Successful lifelong learners possess several distinguishing characteristics. These include clear educational goals, strong study skills, and positive attitudes. In addition, lifelong learners have a willingness to take advantage of intellectual stimulation and development. Knowing how to study efficiently does not come naturally; however, there are practical techniques which, when learned, often open the door to an array of related situations (i.e., effective use of time and energy; increased concentration; balance of work and family).

Theory is implicit, so it needs to be presented with specific instruction on how to apply it. After all, persons needing sulfa drugs are seldom cured by learning the chemical composition of the antibiotic but rather by ingesting it, according to specific instruction given. Similarly, the lifelong learner can use the study techniques presented, knowing the techniques are the product of extensive research and accepted education and learning theory.

Students are typically advised to study a minimum of two hours for every one hour spent in class. This, of course, varies. Some college courses require more outside study, especially if prerequisite skills and knowledge are lacking. By applying the principles of learning which follow, coping with the demands of school, work, and family will be much easier.

The Principles of Motivated Interest and Intent to Learn

To learn something thoroughly, it is important to have interest in the material being studied and an overall positive attitude towards learning. It is great if you are naturally interested in the subject matter. However, if not, you will need to create a positive mental set.

By creating a positive attitude or intent to learn, you will trigger several subsidiary attitudes, such as paying attention, getting the facts right the first time, and striving to understand. Try to look upon studying as an opportunity to learn, making your study area a sanctuary rather than a prison.

The Principles of Selectivity and Meaningful Organization

It is impossible to learn and remember any subject with all its details. Instead skim the material to determine how the material is organized and to grasp the author’s main ideas and principles. Then use them, as you would a magnet to draw out the supporting facts and details.
Be alert to relationships, particularly causes and results. Tables, graphs, diagrams, and pictures convey important information, so give them more than a passing glance. After all, they are compact, orderly arrangements which authors use to make complex relationships clear.

The Principle of Concentration

Persons who focus total thinking on the task at hand have a better chance of completing the task more quickly and accurately than persons who divide their attention. The ability to concentrate can be improved by recognizing the causes of poor concentration and controlling them as matter of habit.

External Distractions

Noise. Noise is one of the most serious single obstacles to effective study. Find a quiet place where disruptions and noise are minimal.

Soft wordless background music in industry is effective in maintaining productivity by overcoming boredom and monotony when tasks are routine or manipulative in nature. However, when tasks require higher conceptualizing thought, background music may reduce the ability to concentrate and thus, significantly lower one’s ability to learn. Of twelve studies on the effect of music on learning ability, seven reported higher scores among groups without music in the background, and five reported no significant differences in learning abilities between groups with or without music in the background.

Light. Researchers report that poor quality light can cause eye strain, general tension, dull headaches, and sleepiness—all of which interfere with concentration and learning. Reduce glare by using two light sources in the room and a good shade if using incandescent light. Two-tube fluorescent lamps are better than single-tube lamps which flicker.

Internal Disruptions

Indecision. Planning ahead as to when you will study and which tasks you will accomplish during that time prevents the psychological barrier of indecision from creating a negative attitude and wasting precious time.

Daydreaming. Daydreaming, as pleasant as it is, is one of the worst time wasters. Establish habits of giving work your full attention for 50 minutes, then rewarding yourself with 5-10 minutes of relaxation during which your mind truly wanders.
A technique which works to increase your attention span and concentration is to place a checkmark in the margin (or on a scratch sheet) each time you catch yourself daydreaming. The mere act of checking reminds you to get back to work. Students report progressing from 20+ checkmarks to only one or two after a week or two of trying this technique.

*Personal Problems.* Try to prevent personal problems from intruding on your thoughts while studying. If you find it impossible, take time to resolve them. Doing so will then allow you to fully concentrate on learning the material at hand.

*Physical fatigue.* There is little doubt that a person’s general health affects the ability to concentrate and learn. Diet, sleep, and exercise are critical components.

Research in nutrition reveals that when the amount of sugar in the blood available to cells decreases below a certain level, thinking slows down and becomes confused, and nerves become tense. Sugars and starches alone give an immediate surge of energy but leave you in a worse state than before. Take time to eat meals which combine sugars and starch with protein so the release of sugar is gradual rather than snacking on high caloric foods.

Sleep relaxes and refreshes both mind and body. Depriving the body of sleep by cramming all night before exams is a losing battle. Thinking is disorganized and memory is impaired, so little is learned or retained.

Regular exercise keeps the brain and body in tone for alert studying and thinking, and it promotes regular patterns of sleep. Taking time for exercise reaps rewards not only increasing productivity when studying, but also improving the ability to cope with life’s many responsibilities.

*Mental Fatigue.* People confuse fatigue with boredom. Rather than studying for several hours at a time, make use of the 30 minutes you have here and there throughout the day to review material to be learned. Research also shows each hour used for study during the day is equal to one and a half hours at night.
The Principles of Recitation and Review

Students who silently read their assignments, no matter how diligently, often wonder why they remember so little after several days have passed. Little do they realize that using the eyes alone as a means of absorbing information is inefficient and ineffective. Reciting aloud or writing the information even sketchily is far more effective in transferring material from the short-term memory to the long-term memory. Rather than reciting the text or your notes word for word, it is best to paraphrase it as you would if you were explaining the material to a friend. Recitation is far more effective than merely reading because: (1) you will be motivated to read for understanding, knowing that you will be stopping to paraphrase the material; (2) you will know how you are doing as you study rather than waiting for an exam to provide feedback; (3) the original memory trace is deepened because your mind must actively think about the new material; and (4) the more physical senses you use in learning, the stronger the neural trace in the brain.

It is recommended that you take concise, legible notes during class rather than tape-recording the lecture or using shorthand to get every detail. Valuable time is wasted in listening to the entire lecture again or in transcribing your notes. Likewise typing class notes is not advised because the mind cannot concentrate on two activities, that is mechanically reproducing the notes and studying. It is best to review the material by paraphrasing the main ideas and principles which were presented.

The Principle of Reflection

Reflect upon the ideas your professor and the author of the text present until they take definite shape in your mind. Research other references to bring those ideas that are still fuzzy into focus. Doing so will help weave the various ideas together and enter them in the long-term memory.

Reflect upon the principles presented in this article and try the techniques suggested to improve the efficiency and effectiveness of the time you spend studying. The time spent will be worthwhile now and in the future—Life is a learning process!