

## Damage Control: What To Do After The Exam Is Returned

*These suggestions are offered to help you improve your learning skills and test taking skills based on information available after your exam has been graded and returned to you.*

**Even before your exam is returned**, jot down any concerns or observations you have. For example, if you ran out of time, felt test anxiety was a problem, became aware that you hadn't studied sufficiently, or any other related issues, take some time to self-evaluate these issues. In particular, become aware that you and only you can help you achieve performing better on examinations. Take the time to put down in writing what you noticed about yourself and your performance while taking the exam.

***Ok... Your exam has just been returned to you. Quick peek at your score...  
Eeeek !!! Drat !!! Oh No !!! You've got to be kidding !!!***

(1) Don't faint! In the unconscious state, you aren't likely to be able to benefit from the professor's discussion of the exam solution. **Instead, be ready with several sheets of paper and in particular, be focused on what the professor is saying about the exam and about the classes' performance.** Often valuable information is being conveyed but if you are "in a fog" you will not hear or benefit from this.

(2) Don't get sick to your stomach. **A certain amount of "bad news" is to be expected** even for a student who has usually been able to perform well on exams. Try to get very philosophical about the exam. **The exam is NOT about you personally but it is about your performance.** It is a reflection of several items including how well prepared you were, how perfected your exam taking habits are, how well the professor judged the difficulty and time required to completely work the exam, how affected you were by test anxiety and other external factors (noise, distractions, personal issues, health, etc). So whatever your score, there is more hiding in that one number than just an overall assessment of your performance. Feeling like you are a failure is NOT the best way to respond to a low exam score.

(3) **Remember the TRUE purpose of an exam.** Probably there are several important functions of an exam but the main one is for the professor to attempt evaluate whether or not you can successfully apply the knowledge and techniques discussed during lecture and in reading assignments in practical situations. Note this means you may learned at great deal but be unable to apply what you have learned or demonstrate that you can use this knowledge to solve problems. That's actually an important distinction.

**Professors want to measure what you can do with what you learned and not simply verify that you have learned the material being covered.** This is one of the main differences between high school level exams and college level exams. The successful application of knowledge is one of the main goals of higher education and professional education. (See Bloom's Taxonomy).

**Another of the important purposes of the exam is to provide you with feedback.** Actually except in the case of multiple choice and true/false exams, the feedback is very complex and consists of various notations, x's, comments, etc. Frequently information is conveyed to the entire class during the discussion of the exam that is very important for all students to appreciate. It is important for the student to ACT on the exam grade and all the comments and other feedback and notations. One of the best ways to do this is **look at EVERY mark and comment made by the professor and establish that you completely understand why the mark or comment is there.** Don't treat this analysis lightly. Things aren't just "wrong".

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- Did you make a math mistake? Specifically WHAT was the mistake you made. How did it occur? How can you prevent this same mistake from happening on other exams.
- Did you employ the wrong principle? How did it happen you were confused about the application of this principle? Are you clear on it now? Are you certain you are clear?
- Was the professor unable to follow your reasoning or methodology? Did you even have a methodology? Have you forgotten your exam is a written communication to the professor and unless it is clear what your thinking is, the professor will be unable to perceive your methods and reasoning?
- Make sure you understand what you did that was incorrect and what you should have done.

(4) **At an appropriate time, check the math used to determine your exam grade.** It's not unheard of for a professor to have miscalculated or overlooked some of his notations. (We are human too!) If this happens, simply take the exam to the professor immediately AFTER class and ask him/her to recheck or explain how the grade was computed. (You may be the one making the mistake now... you are human too!) On the other hand, if your concerns are about the fashion in which the exam was graded (partial credit, unclear work, overlooked answer, etc) bring this to the professor's attention after asking him/her when there would be time to discuss the exam grade. This might take some time and there might be several students with similar concerns so it's best to arrange for a time rather than lining up right after class.

(5) **Pay attention to what the professor is SAYING and WRITING during the review of each problem.** At this time, it would be better NOT to be looking back at your exam but rather to appreciate the whole approach used by the professor in explaining the solution to the problem. Make notes and sketches that you can use later to reconstruct your own solution. This is a time for intense LISTENING and WATCHING rather than trying to compare your solution to the professor's. Worse yet, don't engage in conversation with your fellow students about their performance or your feelings about the exam. The time for that is after class.

(6) Once the exam has been discussed, find a quiet location and begin the REAL WORK of analyzing your performance and developing a strategy to improve. Start by reviewing your feelings and recollections of what occurred during the exam. **Consider the following suggested issues. Rate yourself on a scale of 1 to 5 on each issue.** (Assign 1 for a negative or failed skill and 5 for a positive or mastered skill)

- How affected were you by exam anxiety?
- How prepared were you to take the exam?
- How effective are your "learning" habits?
- How helpful was homework in identifying the effectiveness of your learning habits?
- How much cramming did you do before the exam?
- How much time was wasted trying to "find the answer" in the book (for open book exams)?
- How effectively did you allocate your time (did you run out of time)?
- How appropriately did you allocate your time (proportionately based on problem value)?
- How much time was wasted looking up information, conversation factors, equations, etc. which should be committed to memory?
- How organized were you in your approach?
- How effective are you as a problem solver?
- How clear is your solution methodology?
- Do you employ units consistently and correctly?
- Do you successfully and quickly evaluate math calculations?
- Do you constantly double-check and consider the magnitude, sign, etc. of numerical answers?
- Does your work look like a professional communication?
- Were you trying to solve problems without being entirely clear on what was being asked or how you would solve the problem?

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Continue to develop new “measures” of your exam taking success. **Learn to perform this analysis after all exams.**

(7) Take all the items above which represent “negative” factors (1-2) and **write out a specific strategy for each which you can employ to overcome the problem.** For example, test anxiety will not “go away”. You will have to spend time and energy to understand and compensate for this tendency. Similarly, if you aren’t learning from your text reading assignments, lecture experience and near-term review of lecture notes, then you will have difficulty working homework without referring to the example problems in the book. This will cause you to try to cram (definitely an undesirable habit). Again, what you fail to have is effective study and learning habits and like test anxiety they won’t suddenly improve or appear. **Only with hard work, discipline and practice will new habits slowly replace old habits.**

(8) **Once each week, take out the notes you have made above and review your strategy and reinforce the idea that you have identified specific weaknesses and have developed a strategy which needs to be worked on and continuously monitored.**

For example, suppose you ran out of time during the exam but appropriately divided your time among the problems. You carefully considered this and determined that you are not working problems fast enough. Now you will have to find for yourself ways to solve problems faster. Perhaps you sketch too slowly. Perhaps you read and reread the problem statement over and over without making progress in understanding what is being asked or how you will solve for it. Perhaps you suffer from test anxiety and find yourself in a haze or that time has suddenly disappeared. Perhaps you knew that you wanted to divide your time appropriately but don’t have a specific technique to assure it.

**In each person’s case, there will be a different strategy or strategies that will be appropriate for that individual.** One person might take every homework problem as an opportunity to try to work faster. Another person might work, rework, and rework again each problem looking for ways to get faster. Another person would be working on understanding the source of test anxiety for them and developing a strategy for identifying when they start to feel anxious about their performance. They would want to go to other books to simulate an exam environment to try out their techniques before the next real exam.

(9) Read, Read, Read. **There is a plethora of information on the web about effective test taking, study habits, problem solving skills, etc.** The library has many books which contain other examples, potential homework and practice problems, and presentation of material you might be having trouble with. The web also has course material provided by professors teaching the same course at other universities. On line sites like Amazon and Barnes and Noble often have used textbooks and old editions at a fraction of the cost of new books which can be valuable secondary resources for you to personally own. Find someone who has “negative factors” similar to your own. Arrange weekly meetings to sit down and discuss strategies and successes. Use your faculty and other university resources to help you do your best. **Be creative in assessing the factors that hinder your learning and successfully solving exam problems. Learn that YOU are in control of your success in becoming a capable problem solver.**