievement of mastery level of performance for criteria #1	
Criteria #2		Description reflecting achievement of mastery level of performance for criteria #2	
Criteria #3		Description reflecting achievement of mastery level of performance for criteria #3	

^aAdapted from Fluckiger, “Single Point Rubric”; Balch, Blanck, and Balch, “Rubrics-Sharing the Rules of the Game”

A student-centered learning environment creates opportunities for students to showcase their creativity, push them beyond their comfort zone, and more importantly learn from their mistakes. For example, a well-crafted single-point rubric, as shown in Table 3.1, can be one such instructional scaffold. It offers clarity of the assessment task along with clear guidance and support, which according to Hockings et al. are necessary to enhance independent learning.⁵⁴ It not only makes the process and expectations of disciplinary knowledge and communication transparent to students, but also opens new possibilities for the teacher to create

⁵⁴Christine Hockings, Liz Thomas, Jim Ottaway, and Rob Jones, “Independent Learning—What We Do When You’re Not There,” *Teaching in Higher Education* 23, no. 2 (2018): 145–161, <https://doi.org/10.1080/13562517.2017.1332031>.

a significant learning experience that helps students develop higher-level extending and applying skills.⁵⁵

Like holistic and analytic rubrics, a single-point rubric breaks down the assessment tasks into categories and outlines the standards for proficient student performance, but deliberately leaves open-ended the areas for success and shortcomings. Thus, a single-point rubric does not impose boundaries on student performance, instead offers flexibility in setting their own learning goals and promotes student creativity without sacrificing clarity. As Fluckiger notes, it ‘allows time for goal setting and revision, provides a place for noting current status, and sets an expectation of initiative and innovation.’⁵⁶ It also emphasizes descriptive, personalized feedback specific to individual students and has the power to create a significant learning experience that challenges the focus on grades inherent in analytic rubrics. Thus, a single-point rubric acts as: (a) a process scaffold to support students in tackling complex assignments by breaking them down into smaller components; (b) a critical thinking scaffold to demand sophisticated thinking in students; and, (c) a disciplinary practice scaffold to induct students into the professional discourse and practice of their discipline.⁵⁷

Initiating classroom discussion using single-point rubrics prior to the start of an assignment can prompt reflection and promote scholarly critical thinking.⁵⁸ The intentionally blank open-ended spaces used to record areas of concern and excellence can stimulate discussion on the thought processes, analyses and judgments for each of the components and generate pre-assessment narratives. Reitmeier and Vrchota discuss the use of such exercises for deeper reflection not only to help students identify and achieve baseline knowledge, but also to be aware of how they meet

⁵⁵ L. Dee Fink, *Creating Significant Learning Experiences: An Integrated Approach to Designing College Courses* (San Francisco: Jossey-Bass, 2003).

⁵⁶ Fluckiger, “Single Point Rubric.”

⁵⁷ Allyson Skene and Sarah Fedko, *Instructional Scaffolding* (University of Toronto Scarborough: Centre for Teaching and Learning, 2014).

⁵⁸ Jon F. Schamber and Sandra L. Mahoney, “Assessing and Improving the Quality of Group Critical Thinking Exhibited in the Final Projects of Collaborative Learning Groups,” *The Journal of General Education* 55, no. 2 (2006): 103–137, <http://dx.doi.org/10.1353/jge.2006.0025>.

the proficient standards and to provide evidence for how they have gone above and beyond proficient standards.⁵⁹

Turning now to rubrics in general, Sadler argues that the listed criteria may not mean the same thing to all students and may not be specific enough to guide student thinking.⁶⁰ Rubrics may not always be self-explanatory, and so it is good practice to do a mock critique in a class using exemplars, taken for instance from previous years' work, that have gone through the same marking and feedback process.⁶¹ As a variation, Blommel and Abate suggest the use of published journal articles as exemplars for such critiques.⁶² Mock critiques help students understand the nature of the assessment task and signal the expected quality required to excel. Lipnevich et al. investigated the efficacy of providing detailed rubrics and written exemplars and found that such practice does indeed lead to substantial improvement in student performance.⁶³ Nordrum, Evans, and Gustafsson extended this practice by providing commented exemplars and explanations for the grade the exemplar was assessed to merit.⁶⁴ Mock critiques can further be used as tools for peer assessment and peer feedback. Getting students ready to be engaged in peer assessment is a two-stage process: The first stage involves familiarizing students with the rubric for reflection and critique of their own work and the second stage involves providing detailed feedback to peers. This approach recognizes the powerful learning that takes place when receiving and giving peer feedback, in particular for the development of evaluative judgment. Nicol et al. further suggest that the provider of feedback can benefit

⁵⁹ Cheryl A. Reitmeier and Denise A. Vrchota, "Self-Assessment of Oral Communication Presentations in Food Science and Nutrition," *Journal of Food Science Education* 8, no. 4 (2009): 88–92.

⁶⁰ D. Royce Sadler, "The Futility of Attempting to Codify Academic Achievement Standards," *Higher Education* 67 (2014): 273–288, <https://doi.org/10.1007/s10734-013-9649-1>.

⁶¹ Dawson, "Assessment Rubrics: Towards Clearer and More Replicable Design, Research and Practice."

⁶² Matthew L. Blommel and Marie A. Abate, "A Rubric to Assess Critical Literature Evaluation Skills," *American Journal of Pharmaceutical Education* 71, no. 4 (2007): 63.

⁶³ Anastasiya A. Lipnevich, Leigh N. McCallen, Katherine P. Miles, and Jeffrey K. Smith, "Mind the Gap! Students' Use of Exemplars and Detailed Rubrics as Formative Assessment," *Instructional Science* 42 (2014): 539–559.

⁶⁴ Nordrum, Evans, and Gustafsson, "Comparing Student Learning Experiences of In-text Commentary and Rubric-Articulated Feedback."

more than the receiver, as it is in the provision of feedback that evaluative judgment is exercised.⁶⁵

By integrating rubrics into assignments, students can self-assess their own work using a rubric and attach their marked rubric along with the assignment for grading. Recurring use of rubrics in a course that offers multiple opportunities for students to use them in assignments is an effective method to improve student learning. Such use can shape the formation of criteria in which the work is graded and can support the process of designing and developing co-constructed analytic rubrics, which can be ‘powerfully instructive.’⁶⁶

Thus, rubrics help in providing timely feedback that is detailed, diagnostic, easier-to-read, personalized, and specific to each student’s work. Teachers can simply circle or check the appropriate descriptions that apply, while also adding in targeted comments only when needed. This makes the grading process both fairer and more efficient. In this way, rubrics are excellent tools that allow for easy tracking of student progress and improvement over time, promoting self-assessment and self-improvement.

HOW RUBRICS CAN IMPACT YOUR TEACHING PRACTICE?

Beyond making assessments fair, transparent and consistent, teachers who advocate the use of rubrics report that they make a significant impact in encouraging and enabling reflective practice, see for example the review by Jonsson and Svingby.⁶⁷ Such advocates argue that **rubrics provide insight into the effectiveness of their teaching practice**. Huba and Freed suggest several ways in which rubrics can become excellent ‘instructional illuminators’ to enhance instructional quality⁶⁸:

⁶⁵ David Nicol, Avril Thomson, and Caroline Breslin, “Rethinking Feedback Practices in Higher Education: A Peer Review Perspective,” *Assessment & Evaluation in Higher Education* 39, no. 1 (2014): 102–122, <https://doi.org/10.1080/02602938.2013.795518>.

⁶⁶ Andrade, “Using Rubrics to Promote Thinking and Learning.”

⁶⁷ Jonsson and Svingby, “The Use of Scoring Rubrics: Reliability, Validity and Educational Consequences.”

⁶⁸ Huba and Freed, *Learner-Centered Assessment on College Campuses*; Popham, “What’s Wrong—And What’s Right—With Rubrics.”

1. Foremost is the need to design rubrics that are clearly aligned with learning outcomes. This alignment helps teachers gain greater clarity on both content and outcomes as they are focused on what they want their students to learn rather than on what they intend to teach.
2. Rubrics steer teachers toward being learning- and learner-centric rather than being task-centric. Referencing overall rubric results in class can be an excellent way of addressing class problems by not singling out individual students. Rubrics showing student development over time can help teachers gain a clearer view of teaching, specifically blind spots, omissions, and strengths.
3. **Revision of rubrics takes place as teachers gather information** and capture areas of concern in students' understanding of criteria, students' quality of work, and as teachers reflect on the difficulty in assessing and scoring student work. These can be used as teaching moments to teach or talk about the issues that are important and how such issues can be corrected. Not only does such information help in revising rubrics, it also supports the reviewing of teaching strategies and learning activities, or may even lead to the revision of learning outcomes. Rubrics can thus lead to a cycle of continuous improvement.
4. Teachers can also share their own rubrics and rubrics-articulated feedback with colleagues to initiate dialogue about teaching that can lead to rubric cocreation and development through collaboration. Not only will it promote a careful yet faster review and revision process but may also lead to the development of department-wide and/or institution-wide rubrics that represent common practices of particular interpretations of the discipline. More importantly, the signaling to students is coherent with regard to the quality of work expected of them from their teachers for most of the courses and emphasize the discipline-specific qualities that they need to develop to become experts in that area.
5. Teachers tend to associate a set of rubrics to one assignment, but it is certainly possible to learn a great deal about one's teaching methods and student learning across multiple assignments, and across multiple courses. This cross-sectional analysis can be used to identify areas for improvement in one's teaching. This analysis can also be used as persuasive evidence of teaching improvement in annual review, and in application for promotion and tenure.

Table 3.2 Teacher summary rubric for teaching improvement^a

<i>Assignment criteria</i>	<i>Summary of student performance on various aspects/components</i>		<i>Summary of changes to mediate teaching improvement</i>	
	<i>Areas that are of concern</i>	<i>Areas that exceeded expectations</i>	<i>Changes to instruction</i>	<i>Changes to assignment</i>
Criteria #1				
Criteria #2				
Criteria #3				

^aAdapted from Stevens and Antonia Levi, *Introduction to Rubrics*

A strategy to support this process of reflection and revision for teaching improvement can involve the use of a teacher summary rubric (Table 3.2). Teacher summary rubrics condense how students completed an assignment in terms of accomplishing specific learning goals and understanding their discipline. Summary rubrics can be completed while grading the assignment with an assessment rubric. The patterns that develop under each of the criteria can help teachers identify the strengths and weaknesses of the assignment. Improvements to the assignment can then be developed and overall teaching practice can be modified to support better student learning. This strategy is an efficient way to check the alignment between course objectives and student learning, and to gather meaningful feedback on the overall class performance.

CONCLUDING REMARKS

Rubrics support the process of both summative and formative assessments. They are excellent tools for grading and judgment evaluation when used as scoring rubrics but can also be effective tools to explicate the learning and teaching processes when used as instructional rubrics. Scoring rubrics are primarily grading tools that are effective in providing objective and consistent assessment of student work. They provide teachers a mechanism to score reliably, make valid judgments, and rationalize the grades awarded. They clarify teacher expectations and inform students on how to meet them in an easy-to-follow visual format. They facilitate transparency in instruction by making objectives and criteria explicit to students that are consistent with teaching goals. The

feedback that students receive through scoring rubrics can help them improve their performance on subsequent work. Such transparency and feedback increase student self-confidence, self-efficacy, self-awareness, and self-determination.⁶⁹

Instructional rubrics embody the clear shift from teacher-centered, summative assessments to student-centered, formative assessments. They promote student achievement by allowing both students and teachers to use evaluative judgments and assessment results as means to further student learning. They help teachers provide productive, targeted feedback, and prompt students' active involvement in making sense and engaging with feedback for ongoing improvement. They prompt students to continuously self-evaluate their work against specific criteria through reflection and action on feedback. While teachers are the enablers of facilitating student feedback literacy, students are the architects of utilizing such feedback for reflection and action.⁷⁰ Instructional rubrics, and in particular, single-point rubrics are excellent scaffolding tools that support such student engagement with feedback and favor the process of assessment as learning. Further, they demand students' cognitive thinking and develop students' disciplinary expertise and promote the use of assessment for new learning. Thus, holistically designed instructional rubrics scaffold the processes of self-assessment and self-regulated learning, and enable students to achieve specific outcomes of an assessment task and demonstrate what has been learned and achieved.⁷¹ Finally, rubrics also promote the process of peer assessment and peer feedback by improving their ability to judge and provide feedback to their own and their peers' work, thus changing students' perspectives on their own abilities and potential.

Rubrics allow teachers to: (a) summarize student performance; (b) tabulate student accomplishment of learning goals; (c) disaggregate student scores by specific criteria and skills; and, (d) identify patterns of

⁶⁹ Winkelmess, Boye, and Tapp, *Transparent Design in Higher Education Teaching and Leadership*.

⁷⁰ David Carless, "Feedback Loops and the Longer-Term: Towards Feedback Spirals," *Assessment & Evaluation in Higher Education* 44, no. 5 (2019): 705–714, <https://doi.org/10.1080/02602938.2018.1531108>.

⁷¹ David Boud and Rebecca Soler, "Sustainable Assessment Revisited," *Assessment & Evaluation in Higher Education* 41, no. 3 (2016): 400–413, <https://doi.org/10.1080/02602938.2015.1018133>.

strengths and weaknesses of students' work and of the assignments themselves. Thus, rubrics provide teachers with a greater understanding of their own teaching practice and encourage teachers to become reflective practitioners.

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