

The Arts Advantage:

Impacts of Arts Education on Boston Students

Introduction

Launched in 2009, BPS Arts Expansion, the public-private partnership led by the Boston Public Schools Visual and Performing Arts Department and EdVestors, brings together local foundations, the school district, arts organizations, higher education institutions, and the Mayor's Office to focus on a coherent, sustainable approach to quality arts education for all BPS students. This collaboration of local leaders along with students, families, and school staff, has enabled Boston to emerge as a national leader among urban districts working to expand arts education.

The purpose of this study is to examine how access to arts education in BPS influences education outcomes pertaining to student social-emotional and academic outcomes as well as parent and teacher perspectives regarding school climate. This research strengthens the case for quality arts education for every student, finding significant evidence increases in arts education lead to improvements on a range of indicators of student and parent school engagement.

Background

Supporters of arts education have long held that the arts play a critical role in K-12 education. The arts provide an abundance of formative educational opportunities, but the extent to which schools yield educational benefits from these opportunities remains largely understudied. Those of us who have experienced or recognize the intrinsic benefits of the arts do not need further evidence to justify their value. However, policymakers increasingly rely on scientific-based research in their decision-making.¹

Existing studies have typically relied on limited data sets and lacked rigorous methodological approaches.² Very few states and districts collect arts education measures.³ Consequently, conducting arts education research has been a challenge, but these efforts have become crucial to the preservation of the arts in schools. In the absence of robust evidence demonstrating the value of arts education, it is often the first subject to be cut when education policymakers are faced with difficult decisions regarding how they allocate educational resources.⁴ Over the past decade, the increased emphasis on accountability testing in core subjects has coincided with a notable decline in school-based arts exposure.⁵

Our Study Included

Number of K-12 Student-Level Observations

616,273

Timeframe (2008-09 – 2018-19)

11 Years

Percent of students with Individualized Education Plans

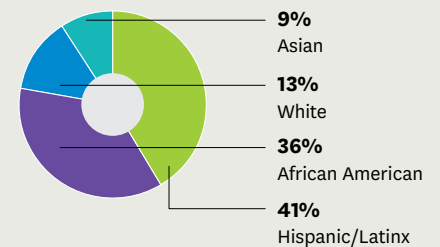
20%

Percent of English Language Learners

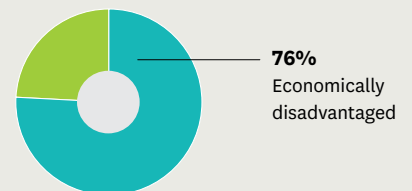
29%

Our Students

Race/Ethnicity



Household Income



A small but growing body of research finds that arts learning opportunities generate causal effects on policy-relevant educational outcomes. Randomized controlled trial studies of arts education programs have found that arts exposure improves students' critical thinking, writing achievement, compassion for others, and increases students' motivation to engage in cultural activities.⁶ There are, however, some notable limitations to the settings of these studies that implore further research. Specifically, these studies tend to not take place in authentic school settings and examine fairly short-term interventions. Important questions remain about whether common school-based arts learning experiences yield educational benefits.

Lingering policy-relevant questions also remain regarding who benefits the most from receiving arts education. Several studies have identified that race/ethnicity and socioeconomic status are strong predictors of access to arts and cultural experiences outside of school, with historically-underserved populations receiving substantially less exposure through family-facilitated experiences.⁷ Moreover, studies have shown that historically-underserved students demonstrate more-pronounced, positive impacts from school-sponsored arts exposure, suggesting that these interventions reduce gaps in educational outcomes.⁸ Consequently, students from underserved communities are more dependent on schools to provide arts access to attain these benefits.

Description of Study

In this study, the researchers provide a critical contribution to this growing body of research through a quasi-experimental, scholarly investigation to assess the impacts of longitudinal variations in arts educational resources relative to secondary administrative data (K-12 student records and surveys as well as parent and teacher school climate surveys) from Boston Public Schools.

The scope and scale of this study encompasses 151 unique datasets, comprised of 1,511 variables and 616,273 student-level observations, enrolled in 171 traditional public schools, over eleven school years (2008-09 through 2018-19). Researchers merged these data to examine the effects of variations in students' arts resources and learning opportunities, with arts access defined as student enrollment in arts courses, on a host of educational outcomes pertaining to student social-emotional and academic outcomes as well as parent and teacher perspectives regarding school climate. The main analytical strategy employed in this study is estimating changes within, rather than across, students, relative to their own changes in arts education participation. In other words, rather than simply comparing students who take arts courses to students who don't; this student fixed effects approach implicitly compares students to themselves at different points in time. For example, rather than compare attendance rates for students who take arts courses to students who don't take arts courses, the research effectively estimates the change in attendance rate, over time, for school years when students are taking an arts course versus school years those same students are not taking an arts course.

"Student engagement and interest in the arts is heavy... it motivates students to show up to school."

— BPS Arts Teacher

"Arts engagement has proven to be a hook for our students and families, which we have been able to leverage to achieve greater parental involvement throughout the school."

— K-8 School Principal

"Arts events have a positive effect on student and family engagement. Parents are excited to see their child's work exhibited at school events and publicly. I am often told that families make a special effort to attend these events with their children."

— BPS Arts Teacher

"Parents have attended arts events to see their students perform and student attendance has increased each of the years we have had a strong music program."

— High School Principal

"Family Engagement has always been the highest during performance dates, and student attendance on those dates is nearly universal."

— K-8 School Principal

Key Findings

This study provides a unique opportunity to study how variations in students' arts resources and learning opportunities impacted a range of outcomes related to student social-emotional and academic outcomes as well as parent and teacher perspectives regarding school climate. The analysis found the following significant findings:

1 There are consistent **positive effects on student attendance** as a result of students taking arts courses. These effects are notably stronger for students who have a history of chronic absenteeism. When enrolled in an arts course, chronically absent students attend school for one additional day compared to when they are not enrolled in arts courses. Another way to think concretely about arts' impact on student attendance is through the cumulative effect on teachers' instructional time. For example, since art has the effect of increasing attendance by about a third of a day per student, this translates into 9 more days of instruction, per teacher, for a classroom of 25 students.

2 When more students in a school are enrolled in arts courses, **indicators of parent and student school engagement are higher**. Students report positive impacts on Arts Enthusiasm, School Belonging, and Learning Engagement as they take more arts courses. As the number of students enrolled in arts courses increases, teachers are more likely to report that students put more effort into their work and parents are more active at the school.

3 The study finds overall mixed effects on test scores, with mostly null and some positive though modest effects. There are significant **positive student test score impacts** for grades 6-8 in both English Language Arts and Mathematics. The effects in English Language Arts tend to be larger. There was no evidence of student test score impacts in elementary grades. While this research did not prioritize examining test score impacts, the positive effects on test scores for students in middle schools could be another indicator that arts education increases student engagement.

Summary of Findings: Taken together these findings highlight the role that arts access has on increased student engagement as measured by reductions in absenteeism, increases in student and parent school engagement, and modest effects on student achievement, particularly in English Language Arts for middle school students. In addition, the arts have an even greater impact on the attendance of students who have been chronically absent. It is important to note that chronic absenteeism, and how to address it, has received a great deal of attention from education policymakers and administrators during the COVID pandemic, with increasing student attendance and maintaining student engagement being even more crucial.

Arts Course-Taking Increases Student Engagement



- ★ Students report positive impacts on Arts Enthusiasm, School Belonging, and Learning Engagement as they take more arts courses.
- ★ Teachers report positive impacts on Student and Parent Engagement when students take more arts courses.

Positive impact on home and school

Students receiving the arts in school attend more, are more engaged with learning and their school community, and their parents are more likely to participate in school activities. As education administrators and policymakers struggle for ways to connect with students and their parents, these results suggest one strategy for generating social capital to provide a robust school climate is through providing arts education as a core ingredient in a well-rounded education.

Student Have Better Attendance Rates When Enrolled in Arts Courses



- ★ A review of studies that examine school efforts primarily designed to target absenteeism typically result in less than a one-day reduction in total absences over one school year.
- ★ An increase in arts course-taking has a significant, positive effect on student attendance that is comparable with targeted interventions to reduce absenteeism. This is even more significant for students with Individualized Education Plans (IEPs).

Over a full school year, each student enrolled in an arts course sees an increase of a third of a day in attendance. This translates to 9 additional days of instruction for a classroom of 25 students.

This effect is increased for students with IEPs that gain 0.7 of an additional day, and by students that have been chronically absent that gain 1.1 additional days when enrolled in arts courses over a school year.

Conclusion

Findings from this study provide strong evidence that can strengthen case-making and help inform decision-making for administrators and policy-makers when it comes to the provision and allocation of resources for arts educational opportunities. Such results are critical for developing a body of evidence to guide decisions by school districts and states, who often have to make difficult decisions with constrained resources.

This study provides a much-needed foundation for future research in arts education and generates new hypotheses for the field. Because the researchers were able to examine the relationships between variations in arts education and experiences relative to critical educational outcomes in everyday school settings, this study provides a more solid foundation for building theory, designing interventions, and guiding future evaluations.

Please [click here](#) for a copy of the complete report.

Endnotes

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About EdVestors and BPS Arts Expansion

EdVestors' mission is to advance equitable, meaningful education that prepares every Boston student to activate their power and shape their future. We drive toward our vision by 1) activating people and resources, 2) learning and iterating in context, and 3) influencing system change. We believe that continuously attending to all three drivers ensures our programs and initiatives will create impact. Boston Public Schools Arts Expansion is a multi-year effort to expand arts education across the district. Launched in 2009, BPS Arts Expansion is focused on a coherent, sustainable approach to quality arts education for all Boston Public School (BPS) students. A true public-private partnership, BPS Arts Expansion has brought together local foundations, the school district, arts organizations, higher education institutions and the Mayor's Office. This collaboration of local leaders along with students, families, and school staff, led by the BPS Visual and Performing Arts Department and EdVestors, believes in the power of the arts to develop creative, engaged learners.

Citation

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