

## The Gifted and Talented

Traditionally, children with superior cognitive abilities (gifted) were identified as those who scored very high on intelligence tests (i.e., two standard deviations above the norm) and who performed exceptionally well on achievement measures. Today there is added emphasis on identifying children who may not score high on tests but who show superior talent and creative abilities. Also, there is greater concern for finding more suitable methods to identify those children in whom extraordinary *potential* may be suppressed because of environmental factors and/or lack of opportunity. Contrary to popular belief, children with areas of giftedness and talent are found in all ethnic, racial, social, and economic groups.

Although giftedness usually implies outstanding performance in a multitude of areas (academic, arts, athletics), while talent is usually understood to be outstanding performance in a specific area, these differences are not evidenced in the following definition from a report given to the United States Congress in 1972 by then Commissioner of Education Sidney Marland.

"Gifted and talented children are those, identified by professionally qualified persons, who by virtue of outstanding abilities are capable of high performance. These are children who require differentiated educational programs and/or services beyond those normally provided by the regular school program in order to realize their contribution to self and society."

"High performance" was further explained as including general intellectual abilities, specific academic aptitude, creative or productive thinking, leadership, ability in visual and performing arts, and psychomotor abilities. Children who meet these criteria are estimated to constitute 3 to 5 percent of the school population.

Specifically, students who are gifted and talented in music show early evidence of skillful performance, unique creativity, exceptional listening skills (including rapid memorization, analysis, and evaluative abilities), and superior knowledge of facts about music. History has recorded more child prodigies in music than in any other field of endeavor. Some of their biographies give credence to the traditional cognitive criteria for general giftedness; others clearly do not. Probably the earliest known musically gifted child was the biblical David. It appears that he was in his early teens when first summoned to play at King Saul's court to soothe his melancholia. David could also be the first music educator, since in later life he organized music instruction and performance in order to preserve the music traditions of his people.

**Talented special children** A number of musical prodigies were special children in other ways as well. Some were abused children (e.g., Paganini, Slenczynska) who were beaten and starved while their talents were exploited for profit. Gertrude Mara became crippled as the result of being constantly tied to a chair as a child. The violinist Itzhak Perlman is disabled as a result of polio. The largest group involves people with sight impairments. Musically talented

musicians who are blind include not only classical but jazz and rock greats, such as Alec Templeton, George Shearing, Art Tatum, Ray Charles, Jose Feliciano, and Stevie Wonder. All of them were performing professionally before adulthood. Among the most notable disadvantaged children to achieve fame musically were Louis Armstrong and Benny Goodman. Both received early training in music as a result of social programs organized for disadvantaged youth.

Minorities that have been discriminated against are also represented in child prodigy history. A slave child called Blind Tom was dragged around the world by his owner to perform as a freak. Never affording an education of any kind, he was a self-taught pianist whose musical memory and improvisational skills were extraordinary. Even so, people considered him an "idiot." Traditionally, females have been discouraged from pursuing concert and composition careers. At one time, the Vienna Academy would allow female students to participate only in piano classes. Even the wording of competition prizes during that time discriminated against women, specifying "to the man...," technically disqualifying a woman from collecting the prize money even if she won. We can only speculate as to how differently music history books would read today if Maria Anna Mozart, Fanny Mendelssohn, and Clara Schumann had been allowed to fully develop their potentials in music.

Some prodigies demonstrated behavior problems as children. It is reported that Isaac Albeniz, at the age of six, deliberately smashed a large mirror at the Paris Conservatory following a successful audition. At eight, he began a pattern of running away from home. Unable to control him and tired of chasing after him, his parents finally gave him up as incorrigible. By the age of thirteen, Isaac was his own manager, arranging and performing concerts in North and South America. It is not surprising that many musical prodigies have eccentric behavior as adults. Such behavior might be related to formative years characterized by unhappiness, exploitation, insecurity, unstable home lives, lack of general education, limited peer interaction, and a paucity of recreational activities appropriate to childhood.

The nature-nurture argument rages as strongly among explanations of giftedness and talent as it does in retardation. There is no question that examples of musical ability in families can be found in abundance in the music field. Bachs were on the music scene for seven generations, Couperins for four. The Purcell, Scarlatti, and Strauss families all produced more than one generation of professional musicians. Modern-day examples of multiple talents in a single family can be found as well (e.g., Iturbi, Serkin, Brubeck, Jackson, Marsalis). Heredity no doubt plays an important role in musical talent. Scientists today tend to support a combination gene theory, but no one has yet determined the specific gene combination or statistically predicted its occurrence. At any rate, a favorable environment and good educational management are certainly necessary if an individual is to fully develop innate talent.

## **Characteristics**

The stereotype of the child who is gifted as a puny, bespectacled, shy, retiring type has not been confirmed in studies. In fact, children who are gifted tend to

be physically superior, outgoing, and well liked by their peers. Although most will not exhibit all the characteristics that follow, many will show evidence of several.

1. Children who are gifted usually have very long attention spans. They can remain absorbed in study much longer than most children. In fact, they may rebel against time limits that characterize most educational design.
2. Most seem to learn basic skills faster and with less practice.
3. Most possess a large vocabulary. Personal histories usually reveal that, as infants, they began to talk earlier and used complex sentences earlier than the average child.
4. They are extremely curious and continually question not only who, what, where, and when, but *why* and *how* at a very young age.
5. Their sense of humor favors puns and riddles.
6. They often exhibit moral and social concerns (e.g., foreign policy, economics, and environment) typical of much older individuals.
7. Their ideas are often considered to be "far out."
8. They usually show aptitude in one or more areas of artistic endeavor.
9. They have a need to work independently on some projects.
10. They prefer discovery and creative approaches to learning. Those who are reading oriented often demonstrate almost total recall of information learned through this medium.
11. Their leadership abilities tend to surface quite early. They will often dominate ideas and procedures in group projects.
12. At a very early age, many have demonstrated empathy for the handicapped and those less fortunate than them.

Identification of students who are gifted and talented continues to be elusive, but experts agree that the identification process should be one that involves a diverse set of measures including individual testing, achievement, observation, teacher referral, interview, and so forth. Although academic giftedness can frequently be spotted before a child reaches school age, musical talent is more difficult to assess, especially for the untrained observer. Further, musical talent can develop only if there is opportunity for it to do so. Musical talent, therefore, can best be assessed by a music educator who not only is a musician, but understands child development and learning theory as well. The role of the music educator is not only to identify but also to do whatever is necessary to provide the opportunity for talent to develop.

## **Learning Style**

As with other special children learning style relates directly to the individual behaviors that are characteristic of the condition. As mentioned above, children who are gifted usually have very long attention spans. Because of their ability to really delve into material, the half-hour or forty-five-minute music class is most frustrating. Further, the type of environment most suited to their learning style and music education is discovery and creative projects, which tend to hold all children's interest for longer periods of time. Every effort should be made to schedule gifted classes, or regular classes with students who are gifted, in an

open-ended fashion so there will be opportunity to extend music time when appropriate. Before lunch, a free period, or dismissal are some options to consider. The child's schedule should be extremely flexible in order to accommodate this very situation. Even if the music teacher has another class, if only one or two children are involved and the music area offers an out-of-the-way place where they can continue to work, they might be allowed to stay to pursue their project.

Research skills are often learned earlier than in the average child. Most children who are gifted read at least two to three years above grade level, so they are independent learners earlier. They enjoy doing research reports (library research) and outside assignments, such as reporting on a special television program. They usually prefer to do this type of assignment alone. Once the child is "turned on" to something, it can become a consuming interest until the need to know is satisfied. Whereas other children may read a book or two about a subject that interests them, children who are gifted will frequently exhaust all available resources before moving on to a new topic.

Students who are gifted are usually interested in music theory. Biographies of musical prodigies reveal that many of them showed an early interest and ability in composition and improvisation. Even elementary-age pupils will advance quickly through the rudimentary principles of scales, modes, triads, harmonization, rhythm, and meter. They will enjoy analyzing chorales and trying their skills at melody writing and three- and four-part harmonizations. Frequently they are frustrated by their physical inability to perform their creative efforts when beyond their vocal range or technical skills. Following music scores, such as string quartets and opera vocal scores, is of great interest to them also.

A large percentage of the population of students who are gifted in public schools studies a musical instrument if the opportunity to do so is available. Even if they are not involved in the instrumental music program, their interest in musical instruments transcends that of the average child in that they zero in on abstract problems almost immediately. A discussion of instrument characteristics, for example, could easily lead to questions regarding acoustical properties of woods and metals, physical factors affecting intonation, and transposition. They will insist on exploring these aspects until their curiosity has been satisfied.

Creative experiences should really constitute the bulk of activity in music for the child who is gifted. Original compositions are often elaborated upon, resulting in orchestrated or choreographed versions. Group projects involving several children should be carefully organized. In order to avoid getting in one another's way and rapidly exhausting school and community resources, the more successful group projects will be large in scope and diverse in content. For example, writing and performing an original opera would provide a group with several separate but related aspects from which to choose (e.g., vocal music, instrumental music, libretto, drama, choreography, stage production, conducting). Because of the superior abilities of these students to analyze, integrate, and synthesize information, there are numerous opportunities for correlating music with other subject areas for them. Topics such as acoustics, aesthetics, and non-Western music can easily be included as part of appropriate units in science, math, humanities, and social studies.

## Learning Needs

Of the special learners in public schools, those who are gifted and talented have always been discriminated against the most. While there is growing enthusiasm, there are limited funds available at state and local levels. At the national level, support and funding are as yet undetermined. Although no current statistics are available, it would probably be generous to estimate that less than 20 percent of them are being adequately provided for in public schools. A national survey in 1972 revealed that interest in projected programs for gifted and talented students had the lowest priority at all levels of government.

The prevailing attitude that these students will make it without help is erroneous. For a number of reasons, some children with potentially superior abilities do not achieve even close to their potential without special programs. Some even have learning problems and, without help, can end up as school dropouts or, at best, underachievers. They have the same basic needs as all children. When needs are not met, the result is frustration, failure, and often, behavior disorders. Research shows that programs designed to meet their special needs result in better academic performance, better self-concept, better attitude toward others, improved social relations, and fewer behavior problems.

Program planning for people who are gifted is a serious problem for public schools. Special schools and classes, although they can best accommodate the special needs and abilities of people who are gifted, are often criticized for setting them apart as an elitist group. In Russia, they are ferreted out at the earliest possible age and sent to special schools that develop their talents. These schools most often have a single purpose, so their educational program is not broad in scope. This system has produced not only Olympic gold medal winners, but Oistrakh, Rostropovich, Richter, and Ashkenazy. In some American cities there are high schools of music and art in which the development of musical and artistic talent is a primary goal. NOCA in New Orleans is one example with many famous alumni. These are, of course, secondary schools, and they may get some of their students too late to fully develop potential. While acceleration of students with superior abilities has been strongly resisted in American education, most research indicates no negative effects on the children participating in either special classes or acceleration programs. A number of history's children who were gifted and became eminent scientists, artists, inventors, and so forth, were not public school products. Many were tutored privately, some by their parents. It is obvious that public schools have always had a difficult time meeting the special needs of this group.

The best accepted approach for meeting the needs of the children who are gifted in elementary school is regular class placement with enrichment opportunities. Enriched content should provide experiences for the student to reach higher levels of competence and understanding. In a general music class, for example, a discussion of electronic music might be enriched for the child who is gifted by offering the opportunity for further knowledge through an independent project in which an original tape composition is created. Supplementary reading and/or listening would no doubt be included in such a project. Some programs at the elementary level allow a child to study certain subjects at an advanced level (e.g., high school music theory, math, literature). The lock-step arrangement that

pervades our educational system (regardless of structures such as open classrooms and multi-age grouping) is a particular hindrance to children with superior abilities. Their *potential* is handicapped if they are forced to sit through sixth-grade arithmetic when they are capable of understanding college calculus. In communities where higher education resources are available, many of these students, particularly at the high school level, attend college classes appropriate to their abilities, returning to the public school for the remainder of their classes.

Children who are gifted are exciting to work with. However, a day with them can be quite exhausting. Their energy level is constant and seemingly limitless. In addition, their most expedient technique for information gathering is questioning, which can become tiresome for the teacher who lacks ready explanations (sometimes about very complex topics!) or functional knowledge of available resources to which the learner can be directed. Teacher preparation has been seriously lacking in this field, and evidence of progress is sparse. Apparently, many teachers feel inadequate to deal with the extremely capable child. Presumably, a great deal of in-service training will need to occur if children who are gifted and talented are to be adequately educated in the regular classroom.

Following are some general suggestions for enriching the music education curriculum for these students who have special talents and gifts.

1. When assigned a class with students who are gifted, familiarize yourself with all available resources at your disposal (i.e., libraries, community musicians and music groups, college music programs, concerts).
2. When a child who is gifted asks a question that is obviously beyond the comprehension of the whole class, make arrangements to meet individually to answer it. This also gives you time to organize your explanation and resources.
3. When a child is a more skilled performer than his or her peers, arrange opportunities for that child to play regularly with more advanced musicians (high school ensemble, community group, and so forth).
4. Consider and plan for ways to individualize learning for the child who is gifted.
  - a) Learning centers
  - b) Commercially produced programs
  - c) Availability of other programmed resources, such as Computer Assisted Instruction
  - d) Enlist help of a more advanced student or parent to play duets with the gifted instrumentalist.
5. Allow children who are gifted to select their own independent study projects and topics. They will anyway, with or without your guidance.
6. Familiarize yourself with curriculum approaches that are based on discovery approaches to music learning.
7. The following verbs are good points of departure for encouraging creative responses: analyze, compare, design, create, criticize, apply, teach, predict, judge.
8. Present enrichment experiences that involve problem-solving approaches. Examples:

- a) Think of a favorite selection of music. Listen, sing, or play it several times. Describe it musically (melody, rhythm, meter, form, texture). Use only three of its musical characteristics to create a new piece of your own.
- b) All the music composed for your instrument has been lost or destroyed. Find some music composed for another instrument and arrange it for yours.
- c) Study the history of the song London Bridge. Request that the students orchestrate it in different styles to reflect London's musical history. Ex: Anglican hymn style, Beatles' style

If other children in a group challenge their right to enrichment projects, let them undertake one. It is unlikely that they will have the independent research skills or the self-motivation to complete the preliminary stages of a project and they will quickly lose interest.

It is not necessary to be gifted in order to be an effective teacher of children who are academically gifted. What is necessary is the ability to facilitate and guide learning without getting in the way. However, guiding extraordinary talent in music is another matter. Every honest music teacher recognizes when personal skills and talent have reached the limit of effectiveness with an individual student. It is then time to assist the student in locating another teacher – one who can extend the student's skills and talents to an even higher level. To do otherwise is not only unprofessional, but selfish and detrimental to the potential of the student.

## **Summary**

Children who are musically gifted and talented are generally characterized by having extraordinary listening skills, superior cognitive knowledge, creativity, and skillful performance. Although there have been more child prodigies recorded in music than in any other field, some were clearly skillful instrumental technicians as opposed to gifted musicians. In addition to apparent genetic factors, sound training in music is essential in order for the child who is musically gifted to realize potential. Children who are gifted are usually quite verbal, have a distinct sense of humor, are well liked by peers, are extremely curious, and prefer discovery and creative approaches to learning. Identification of children who are gifted and talented, implementing appropriate programs to meet their needs, and preparing teachers to work with them are the biggest challenges to effective public school education of this group.