

## Music In Schools

Why is it important?

By Devan LeBlanc and Christina Aguinaga

## What is Music?

- Music is the one incorporeal entrance into the higher world of knowledge which comprehends mankind but which mankind cannot comprehend.”  
— Ludwig van Beethoven

## Musicians Have Better Brains

- Research shows that people who play a lot of music professional musicians have more symmetrical brains than those that do not Alban,D (2016).How Music Affects the Brain for the Better
- Research also shows that the part of the brain that is responsible for motor control, auditory processing, and spatial coordination are larger. Alban,D (2016).How Music Affects the Brain for the Better

## Music Education and Overall Health

- Improves Visual and Verbal Skills-A study that looked at 4 to 6 year olds who were subject to one month of musical training that included training in rhythm, pitch, melody, voice and basic musical concepts resulted in enhanced ability to understand words and explain their meaning. Martino, J(2014). 7 Ways Music Benefits Your Heart, Brain, & Health
- Boosts Immune Health-Research has shown that music is capable of reducing levels of the stress hormone cortisol, which is responsible for weakening the immune system, increasing risk of heart disease, interfering with learning and memory, lowering bone density, blood pressure, etc. [9] Research found that by listening to just 50 minutes of uplifting music the levels of antibodies in the human body increases. Martino, J(2014). 7 Ways Music Benefits Your Heart, Brain, & Health
- Reduces Stress and Anxiety-Researchers from Drexel University found that cancer patients who either listened to music or worked with a music therapist experienced a reduction in anxiety, had better blood pressure levels and improved moods. Music can have positive effects on the psyche, mood, pain and quality of life as well. Martino, J(2014). 7 Ways Music Benefits Your Heart, Brain, & Health

## The History of Music Education in the US

In 1717, the first American school dedicated solely to singing was founded in Boston, Massachusetts. Stanford, G. (2012). History of Music Education in the United States

Boston Academy of Music was founded in 1832 The Academy promoted not only singing instruction but also the study of music and related theory. One of Several teachers outside of the Academy also adopted this text for use in their own classrooms.. The venture was so successful that the local school committee pushed for music to be included as part of the syllabus. In the years that followed, music education became part of the school curriculum for all ages of. This also led to the introduction of music instruction for potential teachers at teachers' colleges, then known as Normal Schools. Stanford, G. (2012). History of Music Education in the United States

## History of Music Education (Cont'd.)

By the early 1900s, colleges that offered degrees spanning four years included music in their programs. The Oberlin Conservatory in Ohio was the first to offer a full Bachelor's degree in Music Education. Many advances occurred in the field of musical education during this time.. Perhaps one of the most valuable progressions was made when a teacher, Frances Elliott Clark, won the approval to use phonographs and music libraries in schools. Many universities and colleges also started to offer endowments, grants and scholarships to promising music students. Stanford, G. (2012). History of Music Education in the United States

## Music in Public Schools Today

- Research unfortunately shows that teachers are receiving less support. Elementary school music specialists rated the support for their teaching "somewhat or very inadequate" in a variety of areas: funding (40%), facilities (27%), materials, equipment, tools and instruments (23%), instructional time in the arts (28%) and the number of arts specialists (36%). Pellegrianni, L. (2012). *Music Education in Public Schools Gets A Passing Grade*

## International Music Education

- Nations whose students consistently outperform the United States in tests assessing science achievement are the countries where music is a primary focus of the curriculum.
- In Dutch secondary schools, music and art became mandatory subjects in 1968, and compulsory examinations in these subjects were implemented in 1976 (Netherlands National Institute for Educational Measurement).
- In Hungary, the land of Bela Bartok and Franz Liszt, with its number one ranking in science achievement for eighth and ninth graders, music education has long been an essential and developmental program implemented nationally by the composer Zoltan Kodaly.

## Music Education and Academic Achievement

- On the 2012 SAT, students who participated in music scored an average of 31 points above average in reading, 23 points above average in math, and 31 points above average in writing. College Board SAT. 2012 College-Bound Seniors: Total Group Profile Report
- Schools that have music programs have significantly higher graduation rates than do those without music programs (90.2 percent as compared to 72.9 percent). In addition, those that rate their programs as "excellent or very good" have an even higher graduation rate (90.9 percent) Harris Interactive Inc. (2006). *Understanding the Linkage Between Music Education & Educational Outcomes*
- Music improves student language development. Alban, D (2016). *How Music Affects the Brain for the Better*
- Playing music increases brain connectivity. Alban, D (2016). *How Music Affects the Brain for the Better*

## Music Education and Math Reasoning

- The combined results of 12 experimental studies indicate a positive relationship between voluntary music study and math achievement. Vaughn, K. (2000). *Music and mathematics: Modest support for the oft-claimed relationship. Journal of Aesthetic Education, 34(3/4), 149-66.*

## Music Education and Reading/Verbal Skills

- The combined results of 30 studies indicate that music instruction is linked to significantly improved reading skills. Standley, J. M. (2008). *Does music instruction help children learn to read? Evidence of a meta-analysis. Update: Applications of Research in Music Education, 27(1), 17-32.*

## Music Education and Reading/Verbal Skills (Cont'd)

- Researchers have found a correlation between three or more years of instrumental music training and enhanced auditory discrimination, fine motor skills, vocabulary, and nonverbal reasoning. Forgeard, M., Winner, E., Norton, A., & Schlaug, G. (2008). *Practicing a musical instrument in childhood is associated with enhanced verbal ability and nonverbal reasoning. PLoS One, 3(10), e3566.*
- Playing a musical instrument significantly enhances the brainstem's sensitivity to speech sounds. This relates to encoding skills involved with both music and language. Patrick C M Wong, Erika Skoe, Nicole M Russo, Tasha Dees, & Nina Kraus. (2007). *Musical experience shapes human brainstem encoding of linguistic pitch patterns. Nature Neuroscience, 10(4), 420-422.*

## Music and Social/Emotional Development

- Chorus America found that choral singers are far more likely to be involved in charity work, as volunteers and as donors (76%), than the average person (44% according to a 2001 report by Independent Sector).
- Choral singers are also more than twice as likely as non-participants to be aware of current events and involved in the political process. They are also twice as likely as the general public to be major consumers of other arts – and not just music. *America's Performing Arts: A Study of Chorus, Choral Singers, and their Impact (Chorus Impact Study, 2003)*.
- Students who participate in music groups score significantly higher than their peers on measures of social capital including talking more with parents and teachers. *Boh, B. A. (2002). Linking extracurricular programming to academic achievement: Who benefits and why? *Sociology of Education*, 75(1), 69-95.*

## MathScienceMusic.org

- Math, Science & Music is a free toolkit for teachers with engaging curricula, games, apps and other online elements that integrate music, math and science into teaching and learning materials for K-12 and college students that can be found at [mathsciencemusic.org](http://mathsciencemusic.org).
- Launched on International Jazz Day in 2016, the Theolonius Monk Institute of Jazz together with Jazz legend Herbie Hancock joined forces with international math, science and music experts at seven leading universities to establish the program.

## Senate Names Music and Arts as Core Subjects

- On July 16, 2015 the National Association for Music Education (NAFME) was pleased that the United States Senate passed its bipartisan Elementary and Secondary Education Act (ESEA) reauthorization proposal, the Every Child Achieves Act (S. 1177), by a final vote count of 81 to 17.
- By recognizing music and arts as core subjects in the Every Child Achieves Act, the Senate has acknowledged and begun to address the national problem of the diminishing of the curriculum that has taken place under No Child Left Behind (NCLB) for more than a decade now."

## Senate Names Music and Arts as Core Subjects (Cont'd)

- The music education community has poured its blood, sweat, and tears into getting the Senate's bill to this point," said Chris Woodside, NAFME Assistant Executive Director.
- "More than 14,000 letters have been sent to Capitol Hill on behalf of music teachers and students. There is bipartisan support for music and arts in this legislation—senators from across the country are acknowledging that these subjects should be national education priorities. That's really big, and we're grateful."

## Organizations That Advocate Music Education

- National Association for Music Education (NAFME)
- National Association of Music Merchants Foundation (NAMM)
- California Music Education Association (CMEA)
- International Society for Music Education (ISME)

## Online References

- <http://bebrainfit.com/music-affects-brain/>
- <http://www.npr.org/sections/therecord/2012/04/06/150133858/music-education-in-public-schools-gets-a-pastings-grant>

- <http://www.nafmc.org/take-action/what-to-know/all-research/>
- <http://www.collective-evolution.com/2014/03/13/seven-reasons-why-music-benefits-your-health/>
- <https://newsinhealth.nih.gov/2010/january/feature1.htm>