

Memory and Concentration Online Workshop Script

1. Introduction

Welcome to the Memory and Concentration Workshop offered by the University of Texas at Dallas Student Counseling Center. We hope that you find the following materials to be useful to you during your studies at UTD. If you have any questions about the workshop, please contact us during regular business hours at 972-883-2575 or stop by our office in the Student Union.

Before proceeding with this presentation, please print out the handouts that are provided in the folder with this presentation.

2. Overview

In this presentation we will discuss ways you can improve your memory. We are going to be discussing three major areas. The first is that attention is a prerequisite to improving memory. Second, we will discuss strategies to increase concentration and attention. You will learn that attention is enhanced by increasing your motivation for the material to be learned, controlling your environment by eliminating distractions, and managing physical factors that impact attention. We will then discuss several different ways memory can be improved. These include thorough understanding of the material, organization of material, making meaningful associations, engaging in active learning, and rehearsing the material to be learned.

3. Attention is Fundamental to Memory

Many people report that they have a terrible memory when in fact they have not paid attention in the first place. For example, when you are ready to leave home and you are looking for your car keys but can't find them, you may think you have a bad memory. However, if you never paid attention to where you put your keys in the first place, you would not be able to find them with the best memory. So attending is the first step in the memory process. This is why attending to new information is crucial to the memory process. You will never be able to recall what your professor says in class if your mind is wandering or you are texting a friend during the lecture.

4. Improve Attention by Optimizing

Let's now discuss how to improve your attention. You can improve your attention by increasing motivation, creating a positive learning environment, and by managing the physical factors that impact learning.

5. Motivation

During your college experience, you will find that some of your classes, professors, and text books are very interesting and exciting. With these, it is often easy to maintain attention. On the other hand, you may find be hard to stay focused with classes that are boring or very difficult. Under these circumstances, your motivation for paying attention may falter.

In order to increase your motivation and thus increase your attention for this type of material, it may be helpful to think about how doing well on this assignment will ultimately lead to accomplishing important goals in your life. You may want to remind yourself that by doing well on the assignment, you are one

step closer to passing this class, and eventually getting a degree. Remind yourself that by completing the degree you will be one step closer to your career goal. It may be helpful to think of the rewards you will obtain by reaching your ultimate career goal. Picture yourself in the job you would like to have, with money in the bank, and the fulfilling relationships you desire. This can bring meaning to a boring assignment and increase your motivation for paying attention.

6. Control Your Environment

The second method of enhancing attention is to study in an environment that is conducive to learning. This may mean getting away from your noisy home, dorm, or apartment. You may find going to the library helpful to get away from distractions. If this is not feasible, you may want to put a “do not disturb sign” on the door of your room.

Another distraction can come from friends. When you have a test or paper to work on, and your friends invite you to do fun things such as going out to a movie or a party, it is helpful to learn to say “no” to them.

Controlling your environment can also mean turning off your cell phone to avoid distractions. In addition it is important to learn how you learn most efficiently. You may find that you work best when studying in complete silence or you may be someone who concentrates better when there is some background noise such as music. This is an individual difference and you need to discover what works best for you.

7. Physical Factors

Attention is affected by how alert and energized you are. You may be more of a day person or you may be a night person. It is best to exploit your most alert times for study and school work. Your periods of lowered alertness and energy may best be used for things such as chores and errands. Most people also benefit from alternating periods of study with breaks. It is not helpful to try to force yourself to study continuously for long periods of time. You will actually have improved attention by taking occasional breaks. During these times you may want to check emails, call friends, go for a walk, or eat a snack. Finally, as mom and dad may have told you, a good night’s sleep and adequate nutrition helps your attention and alertness.

8. Memory is Enhanced by

In this next section we are going to directly discuss ways to improve your memory. As we have already said, unless you first attend to information, there is little chance you will be able to recall it later. Now that you have tools to help your attention, we will address ways to improve your memory. In the following sections we will discuss how memory is enhanced by thoroughly understanding the material to be learned, organizing the material, finding meaning and making meaningful associations, learning actively, and rehearsing the material.

9. Understand Material to be Learned

The more you know about a particular subject the easier it is to learn new information about it, not only in terms of remembering the information but also in terms of understanding it. Learning builds on learning. If you already know something about a topic, if you are already familiar with it, then not only will the new information be more meaningful but you will also have something with which to associate

it. This suggests that learning and recall will be more difficult for the first course you take in a particular area of study.

Research has demonstrated that recall is vastly improved when you thoroughly understand the material. It is difficult to recall information that you don't fully understand. This suggests that it is important to seek help for any information given to you that is confusing, unclear, or not fully understood.

You may do this by getting help from classmates, the TA, or the professor. Most professors and TA's are willing and eager to help. If you go to them and ask a question, they usually value the opportunity to help you. Don't be shy; that is what they are paid to do. Another strategy is to explain the new concept to someone else, such as a study partner, which forces you to more fully understand the material.

10. Organization

Like the directories and sub-directories in your computer, it is helpful to find a way of filing information that you are trying to learn. Without organization, learning and recall can be difficult. How useful would a dictionary be if the words were listed in random order rather than alphabetically? One of the reasons you can find a particular word in a dictionary is because the words are organized in alphabetical order. Similarly, one of the reasons you can find a book in a library, or a particular document in a file cabinet, is because the information is organized. You do not have to search through all the words in the dictionary, all the books in the library, or all the documents in the file cabinet; you merely go to the section where the desired item is stored.

With regard to learning and recalling information from a lecture or reading a text, get an overview of the subject first. Identify the main ideas and points and then organize the information with examples that are associated with the main idea. Two specific approaches for organizing information from lectures and for reading texts will be provided later in this presentation.

You will be able to remember material more effectively when it is organized meaningfully. It may be difficult to immediately recall the numbers: 8175654189. But when you group them in series 817-565-4189, the sequence is much easier to remember. This is the idea behind phone numbers and social security numbers. In addition to arranging the order of the material in a meaningful sequence, another way to organize is to group it into similar categories. Research shows that presenting information organized into categories helps in learning the information. Consider the following list –horse, man, rose, dog, child, pansy, woman, horse, cat, carnation. To improve learning and recall, group them into categories man-woman-child, dog-cat-horse, rose-pansy-carnation.

11. Making Meaningful Associations

Can you make a drawing of the outline of the country Denmark? This may be difficult for you. On the other hand, you probably will find it much easier to draw an outline of Italy. This is because you have associated the country of Italy as looking like a boot.

Associating information with yourself and with events in your life can help you remember it. For example, you can remember when certain events happened by associating them with other more significant events that you know you will never forget, like the golfer who never got in trouble with his wife for forgetting their anniversary. He just remembered that they were married exactly one week after he got a hole in one.

Mnemonic devices are making meaningful associations with new words, acronyms, or creative sentences to which you have tied the information you wish to recall. New words or acronyms are created typically by using the first letter of a series of words: NASA (National Aeronautics and Space Administration), SCUBA (self-contained underwater breathing apparatus) and ROY G. BIV – Red, Orange, Yellow, Green etc. (for the visible spectrum) are classic examples. Creative sentences, like "every good boy does fine" allow for easy recall of the musical notes on the lines of a treble staff.

Using Rhymes- Do you remember when Columbus discovered America? Most likely you learned this rhyme at one time: "In fourteen hundred and ninety-two, Columbus sailed the ocean blue." Many people rely on a rhyme to help them remember how many days are in each month: "30 days has September, April, June and November..." Rhythm and rhyme are used by children in learning the alphabet with the following song (which also uses chunking):

AB-CD-EFG HI-JK-LMNOP-QRS-TUV WX-YZ. Now I've said my ABC's, Tell me what you think of me.

It is also useful to use multi-sensory approaches to the material that is to be learned. Memory is enhanced with the more senses you use. So not only read the material, but write it down, verbalize it, and visualize it. How many windows are in your house? Your memory search is more likely visual than verbal in answering such a question. You conjure up a visual image of each room and count the windows, and then move on to the next room. This task, which is not too hard for most people, illustrates the use of visual images in memory. Visualization of verbal material does not mean picturing the word themselves in your mind but picturing the objects, events, or ideas the words stand for.

12. Active Learning

Active learning helps one learn and remember new material. Most students are passive learners. They only read their textbook or class notes. They believe simply looking at the material is adequate to later recall it. Although this approach can be useful, it is much less efficient than also actively engaging by verbalizing or discussing the material. Active learning involves a variety of activities you can engage in that go beyond simply reading or observing. One popular method of active learning is the classic flash cards. With flash cards you have part of the information on one side of the card and the answer on the other. Another active learning method is to study with a partner where you ask each other questions about the material being learned. These active learning methods have been showed to increase learning by more than 50%. Two specific active learning approaches targeted towards reading texts and note taking, the SQ4R and Cornell Note Taking Systems, will be described.

13. SQ4R

SQ4R is a method for actively studying texts. It involves surveying the material, asking questions about the material, then reading the material and responding and recording your responses to your questions. The final step is reviewing the material.

Before you read, Survey the chapter• The title, headings, and subheadings.

- Captions under pictures, charts, graphs or maps.
- Review questions or teacher-made study guides.
- Introductory and concluding paragraphs.
- Summary.
- Try to get an overview of what lies ahead.

Question while you are surveying

- Turn the title, headings, and/or subheadings into questions.
- Read questions at the end of the chapters or after each subheading.
- Ask yourself, "What did my instructor say about this chapter or subject when it was assigned?"
- Ask yourself, "What do I already know about this subject?"
- Example, the heading "Stages of Sleep" might lead you to ask: "Is there more than one stage of sleep?" What are they and how do they differ?" Asking questions helps you read with a purpose.

When you begin to *Read*

- Look for answers to the questions you first raised.
- Answer questions at the beginning or end of chapters or study guides.
- Reread captions under pictures, graphs, etc.
- Note all the underlined, italicized, bold printed words or phrases.
- Study graphic aids.
- Reduce your speed for difficult passages.
- Stop and reread parts which are not clear.
- Read only a section at a time and recite after each section.

***Recite* after you've read a section:**

- Orally ask yourself questions about what you have just read and/or summarize, in your own words, what you read.
- Take notes from the text but write the information in your own words.
- Underline/highlight important points you've just read.
- Use the method of recitation which best suits your particular learning style.
- Remember to look for answers as you read and to recite or take notes before moving on.
- Recite key terms and concepts.

Relate

- It is easier to remember ideas that are personally meaningful.
- When you study a chapter, try to link new facts, terms, and concepts with information you already know.

Review an ongoing process. • When you're done reading, skim back over the chapter, or read your notes. Then check your memory by reciting and quizzing yourself again.

- Make frequent review a key part of your study habits.

If you are interested in finding more about the SQ4R method, please see the handout titled [SQ4R: A Classic Method For Studying Texts.](#)

14. Cornell Note Taking System

This note taking system takes advantage of the active learning approach that we have been discussing.

The first step is:

Record. During the lecture, record in the main column as many meaningful facts and ideas as you can.

Reduce. In the another column, the Recall Column, as soon after as possible, concisely summarize these ideas and facts. Summarizing clarifies meanings and relationships and strengthens memory.

Recite. Now cover the column, using only your jottings in the Recall Column as cues to help you recall, say over facts and ideas of the lecture as fully as you can, not mechanically, but in your own words and with as much appreciation of the meaning as you can. Then, uncovering your notes, verify what you have said. This procedure helps to transfer the facts and ideas to your long term memory.

Reflect. Distill opinions from your notes. Make your opinions the starting point for your own thoughts on the subject you are studying. Such thoughts aid in making sense out of courses and academic experiences by finding relationships among them.

Review. Review these notes occasionally and you will retain most of what you have learned.

15. Cornell Note Taking Template

16. Rehearsal –Prevent Forgetting

As implied in the Cornell Note Taking System, memory is greatly enhanced with rehearsal. Even those with the best memories will begin to forget information unless it is rehearsed. The attached handout titled The Curve of Forgetting illustrates the speed with which information is forgotten unless it is rehearsed. It is extremely helpful to review the information in your texts or from classroom notes periodically. Successful students will review class notes and text material each week; so that when it is time for the midterm or final the material is familiar and stored in long-term memory. Those who wait until the day before the midterm or final will be at a great disadvantage and will have a more difficult time learning and later recalling the relevant information.

17. Thank You for Your Participation

Thank you for participating in the Memory and Concentration Online workshop offered by the UT Dallas Student counseling Center.

Please take a short, multiple-choice test provided for this workshop to receive verification that you have completed this workshop. Secondly please complete the brief evaluation of this program.

You may want to visit the Counseling Center for additional resources such as self-help books and individual counseling to meet your needs. Checking out books and counseling services are offered at no charge to enrolled students. You can learn more about this and other services on our website- www.utdallas.edu/counseling . Please contact our office if you have any further questions or would like to make an appointment with a counselor.