

History of Interest in the Visual-Spatial Learner

Analysis of psychometric patterns and clinical observations led to the development of the visual-spatial construct in 1982. The paper, "The Visual-Spatial Learner" received positive responses from clients and from students at the University of Denver and North Carolina State University. In July, 1987, it was presented to an international audience under the title "Global Learners" at the Seventh World Conference on Gifted and Talented Children. Four months later, it was incorporated into a model for training engineering professors and was presented at the American Institute of Chemical Engineers. The following year, this model was published in *Engineering Education* (Felder & Silverman, 1988) and won the William Elgin Wickenden Award for the outstanding paper in engineering education. It is the most cited paper in the field of engineering education, and the model is still widely used in that field.

Three papers based on the concept were published in 1989: "The Visual-Spatial Learner," "Spatial Learners," and "Invisible Gifts, Invisible Handicaps." Later that year, the West Palm Beach School District in Florida requested a full-day inservice on the topic, and several other school districts followed suit. Dr. Silverman presented the concept in Singapore in 1989 when she was invited by the Ministry of Education. She was also invited to speak on the topic in Hobart, Tasmania in 1989. In 1991, Dr. Silverman was asked to give a keynote address on the visual-spatial learner at the South Dakota Association for Gifted Children Conference.

In 1992, the state of Missouri created a videotape on the concept directed at teachers in all subject areas K-12 that was televised by satellite to school districts throughout the state. In that same year, an interdisciplinary team was brought together at the Gifted Development Center to create an instrument to identify these children. *The Visual-Spatial Learner: Observer Report* and *The Visual-Spatial Learner: Self-Report* resulted from several years of volunteer work by this committee. A preliminary study was conducted in 1995-1996 with 65 students thought to be visual-spatial learners and their parents or teachers; the results were entered into a database. With the generosity of the Morris S. Smith Foundation, the first validation study of the instrument was undertaken in 1997.

The Independent Schools Association invited Dr. Silverman to present on "The Special Needs of Spatial Learners" in November, 1993. The construct was part of an invited address for the International Council for Exceptional Children in April, 1994. The paper was published in a monograph on gifted children with learning disabilities (Silverman, 2001). Also in 1994, Dr. Silverman was invited to speak on the topic in Adelaide, Australia. A television crew from TV ASAHI in Tokyo, Japan, filmed a meeting of the Visual-Spatial Learner Study Group in August, 1994. A short paper entitled, "Effective Strategies for Gifted Visual-

Spatial Learners" was developed for the producer. A fifteen minute segment on the Gifted Development Center was televised in Tokyo September 1, 1994.

A paper entitled, "Toward the Construction of an Instrument to Assess Visual-Spatial Learners" was presented at the prestigious Henry B. & Jocelyn Wallace National Research Symposium on Talent Development at the University of Iowa on May 9, 1995. It appeared in the *Proceedings* of that conference (Silverman, 1999). Both Steven Haas and Linda Silverman presented papers on the visual-spatial learner at the Eleventh World Conference on Gifted and Talented Children in Hong Kong, in August, 1995. Dr. Silverman's paper was among those selected to be translated into Chinese. She also conducted inservice training workshops for the Education Department of Hong Kong that included the visual-spatial learner concept.

In January, 1996, The British Columbia Alternate Education Association extended an invitation to address "Are Gifted Underachievers Primarily Visual-Spatial Learners." "Reaching Visual-Spatial Learners" was an invited address at a Northeastern Illinois University Conference on underserved children in April, 1996. In October of that year, Eton Academy and The Roeper School in Michigan invited presentations on this topic. In December, 1996, the San Francisco Unified School District and the Reading Research Council in Burlingame, California, asked Dr. Silverman to address their groups. Dr. Ronald Davis of the Reading Research Council has posted excerpts from "Strategies for Gifted Visual-Spatial Learners" on his website and printed it in his *Dyslexia Newsletter*.

In 1997, Dr. Silverman delivered a series of lectures on the topic in Melbourne, Sydney, Ballarat, Bendigo, and Lithgow, Australia. "Reaching Visual-Spatial Learners" was presented at The Texas Association for Gifted and Talented Annual Conference in November, 1997. In May, 1997, Dr. Silverman was invited to the Massachusetts Institute of Technology to present on this topic for the national Hollingworth Center Conference on the Highly Gifted.

From 1997 to the present date, the presentations on the concept have been too numerous to list. Perhaps the most outstanding invitations have been two symposia organized in Dr. Silverman's honor in England by the Arts Dyslexia Trust in 2000: one at Green College, Oxford University, and one at the London College of Printing. She has also received two invitations to present at the prestigious research conference, the Henry B. and Jocelyn Wallace National Research Symposium on Talent Development at the University of Iowa in 1995 and 2000.

In 2002, *Upside-Down Brilliance: The Visual-Spatial Learner* was released (Denver: DeLeon Publishing). It was showcased at Barnes & Noble stores

across the country in May/June, 2004. In 2004, *Raising Topsy-Turvy Kids: Successfully Parenting Your Visual-Spatial Child*, a companion book for parents, written by Alexandra Golon, was released (Denver: DeLeon Publishing). In 2004, Dr. Silverman and Alexandra Golon were invited to Vancouver, BC, and Whitehorse, Yukon in Canada. In 2005, they were invited to Edmonton, Alberta and Whitehorse, Yukon in Canada; Auckland and Christchurch, New Zealand; and Brisbane, Sydney, Canberra and Melbourne, Australia.