

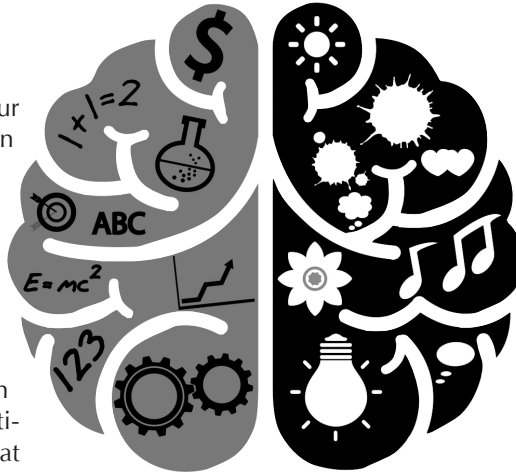
# LEFT Meets RIGHT in Whole Brain Thinking

**W**hy Whole Brain Thinking? Our peak performance (even on standardized tests) requires as many of our 100 billion brain cells as we can access. Your brain is equivalent to 100 laptops in memory capacity!

Around 1900, William James, the father of American psychology emphatically stated, we use less than one tenth of our mental capacity. Although having no scientific evidence for his estimate, modern research now confirms that our educational system develops less than 10 percent of our known capacities.

Dr. Mary Meeker, using her Structure of Intellect (SOI) system, identified 150 separate mental abilities ([www.soisystems.com/](http://www.soisystems.com/)). Of these numerous human potentials, only about a dozen or so of the “Left [side of the] Brain thinking skills, are cultivated in the classroom. Little systematic emphasis is placed on “Right [side of the] Brain visual/creative thinking skills and counteracting negative thinking. Generally, “if it is not taught--it is not tested” so we don’t even know which students may be especially wired for gifted Right Brain “creative” thinking.

Ask yourself: Are you smarter than your Smart Phone? The average Smart Phone has access to more information than



any single individual. The key to becoming smarter than your smart phone is the cultivation of creativity, invention and curiosity. Curiosity can take the form of meaningful questions such as “how can we teach compassion to reduce bullying and violence in our schools?”

The immediate value of more balanced thinking is made obvious by the fact that children who use both Left and Right thinking modes (as measured by electroencephalogram) perform better on standardized intellectual tasks than children using predominantly Left Brain reasoning.

## Brain Basics

Brain research has illustrated that each

half or hemisphere actually has its own personality and set of specialties.

Generally, you talk with your Left Brain and imagine with your Right Brain. The Left Brain deals with facts and the Right Brain more with feelings. Positive emotions are a product of the Left Brain; negative emotions (e.g., test-anxiety) stem from the Right Brain.

In the classroom, the Left Brain deals with the three R’s (reading, writing, and arithmetic), the Right Brain deals with visual and performing arts, physical education and industrial arts. The Left Brain dominates when you take careful notes, while doodling means you are drifting into a mostly visual, Right Brain mode.

The Left Brain is better at finding differences between ideas and concepts (how are an apple and orange different), while the Right Brain sees similarities (how are an apple and orange the same). In terms of overall approach, the Left Brain makes “order out of chaos,” while the Right Brain makes creative, sometimes useful, chaos out of order.

Most children identified as gifted tend to be Left Brain in their talents. They are advanced in their use of language, display excellent logical reasoning skills and perform exceptionally well in the 3 R’s. >>>

## **Fostering a Partnership Between Hemispheres**

The more fully both hemispheres are involved in learning, the better information will be remembered and used.

Cursive writing, which is becoming a fading art in over 40 states, is a natural, time trusted way of integrating Left and Right Brain functions. Soon, some of our most important articles (e.g. The Constitution) written in cursive, will become museum pieces, read by some, but unable to be reproduced in cursive by most.

Advertising is a very powerful application of this principle. Highly memorable ads feature aspects that involve Left Brain thinking (words, sometimes false logic) and Right Brain thinking [pictures, music, emotions]).

Activities designed to exercise both sides of thinking include:

- Learning a Romance Language (Spanish or French)
- Defining highly emotive words
- Plays, charades
- Describing personally important events
- Reading mysteries, science fiction, and adventure stories
- Cartooning, humor, puns
- Rhyming, singing, dancing, mime
- Photo Story
- Playing chess, checkers

Play can also be used to balance out thinking skills. Highly verbal games such as Trivial Pursuit, Word Find or Scrabble may benefit Right Brain students. Left Brain, highly-verbal gifted children can exercise spatial reasoning skills with Rubik's cube or similar activities.

## **Questioning Strategies**

Imaginative, Right Brain thinking can be encouraged by asking your child speculative questions rather than the

usual factual ones (who, what, where, why, when, how). Key speculative questions involve a "what if, why not", "in how many ways" approach. For example, instead of requiring factual answers by asking "What were the original 13 colonies? You could ask, "What might have happened if the colonies had been based in California?"

## **Visual Thinking**

Visualization is the major communication path of the Right Brain. Rather than a written report about a topic, suggest that your student construct a model, paint a picture or develop a "photo story" or Power Point presentation. Visit local museums on topics of interest or consult illustrated versions (even an encyclopedia). Of course, using the Internet is invaluable. Emphasize to the child the importance of looking at all the pictures, illustrations and end of chapter questions before reading a chapter. Have your student draw scenes that he or she imagines of stories you read together. Listening to storytelling media will also strengthen your student's picturing ability.

## **Increasing Creative "Prime-Time"**

"Gather the facts, then relax" is the creativity formula practiced by some of the greatest minds in history. After intense fact gathering, many highly creative individuals enjoyed a catnap. They claimed catnapping aided in the creation of innovative ideas. The "Man of the 20th Century", Albert Einstein, catnapped and he believed naps inspired his creativity. John F. Kennedy, Thomas Edison, and Salvador Dali all enjoyed catnaps.

Physical relaxation is a critical ingredient for enhancing Right Brain creative thinking. Research shows that the brain is in prime time for creative thinking only about 5% of the time, primarily right be-

fore sleeping. A hallmark of creative genius is the ability to bring about creative "prime time" at will—at any hour—by deeply relaxing. Children are especially good at learning to relax.

Strenuous physical activity helps the body and mind relax, and there are books and tapes available to help reduce anxiety and improve creative thinking. Inactivity has actually been linked to negative changes in brain physiology. Sweat from exercise is the fountain of youth to keep your brain young, nimble and quick

## **Vive La Difference: Males, Get in Touch With Your Feminine Side**

Since embryonically, we all start off as females, every male has a feminine side. Due to differing development in brain architecture during the neonatal period, females are equipped with the ability to shift between left and right hemispheres more easily than males. Females can engage in multi-thinking. Bilateral shifting may account for females' uncanny intuition. Males are more single-minded (using one brain at a time) so repetition of a single idea may be useful.

## **Educate Your Other (Right) Half to Increase Your Personal Brain-Power.**

Studies measuring brain activity of eminently creative scientists during problem solving sessions have consistently shown a high degree of right brain involvement among subjects. Educating our other Half of thinking can bring out the best in all of us.

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