

## What Is Intelligence?

Intelligence is commonly defined as the capacity for learning, reasoning, and understanding; aptitude in grasping truths, relationships, facts, meanings, etc. Intelligence is also the ability to discern effective and appropriate behavior. There has been much debate in recent years about whether intelligence is inherited or environmentally influenced. In *A Parenting Manual*, I explain that while DNA has coded within it the basic patterns for brain development, DNA does not determine all our neuronal connections. These form through experiences and environmental influence. When children lack love, are continuously over-stimulated, fearful, or worried, they become preoccupied with the internal stress. Their ability to adapt diminishes. As they become conditioned to stress, the brain's neuronal patterns are set in stress response patterns. According to Martin Seligman, Ph.D., author of *The Optimistic Child*, despite the emphasis on self-esteem and the abundance of child-rearing strategies, today's children have never been more depressed or pessimistic.<sup>1</sup> Children need love. They need to know how to keep alive or rekindle their childlike spirit. A playful, loving attitude is a key to lifelong learning.

## Multiple Intelligences

Howard Gardner, author of the book *Frames of Mind*, proposes that the human system has multiple intelligences: linguistic, logical-mathematical, spatial, musical, bodily-kinesthetic, intrapersonal (knowing yourself), and interpersonal (knowing others). Children are generally stronger in one or two types than others.<sup>2</sup> In his book *Peak Learning*, Ronald Gross encourages adults and teachers to use a natural intelligence inclination to enhance other areas of intelligence.<sup>3</sup> Gross suggests, "Suppose you have a strong spatial intelligence and you're setting out on a study of philosophy. How might you link learning with your predilection for visual forms, shapes, and patterns?"

Having a strong spatial, logical-mathematical, or other isolated area of intelligence can serve as a tool or method for learning — but it is not necessarily "good" or altruistic in and of itself. Howard Gardner notes that while the word intelligence has a positive connotation in our culture, there is no reason to think that intelligence must be put to good purposes. In fact, one can use one's logical-mathematical, linguistic, or interpersonal intelligence for ill-motivated or corrupt purposes.

Learning to love and developing the intelligence of the heart enhances all other aspects of intelligence *for the good of the whole*. The heart intelligence always strives for a complete intelligence. It expands perception and imagination to transform any problem into a learning opportunity. Albert Einstein once stated, "The mere formulation of a problem is often far more essential than its solution, which may be a matter of mathematical or experimental skill. To raise new questions, new possibilities, to regard old problems from a new angle requires creative imagination and marks real advance in science." It was Einstein's passion for science and his love and care for humanity that allowed his heart intelligence to imagine, perceive, and explain so much to the world.

The games and activities in *Teaching Children to Love* incorporate the learning styles of each type of intelligence. However, the main theme — developing heart intelligence — is what will improve your child's learning in any area. Through heart intelligence it is possible to gain an

understanding and appreciation of all types of intelligence. Whether or not children play music or paint well, through the heart they will be able to love and appreciate music and art. Whether or not they are strong in interpersonal skills and communication, the tools and games will develop interpersonal intelligence through enhancing the heart connection between the children and other people in their lives. If a child is learning disabled, practicing the HeartMath Heart Tools will enhance his ability to overcome that disability. As heart intelligence expands and develops, the brain's intelligence becomes more complete in actualizing its potential for fulfillment. Adults and children can become more intelligent in any area they choose. It starts with increasing your love, perception, and understanding.

### The Physiology of Heart Intelligence

Central to our research at the Institute of HeartMath, and to this book, is the discovery that the heart is vital to effective learning on all levels — physically, mentally, and emotionally. The heart is an essential balancing organ. It helps balance the autonomic nervous system and produces a hormone, ANP, called “the balancing hormone,” which has receptors in the brain.<sup>4</sup> Research at the Institute of HeartMath has shown that the higher perceptual faculties in the brain perform better when electrical rhythms produced by the heart are balanced and harmonious.<sup>5</sup> Positive feelings of love, care, appreciation, and compassion are what create balanced and harmonious heart rhythms.<sup>6</sup>

People feel love in the area of the heart. The physical heart responds to love and this can be measured in the ECG (electrocardiogram) and in HRV (heart rate variability) rhythms.<sup>6</sup> On the other hand, when a child or adult feels frustrated, angry, worried, fearful or stressed, their heart rhythms become unbalanced and disordered. Stress creates “cortical inhibition,” a shutting down of the creative faculties which causes the brain to be less efficient in making choices. By learning to generate loving and appreciative feelings, heart rhythms come back into balance and regain their natural harmony. Adaptability and creative learning are reinstated. Whereas it usually takes adults hours or days to feel loving again after a stressful episode, children have a great ability to move from loving to frustrated and back to loving quickly. However, if stress remains unresolved and heart rhythms remain disordered, a child's natural adaptability and hopefulness diminishes.

Many Asian and native cultures have understood that the heart is much more than just a physical organ. In Japanese, the word “kokoro” describes the mind of the heart. It is this intelligence of the heart which is the key to learning and is activated by love. It is through love that the electrical rhythms of the brain synchronize with the harmonious electrical rhythms of the heart. When heart and brain are in sync, more power and intelligence become available to the brain. Perception increases. *Teaching Children to Love* shows children how to self-generate feelings of love, care, appreciation, and compassion to enhance perception and well-being. In addition to synchronizing heart and brain, loving feelings have been shown scientifically to have profound positive effects on the nervous, immune, and hormonal systems.

Dr. Karl Pribram is one of the pioneers of modern neuroscience and author of numerous books on brain function, including *Brain and Perception* which mathematically proves how the brain functions under holographic principles.<sup>7</sup> Dr. Pribram has commented, “The heart as an input system to the brain is very powerful. It can be studied in the way the visual or auditory system can be studied. The optic system can function, but without a lens you won't see anything. Add a lens