Teaching Orientation @ Ohio State: Session Agenda

College Teaching Topics: Fair and Efficient Grading

Coordinator: UCAT Staff, ucat@osu.edu
Date:........... Autumn
Duration:...... 1 hour, 15 minutes

Rationale
In this session, participants will learn grading techniques that provide appropriate and clear feedback to students and maintain fairness. They will also learn ways to be more efficient in grading.

Objectives
By the end of this session, participants will:

- Have developed and learned how to use a rubric to make their grading more effective and fair.
- Have learned how to use rubrics to improve student learning.
- Have practiced using rubrics in grading.
- Have been introduced to additional ways to make their grading more efficient and fair.

Timeline
The structure of this agenda must be followed in the order given. Options for activities within each section are provided on the following pages. (Facilitators can write the specific times that they will be teaching in the blanks below)

_____ - _____  (5 minutes)  Activity 1: Icebreaker/Introduction
_____ - _____  (5 minutes)  Activity 2: Grading Mysteries Video
_____ - _____  (5 minutes)  Activity 3: Candy Problem
_____ - _____  (5 minutes)  Activity 4: Discussing the Goal of Grading
_____ - _____  (10 minutes)  Activity 5: What Is a Rubric?
_____ - _____  (10 minutes)  Activity 6: Practice Using Rubrics
_____ - _____  (10 minutes)  Activity 7: Constructing a Rubric
_____ - _____  (5 minutes)   Activity 8: Discuss Rubric with a Partner
_____ - _____  (10 minutes)  Activity 9: Beyond the Rubric: Other tips
_____ - _____  (5 minutes)   Activity 10: Closing Discussion/Additional Resources

Other Details
I will be presenting in Central Classroom Building, room #___________________________

Materials
DVDs:
   Grading Mysteries: In this 2 minute clip, 3 students compare the grades and feedback that they have received on the same assignment – they think that grades are like 'a roll of the dice' – you never know what you are going to get each time.
Overheads (and flash drive):
  - The Candy Problem
  - Minimal Rubric Example
  - Rubric with Full Description of Each Scoring Level
  - Rubric with Full Description of Each Scoring Level for Title Trait
  - Scores for Science Experiment Titles
  - Titles of Science Experiments

Handouts (and flash drive)
  - Practice Grading Using a Rubric
  - Blank Rubric
  - Suggestions for Grading

Flash drive:
  - Suggestions for Grading
  - Additional Resources on Fair and Efficient Grading

Notes:

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Activities

Activity #1 – Introduction (5 minutes)
Introduce yourself to the participants. Do a quick survey to find out in what context they will be grading if they know (i.e., for an independent course, as a TA for faculty member, in a course with parallel sections, etc.). This will help you gear this session to your audience.

Activity #2: Grading Mysteries Video (Video is 2-minutes long) (5 minutes)
When students receive their graded assignments and tests back, they should expect to see indications of why they received the grades they did. Therefore, communication on the paper between the grader and student needs to be clear. This is particularly important in situations when the grader does not have direct contact with the students (as happens in many science and engineering classes). View the vignette Grading Mysteries and pose the following questions to seed a discussion:

What issues do you see illustrated in this situation?
What guidelines can you suggest for giving students effective feedback on their work? for returning assignments?

Activity #3 – Candy Problem (5 minutes)
A key issue in determining how to grade is knowing what the expectations are for the students. Is it up to the student to explicitly show or tell the grader what she or he knows, or can the grader make assumptions about the student’s knowledge? When grading quantitative problems, what happens if a student gets the right answer using the wrong method? When grading an essay, what do you do if a student uses all the right words and phrases, but you’re not convinced that they actually understand the topic at the level you want them to?

To get participants thinking about these issues, show them The Candy Problem overhead. Ask them to grade each of the two solutions (out of 10 points). Then take a poll:
- Raise your hand if 1 should get a higher grade than 2.
- Raise your hand if 2 should get a higher grade than 1
- Raise your hand if they should get equal grades

Have some TAs explain their thought process, then use this to seed a discussion on possible grading expectations.

Point out explicitly that for those grading for another instructor, they need to find out how that supervisor views this issue, so that they grade in a manner acceptable to the supervisor. Additionally, for those grading as part of a team, the team should discuss these expectations so that grading is done in a consistent manner. Also, it is crucial that these decisions be made
before the assessment is given, so that the expectations are clearly communicated to the students before they are assessed.

Also point out that having clear grading expectations can speed up the grading process by making it more efficient. Developing an assignment rubric for your independent class or in collaboration if you are grading as part of a team can be a helpful tool.

Activity #4 – Discussing the Goal of Grading
(5 minutes)
Discuss how the goal of grading is to assess student learning, not to simply put a letter grade on something. As Walvoord and Anderson write in *Effective Grading* (2010:1):

> By *grading*, we mean not only bestowing an *A* or a *C* on a piece of student work. We also mean the process by which a teacher assesses student learning through classroom tests and assignments, the context in which good teachers establish that process, and the dialogue that surrounds grades and defines their meaning to various audiences. Grading encompasses tailoring the test or assignment to the learning goals of the course, establishing criteria and standards, helping students acquire the skills and knowledge they need, assessing student learning over time, shaping student motivation, planning course content and teaching methods, using in-class and out-of-class time, offering feedback so students can develop as thinkers and writers, communicating about students’ learning to appropriate audiences, and using results to plan improvement in the classroom, department, and institution. When we talk about grading, we have student learning most in mind.

- Does it make more sense now why it can be so time consuming and frustrating? However, the purpose of this session is to make it less time consuming and more rewarding for you and your students.

Activity #5: What Is a Rubric?
(10 minutes)
One of the best practices for grading both fairly and efficiently is to use a rubric. Does anyone know what a rubric is or what it is used for? (Just get a quick show of hands to ensure understanding of the term *rubric.* It is not necessary to have participants share their experiences. For the sake of time, just introduce it as a way to increase fairness and efficiency in grading)

- Walvoord and Anderson (2010:39) define rubric as follows:

  > The term *rubric* is widely used to refer to a format in which the traits of the student’s work are separately named, and each trait is evaluated according to a scale from low to high.

- Show participants the *Minimal Rubric Example* (overhead) from Walvoord and Anderson (2010:40)

<table>
<thead>
<tr>
<th>Rubric for a Business Management Case Analysis: Analysis of the Firm’s Goals</th>
<th>5</th>
<th>4</th>
<th>3</th>
<th>2</th>
<th>1</th>
</tr>
</thead>
<tbody>
<tr>
<td>The statement about goals is consistent</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

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The writer presents sufficient and clearly organized evidence for the summary of the firm’s goals.

The writer has chosen the most important or primary goals.

- The items in the left-hand column are the traits of the student’s work that the instructor is going to evaluate.

- Show participants the Rubric with Full Description of Each Scoring Level for Title Trait overhead from Walvoord and Anderson (2010:41)

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### Rubric with Full Descriptions of Each Scoring Level

**Assignment:** Design and conduct an original scientific experiment and write a report using scientific format

#### Trait: Title

<table>
<thead>
<tr>
<th>Level</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Level 5</td>
<td>Is appropriate in tone and structure to a science journal; contains all necessary descriptors for placement in a scientific database; contains necessary brand names; identifies functions of experimentation; allows reader to anticipate design.</td>
</tr>
<tr>
<td>Level 4</td>
<td>Is appropriate in tone and structure to science journal; contains most descriptors; identifies function and brand names; suggests aspects of design.</td>
</tr>
<tr>
<td>Level 3</td>
<td>Identifies function and brand name but does not allow reader to anticipate design.</td>
</tr>
<tr>
<td>Level 2</td>
<td>Identifies function or brand name, but not both; lacks design information or is misleading.</td>
</tr>
<tr>
<td>Level 1</td>
<td>Is patterned after another discipline or missing.</td>
</tr>
</tbody>
</table>

#### Trait: Methods and Materials Section

<table>
<thead>
<tr>
<th>Level</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Level 5</td>
<td>Contains appropriate, quantifiable, concisely organized information that allows the experiment to be replicated. All information in the report can be related back to this section. Identifies sources of data. Sequences information appropriately. No wordiness.</td>
</tr>
<tr>
<td>Level 4</td>
<td>As above, but contains unnecessary information or wordiness.</td>
</tr>
<tr>
<td>Level 3</td>
<td>Experiment could be replicated from the information given. All information in the report can be related back to this section. However, fails to identify some data sources or has problematic sequencing.</td>
</tr>
<tr>
<td>Level 2</td>
<td>Marginally replicable. Parts of the basic design must be inferred. Procedures not quantitatively described. Some information in Results or Conclusions sections cannot be anticipated by reading this section.</td>
</tr>
<tr>
<td>Level 1</td>
<td>Describes experiment so poorly it cannot be replicated.</td>
</tr>
</tbody>
</table>

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- So using your own words, who can explain these rubrics and how they are used in grading?

- For those of you who have used rubrics before, how have they made grading more efficient and/or fair?

Possible points to cover:
1. Eliminated worry about if the grade I gave to the student was the right one.
2. Gave me a standard comparison for all the assignments instead of just making the best paper an A.
3. Stress that rubrics can be used in many different contexts for many different types of assignments, from showing work on a problem as the Candy Problem to an essay to a presentation.
4. Etc.

**Activity # 6: Practice Using Rubrics**

*(10 minutes)*

Prepare participants to use a rubric by showing the **Titles of Science Experiments** overhead. Explain that These are titles of student experiments that they will be grading using a rubric. Distribute the **Practice Grading Using a Rubric** handout and have participants grade the titles as you show the **Rubric with full Description of Each Scoring Level for Title Trait**.

<table>
<thead>
<tr>
<th>Report</th>
<th>Title</th>
</tr>
</thead>
<tbody>
<tr>
<td>U</td>
<td>Comparison of Prell and Suave Shampoo</td>
</tr>
<tr>
<td>V</td>
<td>The Battle of the Suds: Budweiser and Weiderman Beer</td>
</tr>
<tr>
<td>W</td>
<td>Would You Eat Machine-Made or Homemade Cookies?</td>
</tr>
<tr>
<td>Y</td>
<td>Research to Determine the Better Paper Towel</td>
</tr>
<tr>
<td>Z</td>
<td>A Comparison of Amway Laundry Detergent and Tide Laundry Detergent for Characteristics of Stain Removal, Fading, Freshness, and Cloth Strength</td>
</tr>
</tbody>
</table>

- Be sure to keep to keep the Rubric with Full Description of Each Scoring Level showing so participants can grade the titles using

- After giving the chance to grade, share the results provided by Walvoord and Anderson (2010:43) in the **Scores for Science Experiment** overhead.

**Overhead 4**

<table>
<thead>
<tr>
<th>Title</th>
<th>Score</th>
<th>Reason</th>
</tr>
</thead>
<tbody>
<tr>
<td>U</td>
<td>3</td>
<td>Prell and Suave identify the brand names. The word <em>comparison</em> vaguely hints at design and function but without specificity.</td>
</tr>
<tr>
<td>V</td>
<td>2</td>
<td>Only the brand names are explicit, and the title is almost misleading</td>
</tr>
<tr>
<td>W</td>
<td>1</td>
<td>Perhaps it is modeled after a Speech 101 title the worked, but it doesn’t fit this upper-level biology assignment.</td>
</tr>
<tr>
<td>X</td>
<td>5</td>
<td>The design is clearly specified, and the writer includes all the key words that will accurately classify this report in permuterm indexes or electronic databases.</td>
</tr>
<tr>
<td>Y</td>
<td>2</td>
<td>As perfunctory as <em>Book Report on Silas Marner</em>.Φ</td>
</tr>
<tr>
<td>Z</td>
<td>4</td>
<td>Very good, but wordy.</td>
</tr>
</tbody>
</table>

Discuss the results presented by Walvoord and Anderson in comparison with those the participants came up with. Are there discrepancies? Looking back at the rubric, can they be resolved?
When using a rubric, you can save a lot of time by pointing the students to the particular item on the rubric and making comments referring specifically to the rubric.

Avoid the temptation to write lengthy comments that are time-consuming and can also lead the student away from the particular levels of the rubric.

Also discuss how when you construct a rubric, it may not work the way you think that it should work because some students might get a grade that is better or worse than you think s/he should get based on the rubric. When this happens, you will need to reevaluate the rubric for the following quarter. What traits are missing from the rubric?

**Activity # 7: Constructing A Rubric**

*(10 minutes)*

Have participants imagine an assignment that they are likely to grade. Now think about what the traits that you want to evaluate are. Since we have limited time, take one or two of those traits and construct a three-to-five-point scale for each trait using descriptive statements.

- One thing to stress is that even though some participants will not have to create a rubric, but they will be given one, they still need to *own* the rubric. They need to know it really well to be able to use it. Thus this exercise will give a greater understanding about what goes into creating a rubric and thus make it easier to use one given to you by someone else.
- Demonstrate what to do by providing an example of your own.
- Use the Blank Rubric handout to complete this activity.

**Design a Rubric for Your Class**

*Assignment Description:*

<table>
<thead>
<tr>
<th>Trait:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Level 5</td>
</tr>
<tr>
<td>Level 4</td>
</tr>
<tr>
<td>Level 3</td>
</tr>
<tr>
<td>Level 2</td>
</tr>
<tr>
<td>Level 1</td>
</tr>
</tbody>
</table>
• Facilitator should walk around the room to offer advice and answer questions.

Activity #8: Discuss Rubric with a Partner
(5 minutes)
After participants have had a chance to come up with a few traits and a scale. Have each explain the assignment, traits, grading levels and their rationale for each with a partner.

Activity #9: Beyond the Rubric: Other Tips
(10 minutes)
Whether or not a rubric is used for a particular assignment, there are plenty of other ways to increase fairness and efficiency when grading. Distribute the Suggestions for Grading handout and have participants read through it with a partner, marking tips that they find potentially helpful. Have a few groups share their favorite tips with the class. As a facilitator, share any strategies that have been particularly effective for you.

Activity #10: Closing Discussion
(5 minutes)
At the end of the session, we need to have a class discussion (or in small groups or pairs) about how to apply these points if they are recitation leaders for a faculty member, working as part of a team, only a grader, or an independent instructor.

• other questions or comments?

Be sure to hand out evaluation forms and collect them anonymously.