

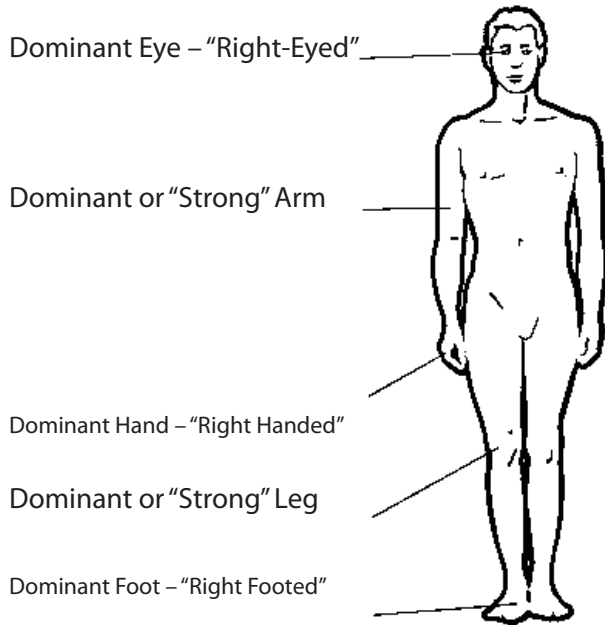
# The Theory Behind the HBDI® and Whole Brain® Technology



Ned Herrmann



Dominance, such as handedness, can occur between two parts of a physically living whole. Dominance is perfectly normal and natural. It is part of the human condition, and all human beings experience its consequences everyday. The human body is made up largely of paired structures, most of which are not perfectly matched. Stated differently, the apparent mirror image symmetry of the human body (arms, legs, face, eyes) is in



reality an array of asymmetrical parts. It is this fundamental asymmetry that leads to the concept of dominance. For example, most people have a dominant arm and hand, a dominant leg and foot, and a dominant eye. For most of us, this choice is made early in life and continues to gain strength through usage. It stands to reason that if we prefer to use our right arm and hand, we will use it more often and use it in a variety of ways, all of which will add to the strength of the right arm and hand and its capability to perform tasks such as carpentry, drawing and writing.

These physical examples of body preferences are the more obvious illustrations of the presence and consequence of dominance.

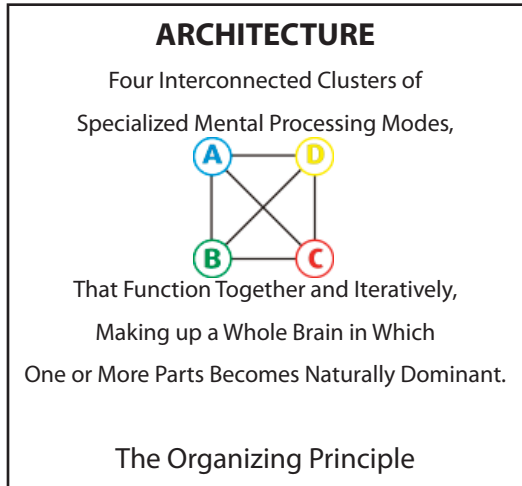
The human body also has many other paired structures that are located internally and not visibly obvious. These include our two lungs and kidneys. Of major importance are the paired structures that exist in the brain. These are comprised of the two big hemispheres and the two halves of the limbic system, both of which are connected together by powerful links that allow the four of them to function on a coordinated basis.

Just as is the case with our hands, feet, and eyes, these paired brain structures are asymmetrical. They are different physically and chemically as a result of being specialized to think in different ways and to do different things.

In the case of hands, feet and eyes, these dominance differences are quite obvious. For example, we use our dominant hand more frequently than our non-dominant hand and, therefore, it becomes stronger and more capable. In the case of the brain, our preference to think in particular ways results in more frequent use of that particular brain part (one hemisphere or one limbic half) with the resulting development of greater competency for that set of mental activities that are located in those specialized parts. Just as our less developed non-dominant hand assists our stronger, more skillful dominant hand, the less developed brain structures collaborate with the more preferred (and therefore dominant) thought processes of our brain in order to more fully apply our best mental ability to everyday tasks and events. It is natural for our brain to form a coalition of the specialized structures in order to deal with complex situations.

At birth, the brain is without developed preferences, and, is therefore, essentially whole. As the brain matures, it acquires preferences as a result of the individual’s life experiences. The developing brain is, therefore, an evolving coalition of many different preferences.

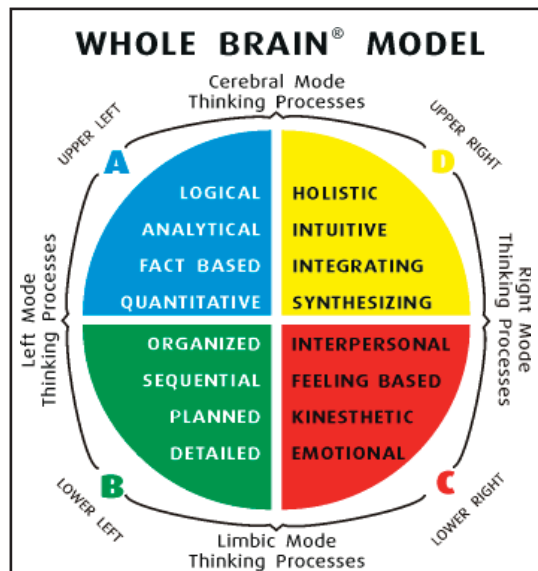
Whole Brain® technology provides a basis for measuring these different preferences by determining the degree of dominance that has developed among the four thinking structures of the brain. These parts consist of the two cerebral pairs (hemispheres) and the



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two limbic pairs (limbic halves). All four of which are massively interconnected. Taken together, these represent a Whole Brain® divided into four equal quadrants, designated as A, B, C, and D.

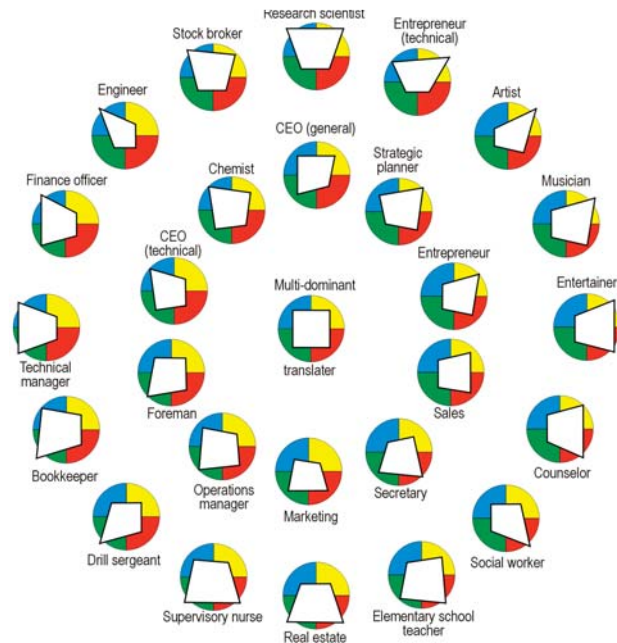
The HBDI®, through its scientifically designed questions, is capable of isolating out and measuring the strength of preference for each of these four thinking parts. These consist of the left and right cerebral hemispheres



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and the left and right halves of the limbic system. The two left side structures combine to represent what is popularly called left brain thinking. The two right side structures combine to represent right brain thinking. The two cerebral structures combine to represent cerebral thinking and the two limbic structures combine to represent limbic thinking. The HBDI® is capable of measuring the degree of preference between each of the four individual thinking structures (quadrants) and each of the four paired structures (modes).

This thinking assessment is accomplished through a 120-question survey instrument, the responses to which assess the strength of the four different thinking quadrants and compares each to one another. This results in a four-quadrant profile, which displays the degree of preference for each of the four quadrants. These profiles are different for



different occupations. Shown here is a representative array of occupational profiles. The differences between the profiles result from the mental differences required by different occupations. Our active database of about 200,000 profiles represents over 200 occupations. Taken together, these profiles are equally distributed in the four quadrant

model and can be thought of as a balanced universe of thinking styles.

This ability to profile thinking styles is a major application of Whole Brain® Technology. As a tool, the HBDI® is the validated, worldwide standard for accomplishing this assessment.

Once an individual or group has their HBDI® profile, they are better able to successfully apply not only their understanding of their thinking style, but also their preferred learning, communicating, and problem solving styles, to name a few. Experience over the last 20 years has shown that individual and group applications of the HBDI® and the Whole Brain® Technology are almost without limit.

December 1, 1998



better results through better thinking

## Clients

The Herrmann International clients, for whom better thinking has become integral to their business culture, include:

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**Chevron**

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**University of Pretoria, S. Africa**

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