

Grading Rubrics

Introduction

This document describes the grading rubrics I use in my classes. It is based on the [grading philosophy](#) of [William Rapaport](#), with some [modifications](#).

Triage Grading

This grading philosophy is based on idea that all assignment submissions can be divided into four categories. Point values are assigned to these categories as illustrated in the table below:

Points	Category
0	Assignment not done, or assignment shows no indication that the material was understood
1	Assignment done but clearly incorrect
2	Assignment done and nearly correct
3	Assignment done and correct

Each component of graded work can be assigned a weight. For example, I have used the following grading scheme for a CS1 assignment:

Project Report	
Content (problem description, solution strategy)	6 4 2 0
Form (style, grammar)	3 2 1 0
Program	
Syntactic correctness (does it compile?)	6 4 2 0
Semantic correctness (does it solve the problem?)	12 8 4 0
Programming style (documentation, naming)	6 4 2 0
Total possible points: 33	

Letter Grade Assignment

The table below provides the mapping to letter grades. Although there is no integer mapping for _B grades, they emerge as the average of perfect scores (_A) and average scores (_C).

Points	Letter Grade
3	A
2	C
1	D
0	F

Final letter grades, which include _B and +/- grades, are assigned by interpolating points according to

the table below, where T is the total number of points possible.

Grade	Range	Width	T=100%
A	$(17T/18, T]$	$T/18$	94% – 100%
A-	$(8T/9, 17T/18]$	$T/18$	89% – 93%
B+	$(5T/6, 8T/9]$	$T/18$	83% – 88%
B	$(7T/9, 5T/6]$	$T/18$	78% – 82%
B-	$(13T/18, 7T/9]$	$T/18$	72% – 77%
C+	$(2T/3, 13T/18]$	$T/18$	67% – 71%
C	$(3T/5, 2T/3]$	$T/15$	60% – 66%
C-	$(8T/15, 3T/5]$	$T/15$	53% – 59%
D+	$(7T/15, 8T/15]$	$T/15$	47% – 52%
D	$(2T/5, 7T/15]$	$T/15$	40% – 46%
D-	$(T/3, 2T/5]$	$T/15$	33% – 39%
F	$[0, T/3]$	$T/3$	0% – 32%

Background and Acknowledgements

This grading system is based on the [grading philosophy](#) of [William Rapaport](#). I have customized the scheme based on two observations:

1. His scheme does not consider D^- grades, which are included in [Ball State University's grading system](#) but not at Dr. Rapaport's institution.
2. Strictly following his scheme, it is possible for a student to answer all questions incorrectly and pass the course. Although the student's grade would still be very low and the odds of this happening are slim, I still consider this a mathematical vulnerability in the grading system. My modification to the [letter grade assignment](#) and [triage system](#) ensure that passing students have shown at least minimal understanding of the material.

You are welcome to discuss this rubric with me over [email](#) or in a course discussion board. I am grateful to Dr. Rapaport for his inspiration as well as his collection of [excellent educational resources](#).