

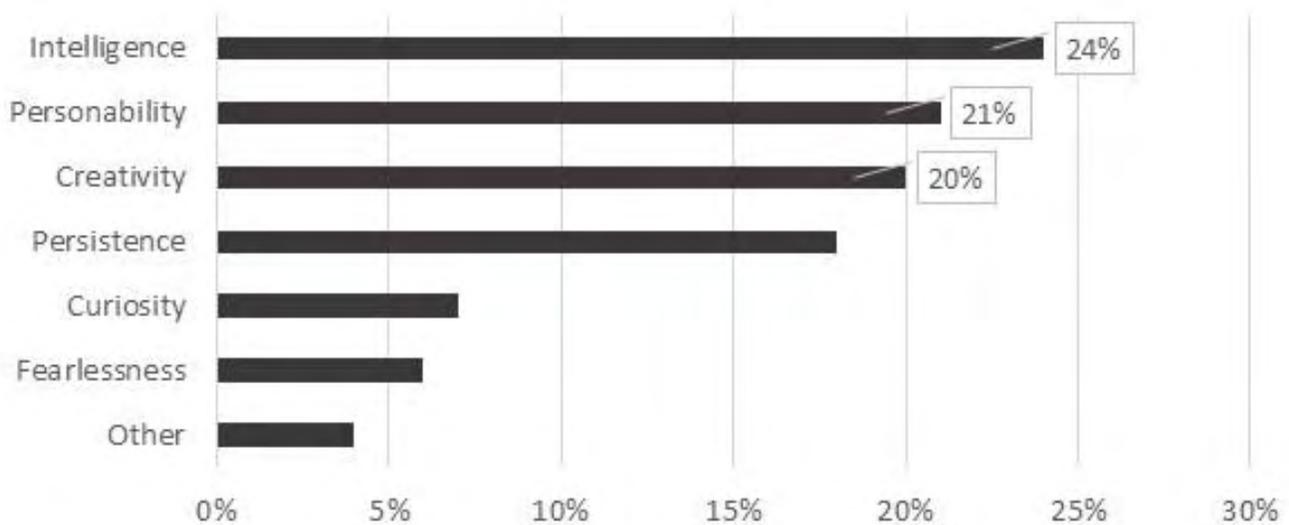


### Arts Facts . . . Preparing Students for the Workplace

Schools and employers rank a *degree in the arts* among the most significant indicator of a job candidate's creativity and innovation skills.

## Arts are Key to Preparing Students as Creative Workers in the Global Marketplace

**Creativity is one of the top three personality traits most important to career success, according to U.S. employers**



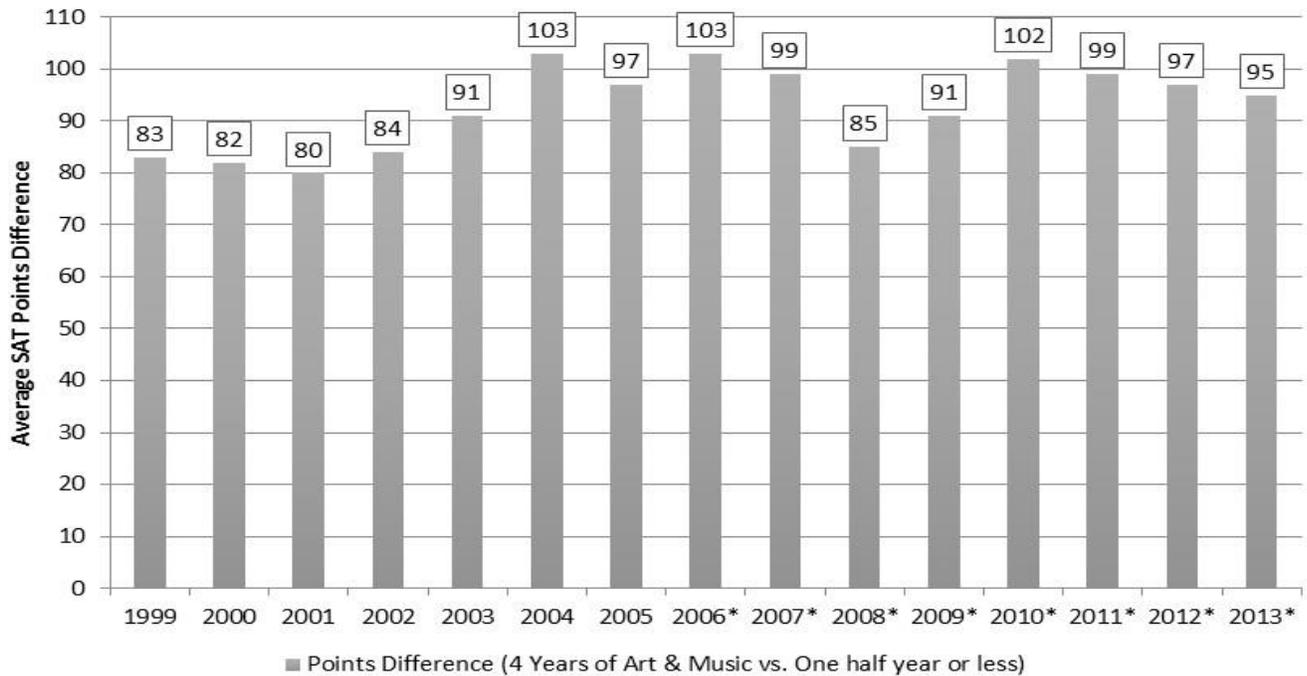
- Teaching creativity develops critical thinking, engages students, and fosters innovation.
- 85 percent of people agreed that creative thinking is critical for problem solving in their career. 71 percent of college-educated professionals say creative thinking should be taught as a course, like math and science. Additionally, 78 percent of the respondents (1,000 U.S., college-educated and full-time salaried employees ages 25+) stated that creativity is very important to their career but only 57 percent thought so when they were in college.
- 72 percent of employers say creativity is of primary concern when they're hiring, yet 85 percent of these employers can't find the creative applicants they seek.
- Employers (56 percent) and superintendents (79 percent) agree that a college degree in the arts is the most significant indicator of creativity in a prospective job candidate.
- 97 percent of superintendents surveyed agreed that music develops creativity, yet only 17 percent of their schools require music courses for graduation.

Sources: Adobe Systems Inc. and *Ready to Innovate*, a collaboration between The Conference Board, Americans for the Arts, and the American Association of School Administrators.



**Arts Facts . . . SAT Scores and the Arts**  
 Students with four years of high school arts and music classes have higher SAT scores than students with one-half year or less.

### Arts Students Outperform Non-Arts Students on SATs



- Data from The College Board show that in 2013, students who took four years of arts and music classes while in high school (only eighteen percent of test-takers) scored an average of 95 points better on their SATs than students who took only one-half year or less (scores of 1061 vs. 966, respectively).
- The College Board’s report, *Arts at the Core: Recommendations for advancing the state of arts education in the 21<sup>st</sup> Century*, by the National Task Force on the Arts Education, recommends that education stakeholders consider arts requirements for high school core curricula, high school graduation requirements, and college and university admission requirements in the arts (including arts courses in GPA calculations), working with regional accrediting agencies.
- \*These scores reflect the *Critical Reading* and *Mathematics* portions of the SAT only. The *Writing* section of the test is excluded from this analysis for year-to-year comparison purposes. Students with four years of art and music classes averaged 520 on the *Writing* portion of the test—59 points higher than students with one-half year or less of arts/music classes (461).

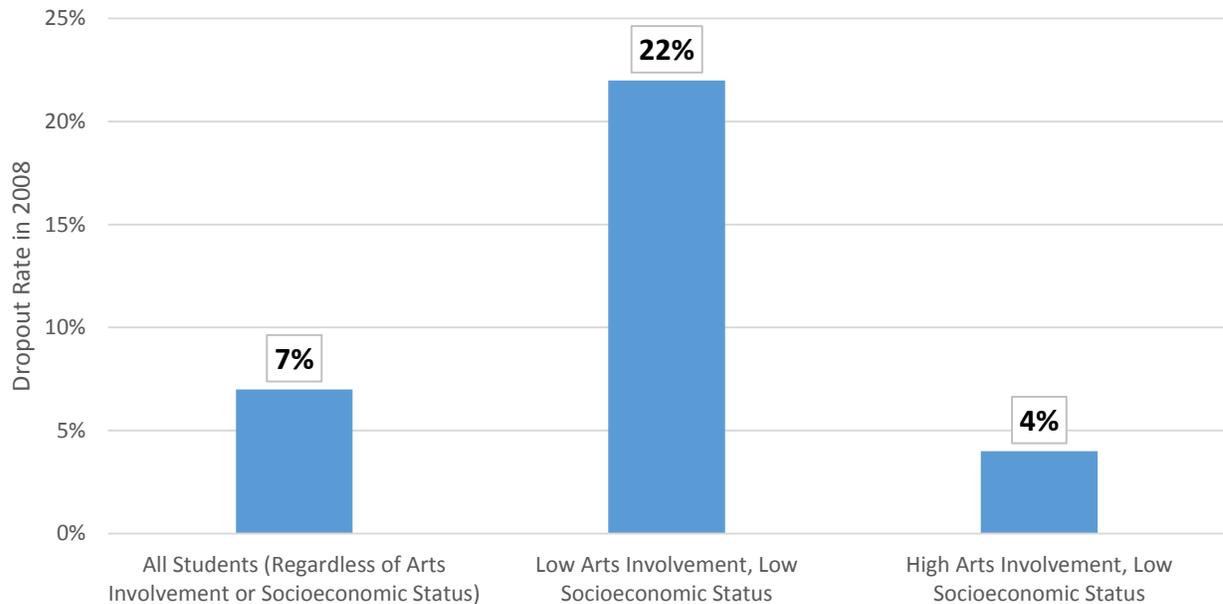
Source: The College Board, 2013. *2013 College-Bound Seniors: Total Group Profile Report*. Analysis by Americans for the Arts, 2014.



### Arts Facts...Improved Academic Performance

Students who participate in the arts, both in school and after school, demonstrate improved academic performance and lower dropout rates.

## Students with High Levels of Arts Involvement: Less Likely to Drop Out of School



- Longitudinal data of 25,000 students demonstrate that involvement in the arts is linked to higher academic performance, increased standardized test scores, more community service, and lower dropout rates (see chart above). These cognitive and developmental benefits are reaped by students regardless of their socioeconomic status.
- Arts in the schools increase test scores and lower dropout rates. The report, *Critical Links*, contains 62 academic research studies that, taken together, demonstrate that arts education helps close the achievement gap, improves academic skills essential for reading and language development, and advances students' motivation to learn.
- Research conducted between 1987 and 1998 on young people working in the arts for at least three hours on three days of each week throughout at least one full year, demonstrated the following:
  - ✓ 4 times more likely to have been recognized for academic achievement
  - ✓ Being elected to class office within their schools more than 3 times as often
  - ✓ 4 times more likely to participate in a math and science fair
  - ✓ 3 times more likely to win an award for school attendance
  - ✓ 4 times more likely to win an award for writing an essay or poem

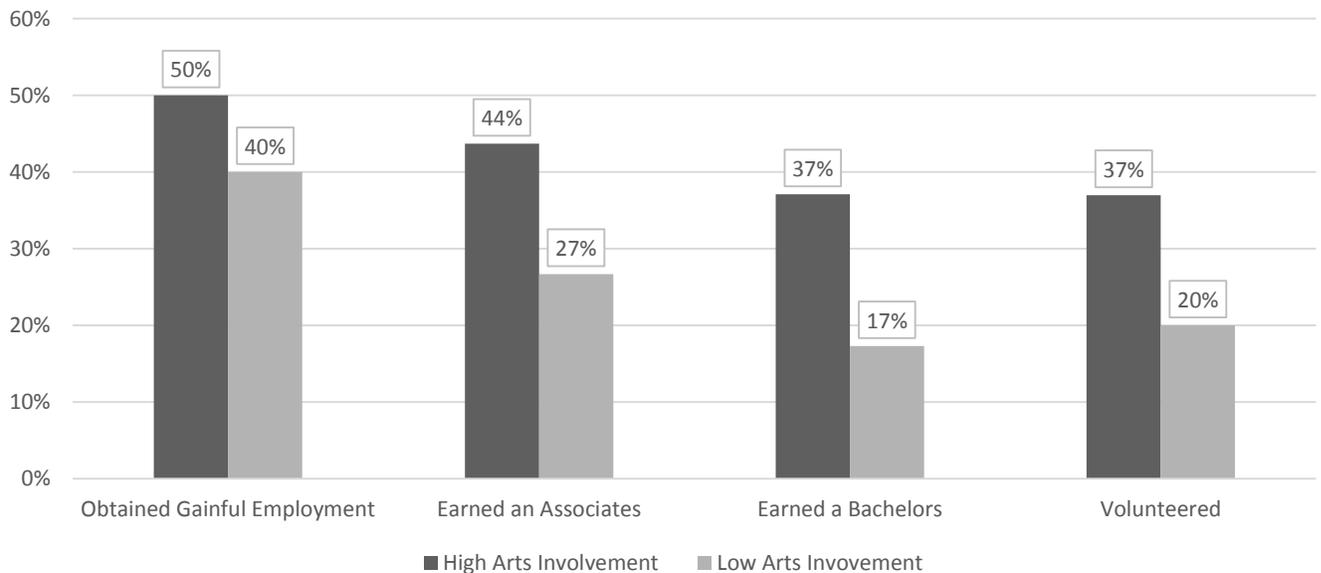
Sources: NEA Office of Research & Analysis (Catterall 2012); Arts Education Partnership (Deasy 2002); Americans for the Arts (Heath 1998).



### Arts Facts...Advantages of Arts Learning Continues over Time

Low-income students who are highly engaged in the arts are more than twice as likely as their peers with low arts involvement to earn a Bachelor's degree.

#### Increased Arts Involvement Among Disadvantaged Students Leads to: Finding a Better Job, Earning a College Degree, and Volunteering



In the late 1990s, James Catterall analyzed data from the National Educational Longitudinal Survey, a study of some 25,000 secondary school students, over four years. He found significant connections between high involvements in arts learning and general academic success.

In 2009, Catterall analyzed ten additional years of data for the exact same cohort of students, now age 26. The results strongly connect arts learning with continued success in academics and in life.

- The study found significant advantages for “arts engaged low-socioeconomic status [low-SES] students” in college-going and types of employment, as well as strong advantages in volunteerism and voting.
- Gainful employment for this group of students included better jobs with higher pay, more responsibility, more promotion opportunity, and more employee satisfaction.
- Dr. Catterall concludes that the benefits to arts-engaged disadvantaged students are measurable and unparalleled. He states: “In the annals of education research, it is hard to find average performance or outcome statistics reported for low-SES students that exceed such measures for the entire population.”

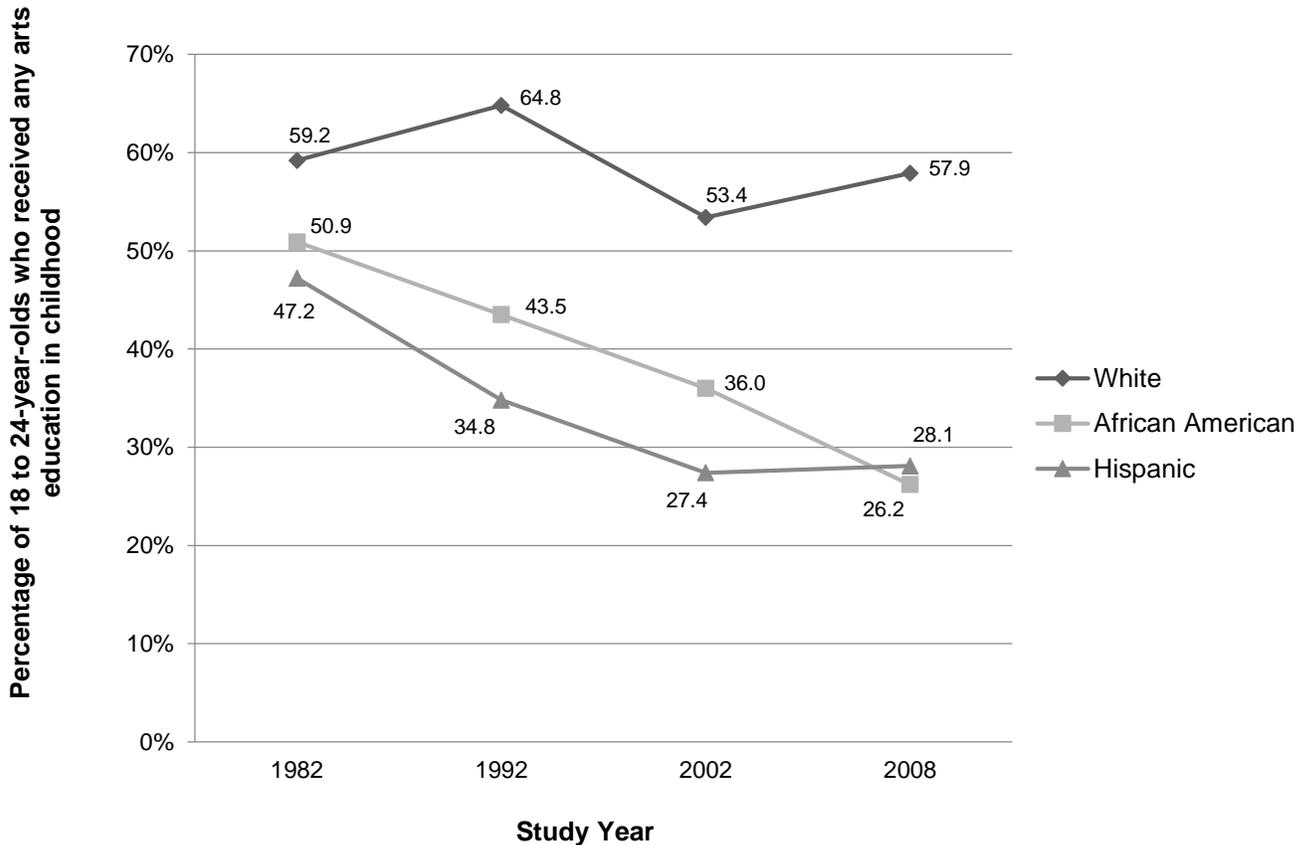
Source: Catterall, James S. (2009). *Doing Well and Doing Good by Doing Art: The Effects of Education in the Visual and Performing Arts on the Achievements and Values of Young Adults.*



**Arts Facts...Access to Arts Education is Not Equitable**

In 2008, African-American and Hispanic students had less than half of the **access** to arts education than their White peers.

**Decline of Arts Education in Underserved Populations**



- Access to arts education for African Americans and Hispanics is significantly lower than for their White peers, and has been steadily declining for three decades.
- Findings by UCLA researcher James Catterall indicate that low socio-economic-status students who are engaged in arts learning have increases in high school academic performance, college-going rates, college grades, and holding jobs with a future.
- Despite these findings, the decline of arts education is most drastic in underserved populations, where students who could benefit the most from arts education are getting it the least.

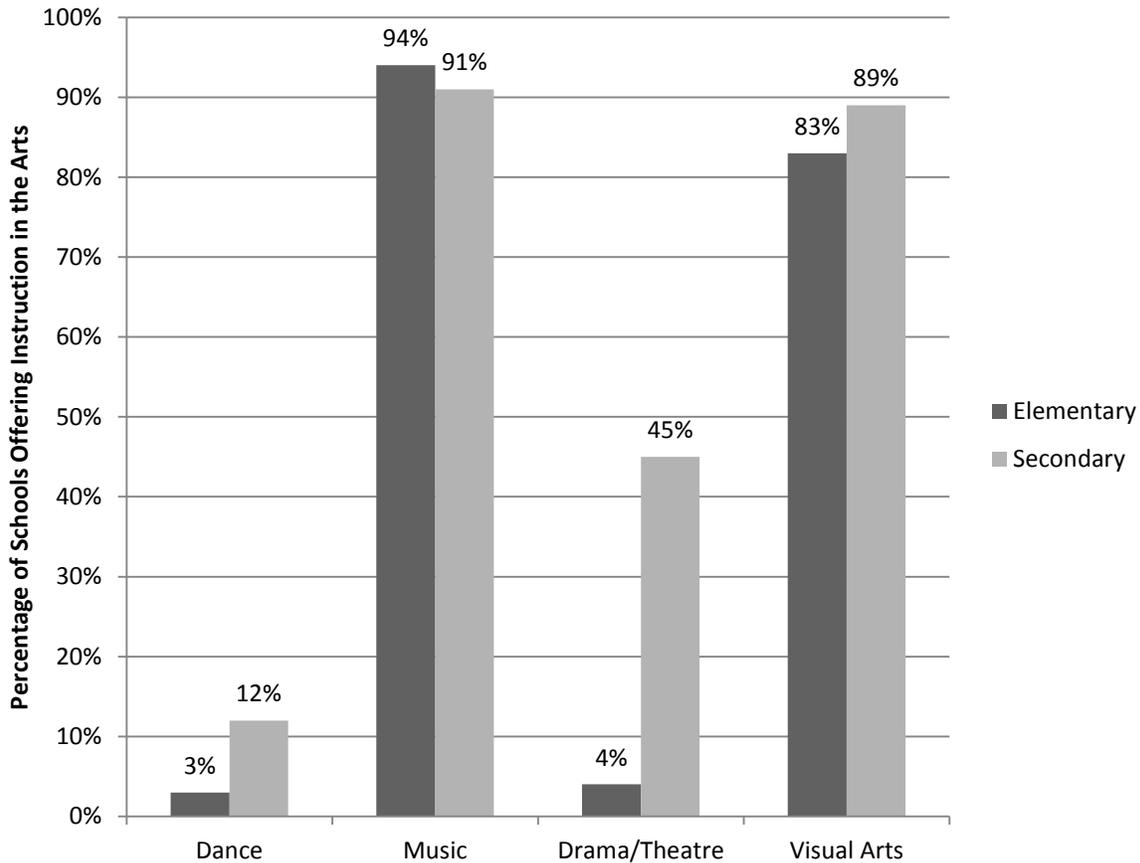
Source: NEA Office of Research & Analysis, NORC at the University of Chicago (Rabkin & Hedberg, 2011).



### Arts Facts...Only 3 percent of Elementary Schools Offer Dance

In spring 2012, the U.S. Department of Education released its decennial study on the status of arts education, and the results were bleak, with only 3 percent of elementary schools offering dance and only 4 percent offering theatre.

## Uneven Arts Education Opportunities Nationwide



- This report provides selected national data on the status of arts education in public elementary and secondary schools.
- This report represents virtually no change from results a decade ago, the last time the National Center for Education Statistics (NCES) conducted a similar survey.
- Schools with a higher concentration of students in poverty were less likely to offer arts education. U.S. Education Secretary Arne Duncan has called this gap “an equity issue and a civil rights issue.”
- While the report shows that music and visual arts are widely available in schools, elementary school music instruction is not provided at all for roughly 1.3 million students (6 percent).

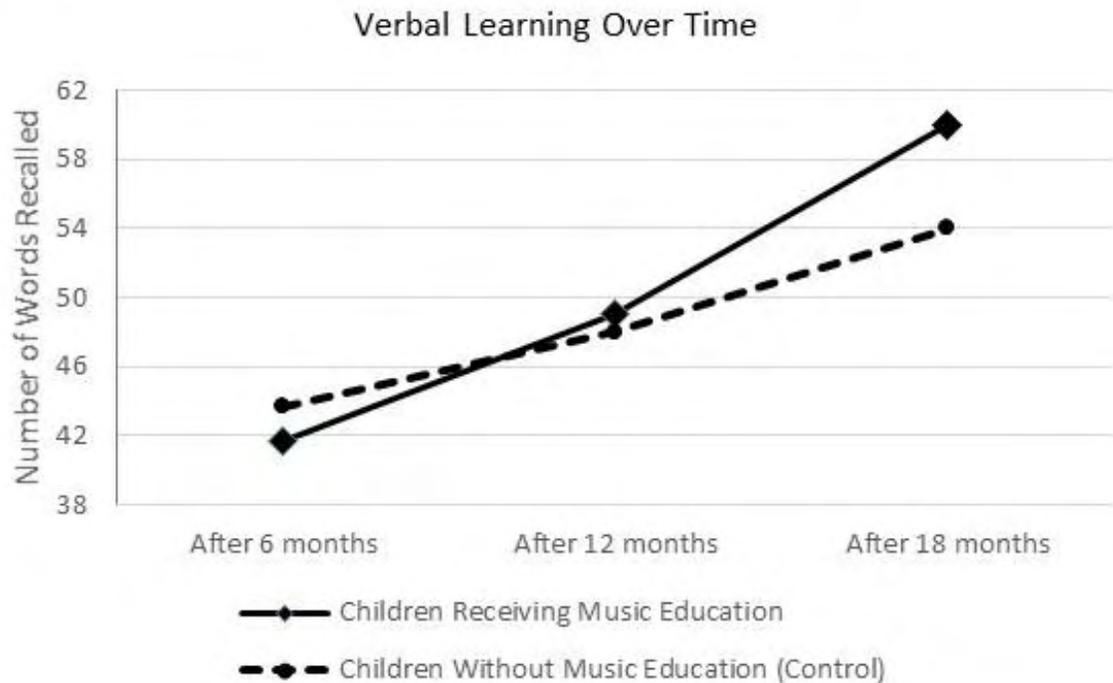
Source: Arts Education in Public Elementary and Secondary Schools: 1999-2000 and 2009-10 (NCES 2012-014), U.S. Department of Education.



**Arts Facts . . . Early Childhood Arts Education improves cognitive development**

Music training increases brain and cognitive development in three- to five-year-old underprivileged children.

## Early Childhood Arts Education Improves Vocabulary, Communication, and Memory in Young Children



- An 18-month study of German elementary school students found that 40 minutes of instrumental music education each week resulted in improved abilities in Verbal Learning, Verbal Delayed Recall, and Verbal Recognition in experimental and control groups.
- After only four weeks of daily training in rhythm, pitch, melody, voice, and basic musical concepts, 90 percent of Canadian four- to six-year olds demonstrated “a rapid transfer of cognitive benefits” in vocabulary and verbal communication, enhancing their ability to understand words and explain their meaning.
- With regular training in the motor and listening skills needed to play an instrument, young students benefit from improved attention and memory. A Harvard study shows particularly significant improvements in students with dyslexia.

Sources: Dana Consortium Report on Arts & Cognition, 2008; US National Library of Medicine at NIH; *Psychological Science* Journal; American Institute of Physics

# SUMMARY OF KEY ADDITIONAL ARTS EDUCATION RESEARCH AND FACTS



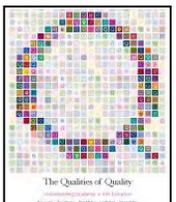
## The arts boost learning and achievement for students



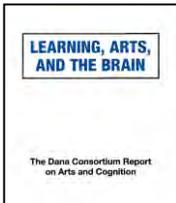
- The collection of research described in *Critical Links: Learning in the Arts and Student Academic and Social Development* (2002) finds that learning in the arts may be uniquely able to boost learning and achievement for young children, students from economically disadvantaged circumstances, and students needing remedial instruction.



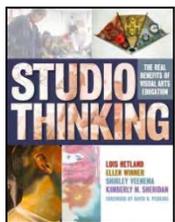
- According to *Champions of Change: The Impact of the Arts on Learning* (1999), a compilation of studies on the impact of arts on learning, students who participate in the arts outperform their peers on virtually every measure. Researchers found that "sustained learning" in music and theater correlates to greater success in math and reading, and students from lower socioeconomic backgrounds see the greatest benefits. In fact, "learning in and through the arts can help 'level the playing field' for youngsters from disadvantaged circumstances," the researchers contended.



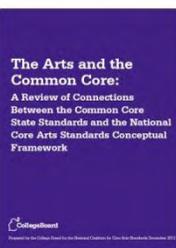
- What do arts educators and others think are the key attributes of quality in arts learning? Researchers at Harvard's Project Zero explore this question in *The Qualities of Quality: Understanding Excellence in Arts Education* (2009) through interviews, case studies and a literature review. Excellent arts education, they conclude, is not simply a matter of adopting a set of "best practices." Rather, it requires educators to reflect deeply about a range of issues, including the many possible purposes of arts education, from helping students develop aesthetic awareness to helping them grow as individuals. The report includes a set of tools that can assist decision-makers in achieving and sustaining quality arts education.



- Cognitive neuroscientists at seven major universities have found strong links between arts education and cognitive development (e.g. thinking, problem solving, concept understanding, information processing and overall intelligence.) According to the Dana Consortium study, *Learning, Arts, and the Brain* (2008) children motivated in the arts develop attention skills and memory retrieval that also apply to other subject areas.



- In their 2006 book *Studio Thinking: The Real Benefits of Visual Arts Education* authors Lois Hetland and Ellen Winner discuss why students involved in the arts do better in school and on their SATs than their peers. They find that students in art classes learn a remarkable array of mental habits not emphasized elsewhere in school. Skills include persistence, expression, making clear connections between schoolwork and the outside world, observing, envisioning, and innovating through exploration. Each of these skills has a high value as a learning tool, both in school and elsewhere in life.



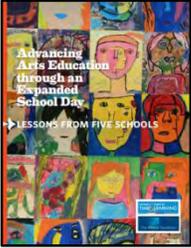
- The Common Core State Standards for English Language Arts and Mathematics were released in mid-2010, and they have been quickly adopted by almost all 50 states. According to *The College Board, The Arts and the Common Core: A Review of Connections Between the Common Core State Standards and the National Core Arts Standards Conceptual Framework* (2012), aligning arts education with Common Core objectives may not detract from arts instruction and impose additional expectations on arts teachers; rather, the Common Core can potentially provide arts teachers with a common language with which to describe the cognitive skills that they are *already* addressing and cultivating through rigorous and meaningful arts experiences.

(continued)

## Instruction time for the arts is decreasing, but schools are finding new ways of extending learning opportunities

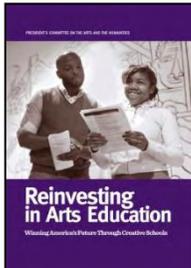


- A 2011 national survey by Common Core and the Farkas Duffett Research Group of 1,001 3rd-to-12th grade public school teachers finds that according to most teachers, schools are narrowing curriculum, shifting instructional time and resources toward math and language arts and away from subjects such as art, music, foreign language, and social studies. Two-thirds (66%) say that other subjects “get crowded out by extra attention being paid to math or language arts.”

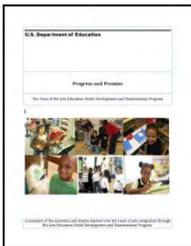


- *Advancing Arts Education through an Expanded School Day: Lessons from Five Schools*, presents case studies of five schools utilizing the longer student and teacher days to prioritize time for arts education as they work to improve overall academic instruction and focus on individual student achievement.

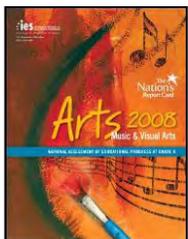
## Federal data on arts education



- A 2011 report by the President’s Committee on the Arts and the Humanities, *Reinvesting in Arts Education*, synthesizes the past decade of research about how the arts boost student achievement. It also offers five major recommendations based on this research: 1) build collaborations among different approaches; 2) develop the field of arts integration; 3) expand opportunities for teaching artists; 4) utilize federal and state policies to reinforce the place of arts in K-12 education; and 5) widen the focus of evidence gathering about arts education.

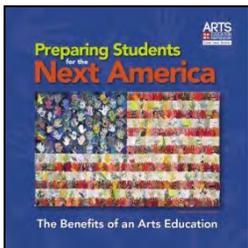


- *Progress and Promise: Ten Years of the Arts Education Model Development and Dissemination Program*, offers a summary of the successes and lessons learned over ten years of arts integration through the US Department of Education’s federally funded Arts Education Model Development and Dissemination Program.



- The 2008 National Assessment of Educational Progress (NAEP, or often referred to as the Nation’s Report Card) arts assessment measures students’ knowledge and skills in music and visual art. The inclusion of the arts in NAEP 2008 marked the fourth time the disciplines of music and visual arts have been assessed nationally. The results showed mediocre achievement in students’ knowledge and skills in both arts forms, with lower proficiency scores for minority students, males, and low income students.

## Overview of research shows that arts education prepares students to succeed in school, work, and life



- The Arts Education Partnership's latest research bulletin, *Preparing Students for the Next America: The Benefits of an Arts Education*, offers a snapshot of how the arts support achievement in school, bolster skills demanded of a 21st century workforce, and enrich the lives of young people and communities. It draws on literature found in AEP's clearinghouse for research ArtsEdSearch.org.