

57-73

IT TAKES EFFORT AND TIME TO ACHIEVE NEW WAYS OF THINKING: CREATIVITY AND ART EDUCATION

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After attending several National Art Education Association conventions, I became interested in the topic of creativity not for its presence at these conventions, but for its lack of attention. At the National Art Education Association Convention in 1998, there were 763 presentations and only one addressed the topic of creativity. At the 2002 National Art Education Convention, representation of the topic of creativity was still sparse; of the over 590 sessions in the conference program, only eight mentioned creativity in an abstract and only one entry included creativity in its title. The scarcity of mention of creativity in art education literature and at public presentations was not always the case in the past (Clark & Zimmerman, 2001a; Zimmerman, 2004).

In the 1930s and 1940s, writings of John Dewey and the Progressive Education Movement had great influence on art education theory and practice. Dewey emphasized importance of individuals, schools, and society and the role that experience played in education. At this time, Viktor

Lowenfeld's notions of self-expression and creativity in visual arts education became popular and dominated the field of art education for the next five decades. His book, *Creative and Mental Growth* (1949), was published in seven successive editions. During the past decade and a half, due to the influence of the Getty Center for Education in the Arts, a major change in theory and practice, referred to *discipline-based art education*, in the field of art education took place (Clark, Day, & Greer, 1987).

Discipline-based art education (DBAE) differed radically from principles in the creative self-expression movement. Emphasis of the creative self-expression movement was to develop each student's creative and expressive abilities and creativity was thought of as developing naturally without imposition of adult intervention. Curricula often were developed locally without sequencing and the art teacher's role was to provide motivation, support, and resources, but not to interfere directly with students' creative activities. In a discipline-based approach to art education, however, students are taught through articulated and sequenced curricula in which art disciplines are emphasized and work of adult artists, from diverse cultural contexts, serve as motivators for students' creative development.

As the discipline-centered movement became popular, the term creativity was scarcely mentioned the field of visual art education and there was a paucity of research in this area. Although many visual art programs emphasized creativity as an outcome, identification of student creative characteristics or a research basis upon which to assess creative outcomes often is absent.

Definitions of Creativity and Their Relation to the Terms Gifted and Talented

When *creativity* is mentioned in the gifted and talented education literature, there are no agreed upon definitions of this term or its connection to the terms *gifted* and *talented*. The relationship between creativity, giftedness, and talent development has been explained in three different ways: (1) giftedness and talent are viewed as separate intellectual abilities, with giftedness associated with high intelligence and creativity associated with novel or divergent thinking; (2) creativity is viewed as a fundamental to the concept of

giftedness, and (3) creativity is considered as a separate category or style of giftedness (Hunsaker and Callahan, 1995). The term *gifted* often refers to students who have superior academic abilities, whereas the term *talented* usually refers to students with superior abilities in the visual and performing arts. In educational practice, the term *gifted* often is seen as a fixed concept that cannot be changed by education, whereas *talent* implies that students can be nurtured to develop special abilities and educational intervention plays a major role. Feldhusen (1992) suggested that *talent development* be applied to academic school subjects and the term talent development replace the concept of expanding upon predetermined 'gifts' (Feldhusen, 1992; Feldhusen & Hoover, 1986).

There also is no agreement about the relationship among the terms *creativity*, *talent*, and *giftedness* (Zimmerman, 2004). The definition of *creativity* as an ability to produce work that is both novel and appropriate is widely accepted (Sternberg & Lubart, 1999). *Creativity*, as defined by contemporary educators and psychologists, is an interrelated system in of relationships among persons, processes, products, and social and cultural contexts (Csikentmihalyi, 1996; Feldman, 1999; Gruber, 1989; Sternberg, 1999). According to Sternberg (1999) creative outcomes occur in one or more domains of knowledge; therefore, people are not creative in a general sense, they are creative in particular domains such as the visual arts and judged by a community of experts within this domain.

Gardner (1996) also explained that talented individuals' work matches a particular domain of knowledge within their cultures and members of related fields judge these talented people to be highly competent. On the other hand, creative individuals do not fit within a domain of knowledge and only after passage of time and a great amount of effort to develop a body of work is there a possibility that they are valued within their culture. Identifying giftedness in the arts and sciences, as evidenced by high IQ scores, may not be an accurate way to indicate adult creative achievements, and there may not a significant relationship between IQ scores and creativity (Feist, 1999).

Within various arts areas, many vastly different behaviors and abilities often are required for success. In the 1970s, studies about personalities of young, college level, visual arts students indicated that their personalities and

abilities differed substantially from those of advertising and industrial arts majors (Csikszentmihalyi & Getzels, 1973; personalities of students and professionals within arts areas such as acting, dance, writing, and visual arts were found to differ as well (Barron, 1972). Professionals in fields related to the arts, such as aestheticians, critics, and historians, demonstrate skills and abilities that differ greatly from those required for success by visual artists. Intelligence needed for success clearly cannot be defined as a single characteristic, but includes multiple ways of dealing with knowledge, skills, and understandings in the visual arts (Zimmerman, 2004).

Relationship between Creativity and Intelligence

Sternberg (2001) viewed intelligence in a dialectical relationship to creativity, where intelligence is viewed as advancing societal norms and creativity is seen as opposing societal norms and at the same time proposing new norms. A person therefore needs intelligence to be creative, but not all intelligent people are creative. Creativity is a characteristic of an individual as he or she reacts with one or more structures within a particular socio-cultural context. Sternberg (2001) used an example of a Cubist painting that was viewed as highly creative at a particular time in the past, but today may be seen as less creative than when it was originally conceived because such a concept no longer is considered novel.

During the 1970s, creativity tests came into popular usage and were used to measure general problem solving skills and divergent thinking abilities. In the 1980s, a number of educators endorsed using creativity tests to identify talented students for visual arts programs (Khatena, 1982, 1989; Hurwitz & Day 2001; Greenlaw & Macintosh; 1988). Creative achievements in writing, science, medicine, and leadership, however, were found to be more easily predictable than creative achievements in music, the visual arts, business, or industry (Torrance, 1962). Khatena (1982). Others, however, claimed that visual and performing arts abilities are closely associated with creativity as a measurable construct. When Clark tested over 1200 third graders in four ethnically diverse communities in the United States he found a positive correlation among drawing ability, as measured by Clark's Drawing Abilities Test (CDAT), creativity, as determined by Torrance Tests of Creative Thinking

(TTCT), and results of state-wide achievement tests (Clark & Zimmerman, 2001b, 2005; Zimmerman, 2004). These findings indicated that for these populations, performance on the three tests was affected by a factor or factors, such as intelligence and problem-solving skills, as well as specific skills required in the visual arts. The TTCT, however, appeared to measure native, inherent abilities that are relatively unaffected by past experiences and developed skills. The CDAT measured both problem-solving skills and differentiated drawing abilities, and also seemed to be sensitive to students' past experiences and previously learned skills. The CDAT scores often accelerated with age, however, whereas scores on the TTCT remained relatively constant over time. Clark concluded that these findings might indicate that there is a positive correlation between high intelligence, high academic achievement, and high ability in the visual arts.

Children and Art Students and Their Creative Acts

Many scholars agree that creative achievement is reflected in production of useful, new ideas or products that result from defining a problem and solving it in a novel way (Hunsaker & Callahan, 1995; McPherson, 1997; Mumford, Connely, Baughnan, & Marks, 1994; Wakefield, 1992). Some distinguish between expert, adult creative acts and those of novices. James (1999-2000) defined *artistic creativity* as a series of "decisions and actions that are both purposeful and not predictable ... it is an individual and a social process during which materials, forms, and cultural conventions are fused with the artist's personal history and emotions. Something is created that has never before existed in exactly that form" (p.115). Creativity has been referred to as inventiveness within a domain of knowledge, where a creative person's work is recognized as significant in a domain by those in fields that direct the domain (Csikszentmihalyi, 1988, 1990, 1996; Feldman, 1982; Gardner, 1999; Winner & Martino, 1993). There is no evidence, according to some scholars, that talented children have been able to reorganize a domain of knowledge (Winner & Martino, 1993). Children are able to demonstrate talent in a number of areas, according to Csikszentmihalyi (1996), but they cannot be viewed as truly creative because creativity involves changing a domain and ways of organizing knowledge within that domain. No matter how precocious

a child is he or she is not able to accomplish this achievement.

There needs therefore to be a differentiation between creativity at an individual level as a person solves problems in daily life and at a societal level where creativity can lead to new findings, movements, inventions, and programs (Csikszentmihalyi, 1996; Sternberg, 1999). Some researchers hold a position that everyone has some creative ability and this capability should be supported in educational settings (Parkhurst, 1999). Creativity can then be viewed as what is creative for an individual rather than the society in which that person resides. If art students can be viewed as creative, then it then would be possible to teach them skills and understandings to help them think creatively.

Although examining art products for evidence of talent and creativity in the visual arts is common, it also is possible to observe behaviors that may indicate a predisposition to create art products or are manifest while students engaged in art making (Clark & Zimmerman, 2005). Dispositional factors have been found to differentiate less creative students who produced drawings that were realistic without much inventiveness from creative students who found problems and attempted to solve them by producing novel solutions (Getzels & Csikszentmihalyi, 1976). Dudek and Cote (1994) determined that factors such as problem-finding, problem-solving, ability to become emotionally involved, and focus on finding personal visions, were relevant throughout students' successful creative engagement with art projects.

Adult Creative Achievement in the Arts

After an extensive longitudinal literature review to determine if personality had an influence on adult creative achievement in art and science, Feist (1999) found that creative artists and scientists tended to be open to new experiences, self-confident, self-accepting, driven, ambitious, hostile, and impulsive, and less conventional and conscientious than others in the general population. Artists, however, were found to be more affective, emotionally unstable, as well as less socialized and accepting of group norms than were scientists who were found to be more conscientious. Feist also determined that traits that distinguish creative children and adolescents

tend to be ones that distinguish creative adults and that creative personalities tend to be stable over time.

Individual creative, adult traits also were described by Gardner (1999). In his study of creative individuals from many different domains, he found them to possess high energy levels and be extremely demanding, self-promoting, and prone to deprecate others; evidence child-like traits; ignore convention; and be fascinated by their own childhood experiences. He characterized five kinds of creative activity: 1) solving a well defined problem; 2) devising an all-encompassing theory; 3) creating work that has distance in time from creation to time the work is evaluated; 4) performing a ritualized work; and 5) performing a series of actions that bring about some kind of political or social change. According to Gardner (1999), categories 3 and 4 above are those most connected with artistic creativity.

Csiksentmihalyi and his colleagues (1996) interviewed over 90 exceptional, creative men and women from around the world, including artists, who were at least 60 years old and who had made contributions in a major domain within their culture. Traits they found that were associated with creativity often were dichotomous and included: 1) displaying a great amount of physical energy and a need for quiet times, 2) being wise and childish, 3) being playful and disciplined, 4) using imagination rooted in reality, 5) being extroverted and introverted, 6) being humble and proud, 7) displaying a tendency toward being androgynous, 8) being traditional and rebellious, 9) being passionate yet objective about work, and 10) displaying ability to suffer and enjoying creation for its own sake.

Case Studies of Creative Children and Adults

The case study method has long been considered a productive avenue when considering the work of significantly creative adults and children. There have been a number of case studies about the work of talented young artists who evidenced precocious abilities in the visual arts (Gardner, 1980; Goldsmith, 1992; Golomb, 1992, 1995; Wilson & Wilson, 1980; Zimmerman, 1992b, 1995). All of these studies emphasized spontaneous artwork done by precocious youngsters, from early childhood through their adolescence, or emphasized specific time periods during the development of these young

artists. In Zimmerman's (1992b, 1995, 2004) case study about Eric, an artistically talented student, his body of work demonstrated a learned set of characteristics influenced by his home-life, culture, and educational opportunities that were available to him. Eric spoke about development of both perceptual and conceptual qualities of his artwork through self-expression and skill with a variety of media. Issues about the processes of his art-making activities included his use of themes, puns, paradoxes, and emotive qualities on viewers of his work. Eric discussed the influence of popular culture through media such as comic books, magazines, and rock groups on his artwork and creative development. Meta-level manipulation of drawing frames, changing points of view, spatial issues, competition with peers, plagiarism and interpretation of borrowed images, and pleasure from the act of creating all played important roles in his art development. Teachers, who Eric viewed as having a positive influence on his creative development, possessed characteristics such as emphasis on art skills, general knowledge about art, empathy with students, ability to make classes challenging, readiness to make to help students aware of the contexts in which they make art, and their expectations that students examine their reasons for creating art. Eric described transformational experiences that enabled him to view himself as a young artist achieving his own predetermined goals. Zimmerman (1992b, 1995, 2004) concluded that creative, artistic development is not an automatic consequence of maturation. It is instead a learned set of complex abilities that, to a great extent, are influenced by culture and available educational opportunities within that culture.

Other researchers also found that an individual's talent and creativity within a culture involves interplay of many forces including education. Feldman (1980) and Feldman and Goldmith (1986a, 1986b) studied children who were precocious in many different areas, including the arts, and concluded that their progress was the result of intensive and prolonged instruction. Talent, they contended, does not develop without an enormous amount of work, practice, and study, coupled with guidance, and encouragement. Recently, psychologists have used multiple, individual case studies to compare and contrast influence of personality factors of adults who have achieved success in particular domains including the visual arts

(Feist, 1999; Gardner, 1996). Csikszentmihalyi (1996), after 30 years of research and in nearly 100 interviews with creative people in many different fields including the arts, found that the most creative person will not be able to achieve to his or her potential without a constellation of conditions provided by society including training, expectations, resources, recognition, hope, and opportunity.

Art Teachers, Creativity, and Art Talent Development

The role of the art teacher and his or her positive and negative impact on creative students art development cannot be minimized. There is research that demonstrates problem finding and problem solving skills can be taught and students' abilities to be creative problem solvers can be nurtured and developed (Treffinger, Sortore, & Cross, 1993). According to Feldhusen (1992), students can be taught to find problems, clarify problems, and solve problems and monitor their own learning activities and seek and test alternative solutions. Traits such as problem finding, problem solving, divergent and convergent thinking, self-expression, and adaptability to new situations are ones commonly associated with creativity (Csikszentmihalyi 1996; Mumford, et al., 1994; Runco, 1993; Runco & Nemiro, 1993; Starko, 2001; Sternberg 1988, 1997, 1999). Rostan, Pariser, & Gruber (2000) found that successful teachers of highly able students were knowledgeable about their subject matter, able to communicate instructions effectively, and selected learning experiences that challenged their students to attain advanced levels of achievement. In contrast, Brown and Thomas (1999) studied art students at the college level in Australia and found that when students are ready to make a creative leap to individual self-expression, they often are expected by their teachers to produce outcomes that are conventional as determined by examination expectations and not individual creative responses in either the processes they employ or products they create.

Teachers can help students develop their creativity by adapting teaching strategies that balance generation of new ideas, critical thinking abilities, and abilities to translate theory into practice (Sternberg & Williams, 1996). Successful teachers of highly able students are knowledgeable about their

subject matter, able to communicate instruction effectively, and select important learning experiences that lead their students to attain challenging and advanced levels of achievement.

Zimmerman (1991, 1992a) studied two teachers of artistically talented students. The successful teacher was knowledgeable about subject matter, understood and communicated effectively with his students, and was deeply involved in teaching. His success was due to equal attention to all his students, ability to make classes challenging and interesting through humor and storytelling, and encouraging students to think reflectively about the contexts in which they were creating art. To develop art talent and creativity, therefore, it is important that art teachers be sensitive to the needs of their students and go beyond simply teaching skills and encourage independent thought, spontaneity, and originality.

Diversity, Postmodern, and Global Issues

Of current concern to many researchers and educators is the issue of providing appropriate instruction for students from diverse populations with superior talent, interest, and creative potential in the visual arts. Cultures differ in the amount they value creative endeavors. In cultures that are less traditional than others, change and creativity are not only tolerated, but are encouraged. In other cultures collaboration, cooperation, conformity, and traditions are valued more than novel solutions to problems. "Cross-cultural comparisons....have demonstrated cultural variability in the expression of creativity. In cultures that are traditional and adhere to tradition, it takes much effort and time to achieve new ways of thinking" ((Sternberg & Lubart, 1999, p. 9). From a western perspective, creativity often is defined as producing a product that is both novel and appropriate within a particular cultural context. Problem finding and problem solving are strategies that fit a concept of creativity in which individuality, a strong work ethic, and belief that progress is always for the betterment of society is emphasized. Creativity, according to Csikszentmihalyi (1996), is more likely to occur in places where new ideas take less time to enact and be accepted. In cultures that are less traditional than others, change and creativity are not only tolerated, but are encouraged.

Contemporary notions about creativity and art talent development may

need to be reconsidered if creativity is seen only as something new, novel, and original within a particular cultural context and produced by only a few individuals within that culture. In post-modernism, it is an accepted premise that recycled imagery and objects can be used to create artworks and confront a modernistic notion of a progressive art history (Efland, Freedman, & Stuhr, 1996). In the present art education climate in the United States, where emphasis is on visual culture, artists are free to adapt any style from the past and employ it in creating a variety of novel interpretations.

Some Summary Thoughts About Creativity

There are many ways to describe and categorize characteristics of creative students and adults in the visual arts, and no single set of characteristics has been developed to comprehensively describe all covert or overt manifestations of such ability. A model of creativity for the visual arts that is inclusive rather than exclusive and in which creativity is viewed as being possessed by all people is one that should be considered. From this point of view, all people would be considered as having some creative ability. The quality of that creative ability would differ from person to person and culture to culture, some people would evidence a small amount of creative abilities and dispositions while others would possess greater amounts. Those who demonstrate potential to be highly creative as adults should be offered differentiated opportunities to develop their talents. Csikszentmihalyi (1996) explained that “each person has potentially all the psychic energy he or she needs to lead a creative life (p. 344). Peat (2000) echoed this conclusion and suggested that although artists need long apprenticeships to be able to practice their crafts, everyone can learn techniques to “disrupt persistent habits of thought and free us for new ways of thinking” (p. 24) so that blocks are eliminated and creativity can flow.

The importance of developing enriched programs for artistically talented and creative students cannot be underestimated. As we enter the 21st century, it is apparent that students need to be prepared for a new information age. Those students who will later become practicing artists should be prepared to think creatively and develop skills and abilities appropriate in a rapidly changing world. There also is a need to prepare

appreciators and consumers of art who, as future leaders, will make decisions about the arts in their local communities and beyond. Educational interventions and accelerated and enriched programs for students with interest and abilities in art can foster leadership and creative thinking with the potential to generate solutions to real life problems both now and in the future.

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