

**ASCC Alignment and Assessment of  
Student Learning Outcomes (SLOs)  
Training Manual**

Developed by:  
ASCC Assessment Planning Committee  
2008

## Table of Contents

Overview	4
<b>Part – I</b>	<b>5</b>
<b>Writing Student Learning Outcomes</b>	
What is Student Learning Outcomes Assessment?	6
Accountability, Accreditation, Educational Improvements	6
Student Learning Outcomes (SLOs)	7
Assessment and Bloom’s Taxonomy	7
SLOs versus Course Objectives	8
Bloom’s Taxonomy (Knowledge, Skills & Abilities, Attitudes)	9-11
Samples: Student Learning Outcomes	12-13
Guide to Writing Student Learning Outcomes	14
Writing Student Learning Outcomes Worksheet Activity	15-16
Checklist for Writing Student Learning Outcomes	17
Revised SLO – Worksheets	18-19
<b>Part – II</b>	<b>20</b>
<b>Aligning Course Activities with Student Learning Outcomes</b>	
Overview	21
Aligning Activities with Outcomes (Step One: Skeleton Building)	22-23
Skeleton Checklist	24
Step Two: Assignment Evaluation	25
Assignment Evaluation Worksheet	26
Step Three: Assignment Skills to Class Activities to Outcomes	27
Course Alignment Worksheet II	28-31
Working with different Learning Styles	32
Step One: Identifying Your Learning Style	33
VAK Learning Styles Self-Assessment Questionnaire	34-37
VAK Learning Styles Explanation	38
Multiple Intelligence Survey: What Intelligence Style Are You?	39-41

**Part – II      Aligning Course Activities with Student Learning Outcomes (continued)**

Multiple Intelligence Chart	42-43
Identifying Learning Styles Worksheet	44-45
Step Two: Analyzing Your Teaching Methods	46
Step Three: Designing New Activities	47
Revised Course Alignment Worksheet	48-51
Learner-Centered Teaching	52
Learner-Centered Theory (Active-Learning Approach: First Exposure)	53-55
Sources for Active Learning	56
Analyzing Your Teaching	57
Revised Course Alignment Worksheet	58-61

**Part – III      Assessing Student Mastery of Student Learning Outcomes**

Overview	62
Creating A Rubric	63
Sample Rubrics	64
Defining Rubric Components	65
Describing Levels of Success	66
Using the Rubric	67-71
Evaluating Your Rubric	72
	73

**Part – V      Aligning Course to Program and Institutional SLOs**

Overview	74
Course Skeleton: Practice Worksheet	75
Course Topical Outline (Another Option)	75
Topical Outline Worksheet	76
	77

**Appendix:**

- A. Pre-Assessment Training – Ice Breaker Activity
- B. List of Action (verbs) Words for Bloom’s Taxonomy
- C. Tips for Putting Outcomes Into Words Handout
- D. Copy of ASCC Official Course Syllabus
- E. Rubric Summary Data Form
- F. Samples of Various Rubrics

## Overview

The Accrediting Commission for Community Junior College, ACCJC – WASC, which accredits colleges in California, Hawaii, and the Pacific Region, defines assessment as “the method an institution employs to gather evidence and evaluate quality.”

Assessment in higher education involves four important processes:

- Identifying clear, valid, and appropriate student learning outcomes
- Collecting evidence that those outcomes are being addressed
- Dialogue to attain a collective interpretation of the data
- Using data to improve both teaching and learning

The purpose of this manual is to provide assistance in writing Student Learning Outcomes (SLOs) for course syllabi and assessing student learning outcomes (SLOs) in the classroom, and how to align from the course, program, and institutional SLOs. Parts of this manual are comprised of current trends in student learning outcomes research information, assessment, and training activities from Cabrillo College, Merritt College, and the American Samoan Community College (ASCC) Assessment Planning Committee.

The ASCC Assessment Planning Committee intention is to provide faculty who write course syllabi a training manual on how to effectively develop, use, assess, and align SLOs.

This manual has four main parts:

1. Writing Student Learning Outcomes
2. Aligning Classroom Activities with SLOs
3. Assessing Student Mastery of SLOs
4. Aligning Courses to Department and Institutional SLOs

# **Part I: Writing Student Learning Outcomes (SLOs)**

## **What is Student Learning Outcomes (SLOs) Assessment?**

SLO assessment is the process of collecting evidence to see if students are actually learning what we're teaching. The focus is on seeing what the student is able to do or demonstrate, rather than just listing an inventory of what was covered in a particular course.

“Assessment is the ongoing process of:

- Establishing clear, measurable expected outcomes of student learning
- Ensuring the students has sufficient opportunities to achieve those outcomes.
- Systematically gathering, analyzing, and interpreting evidence to determine how well student learning matches our expectations.

## **Accountability, Accreditation, Educational Improvements**

Assessment is an opportunity to improve curriculum, make pedagogy more effective, challenge students to take ownership of their own learning, and produce deeper learning. Classroom assessment can:

- Guide teaching that targets appropriate levels of Bloom's taxonomy and deep versus superficial learning
- Provide immediate feedback, the most powerful method known for improving learning
- Develop a conduit for diagnostic feedback to adjusting pedagogy effectiveness
- Motivate faculty and students and invigorate professional dialogue
- Link educational tracks and goals into a cohesive pathway for students
- Move the institution towards the learning paradigm

## **Student Learning Outcomes (SLOs)**

Are statements which define what a student should be able to do after the completion of a course. The SLO defines what will be measured and dictates what assessment is appropriate. SLOs represent both the target for our services and the expectation for student achievement as a result of our teaching. Assessment information tells us what students can do and how they have learned as a result of a course or program. It informs us about the effectiveness of our pedagogy. Assessment data provides a culture of evidence which is the foundation for modification in teaching and further revisions to SLOs.

## **Assessment and Bloom's Taxonomy**

The learning theory paradigm powerfully impacted accreditation standards shifting validation of higher education activities from inputs (finances, library books, curriculum, etc.) to outputs, student learning outcomes. This required a review to determine what type of cognitive, psychomotor, and affective learning needs to be produced in the student. It was found that objectives or goals written for courses and programs in the past often focused on:

- 1) What they were going to cover not what the student would be able to do;
- 2) Knowledge or comprehension, rather than more complex levels of thinking.

The real benefit of assessing outcomes lays in the metamorphosis from a teaching-centered to a learning-centered mentality. In the new Accreditation Standards, the Student Learning Outcomes should describe the following areas of learning (Using Bloom's Taxonomy)

- Knowledge
- Skills
- Abilities
- Attitudes

students have attained at ASCC. Faculty is expected to develop SLOs for each course, assess achievement in the classroom, and alignment to the institutional and program SLOs.

## SLOs versus Course Objectives

Student Learning Outcomes for the classroom describe the knowledge, skills, abilities or attitudes that a student can **demonstrate** by the end of your course.

- ❑ Don't think about content or coverage - consider what students should be able to DO with what they've learned by the end of the semester.
- ❑ How will students demonstrate this?
- ❑ What can they produce to show faculty that they have learned to apply their new knowledge?

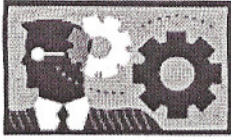
When trying to define Student Learning Outcomes for a course, think of the big picture. SLOs:

- ❑ Describe the broadest goals for the class, ones that require **higher-level** thinking abilities.
- ❑ Require students to **synthesize** many discreet skills or areas of content.
- ❑ Ask them to then **produce** something - papers, projects, portfolios, demonstrations, performances, art works, exams etc. – that **applies** what they have learned.
- ❑ Require faculty to **evaluate** or **assess** the product to measure a student's achievement or mastery of the outcomes.

Course objectives are on smaller scale, describing small, discreet skills or "nuts and bolts" that require basic thinking skills. They are subsets of outcomes. Think of objectives as the building blocks used to produce whatever is used to demonstrate mastery of an outcome. Objectives can be practiced and assessed individually, but are usually only a portion of an overall project or application.

Objectives	Outcomes
Objectives describe skills, tools or content that a student will master by the end of course.	Outcomes describe over-arching goals that a student will be able to demonstrate by the end of a course.
Objectives require the use of basic thinking skills such as knowledge, comprehension and application.	Outcomes require the use of higher level thinking skills such as analysis, synthesis and evaluation.
Objectives do not necessarily result in a product. Most often, objectives are synthesized or combined to produce something that measures an outcome.	Outcomes result in a product that can be measured and assessed.





# Knowledge

## Objectives

Basic  
Knowledge

## Outcomes

More Sophisticated  
Higher Level Thinking

Knowledge	Comprehension	Application	Analysis	Synthesis	Evaluation
Student remembers or recognizes information or specifics as communicated with little personal assimilation.	Student grasps the meaning behind the information and interprets, translates, or comprehends the information.	Student uses information to relate and apply it to a new situation with minimal instructor input.	Student discriminates, organizes, and scrutinizes assumptions in an attempt to identify evidence for a conclusion.	Student creatively applies knowledge and analysis to integrate concepts or construct an overall theory.	Student judges or evaluates information based upon standards and criteria, values and opinions.
Cite Label List Enumerate Identify Imitate Match Name Quote Recall Reproduce State Write	Convert Define Describe Discuss Estimate Explain Generalize Identify Illustrate Locate Paraphrase Restate Summarize	Apply Chart Compute Demonstrate Determine Dramatize Establish Make Manipulate Prepare Project Solve Use	Analyze Compare Contrast Correlate Diagram Dissect Differentiate Distinguish Infer Investigate Limit Outline Separate	Assemble Create Construct Design Develop Formulate Generate Hypothesize Initiate Invent Modify Reframe Synthesize	Access Appraise Conclude Critique Decide Defend Diagnose Evaluate Judge Justify Rank Recommend Support



## Skills and Abilities

### Objectives

Basic Knowledge  
Basic Skills  
Level

### Outcomes

More Sophisticated Skills  
Higher Level Abilities  
Critical Understanding of Performance

Observe	Model	Recognize Standards	Correct	Apply	Coach
Students translate sensory input into physical tasks or activities.	Students are able to replicate a fundamental skill or task.	Students recognize standards or criteria important to perform a skill or task correctly.	Students use standards to evaluate their own performances and make corrections.	Students apply this skill to real life situations.	Students are able to instruct or train others to perform this skill in other situations.
Hear Identify Observe See Smell Taste Touch Watch  *Usually no outcomes or objectives written at this level.	Attempt Copy Follow Imitate Mimic Model Reenact Repeat Reproduce Show Try	Check Detect Discriminate Differentiate Distinguish Notice Perceive Recognize Select	Adapt Adjust Alter Change Correct Customize Develop Improve Manipulate Modify Practice Revise	Build Compose Construct Create Design Originate Produce	Demonstrate Exhibit Illustrate Instruct Teach Train



## Attitudes

### Objectives

Elementary Values and Behaviors  
 Inherited Value System  
 Egocentric View

### Outcomes

More Highly Developed Attitudes  
 Well Thought-out Value System  
 Higher Level Abilities to Identify and  
 Articulate Others' Values

Receiving	Responding	Valuing	Organizing	Characterizing
Students become aware of an attitude, behavior, or value.	Students exhibit a reaction or change as a result of exposure to an attitude, behavior, or value.	Students recognize value and display this through involvement or commitment.	Students determine a new value or behavior as important or a priority.	Students integrate consistent behavior as a naturalized value in spite of discomfort or cost. The value is recognized as a part of the person's character.
Accept Attend Describe Explain Locate Observe Realize Receive Recognize	Behave Comply Cooperate Discuss Examine Follow Model Present Respond Show Studies	Accept Adapt Balance Choose Differentiate Defend Influence Prefer Recognize Seek Value	Adapt Adjust Alter Change Customize Develop Improve Manipulate Modify Practice Revise	Authenticate Characterize Defend Display Embody Habituate Internalize Produce Represent Validate Verify

## Sample Student Learning Outcomes

These are samples of various course SLOs written by faculty into their syllabi. Note the use of verbs and how they reflect a higher order of thinking, skills, and attitudes making them more SLOs than learning objectives.

ED 280      Introductions to Bilingual Education

1. **Analyze** language acquisition issues with greater understanding

POL 170      Introduction to Public Policy

1. **Compare and contrast** the ways in which governments address similar problems and its response to the needs and demands of their citizens.

BUS 150      Financial Math

1. **Outline formula(s) and speak** clearly when sharing them with a variety of audiences.

MATH 250    College Algebra and Trigonometry

1. **Demonstrate** the ability to analyze, identify, and assess mathematical problems and formulate effective solutions.

HIS 162      Pacific History

1. **Recreate/Re-enact** history of the Pacific Islanders through song, dance, poetry, story writing, or other forms

CEM 151      Construction Fundamental Principles and Practices

1. **Construct** a building applying the skills and knowledge obtained in this class.

DANCE 58    Street Dance and Hip Hop

1. **Perform**, with an increasing degree of proficiency, simple Hip Hop movements, **demonstrating** increasing control of skills pertaining to memorization, physical safety, body awareness, alignment, and aesthetic valuing.

CIS 103      Technical Support and Trouble Shooting

1. **Analyze** symptoms of host configuration errors
2. **Solve** novel hardware and software problems.
3. **Create** technical documentation for user training

CABT 131    Microsoft Word

1. **Analyze** communication requirements and **produce** professional-quality business documents, including letters, memoranda, and multi-page reports, using intermediate and advanced features of Microsoft Word.

JOUR 53 Newspaper Production and Copy Writing

**Construct** visually attractive and readable newspaper pages by:

1. Using knowledge of effective design to fit graphical and text elements on newspaper pages and resolve problems with space constraints.
2. Critiquing newspaper pages for design principles and design quality.

*(Next groups of courses is a series – progression from a fundamental level to a more advanced level)*

TA 7 Introduction to Acting

**Select, analyze, and perform** selections from dramatic texts utilizing the performance skills of memorization, vocal projection, spatial awareness, stage directions and physical expression.

TA 10A Beginning Acting

**Select, analyze, and perform** selections from dramatic texts **demonstrating increasing control** over the skills of memorization, vocal, projection, spatial awareness, stage directions and physical expression.

TA 10B Intermediate Acting

**Select, analyze, and perform** selections from dramatic texts **demonstrating consistent control** and use of the performance consistent skills of memorization, vocal, projection, spatial awareness, stage directions and physical expression.

English Composition Series

ENG 55 Basic Writing

1. **Write** paragraphs and short essays demonstrating basic sentence-level competency and culminating in a portfolio.
2. **Comment** on ideas and writing strategies in reading assignments.

ENG 100 Elements of Writing

1. **Write** essays demonstrating sustained clarity of intention, awareness of audience, and various writing techniques.
2. **Articulate** responses to readings in various genres.

ENG 101A College Composition

1. **Write** essays, including research – based writing **demonstrating** academic rhetorical strategies and documentation.
2. **Analyze and evaluate** assigned and researched texts.

ENG 101B Composition and Literature

1. **Write literary analysis**, interpretation, and research-based essays.
2. **Demonstrate** close readings of literary texts for analysis and interpretation

## Guide to writing Student Learning Outcomes (SLOs)

Student Learning Outcomes (SLOs) describe what a student should be able to DO at the end of a course.

1. SLOs use action verbs from Bloom's Taxonomy with an emphasis on higher order thinking skills.
2. SLOs describe one major piece of knowledge, skill, ability or attitude that a student will have gained by the end of your class.
3. SLOs should be included in course syllabi.
4. SLOs should be the same for all sections of one course being taught.
5. SLOs should be written in language that students are able to understand.
6. SLOs are typically not content-specific
7. SLOs should focus on big-picture, overarching knowledge, skills or attitudes.
8. SLOs ask students to apply what they have learned.
9. SLOs are something that can be assessed (measurable) or tested
10. SLOs written into a syllabi should be between 3 to 8 per course

### Practice Worksheet: Writing SLOs Activity:

1. Use the following worksheets to write one sentence, to describe one **MAJOR** piece of knowledge, skill, ability or attitude that a will have gained by the end of your class.  
*\* Describe what the student will DO – not content, or activities*
2. Describe one Major Assignment, Project, or test used to demonstrate or apply outcomes. (Assessment used)

### Strategy:

**Backward Chaining:** Another strategy is to start with the Major assessments you use in your course. Such as demonstrations, or products, aligned to your SLOs. Develop a list of major assignments in your course and try to describe in one sentence what the students are being asked to demonstrate in those assignments.

## Writing Student Learning Outcomes Worksheet

Course Name and Number \_\_\_\_\_

<b>Outcome</b> 1 sentence that describes a major piece of knowledge, skill, ability or attitude that students can demonstrate by the end of the course	<b>Assessment</b> Major Assignment, Project or test used to demonstrate or apply outcome

<b>Outcome</b> 1 sentence that describes a major piece of knowledge, skill, ability or attitude that students can demonstrate by the end of the course	<b>Assessment</b> Major Assignment, Project or test used to demonstrate or apply outcome



## Checklist for Writing Student Learning Outcomes

Once you have completed the writing SLOs activity use this checklist to gauge your level of understanding. Share your written SLOs with other instructors to provide feedback. Use the following checklist to review your written SLOs from the practice worksheet:

- Have you used action verbs (Bloom's Taxonomy Chart) in describing your SLOs?
- Is it written as an Outcome rather than an Objective?
  - Language indicates the BIG PICTURE rather than most basic level of thinking
  - Describes what students DO
  - Ask students to apply what they've learned by producing or demonstrating something
  - Address students competency rather than content coverage
- Is the SLO appropriate for the course?
  - Represents a fundamental result of the course
  - Aligns with other courses in a sequence, if applicable
  - Represents collegiate level work
  - Aligns with institutional SLOs, program/department SLOs

If you find your practice written SLOs do not meet the checklist, just try again on the following practice worksheet to revise your SLOs on the next pages.

## Revised Student Learning Outcomes Worksheet

Use the chart below to revise any of the SLOs you created earlier.

Course Name and Number \_\_\_\_\_

<b>Outcome</b> 1 sentence that describes a major piece of knowledge, skill, ability or attitude that students can demonstrate by the end of the course	<b>Assessment</b> Major Assignment, Project or test used to demonstrate or apply outcome

<b>Outcome</b> 1 sentence that describes a major piece of knowledge, skill, ability or attitude that students can demonstrate by the end of the course	<b>Assessment</b> Major Assignment, Project or test used to demonstrate or apply outcome

## **Part – II: Aligning Course to Activities with Student Learning Outcomes**

## Part II – Aligning Course Activities with Student Learning Outcomes (SLOs)

### Overview

Here is a checklist on what we have done from Part I – Developing and Writing SLOs:

- Discussed the differences between Learning Objectives and Student Learning Outcomes;
- Differentiated the use of sophisticated verbs to address Student Learning Outcomes & Learning Objectives according to Bloom's Taxonomy;
- Developed Student Learning Outcomes and identified major assignments to address SLOs

Part – II Aligning Course Activities with Student Learning Outcomes (SLOs) section will help you plan the route to take in order for students to achieve you course SLOs by focusing on three aspects of the classroom:

- Alignment Activities with Outcomes
- Working with different Learning Styles
- Using Learner-Centered Teaching Techniques

## **Aligning Activities with Outcomes**

### **Step One: Skeleton Building**

The first step in aligning your class activities with outcomes is to look at the scope of the entire semester. Now that you've articulated your outcomes or ultimate goals, you can turn your attention to the following questions:

- What are the major assignments that measure your outcomes?
- Where do they come during the semester?
- How do you build toward them?
- What specific class activities and homework assignments help students to successfully complete your major assignments?

Use **Course Alignment Worksheet I** to plot where the major assignments that measure your outcomes are placed during the semester. Think of this as the skeleton of your class. At this point, write down **only where the major assignments come in the time frame of the semester.**

As you work, remember that you are focusing on what students will **DO**, not necessarily what must be covered. Doing presupposes knowing, so of course time must be spent helping students to assimilate new knowledge. But using this approach, the organizing principle of your class is based on what students actually do and how they apply or demonstrate that knowledge, ultimately leading to mastery of the course outcomes. Start your planning with your major assignments.

## Course Alignment Worksheet I

Course	
Outcome 1. 2. 3. 4. 5.	Assignment that measures it
Week 1. 2. 3. 4. 5. 6. 7. 8.	Week 9. 10. 11. 12. 13. 14. 15 (Finals)

## Skeleton Checklist

Look again at your course skeleton:

- ❑ Is what you've planned **feasible** for both you and your students in terms of workload and grading? How many major assignments do you have? Will students have enough time to produce them? Will you have enough time to grade them?
- ❑ Do your major assignments match your outcomes? Do they provide students with an opportunity to demonstrate their mastery of the course outcomes?
- ❑ Though it is difficult, check once again to make sure that the skeleton you've created is focused on the assignments, rather than the content covered.



## **Step Two**

### **Assignment Evaluation**

The next step is to carefully consider how your **major assignments** help students to demonstrate the skills or outcomes you are seeking. It helps if you take the time to articulate and define the skills that each major assignment demands. It is important to ask:

- Do my assignments reflect the kind of learning I most desire?
- Do my assignments match my outcomes?
- What are the precise skills that students will need to learn to complete these assignments?
- Do my assignments require that student demonstrate the kinds of skills I am actually grading?

Next you analyze your assignments to make sure they are in alignment with your outcomes. Fill out the **Assignment Evaluation Worksheet** for each of your **major assignments** in your class. Each time, you will be making a list of what students need to learn for that particular assignment. Use the worksheets to analyze the skills students will need to learn for each of your major assignments.

# Assignment Evaluation Worksheet

<b>Course</b>	
<b>Assignment: (Describe Briefly)</b>	
<b>SLOs Assignment Addresses (list)</b>	
<b>Major Skills Required (Be Specific! What do students need to learn to complete this assignment?)</b>	

### **Step Three: Assignment Skills to Class Activities To Outcomes**

The final step is to go back to your course skeleton and plot out how you will use class time, home work assignments, readings and other activities to teach students the skills your assignment requires and to allow them to practice them before the assignment is graded.

This concept of “practice” is one of the key principles to using SLOs successfully. This teaching model believes strongly that students must practice the skills they are being evaluated on before that evaluation occurs. Again, the emphasis is on what they can do with what they are learning rather than the knowledge itself. Giving them the base knowledge or exposure to the ideas and content of the course without allowing them time to do something with it before they are evaluated on it will not lead to successful mastery of your course outcomes.

Use **Course Alignment Worksheet II** to describe the skills students need to learn in each week of the course to be able to complete your major assignments. Next to those skills, list the activities, exercises, homework assignments, readings, exercises etc. that will allow the students to learn the content the skill requires and to practice it.

Be brave! Be willing to let go of favorite class activities or readings that don't actually contribute to the skills required and ultimately to the class outcomes. Be creative! Allow yourself to invent others that focus on the skills needed. You may find that certain activities actually contribute to mastery of your outcomes, though you weren't aware of it. Others may need to be cut.

Remember that students will need good exposure to the content of your course in order to apply it in an assignment. But once again, place application at the center of your planning rather than focusing on coverage. Coverage is necessary, but if there's only time for covering content and not applying it, how do you know that learning is actually taking place? Perhaps you need to rethink how you are using class time and how students are first exposed to the content so that there is ample opportunity for skill demonstration and application. The section of this workbook on Learner-Centered Teaching may give you some ideas.

## Course Alignment Worksheet II

Course:

Week	Skills	Exercises, Activities, Assignments
1		
2		
3		
4		

Week	Skills	Exercises, Activities, Assignments
5		
6		
7		
8		

Week	Skills	Exercises, Activities, Assignments
9		
10		
11		
12		

Week	Skills	Exercises, Activities, Assignments
13		
14		
15 Finals		

## **Working with Difference Learning Styles**

Do your teaching methods encourage all students to learn? How well do you work with students of differing learning styles?

Every instructor knows that students learn differently – all it takes is a look around the classroom. Students don't all absorb material in the same way. Research has shown that faculty tended to teach to only one particular learning style, and it usually matched their own. This section of the manual is designed to help you:

- Identify your own learning style
- Analyze your teaching methods in respect to learning styles
- Design new activities or methods of delivery that will reach all learning styles.



## **Step One:**

### **Identifying Your Learning Style**

There are several methods or theories that describe learning styles. Though they may call the various styles different names and base their classification systems on contrasting research, all agree that learning style can be divided into several broad categories and these affect how students learn.

The Visual, Auditory, and Kinesthetic Inventory (VAK) and the Multiple Intelligence Inventory on the following pages are tools to quickly identify what a person's learning style tendencies may be. In order to understand your students learning style you should complete the following inventories to find out what your learning style tendencies are.

After completing the VAK and Multiple Intelligence Inventories, analyzing the results and reading the description of the various learning styles. Use the identifying Learning Style Worksheet to gather information on how you are addressing the differing learning styles among your students.

Some faculty have found it helpful to use the VAK at the beginning of the semester with the students in order for the instructor to be aware of the learning styles in the classroom and how the instructor would need to adjust or balance the teaching methods to address all students learning styles.

Use the results from your Multiple Intelligence Inventory results and the Multiple Intelligence Chart to complete the Identifying Learning Style Worksheet. This should provide information on varying your teaching methods to address your students Learning Styles.

**VAK Learning Styles Self-Assessment Questionnaire**

Circle or tick the answer that most represents how you generally behave.

(It's best to complete the questionnaire before reading the accompanying explanation.)

1. When I operate new equipment I generally:
  - a) read the instructions first
  - b) listen to an explanation from someone who has used it before
  - c) go ahead and have a go, I can figure it out as I use it
  
2. When I need directions for travelling I usually:
  - a) look at a map
  - b) ask for spoken directions
  - c) follow my nose and maybe use a compass
  
3. When I cook a new dish, I like to:
  - a) follow a written recipe
  - b) call a friend for an explanation
  - c) follow my instincts, testing as I cook
  
4. If I am teaching someone something new, I tend to:
  - a) write instructions down for them
  - b) give them a verbal explanation
  - c) demonstrate first and then let them have a go
  
5. I tend to say:
  - a) watch how I do it
  - b) listen to me explain
  - c) you have a go
  
6. During my free time I most enjoy:
  - a) going to museums and galleries
  - b) listening to music and talking to my friends
  - c) playing sport or participating in physical activities
  
7. When I go shopping for clothes, I tend to:
  - a) imagine what they would look like on
  - b) discuss them with the shop staff
  - c) try them on and test them out
  
8. When I am choosing a holiday I usually:
  - a) read lots of brochures
  - b) listen to recommendations from friends
  - c) imagine what it would be like to be there

9. If I was buying a new car, I would:
- a) read reviews in newspapers and magazines
  - b) discuss what I need with my friends
  - c) test-drive lots of different types
10. When I am learning a new skill, I am most comfortable:
- a) watching what the teacher is doing
  - b) talking through with the teacher exactly what I'm supposed to do
  - c) giving it a try myself and work it out as I go
11. If I am choosing food off a menu, I tend to:
- a) imagine what the food will look like
  - b) talk through the options in my head or with my partner
  - c) imagine what the food will taste like
12. When I listen to a band, I can't help:
- a) watching the band members and other people in the audience
  - b) listening to the lyrics and the beats
  - c) moving in time with the music
13. When I concentrate, I most often:
- a) focus on the words or the pictures in front of me
  - b) discuss the problem and the possible solutions in my head
  - c) move around a lot, fiddle with pens and pencils and touch things
14. I choose household furnishings because I like:
- a) their colours and how they look
  - b) the descriptions the sales-people give me
  - c) their textures and what it feels like to touch them
15. My first memory is of:
- a) looking at something
  - b) being spoken to
  - c) doing something
16. When I am anxious, I:
- a) visualise the worst-case scenarios
  - b) talk over in my head what worries me most
  - c) can't sit still, fiddle and move around constantly
17. I feel especially connected to other people because of:
- a) how they look
  - b) what they say to me
  - c) how they make me feel

18. When I have to revise for an exam, I generally:
  - a) write lots of revision notes and diagrams
  - b) talk over my notes, alone or with other people
  - c) imagine making the movement or creating the formula
19. If I am explaining to someone I tend to:
  - a) show them what I mean
  - b) explain to them in different ways until they understand
  - c) encourage them to try and talk them through my idea as they do it
20. I really love:
  - a) watching films, photography, looking at art or people watching
  - b) listening to music, the radio or talking to friends
  - c) taking part in sporting activities, eating fine foods and wines or dancing
21. Most of my free time is spent:
  - a) watching television
  - b) talking to friends
  - c) doing physical activity or making things
22. When I first contact a new person, I usually:
  - a) arrange a face to face meeting
  - b) talk to them on the telephone
  - c) try to get together whilst doing something else, such as an activity or a meal
23. I first notice how people:
  - a) look and dress
  - b) sound and speak
  - c) stand and move
24. If I am angry, I tend to:
  - a) keep replaying in my mind what it is that has upset me
  - b) raise my voice and tell people how I feel
  - c) stamp about, slam doors and physically demonstrate my anger
25. I find it easiest to remember:
  - a) faces
  - b) names
  - c) things I have done
26. I think that you can tell if someone is lying if:
  - a) they avoid looking at you
  - b) their voices changes
  - c) they give me funny vibes

27. When I meet an old friend:
- a) I say "it's great to see you!"
  - b) I say "it's great to hear from you!"
  - c) I give them a hug or a handshake
28. I remember things best by:
- a) writing notes or keeping printed details
  - b) saying them aloud or repeating words and key points in my head
  - c) doing and practising the activity or imagining it being done
29. If I have to complain about faulty goods, I am most comfortable:
- a) writing a letter
  - b) complaining over the phone
  - c) taking the item back to the store or posting it to head office
30. I tend to say:
- a) I see what you mean
  - b) I hear what you are saying
  - c) I know how you feel

Now add up how many A's, B's and C's you selected.

A's =

B's =

C's =

If you chose mostly A's you have a **VISUAL** learning style.

If you chose mostly B's you have an **AUDITORY** learning style.

If you chose mostly C's you have a **KINAESTHETIC** learning style.

Some people find that their learning style may be a blend of two or three styles, in this case read about the styles that apply to you in the explanation below.

When you have identified your learning style(s), read the learning styles explanations and consider how this might help you to identify learning and development that best meets your preference(s).

Now see the VAK Learning Styles Explanation.

## VAK Learning Styles Explanation

The VAK learning styles model suggests that most people can be divided into one of three preferred styles of learning. These three styles are as follows, (and there is no right or wrong learning style):

- Someone with a **Visual** learning style has a preference for seen or observed things, including pictures, diagrams, demonstrations, displays, handouts, films, flip-chart, etc. These people will use phrases such as 'show me', 'let's have a look at that' and will be best able to perform a new task after reading the instructions or watching someone else do it first. These are the people who will work from lists and written directions and instructions.
- Someone with an **Auditory** learning style has a preference for the transfer of information through listening; to the spoken word, of self or others, of sounds and noises. These people will use phrases such as 'tell me', 'let's talk it over' and will be best able to perform a new task after listening to instructions from an expert. These are the people who are happy being given spoken instructions over the telephone, and can remember all the words to songs that they hear!
- Someone with a **Kinaesthetic** learning style has a preference for physical experience - touching, feeling, holding, doing, practical hands-on experiences. These people will use phrases such as 'let me try', 'how do you feel?' and will be best able to perform a new task by going ahead and trying it out, learning as they go. These are the people who like to experiment, hands-on, and never look at the instructions first!

People commonly have a main preferred learning style, but this will be part of a blend of all three. Some people have a very strong preference; other people have a more even mixture of two or less commonly, three styles.

When you know your preferred learning style(s) you understand the type of learning that best suits you. This enables you to choose the types of learning that work best for you.

There is no right or wrong learning style. The point is that there are types of learning that are right for your own preferred learning style.

Please note that this is not a scientifically validated testing instrument – it is a free assessment tool designed to give a broad indication of preferred learning style(s).

More information about learning styles, personality, and personal development is at [www.businessballs.com](http://www.businessballs.com).

With acknowledgements to Victoria Chislett for developing this assessment.

Victoria Chislett specialises in performance psychology and its application within organisations, and can be contacted via email: [performance\\_psychologist@yahoo.com](mailto:performance_psychologist@yahoo.com).

## WHAT INTELLIGENCE STYLE ARE YOU?

Place a 1 if the statement applies, leave blank if it does not. At the end, total up each section. Identify which section (or sections) you scored the highest in.

### Section 1

- \_\_\_\_\_ I enjoy categorizing things by common traits
- \_\_\_\_\_ Ecological issues are important to me
- \_\_\_\_\_ Classification helps me make sense of new data
- \_\_\_\_\_ I enjoy working in a garden
- \_\_\_\_\_ I believe preserving our National Parks is important
- \_\_\_\_\_ Putting things in hierarchies makes sense to me
- \_\_\_\_\_ Animals are important in my life
- \_\_\_\_\_ My home has a recycling system in place
- \_\_\_\_\_ I enjoy studying biology, botany and/or zoology
- \_\_\_\_\_ I pick up on subtle differences in meaning.
- \_\_\_\_\_ TOTAL for Section 1

### Section 2

- \_\_\_\_\_ I easily pick up on patterns
- \_\_\_\_\_ I focus in on noise and sounds
- \_\_\_\_\_ Moving to a beat is easy for me
- \_\_\_\_\_ I enjoy making music
- \_\_\_\_\_ I respond to the cadence of poetry
- \_\_\_\_\_ I remember things by putting them in a rhyme
- \_\_\_\_\_ Concentration is difficult for me if there is background noise
- \_\_\_\_\_ Listening to sounds in nature can be very relaxing
- \_\_\_\_\_ Musicals are more engaging to me than dramatic plays
- \_\_\_\_\_ Remembering song lyrics is easy for me
- \_\_\_\_\_ TOTAL for Section 2

### Section 3

- \_\_\_\_\_ I am known for being neat and orderly
- \_\_\_\_\_ Step-by-step directions are a big help
- \_\_\_\_\_ Problem solving comes easily to me
- \_\_\_\_\_ I get easily frustrated with disorganized people
- \_\_\_\_\_ I can complete calculations quickly in my head
- \_\_\_\_\_ Logic puzzles are fun
- \_\_\_\_\_ I can't begin an assignment until I have all my "ducks in a row"
- \_\_\_\_\_ Structure is a good thing
- \_\_\_\_\_ I enjoy troubleshooting something that isn't working properly
- \_\_\_\_\_ Things have to make sense to me or I am dissatisfied
- \_\_\_\_\_ TOTAL for Section 3

**Section 4**

- \_\_\_\_\_ I learn best interacting with others
- \_\_\_\_\_ I enjoy informal chat and serious discussion
- \_\_\_\_\_ The more the merrier
- \_\_\_\_\_ I often serve as a leader among peers and colleagues
- \_\_\_\_\_ I value relationships more than ideas or accomplishments
- \_\_\_\_\_ Study groups are very productive for me
- \_\_\_\_\_ I am a "team player"
- \_\_\_\_\_ Friends are important to me
- \_\_\_\_\_ I belong to more than three clubs or organizations
- \_\_\_\_\_ I dislike working alone

\_\_\_\_\_ TOTAL for Section 4

**Section 5**

- \_\_\_\_\_ I learn by doing
- \_\_\_\_\_ I enjoy making things with my hands
- \_\_\_\_\_ Sports are a part of my life
- \_\_\_\_\_ I use gestures and non-verbal cues when I communicate
- \_\_\_\_\_ Demonstrating is better than explaining
- \_\_\_\_\_ I love to dance
- \_\_\_\_\_ I like working with tools
- \_\_\_\_\_ Inactivity can make me more tired than being very busy
- \_\_\_\_\_ Hands-on activities are fun
- \_\_\_\_\_ I live an active lifestyle

\_\_\_\_\_ TOTAL for Section 5

**Section 6**

- \_\_\_\_\_ Foreign languages interest me
- \_\_\_\_\_ I enjoy reading books, magazines and web sites
- \_\_\_\_\_ I keep a journal
- \_\_\_\_\_ Word puzzles like crosswords or jumbles are enjoyable
- \_\_\_\_\_ Taking notes helps me remember and understand
- \_\_\_\_\_ I faithfully contact friends through letters and/or e-mail
- \_\_\_\_\_ It is easy for me to explain my ideas to others
- \_\_\_\_\_ I write for pleasure
- \_\_\_\_\_ Puns, anagrams and spoonerisms are fun
- \_\_\_\_\_ I enjoy public speaking and participating in debates

\_\_\_\_\_ TOTAL for Section 6



Section 7

- \_\_\_\_\_ My attitude effects how I learn
- \_\_\_\_\_ I like to be involved in causes that help others
- \_\_\_\_\_ I am keenly aware of my moral beliefs
- \_\_\_\_\_ I learn best when I have an emotional attachment to the subject
- \_\_\_\_\_ Fairness is important to me
- \_\_\_\_\_ Social justice issues interest me
- \_\_\_\_\_ Working alone can be just as productive as working in a group
- \_\_\_\_\_ I need to know why I should do something before I agree to do it
- \_\_\_\_\_ When I believe in something I give more effort towards it
- \_\_\_\_\_ I am willing to protest or sign a petition to right a wrong

\_\_\_\_\_ TOTAL for Section 7

Section 8

- \_\_\_\_\_ Rearranging a room and redecorating are fun for me
- \_\_\_\_\_ I enjoy creating my own works of art
- \_\_\_\_\_ I remember better using graphic organizers
- \_\_\_\_\_ I enjoy all kinds of entertainment media
- \_\_\_\_\_ Charts, graphs and tables help me interpret data
- \_\_\_\_\_ A music video can make me more interested in a song
- \_\_\_\_\_ I can recall things as mental pictures
- \_\_\_\_\_ I am good at reading maps and blueprints
- \_\_\_\_\_ Three dimensional puzzles are fun
- \_\_\_\_\_ I can visualize ideas in my mind

\_\_\_\_\_ TOTAL for Section 8

**Key to the test below:**

- Section 1 – This reflects your **Naturalist** strength
- Section 2 – This suggests your **Musical** strength
- Section 3 – This indicates your **Logical** strength
- Section 4 – This shows your **Interpersonal** strength
- Section 5 – This tells your **Kinesthetic** strength
- Section 6 – This indicates your **Verbal** strength
- Section 7 – This reflects your **Intrapersonal** strength
- Section 8 – This suggests your **Visual** strength

Copyright © 1999 Walter McKenzie, The One and Only Surfaquarium. This survey may be printed, used and/or modified by educators as long as the copyright tag remains intact. <http://surfaquarium.com/MI/inventory.htm>

Original URL: <http://www.teachervision.fen.com/intelligence/teaching-methods/2204.html>



### Multiple Intelligences Chart

How do you ensure all of your students' intelligences are being tapped? Here is a list of activities that speak to each intelligence.

Verbal-Linguistic	Logical-Mathematical	Visual-Spatial	Bodily-Kinesthetic
choral speaking	problem solving	graphing	hands on experiments
declarizing	measuring	photographing	activities
storytelling	coding	making visual metaphors	changing room arrangement
retelling	sequencing	making visual analogies	creative movement
speaking	critical thinking	mapping stories	going on field trips
debating	predicting	making 3D projects	physical education activities
presenting	playing logic games	painting	crafts
reading aloud	collecting data	illustrating	dramatizing
dramatizing	experimenting	using charts	using cooperative groups
book making	solving puzzles	using organizers	dancing
nonfiction reading	classifying	visualizing	
researching	using manipulatives	sketching	
listening	learning the scientific model	patterning	
process writing	using money	visual puzzles	
writing journals	using geometry		
Musical	Interpersonal	Intrapersonal	Naturalistic
humming	classroom parties	personal response	reading outside
rapping	peer editing	individual study	cloud watching
playing background music	cooperative learning	personal goal setting	identifying insects
patterns	sharing	individual projects	building habitats

form	group work	journal log keeping	identifying plants
playing instruments	forming clubs	personal choice in projects	using a microscope
tapping out poetic rhythms	peer teaching	independent reading	dissecting
rhyming	social awareness		going on a nature walk
singing	conflict mediation		build a garden
	discussing		studying the stars
	cross age tutoring		bird watching
	study group		collecting rocks
	brainstorming		making bird feeders
			going to the zoo

© 2000-2008 Pearson Education, Inc. All Rights Reserved.

## Identifying Learning Styles Worksheet

<b>My Learning Style</b> (list name)	
<b>Key Characteristics</b> (list several important traits)	
<b>Best Learning Methods</b> (list preferred learning activities)	
<b>Other Learning Style</b>	
<b>Key Characteristics</b>	
<b>Best Learning Methods</b>	
<b>Other Learning Style</b>	
<b>Key Characteristics</b>	

Best Learning Methods	
Other Learning Style	
Key Characteristics	
Best Learning Methods	
Other Learning Style	
Key Characteristics	
Best Learning Methods	

## Step Two: Analyzing Your Teaching Methods

This section asked you to examine your teaching methods. Are you primarily directed at one teaching style? Most have found that after analyzing their own preference (learning style), it was easy to add activities or assignments that reached other learning styles. Students enjoyed the variety and, much to the instructor's surprise deeper learning takes place in the classroom.

To analyze your teaching methods, revisit **Course Alignment Worksheet II** on <sup>28-31</sup>pg. in the margins, identify which learning styles are targeted by each activity on the worksheet. Take an inventory of the types of activities you are planning. Over the course of the semester, do you have a balance of activities for all learning styles? Do you provide alternate methods for some assignments so that all learning styles are given an opportunity to succeed?

**Step Three:**  
**Designing New Activities**

You can now begin to design new class activities or assignments to balance the learning styles by using your **Identifying Learning Style Worksheet** and the **Multiple Intelligence Chart**. Take a careful look at the best learning methods for each learning style. Then decide if any of the activities on your **Course Alignment Worksheet II** can be changed so that they work for a different learning style. Record your changes on the **Revised Course Alignment Worksheet**.

## Revised Course Alignment Worksheet

Course:

Week	Skills	Exercises, Activities, Assignments
1		
2		
3		
4		



Week	Skills	Exercises, Activities, Assignments
5		
6.		
7		
8		

Week	Skills	Exercises, Activities, Assignments
9		
10		
11		
12		

Week	Skills	Exercises, Activities, Assignments
13		
14		
15 Finals		

## **Learner – Centered Teaching**

Now that you've organized your course with respect to scheduling assignments and teaching to different learning styles, it's time to look at them through one last lens:

- How learner – centered is your class?
- What is the focus in your class room?
- Do students spend most of their time listening to you lecture, give perspectives on an issue or relate important content information?

Or do they spend it on activities that require them to interact and grapple with what is being taught? Is there a balance between the two? What lies at the center of the hours that you and your students spend together? What is actually going on?

This section of the manual will:

- Explain some of the theory behind learner – centered teaching
- Help you to analyze your own approach

## Learner – Centered Teaching: The Theory

The theorists behind the SLO teaching model believe that we need to make a change in how we think about classroom instruction. Some have gone so far as to call it a “paradigm shift.” The shift asks faculty to define their role in a different way. We should no longer think of ourselves as primarily imparters of information whose job is to pour knowledge into the empty heads of passive students. Rather, our role should be to facilitate student interaction with the material, providing the information but stepping aside from a starring role and becoming more of a supporter player. Student should be at the center of the course, interactively working with the knowledge that they are being taught.

The debate on this theory has been fierce. The SLO theorists support their beliefs with the research that shows that students learn critical thinking and high-order reasoning from interactive activities in the classroom rather than lecturing. This “**active learning**” has been shown to result in greater and more long-lasting information retention and skill-building. Students seem to be able to do more with what they learned.

On the other hand, those who question this approach to education point out that students can not do anything with the material until they have learned the basic concepts, facts or vocabulary in the field of study. Furthermore, in order to facilitate an orderly sequence of learning and, in community colleges, to help students transfer, certain areas must be covered before a student can move on. How in the world can a hard working instructor cover the necessary basics and still have time for all the interactive learning?

A helpful way to think about this issue, as presented in *Effective Grading A Tool for Learning and Assessment* by Barbara Walvoord and Virginia Anderson, is to consider when it is best for students to **first** be exposed to new concepts and information. In the traditional way of teaching, this is done through lecture in class. Active-learning asks students to do the first exposure at home. The figure below, from *Effective Grading*, demonstrates the approach.

### Active – Learning Approach to First Exposure

	Lecture Based Teaching	Interactive Teaching
Class Times	First Exposure (Student first hears or observes facts, ideas, processes not encountered before)	Process (Student applies, analyzes, argues, solves problems using first exposure material)
Student Study Time	Process	First Exposure

You might argue, “That’s all very nice,” “but my students often won’t read the material assigned for homework or they won’t understand it when they do.”

When asking students to do first exposure at home means that they must create a good reason or inducement for students to make the effort. (Cabrillo, 2008) Faculty have:

- Given quizzes
- Assigned short writings
- Required students to answer a short set of questions that must be turned in at the beginning of each class.

Designing some sort of activity that counted toward the final grade resulted in students doing the work. Then, class time was spent processing the information or solving problems (not the emphasis on student activity), with the instructor available to help, but not to lead.

Faculty graded this preparatory work, but didn’t spend much time on it. They didn’t respond with the kind of detail they would use for a major assignment or project. Instead a small number of points were awarded, work was either passed or not passed or given a check or check minus grade.

This approach can work for large classes as well. Some instructors have begun to use class time for problem solving rather than lecture. When lectures are necessary, faculty are aware of the research that states that after 10 – 20 minutes of continuous lecture, the ability to assimilate and understand the material greatly decreases. The following techniques can be used to help students retain lecture information:

- After 7 – 10 minutes, stopping to ask rhetorical questions which are answered in student notebooks.
- Surveying the class (“raise your hand if you agree or disagree or have encountered an example?”)
- Turn to your partner and (share examples or repeat back just learned information)
- Guided lecture (students listen for 15 – 20 minutes without taking notes, then spend 5 minutes recording all they can remember.  
They can work in groups to reconstruct the lecture conceptually, teaching it to each other
- Immediate Mastery Quiz ( a quiz is given at the end of each lecture. Seattle Community College district has done research that shows learners retain almost twice as much material when a quiz is included at the end of the period)

At the end of this section is a list of other resources for making large classes interactive.

A word of caution, some students do not respond positively to an active learning approach. They are comfortable with sitting back and passively receiving material. They want their instructors to be like television: entertaining, mildly interesting and asking nothing more of them than to watch. A learner – centered approach to teaching demands much more from students and makes learning more of their responsibility. Some students had difficulty in changing their role in the classroom.

## Sources for Active Learning

The sources listed below appear in Wolvoord and Anderson's *Effective Grading*. Most of the successful techniques shared are active learning methods.

### ***Resources:***

#### **Sources for Interactive Teaching and Learning**

*Bean, 1996.* Integrating writing, critical thinking, and active learning.

*Bonwell and Eison, 1991.* Strategies for active learning

*Brown and Ellison, 1995.* Single chapter overview, with specific examples of faculty using active learning.

*Halpern and Associates, 1994.* Part one contains six articles on instructional strategies that promote active learning.

*Meyers and Jones 1993.* Strategies for active learning

### ***Resources:***

#### **Sources for Making Large Lasses Interactive**

*Bonwell and Eison, 1991.* Summary of research about learning in large classes and suggestions for making them interactive. (see pp. 14 – 19)

*Gibbs and Jenkins (eds.), 1992.* Teaching large classes in higher education:

How to maintain quality with reduced resources. Theoretical issues, case studies, and institutional support for change.

*Tobias, 1994.* Reports how a chemistry professor improved students' pass rate in large classes.

*Walvoord and Williams, 1995.* Video for faculty show how five faculty for various disciplines are making large classes interactive.

*Weimer (ed.), 1987.* Collection of essays on teaching large classes. Electronic discussion group to share ideas about large classes. To join, send the following email message [SUBSCRIBE LCIG-L first name last name] to [LISTSERV@UGA.CC.UGA.EDU]



## Analyzing Your Teaching

A quick way to get a sense of your approach to teaching is to once again return to the **Revised Course Alignment Worksheet**. Look over your list of activities and exercises. How are you using class time? How much is used for first exposure to course materials? How much first exposure occurs out of class?

In the margins, note where first exposure occurs each week of the semester.

If you find that most of your class time is devoted to first exposure, is it possible to redesign the course so more processing can occur in class? What kinds of carrots can you create so that students will be rewarded for completing first exposure on their own time (and penalized if they don't do it)? Can you design any class activities so that students have more opportunity to problem solve, analyze, argue or apply course content?

If you are willing to experiment, revise that **Course Alignment Worksheet** one last time to alter where exposure first occurs and to design new class activities that allow students to process materials. Use the **Revised Revised Course Alignment Worksheet** to record your ideas.

## Revised Course Alignment Worksheet

Course:

Week	Skills	Exercises, Activities, Assignments
1		
2		
3		
4		

Week	Skills	Exercises, Activities, Assignments
5		
6.		
7		
8		

Week	Skills	Exercises, Activities, Assignments
9		
10		
11		
12		

Week	Skills	Exercises, Activities, Assignments
13		
14		
15 Finals		

# **Part III: Assessing Student Mastery of Student Learning Outcomes**

## Overview

How can you tell if the students in your course have achieved mastery of your student learning outcome? That's easy. You simply grade the assignments which measure the outcomes. However, you may need to grade differently than what you have been doing. This teaching model believes will perform better if they know how they will be graded in advanced. They need to know the precise standards and criteria that make up an A, B, or C grade.

"But, my students know that already," you perhaps protest. "We talk about it on the first day of class. The percentages that make up their final grade are right in my syllabus. And I use a grading sheet when I return work."

Many faculty feel they are certain that they were perfectly clear with students about grading. Sure, they had some complaints over the years, but that was to be expected. Yet, when asked if they told their classes exactly what elements composed an A paper, project, or major assignment. Most admitted that they had not gone into it in that kind of detail. The good news is that once they did, through developing a **grading rubric**, they found that students were much less confused. Students seemed to have a better grasp of what they needed to do to successfully complete an assignment. More importantly, once the assignments were graded using the rubric, students understood the marks they earned. Complaints about grades were greatly reduced!

A **rubric** translates the standards and criteria that make up grading into some sort of chart or description. Rubrics can be used to score many kinds of written assignments or exams, papers, projects, speeches or portfolios. They are not useful, as a grading mechanism for multiple choice or short answer tests. However, you can analyze those kinds of assessments by looking at groups of questions to determine how well students are mastering your outcomes.

A rubric answers the question "What precisely is an A grade on a particular assignment or project? How different is it from a B or a C grade?" While this is information that many of us carry inside of our heads, in order to clearly assess student learning outcomes, it must be articulated in writing. It is up to you – the expert in the classroom – to define these standards and criteria and how they will be applied to the class work that you assign. Your rubric will be as individual as your grading style and pedagogy.

## Creating A Rubric

This section of the manual is designed to assist you in creating a **grading rubric** for the major assignments that measure your SLOs. The following four areas are:

- Sample Rubrics
- Defining rubric components
- Describing levels of success for each component
- Assembling both the components and levels of success into one document

After you have created a rubric, it's helpful to share it with another faculty member in your Discipline – or better yet, in a different discipline to check it:

- The wording is understandable to a student or novice (watch for an excess of discipline – specific jargon)
- The progression of criteria for each level is logical and consistent

### What is a rubric?

A scoring rubric is a table that makes clear to students the criteria against which their work will be assessed

Rubrics are used to measure student learning by scoring and grading. Rubrics help instructors assess student work more objectively and consistently.

### Why are rubrics important?

Rubrics help students consciously assess their own learning and performance. Using rubrics, instructors share scoring and grading criteria with students, which focuses students' attention during their initial learning and also when they interpret instructors' feedback.

Students can use it in developing, revising and judging the quality of their own work.

Rubrics are consistent with outcomes – focused education and support a learner-centered approach to teaching, and thus should help in changing our thinking about assessment.

### What are the types of rubrics commonly used?

***Holistic Rubric:*** A rubric in which the entire performance is evaluated and graded.

***Analytic Rubric:*** A rubric in which the performance is evaluated and scored on several distinct criteria.



## Sample Rubrics

A rubric is as individual as the instructor, the assignment or the course. They can be organized and presented in many different ways. Before designing your own, it's helpful to look at rubric developed by other teachers in different disciplines. The following rubric samples come from ASCC faculty, other colleges, and electronic web-site ([www.rubriccampus.com](http://www.rubriccampus.com)) Take a look at the different ways you can organize and present your grading criteria to students.

\* Note the sample grading sheet that is tied to an English 1A rubric. Student receives both the rubric and grading sheet before attempting the assignment. The grading sheet is used to summarize how well the students did on each aspect of the grading rubric. It also articulates what they need to do to improve their grade in the future.

The feedback from faculty who have used rubrics combined with grading sheets for the first time reported that they spent less overall time grading.

## Sample Rubric

### Short Essay Rubric

(Used in my Human Genetics course.)

Score	Content	Organization	Development	Use of Language
5	Answer is appropriate to the question. Content is factually correct.	Clear sense of order. Begins with a thesis or topic sentence. Supporting points are presented in a logical progression.	Develops each point with may specific details. Answers question completely.	Uses technical or scientific terminology appropriately and correctly. No major grammatical or spelling errors.
4	Answer is appropriate to the question. Content may have one or two factual errors.	May lack a thesis sentence, but points are presented in a logical progression.	Each point supported with some details and evidence. All important points included.	Accurate word choice. No more than 2 major errors and a few minor errors.
3	Content relates peripherally to the question; contains significant factual errors.	Logic of argument is minimally perceivable. Points presented in a seemingly random fashion, but all support argument.	Sparse details or evidence. Question only partially answered.	Ordinary word choice; use of scientific terminology avoided. Some serious errors (but they don't impair communication).
2	Content unrelated to question.	Lacks clear organizational plan. Reader is confused.	Statements are unsupported by any detail or explanation. Repetitious, incoherent, illogical development.	Limited vocabulary; errors impair communication.

Developed by Denise Lim, Biology.

## Sample Rubric for Assessing Photographs

### 1. Concept, idea, visualization:

- 10 pts Shows coherency of the concept with a high degree of originality and sophistication. The idea is well stated with visual elements and cues.
- 9 pts Shows coherency of the concept with some originality and sophistication. The idea is stated with visual elements and cues but needs to be more clear or more strongly evident.
- 8 pts Shows some coherency of the concept with commonly used, cliché or stereotyped imagery. The idea is obtuse, and requires greater clarity through the use of visual elements and cues.
- 7 pts Lacks general coherency of the concept. Many of the visual elements and cues do not lead the viewer to the intended idea.
- 6 pts Lacks any coherency of the concept. Visual elements and cues do not lead the viewer to the intended idea.
- 0 pts The work was not presented to me.

### 2. Composition & design:

- 10 pts Shows strong internal integrity of the visual elements. Nothing needs to be added or removed – framing is superb.
- 9 pts Shows internal integrity of the visual elements. A visual element needs to be added, moved or removed – framing needs some slight adjustment.
- 8 pts Shows obvious weaknesses in the internal integrity of the visual elements. Many visual elements need to be added, moved or removed – framing needs definite adjustments.
- 7 pts Image is breaking apart – there is very little internal integrity of the visual elements. Most visual elements need to be rethought – framing needs major readjustment.
- 6 pts Visual integrity is nonexistent and image has broken apart. All of the visual elements need to be rethought – framing needs a complete overhaul.
- 0 pts The work was not presented to me.

### 3. Technical:

- 10 pts Shows master in the use of photographic equipment and techniques to attain the assignment parameters.
- 9 pts Shows a good command of the use of photographic equipment and techniques to attain most of the assignment parameters.
- 8 pts Shows some command of the use of photographic equipment and techniques to attain some of the assignment parameters.
- 7 pts Shows limited command of the use of photographic equipment and techniques to attain a few of the assignment parameters.
- 6 pts Shows little or no command of the use of photographic equipment and techniques to attain a few or none of the assignment parameters.
- 0 pts The work was not presented to me.

Developed by Susan Hoisington, Photography.

# Sample Rubric for Oceanography 10 Lab Project

## Bathymetric Map and Cross Section (Lab #2) Grading Criteria

### **An "A" grade (9 or 10 out of 10):**

- The contour lines are extremely smooth and evenly spaced with none of them touching each other.
- Every water depth # has the appropriate contour line next to it and the entire map is "contoured".
- The overall presentation is excellent.
- The cross section is accurate and complete and the bottoms of the canyons and top of the ridge are not flat.
- The ends of the cross section are complete and the paper shows the vertical exaggeration.

### **A "B" grade (8 out of 10):**

- The contour lines are neat and smooth and appropriately spaced and some are touching, but very few.
- Nearly all the water depth #'s are contoured, some may be missing, but very few.
- The overall presentation is good and very few "shadows" are showing.
- The cross section is accurate, but some information is missing, particularly on the ends.
- Vertical exaggeration may or may not be shown.

### **A "C" grade (6 or 7 out of 10):**

- The contour lines are a little wide and show fringes, some may have double ends and some of them are obviously touching each other.
- Some of the water depth #'s may not be contoured and the contour lines are all not evenly or properly spaced. There may be shadows on the map and the overall presentation is slightly sloppy.
- The cross section is mostly accurate, but some information is off line and missing, particularly on the ends.
- Vertical exaggeration may not be shown.

### **A "D" and "F" grade (5 or less out of 10):**

- The contour lines are sloppy and inaccurate and some or many are touching each other.
- Several of the water depth #'s are not accurately contoured and the map is not complete.
- The overall presentation is below or far below average.
- The cross section is inaccurate, and much information is off line and missing.
- Vertical exaggeration may be shown.

Developed by Dave Schwartz, Geology.

## ED 150-Bulletin Boards for New Teachers:

CATEGORY	Way To Go	Nice Job	Good Start	Stop. Think.	I Can Do It.
<b>Title</b>	Title can be read from 6 ft. away and is quite creative.	Title can be read from 6 ft. away and describes content well.	Title can be read from 4 ft. away and describes the content well.	The title is too small and/or does not describe the content of the poster well.	
<b>Graphics - Clarity</b>	Graphics are all in focus and the content easily viewed and identified from 6 ft. away.	Most graphics are in focus and the content easily viewed and identified from 6 ft. away.	Most graphics are in focus and the content is easily viewed and identified from 4 ft. away.	Many graphics are not clear or are too small.	
<b>Labels</b>	All items of importance on the Poster/Bulletin Board are clearly labeled with labels that can be read from at least 3 ft. away.	Almost all items of importance on the Poster/Bulletin Board are clearly labeled with labels that can be read from at least 3 ft. away.	Several items of importance on the Poster/Bulletin Board are clearly labeled with labels that can be read from at least 3 ft. away.	Labels are too small to view OR no important items were labeled.	
<b>Content - Accuracy</b>	At least 5 accurate facts are displayed on the Poster/Bulletin Board.	3-4 accurate facts are displayed on the Poster/Bulletin Board.	2-3 accurate facts are displayed on the Poster/Bulletin Board.	1 accurate fact is displayed on the Poster/Bulletin Board.	
<b>Attractiveness</b>	The Poster/Bulletin Board is exceptionally attractive in terms of design, layout, and neatness.	The Poster/Bulletin Board is attractive in terms of design, layout and neatness.	The Poster/Bulletin Board is acceptably attractive though it may be a bit messy.	The Poster/Bulletin Board is distractingly messy or very poorly designed. It is not attractive.	

## ED 150 Portfolio Rubric

Name: \_\_\_\_\_

Reviewed by: \_\_\_\_\_

Date: \_\_\_\_\_

Instructor: Mr. Leomiti

Points	Criteria	Exemplary	Accomplished	Developing	Beginning
	<b>Contents</b>	<i>31-40 points</i> Portfolio contains all of the required material.	<i>21-30 points</i> Portfolio contains most of the required material.	<i>8-20 points</i> Portfolio contains some of the required material.	<i>1-7 points</i> Portfolio contains little of the required material.
	<b>Choice of Documentations</b>	<i>26-30 points</i> Samples show student progress and knowledge of Course Principles	<i>17-25 points</i> Samples show student progress and some knowledge of Course Principles.	<i>8-16 points</i> Samples show some student progress and some knowledge of Course Principles	<i>1-7 points</i> Random Selection of Sample Documents. No knowledge of Course Principles displayed.
	<b>Organization</b>	<i>15-20 points</i> Portfolio is completely and neatly organized. A Reader can easily find things.	<i>10-14 points</i> Portfolio is well organized. A Reader has little difficulty finding things.	<i>5-9 points</i> Portfolio is fairly well organized. A Reader may have a little difficulty finding things.	<i>1-4 points</i> Portfolio shows some attempt at organization. A Reader has difficulty finding things.
	<b>Personal Reflections</b>	<i>26-30 points</i> All Reflections include personal reactions that are descriptive and insightful and relate to the stated principle.	<i>17-25 points</i> Most of the Reflections include personal reactions that are descriptive and insightful and relate to the stated principle.	<i>8-16 points</i> Some of the Reflections include personal reactions that are descriptive and insightful and relate to the stated principle.	<i>1-7 points</i> Few of the Reflections include personal reactions that are descriptive and insightful and relate to the stated principle.
	<b>Portfolio Presentation (Peer Review)</b>	<i>15-20 points</i> Student spoke clearly, made appropriate eye contact during the interview and confidently answered questions.	<i>10-14 points</i> Student spoke relatively clearly, made appropriate eye contact during the interview and answered questions.	<i>5-9 points</i> Student spoke relatively clearly most of the time, made eye contact during the interview and was able to answer some questions.	<i>1-4 points</i> Student spoke unclearly, seldom made appropriate eye contact during the interview and had difficulty answering questions.
	<b>Overall Portfolio Impact</b>	<i>26-30 points</i> The portfolio demonstrates well the student's skills, abilities, and knowledge in association with course objectives and learning outcomes.	<i>17-25 points</i> The portfolio helps to demonstrate the student's skills, abilities, and knowledge in association with course objectives and learning outcomes.	<i>8-16 points</i> The portfolio does little to demonstrate the student's skills, abilities, and knowledge in association with course objectives and learning outcomes.	<i>1-7 points</i> The portfolio does not demonstrate the student's skills, abilities, and knowledge in association with course objectives and learning outcomes.
	<b>Mechanics</b>	<i>15-20 points</i> There are no errors in spelling, punctuation or grammar.	<i>10-14 points</i> There are few errors in spelling, punctuation or grammar.	<i>5-9 points</i> Errors in spelling, punctuation or grammar are evident.	<i>1-4 points</i> Errors in spelling, punctuation or grammar are numerous.
<b>/200</b>	<b>Total Points</b>				

Comments:

---



---



---

**TED-ED 150**  
**Classroom Management Plan Rubric:**

<b>Criteria Description:</b>	<b>Possible Points</b>	<b>Student Points</b>
<b>I. Organizing Your Classroom Supplies:</b>		
<b>a. Classroom Set-up:</b>	<b>10</b>	
i. Computerized Outline- a computerized outline of your classroom setting is evident in the Management Plan.		
ii. Written Description- A description of your classroom set-up is specifically described including materials that you have indicated in your classroom outline.		
<b>b. Wall &amp; Ceiling Space:</b>	<b>5</b>	
i. Written Description: A detailed description of the usage of Wall and Ceiling space is included.		
<b>c. Floor Space:</b>	<b>5</b>	
i. Written Description: A detailed description of the usage of Floor Space is included.		
<b>d. Storage Space &amp; Supplies:</b>	<b>5</b>	
i. Written Description: A detailed description of the usage of Storage Space and Supplies is included.		
<b>Section I: Points:</b>	<b>(25)</b>	
<b>II. Classroom Rules &amp; Procedures:</b>		
<b>a. Planning Your Classroom Rules:</b>	<b>10</b>	
i. Five Rules are identified- all Invitational and less discouraging.		
<b>b. Student Participation in Rule Setting and Classroom Procedures:</b>	<b>5</b>	
i. Description for Teacher Desk Usages		
ii. Description for Storage for common materials Usages		
iii. Description for Drinking Fountain, Sink, Pencil Sharpener Usages		
iv. Description for Bathroom Usage		
v. Description for Learning Centers, Stations, and Equipment Areas Usages		
<b>c. Procedures during Individual Work and Teacher-led Activities:</b>	<b>5</b>	
i. Student Attention during Presentations		
ii. Student Participation		
iii. Talking Amongst Students (student to student)		
iv. Students Obtaining Help		
v. When Individual Work has been Completed		
<b>d. Transitions into and out of the Room:</b>	<b>5</b>	
i. Students Leaving the Room		
ii. Students Returning to the Room		
iii. Ending the Day		
<b>e. Procedures during Small Group Instruction</b>	<b>5</b>	
i. Written Description: A detailed descriptions on how you will facilitate small group Instruction.		
<b>f. Procedures during Cooperative Group Activities</b>	<b>5</b>	

i. Written Description: A detailed descriptions on how you will facilitate small group Instruction.		
<b>Section II Points</b>	<b>(35)</b>	
<b><u>Section III: Whole Group Instruction:</u></b>		
<b>a. Preventing Misbehavior</b>	<b>10</b>	
i. Positive Consequences		
ii. Negative Consequences		
iii. Rewards/Incentives		
<b>Total Points</b>	<b>(10)</b>	
<b><u>Section IV: Extra Classroom Procedures:</u></b>	<b>5</b>	
<b>a. Homework</b>	<b>5</b>	
<b>b. Managing Student Assignments</b>	<b>5</b>	
<b>c. PTC Meetings</b>	<b>5</b>	
<b>d. Extra Curricular Activities</b>	<b>5</b>	
<b>e. Materials Lists &amp; Teacher Introduction</b>	<b>5</b>	
<b>Total Points</b>	<b>(30)</b>	
<b>OVERALL POINTS</b>	<b>100/100</b>	
<b>Bonus Points (15 per item) Include other areas of Classroom Management</b>		

Comments:




## ED 150 Philosophy of Education Rubric

Name: \_\_\_\_\_

Reviewed by: \_\_\_\_\_

Date: \_\_\_\_\_

Instructor: Mr. Leomiti

Grade	Points	Criteria
<b>A Paper</b>	<b>90-100pts</b>	<ul style="list-style-type: none"> <li>➤ Well organized, excellent content and ideas;</li> <li>➤ Includes a thesis paragraph, a body, and a summary paragraph;</li> <li>➤ Well written, correct grammar, spelling and punctuation, typed;</li> <li>➤ Includes character education integrated within their curriculum;</li> <li>➤ Personalized and creative;</li> <li>➤ Well cited within the body of the paper;</li> <li>➤ Includes a bibliography.</li> </ul>
<b>B Paper</b>	<b>80-89pts</b>	<ul style="list-style-type: none"> <li>➤ Not organized according to the framework but with very good content;</li> <li>➤ Missing either a thesis paragraph, a body or a summary paragraph;</li> <li>➤ Some errors in grammar, spelling and punctuation, typed</li> <li>➤ Includes character education integrated within their curriculum;</li> <li>➤ Personalized and creative;</li> <li>➤ Missing some citations or incorrectly cited Includes a bibliography.</li> </ul>
<b>C Paper</b>	<b>70-79pts</b>	<ul style="list-style-type: none"> <li>➤ Organized but not in depth content;</li> <li>➤ Missing either a thesis paragraph, a body or a summary paragraph;</li> <li>➤ Some errors in grammar, spelling and punctuation;</li> <li>➤ Did not include character education curriculum;</li> <li>➤ Not that personalized, mostly from the textbook ideas;</li> <li>➤ Missing citations;</li> <li>➤ Missing a bibliography or incorrectly written.</li> </ul>
<b>D Paper</b>	<b>60-79pts</b>	<ul style="list-style-type: none"> <li>➤ Not well organized not much content;</li> <li>➤ Missing either a thesis paragraph, a body or a summary paragraph;</li> <li>➤ Not well written, errors in grammar, spelling and punctuation;</li> <li>➤ Did not include character education curriculum;</li> <li>➤ Not that personalized, mostly from the textbook ideas;</li> <li>➤ Missing citations;</li> <li>➤ Missing a bibliography.</li> </ul>
	59 ↓	Does not meet any of the given Criteria
<b>Total Points</b>	<b>/100</b>	

Comments:

---



---



---



---



---

## English1A Essay Rubric

### **WOW!!! (90-100 Points - Grade A)**

- Begins with an introduction that shows your understanding of the issues, grabs your readers' attention, and presents a strong and insightful thesis or point of view.
- Engages the topic in a thoughtful and individual way, showing originality, elegance and clear thinking.
- Develops the topic using a strong detail, quotes from other sources, and a unique synthesis of ideas.
- Utilizes library research and quotes from outside sources, always properly citing them using the MLA format.
- Possesses a fully explained and logical progression of ideas that indicates the writer's sensitivity to different ways of looking at the topic with an awareness of key counter arguments and a consideration of how those alternate positions shape your understanding of the topic.
- Ends with a strong conclusion that clarifies the significance of the paper's lessons
- Chooses words aptly and sometimes inventively.
- Demonstrates mastery of most of the grammar and usage conventions of Standard English.
- Uses phrasing, tone, and expression that reflects a unique personal voice.

### **Good! Almost There (80-89 Points - Grade B)**

- Begins with an introduction that shows some understanding of the issues, gives some background and has an adequate thesis or point of view.
- Presents a thoughtful response to the topic, using appropriate reasoning and a partially realized analysis that is accurate.
- Develops the topic showing appropriate details, a sense of orderly progress between ideas, and use of references that reveal a familiarity with the topic.
- Uses words precisely if not creatively.
- Varies sentence structure enough to read smoothly.
- Utilizes library research and quotes from outside sources, usually properly citing them using the MLA format.
- Uses competently the conventions of written English, containing few, if any, errors in sentence structure, punctuation and capitalization or usage.
- Uses mostly consistent phrasing, tone and expression that reflects a personal world view and style.

**Getting there (70-79 Points - Grade C)**

- Presents an adequate response to the topic, using superficial analysis and weak point of view.
- Uses logical reasoning, but the supporting evidence is general and imprecise with few examples. There may be some small factual errors.
- Uses a less precise vocabulary and may contain awkwardness of expression.
- Utilizes library research and quotes from outside sources, with fairly consistent use of the MLA citation format. May make some errors.
- Contains minor errors in mechanics and usage, and perhaps one or two more distracting errors in sentence structure.
- Uses fairly consistent phrasing, tone and expression that reflect a personal world view and style with occasional inconsistencies.

**Try Again (60-69 Points - Grade D)**

- Responds to the topic illogically, without a coherent structure or focus.
- Has no point of view, uses mostly summary and lacks evidence and support.
- Makes several large, factual errors.
- Makes enough errors in usage and sentence structure to cause a reader serious, if occasional, distraction.
- Improperly uses the MLA format for citations. Makes major errors in quoting and uses few sources.
- Uses frequently inconsistent phrasing, tone and expression, often formulaic and imitative; lacks evidence of a personal worldview and style.

**Let's not even go there (50-59 Points - Grade F)**

- Doesn't attempt the task or distorts it
- Lacks organization or detail.
- Contains many distracting errors in sentence structure, simplistic or inaccurate word choice, many repeated errors in grammar and usage.
- Not enough is written to get a sense of personal worldview and style.