

Super Square Textbook Study System

SUPER SQUARE is a textbook study system developed by super college students who earn excellent grades. They devised this system for the specific purpose of helping other students maximize grades in the minimum of amount of time. **SUPER SQUARE** is a compilation of only the fastest and most efficient textbook study skills.

SUPER SQUARE is based on the idea of studying as little as is necessary to get an "A" and yet learn the material. This is why only the least time consuming steps are included. By mastering the **SUPER SQUARE** textbook study system and making it a habit, any student can save time studying and get the most out of textbooks.

Mental manipulation of material to be learned is necessary for information to transfer from short-term toward long-term memory. Simply reading over words and ideas do not require mental manipulation therefore does little to facilitate learning or recall.

The **SUPER SQUARE** textbook study system is an easy-to-follow series of steps on how to mentally manipulate material thus, increasing the ability to learn, understand, and remember.

The **S-Q-U-A-R-E** in **SUPER SQUARE** stands for:

S = Survey	Skim over a chapter <i>before</i> reading it.
Q = Question	Formulate and record questions out of main ideas before and/or while reading.
U = Understand	Use the 5 Keys to Unlocking Textbooks.
A = Answer	Read for details to answer your questions.
R = Recite	Read a question, say answers <i>aloud</i> without looking, and then check answers for accuracy.
E = Evaluate	Regularly self-test your knowledge and learning by looking at questions, reciting answers aloud, and then checking for accuracy. This also reduces forgetting.

Each step is an important link in a chain of skills for improving grades, maximizing learning/understanding, and reducing study time. Omit one of the steps and the system will weaken, reducing the chances of earning the results you desire.

Step 1. Survey by skimming before reading

Surveying is done by spending **2 to 3 minutes identifying and previewing main ideas** in a chapter BEFORE reading begins. Reading for understanding isn't done in this step.

Survey by quickly scanning over **clues to main ideas** such as:

Chapter outlines
Headings and Sub-headings
Paragraphs' first/last sentences
Bold and italicized print
Marginal notes
Diagrams, charts, pictures
Summaries and conclusions
End of chapter questions
Numbered or lettered items
Lists of key terms

Surveying helps students spot main ideas in chapters. This prepares the mind for what is to come, improves understanding, and increases recall of what has been read. Surveying begins mental manipulation of the material that is crucial for understanding and learning.

Step 2. Question by formulating & recording questions before or while reading.

Students who earn higher grades find that making questions from main points leads to more organized notes and faster learning. It is a matter of personal style whether to make questions before or during reading.

This 2nd step in **SUPER SQUARE** involves **actively seeking out important points** in textbooks for questions. This way, instead of stroking words with your eyes, you create a purpose for reading which is to actively *read to answer questions*. The result is easier concentration and better memory for what was just read. The act of questioning greatly reduces the **Blank Mind Syndrome** - reading and not remembering what was just read.

Make questions from main ideas. To help form questions similar to potential test questions, use old tests, end-of-chapter questions, questions the instructor asks in class, students who have had the course, and instructor's review sheets.

The best clue to the type of question that can be made for a test is to examine the nature of the details under *each* main idea. If the details include 5 steps, then your questions should go something like this: "What are the 5 steps in?" If the details include 7 characteristics, a question could be, "What are the 7 characteristics of?" If the details contain 3 causes and 3 effects of an event, a questions could be, "What are 3 causes and 3 effects of?"

The nature of the details dictate the format of a question

Most examinations contain questions. When students make questions from main ideas, many of these questions appear on exams. This is so because instructors skim through textbooks and lectures looking for clues to main ideas (like those listed under survey) and turn them into questions to place on exams. In step 2, you are doing this ahead of time and learning the answers *before an exam is taken*.

Step 3. Understand by using the 5 Keys to Unlocking Textbooks

Understanding what is read is absolutely essential for academic success in college. Simply reading over assignments isn't enough for most students to get an adequate understanding of ideas for sufficient recall at test time. Help is needed to check the accuracy and completeness of a learner's understanding. This help begins with the realization that *students are not tested on what has been read but on what has been understood, learned, and remembered*.

#1 Slower reading speed increases understanding. Textbooks require slower reading speeds than do novels, journals, or newspapers. If text material is difficult, it is better to reread it several times by emphasizing *each word* aloud or in your mind.

#2 Find meanings of vague or unknown terms. Do this before reading further when a word or term isn't understood the *1st time* it is encountered. It only takes a few unknown words before understanding a chapter becomes difficult to impossible. Look for definitions in the text, glossaries, and at the end of chapters.

#3 Use a proven textbook study system. There are many systems for getting the most from your textbook in the minimum amount of time such as SQ3R, OK5R, and SUPER SQUARE. If you can follow directions, you can begin getting more from your textbooks immediately and save time.

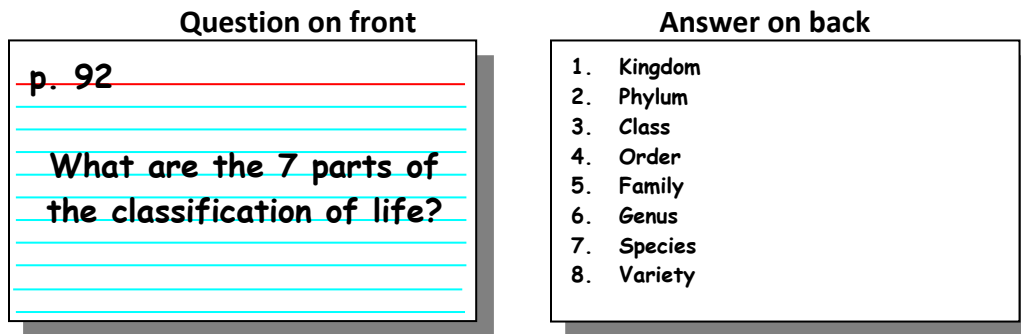
#4 Form a study group. An exchange of perceptions and opinions on important ideas and details adds to understanding. For most students, discussing and hearing material discussed helps fill in notes, speeds learning, and promotes later recall.

#5 Discuss unclear material with the instructor. Have specific questions ready when you meet with instructors. This conveys interest and effort and makes it easier for instructors to help because they can more quickly see what it is you don't understand. When material is unclear and you have done your best to understand, take specific questions to the instructor. This also communicates interest, effort and clarifies what isn't understood.

Step 4. Answer by recording answers to questions

After understanding the main ideas, clarifying details, and explanations, it is important for organization and later self-testing to record these details and explanations in the form of answers to questions. Reading to answer questions increases concentration because reading is done to find specific information. As previously stated, the ability to remember is increased because the reader *is interacting with the material to be learned*. This activity is far superior for memory and concentration than stroking the words with one's eyes simply because the material was assigned. Seeking out answers to specific questions is an effective means for interacting with material to be learned that also promotes learning and recall.

A convenient way to record questions and answers is by using notecards. One question is recorded on one side of a notecard and its answer recorded on the other side.



A variation on the notecard format is called the Cornell System. It involves drawing a vertical line about 2 1/2 inches from the left edge of a sheet of notebook paper. Questions are recorded to the left of the line and answers to the right. Answers should be covered up when reciting then used to check for accuracy of recall.

Question	Answer
What are the phases in mitosis?	A. Interphase B. Prophase C. Metaphase D. Anaphase E. Telophase
What happens in each phase?	<u>Interphase</u> Chromatin spreads out in indistinct mass. <u>Prophase</u> 1. Chromosomes condense into sets of chromatids. 2. Nucleolus and nuclear envelope disappear. 3. Spindle microtubules appear.

Question	Answer
	<p><u>Metaphase</u></p> <ol style="list-style-type: none"> 1. Spindle complete. 2. Chromatids move to metaphase plate. <p>etc.</p>

One benefit of reciting answers **aloud** is that it improves organization on written exams. Students rarely have to pause on how to structure an answer because it has already been done during recitation. Organization of answers is learned along with facts.

Step 5. Recite questions & answers aloud repeatedly

Each time a learner recites, information moves from short-term memory toward long-term memory. The more often a learner recites, information moves farther toward long-term memory.

RECITING QUESTIONS AND ANSWERS ALOUD IS YOUR #1 WEAPON AGAINST FORGETTING

Reciting involves looking at a question and reciting ALOUD as much of the answer as is possible from memory. Then, check the answer for completeness and accuracy. This way, there can be no doubt if information is learned or not. Either it can be stated correctly ALOUD from memory, or it cannot. Recite as many times as necessary to recall answers correctly without looking.

Step 6. Evaluate by self-testing & reciting regularly

When students evaluate by self-testing, **students can discover what has and what has not yet been learned before an exam is taken when you can still do something about it.**

The number of times questions and answers must be recited in order to remember on exams varies from person to person. For some, it may be 3 to 4 times to get an "A". For others, it may be 8 to 10 times to get an "A". Each student needs to discover how many recitations are needed to earn the desired grade. There is no correlation between the number of times one must recite to earn an "A" and intelligence. Rapidity in learning has more to do with assimilation (absorption) speed than intelligence and it varies among human beings for many reasons that are not always clear.

Self-test as many times as necessary in order to recall each answer completely and accurately without looking. Regular self-testing will keep potential test material fresh in the mind. It is vital because it's a foolproof way to **determine what can be recalled and what cannot be recalled before a test when something can still be done about it.**

Unfortunately, many students don't realize what it is they haven't learned until an exam is returned. Not much can be done about the grade then except to complain about the instructor or place blame for poor



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performance on someone or something else. Students, who choose not to self-test, choose to be out of control when it comes to determining grades.

Students who self-test choose to be in control because they are aware of what has been learned and what remains to be learned at a point when they have time to do something about it. Students who see choices have more opportunities for controlling their own academic lives.

As time passes, it is normal to forget material that isn't reviewed regularly. That's why regular recitation and evaluation are important. People get better at that which is rehearsed. If students rehearse by looking at questions and recalling answers from memory, they get better at it. After all, isn't that what happens on quizzes, tests or final exams?