

equalizing access to quality tutoring

# Implementation of the OSSE HIT Initiative:

# School Year 2022 – 23 Interim Report

(July 2022 - March 2023)

#### Overview

During the 2022-23 school year the Washington, DC Office of the State Superintendent of Education (OSSE) expanded the OSSE High-Impact Tutoring (HIT) Initiative (hereinafter, the Initiative) with the goal of rapidly expanding access to high-impact math and reading tutoring for students in grades kindergarten through 12, with a focus on students in the District who are farthest from opportunity. A primary mechanism for expansion is grant funding awarded directly to tutoring providers to conduct tutoring programs in collaboration with eligible schools across the District and at community-based locations. Eligible schools are those in which 40 percent or more of their students are categorized as "at risk."

During the 2022 - 23 school year, funding was initially provided to nine organizations - Blueprint Schools Network, City Year, George Washington University Math Matters, Kid Power, The Literacy Lab, Maryland Teacher Tutors, Reading Partners, Saga Education, and the Springboard Collaborative. OSSE issued an additional round of grant funding to tutoring providers in late January 2023, most of which did not begin programming until March, and funded additional tutoring providers during the reporting period through the recipient of a strategic program supports grant, CityTutor DC, which incubates HIT providers and supports communitybased tutoring hubs as part of their partnership with OSSE. The initiative also funded 10 schoolbased HIT managers as well as tutoring "design

## **Key Takeaways**\*

- ☐ During the 2022 23 school year students from more than half of DC schools (133/244) participated in OSSE-funded high-impact tutoring.
- □ Data from July 2022 March 2023 indicate that 4059 (nearly 5% of) K − 12 DC students participated in OSSE-funded HIT. Three percent (2499) of students in DC schools received OSSE-funded tutoring in reading and 2% (1906) received tutoring in math.
- ☐ Compared to DC students overall, students who attended OSSE-funded tutoring were much more likely to be identified as Black or African American, Hispanic or Latino, at risk, economically disadvantaged, and have lower prior achievement.
- ☐ Participating students attended an average of 16.91 18.36 sessions, with an average student-tutor ratio of 3:1.
- ☐ Elementary students were more likely to receive tutoring and attend more sessions than middle and high school students.
- ☐ Grantees' programs include many evidence-based features of effective tutoring and are strongly aligned to OSSE's high-impact tutoring standards.

<sup>\*</sup>For programming from July 2022 – March 2023

sprints" and communities of practice conducted by CityTutor DC to support tutoring providers and school leaders in implementing high-impact tutoring programs.

This memo describes implementation of the grant program from July 2022 – March 2023. Importantly some data were not available at the time of writing. Specifically, attendance data were not shared from at least three organizations because they had not yet received the necessary consent from families or schools to meet FERPA requirements. Program managers estimate that missing data represent over 1,000 students. These missing data will be included in future reports.

Using available data collected by tutoring providers and administrative data shared by OSSE, we examine the following questions:

- Do programs align to evidence-based features of effective high-impact tutoring?
- How many schools and students did the program reach and what are the characteristics of the schools and students who were served by the OSSE HIT Initiative (hereinafter OSSE HIT schools and students)
- How much tutoring did students receive, and did the number of sessions received vary by student characteristics?

## **Brief Summary**

We find that the Initiative's reach is wide, serving over 4,000 students from more than half of DC schools. OSSE HIT students on average received 17 sessions of tutoring with a consistent tutor in a small group size of 3:1. Additionally, the Initiative has been successful in targeting struggling students and students from many historically marginalized groups, who represent the majority of OSSE HIT students. Importantly, students with lower incoming PARCC scores, as well as Black or African American students and Hispanic or Latino students, tend to receive more tutoring sessions, especially in reading. At the same time, we find that English learners tend to receive fewer tutoring sessions in reading, but more in mathematics; students with disabilities tend to receive slightly fewer mathematics sessions on average. Together these findings suggest variation in how students with specialized instructional needs may be served. Overall, evidence suggests that the Initiative is improving access to high-quality tutoring experiences to a significant number of students in DC schools.

## **Program Features**

Features that characterize effective high-impact tutoring include small group size (i.e., no more than four students), regular and frequent sessions (occurring at least three times per week for at least 30 minutes per session), embeddedness during the school day, the provision of a well-trained consistent tutor, the use of data to identify students' assets and needs, and high-quality instructional materials (Robinson & Loeb, 2021). Analysis of OSSE administrative data, tutoring session data, program documentation, and personal communications with program managers support that all programs include many evidence-

<sup>&</sup>lt;sup>1</sup>Robinson, Carly D., and Susanna Loeb. (2021). High-Impact Tutoring: State of the Research and Priorities for Future Learning. (EdWorkingPaper: 21-384). Retrieved from Annenberg Institute at Brown University: https://doi.org/10.26300/qf76-rj21

based features of effective tutoring and are strongly aligned to <u>OSSE high-impact tutoring standards</u>. Appendix Table A1 presents the features of HIT programs provided by the initial cohort of grantees operating from July 2022 through March 2023.

Across providers, students met with tutors one-on-one or in small groups and saw the same tutor multiple times per week. Most organizations collaborated with school leaders to schedule at least some tutoring during the school day. Some providers offered tutoring at community-based sites such as community centers. Personal communication with program managers confirmed that tutors utilized high-quality instructional materials that were directly aligned to the classroom curriculum and/or were grounded in evidence (e.g., the science of reading).

#### **Participation**

#### **School Participation**

Analyses of available data show that students from 133 schools participated in OSSE-funded tutoring during the 2022-2023 school year reporting period (July 2022 – March 2023) and tutoring took place on site at 110 schools. Figure 1 below displays the characteristics of schools attended by OSSE HIT students. As shown, the schools attended by OSSE HIT students on average had a greater proportion of students identified as Black or African American, at-risk<sup>2</sup>, economically disadvantaged, and/or not meeting proficiency in both mathematics and reading.

<sup>&</sup>lt;sup>2</sup>Students who qualify for Temporary Assistance for Needy Families (TANF), Supplemental Nutrition Assistance Program (SNAP), have been identified as homeless during the academic year, who are under the care of the Child and Family Services Agency (CFSA or "foster care"), or who are high school students at least one year older than the expected age for their grade are categorized as "at risk."

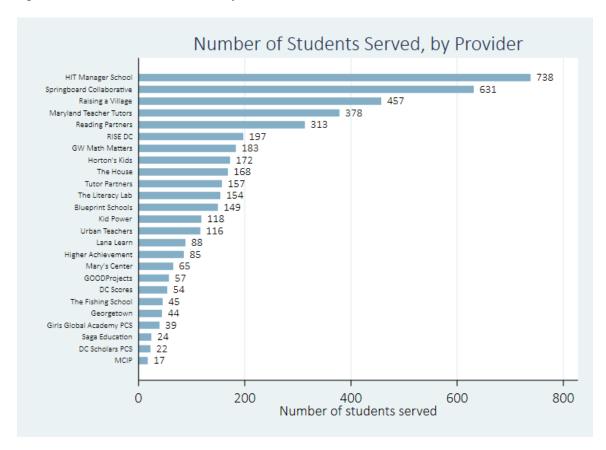
OSSE HIT School Not OSSE HIT School Students with Disabilities **English Learners** Asian or Asian American Black or African American Hispanic or Latino White Economically Disadvantaged At Risk Below Proficient, 2022 Math Below Proficient, 2022 Reading 0 10 20 30 40 50 60 70 80 90 100 Average Percent of Students in Schools

Figure 1. Characteristics of Schools Attended by OSSE HIT Students

#### **Student Participation**

Available data indicate that 4,059 students in kindergarten through grade 12 participated in tutoring during July 2022 – March 2023. This corresponds to about 5 percent of all students in the district. Three percent (2,499) of students in the district received tutoring in reading and 2% (1,906) received tutoring in math. Figure 2 displays the number of OSSE HIT students served by each provider, and also includes OSSE HIT students not directly served by an OSSE grantee provider, but receiving HIT in a school staffed with an OSSE-funded HIT manager. Note that all City Year data and most data from Saga Education were not available for this report but will be included in future reporting.

Figure 2. Number of Students Served by Provider



#### Participation by Student Characteristics

Figure 3 below displays the proportion of students who participated in OSSE HIT by demographic characteristics. In line with the characteristics of OSSE HIT schools we see that compared to students overall, a larger proportion of OSSE HIT students were identified as Black or African American, economically disadvantaged, at risk, or as having a disability.

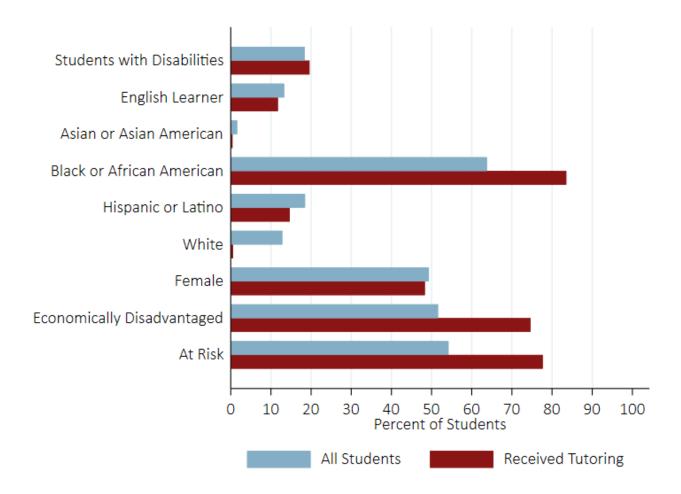


Figure 3. Proportion of OSSE HIT Students by Demographic Characteristics

We then used regression analyses to test whether there was a statistically significant relationship between participation in OSSE HIT and student characteristics when taking into account prior year test scores. Results in Table 1 below can be interpreted as the predicted percentage point differences in participation for groups of students, when taking into account prior year test scores. Table 1 shows that students identified as Black or African American, Hispanic or Latino, or at-risk are more likely to participate in OSSE HIT. For example, Black or African American students are about 10 percent more likely than white students to participate in HIT, after accounting for prior year test scores. Hispanic or Latino students are 18 percent more likely to participate than white students. Conversely, students with disabilities are about four percent less likely to participate in OSSE HIT. These differences are statistically significant.

In general, demographic trends suggest that OSSE HIT was successful in reaching students with the most academic challenges and students from historically marginalized groups. At the same time, compared to students overall, we see that OSSE HIT students were less likely to serve students with disabilities. This may be because students with disabilities may have access to other resources or interventions, and HIT programs are not intended to take the place of other key specialized supports.

Table 1. Predicted Difference in Tutoring Participation Within Schools, by Student Characteristics

| Percentage Points Difference in Participation in Tutoring |       |                                 |                       |                     |                                  |          |  |  |
|---|-------|---------------------------------|-----------------------|---------------------|----------------------------------|----------|--|--|
| Female  | Asian | Black or<br>African<br>American | Hispanic or<br>Latino | English<br>Learners | Students<br>With<br>Disabilities | At Risk  |  |  |
| > 1%  | > -1% | 10.4% ***                       | 18.0% ***             | -1%                 | - 3.8 %***                       | 9.1% *** |  |  |

**Note.** Estimates are from models restricted to the population of students in schools attended by OSSE HIT students. Percentages of female and racial/ethnic categories are relative to male and white students, respectively. Asterisks indicate statistical significance. A difference is "statistically significant" when there is a high degree of confidence that the differences between the two groups did not occur by chance.+ p<0.10, \* p<0.05, \*\* p<0.01, \*\*\* p<0.001. Model Includes fixed effects for student grade level.

#### Participation by Prior Year Performance Level

Figures 4 and 5 below show the percentage of HIT students who scored in a given performance category on their prior year test scores compared to the percentage of students in DC overall. Compared to students overall, a greater proportion of OSSE HIT students scored in the first two performance levels (i.e., "did not meet " and "partially met" expectations) on their prior-year math and reading PARCC scores. This means that in both math and reading, OSSE HIT students had lower incoming PARCC scores compared to DC students, overall, suggesting the Initiative is successful in reaching students with the most academic challenges.

Figure 4. Participation Rates by Prior Year PARCC Performance Level, Math

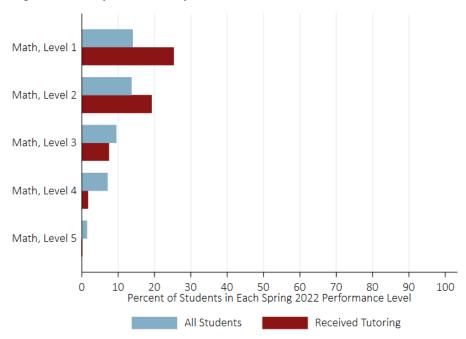
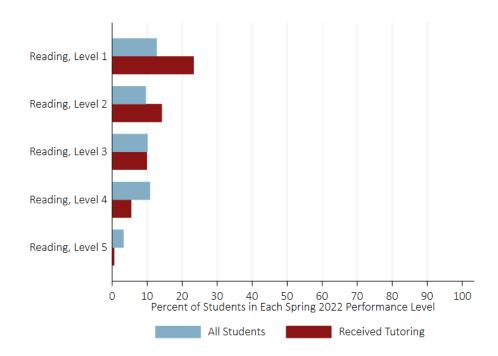


Figure 5. Participation Rates by Prior Year PARCC Performance Level, Reading



## Dosage

Figure 6 presents the percentage of OSSE HIT students who attended a given number of sessions. We use tutoring attendance log data to determine the average number of sessions attended by OSSE HIT students. We find that for OSSE HIT students who attended any tutoring, the average number of sessions attended is 16.91 sessions. When students who were enrolled in HIT but attended zero or only one session are removed from the data, the average number of sessions attended is 18.36 sessions. However, Figure 7 below shows that there is grade-level variation in the number of sessions, with students in the early elementary grades attending the greatest number of sessions and students in high school attending the fewest sessions, on average. Data on individual and average session length were not consistently reported and are not included for the purposes of this report. Descriptions of programs from providers suggest that sessions could range from 20 – 65 minutes.

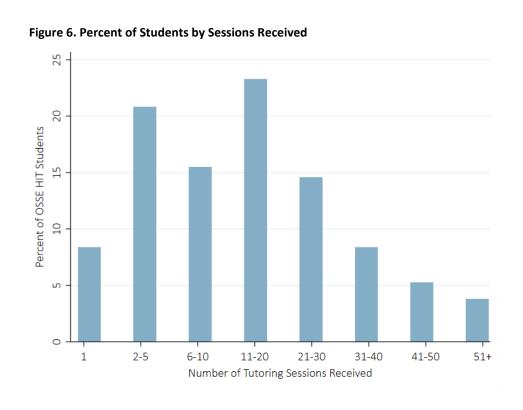
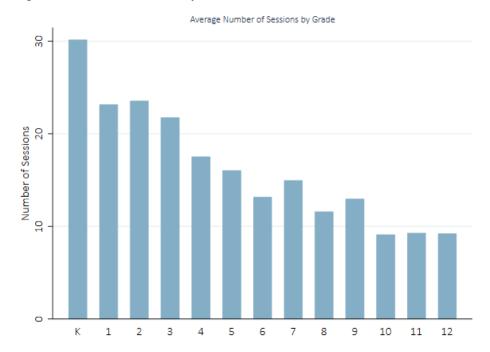


Figure 7. Number of Sessions by Grade



#### **Dosage by Student Demographics**

Table 2 shows the results from regression analysis examining the relationship between student demographic characteristics and the number of sessions attended. In models controlling for prior achievement level, we find that among OSSE HIT students, Black or African American and Hispanic or Latino students attended about 6 and 8 more sessions, respectively, than white students. English learners received about 1.7 more math sessions, but 2.5 fewer reading sessions than native English speakers, when accounting for prior achievement level. Other estimates are inconsistent across models.

Table 2. Relationship Between Student Characteristics and Number of Sessions Attended

| Difference in Average Total Number of Sessions by Student Demographics |        |        |                                 |                       |                     |                                  |         |  |  |  |
|--|--------|--------|---------------------------------|-----------------------|---------------------|----------------------------------|---------|--|--|--|
|  | Female | Asian  | Black or<br>African<br>American | Hispanic or<br>Latino | English<br>Learners | Students<br>With<br>Disabilities | At Risk |  |  |  |
| Total<br>Sessions  | -0.48  | 8.437+ | 5.926+                          | 8.226*                | -1.093              | 0.322                            | -0.273  |  |  |  |
| Math<br>Sessions   | -0.056 | 1.651  | -2.208                          | -0.904                | 1.713**             | -0.663*                          | -0.137  |  |  |  |
| Reading<br>Sessions  | -0.408 | 6.854  | 8.02**                          | 8.867**               | -2.484**            | 0.883                            | -0.461  |  |  |  |

Notes. Differences in average number of sessions by gender is relative to male students. Differences by race are relative to white students. Standard errors in parentheses; all models include fixed effects for student grade level. + p<0.10, \* p<0.05, \*\* p<0.01, \*\*\* p<0.001.

#### **School Attendance**

#### **Relationship between Tutoring Participation and School Attendance**

Table 3 below presents results from regression analyses examining the relationship between participation in OSSE-funded high-impact tutoring and school attendance. We find that on average, participating students attend about 2 percent more (about 3 additional school days³) compared to non-participating students, suggesting that students with better school attendance rates are more likely to partipate in tutoring. Additionally, as expected, we find that students with better school attendance attend more tutoring sessions on average, and vice versa.

Table 3. Relationship Between Tutoring Sessions Attended and Attendance Rate

| Difference in 2023 Attendance Rate (% Days Attended) |                  |                  |                   |                   |                   |                   |                 |  |  |  |
|--|------------------|------------------|-------------------|-------------------|-------------------|-------------------|-----------------|--|--|--|
| Number of Session Attended                           |                  |                  |                   |                   |                   |                   |                 |  |  |  |
| Overall  | 1 -5<br>Sessions | 6-10<br>Sessions | 11-20<br>Sessions | 21-30<br>Sessions | 31-40<br>Sessions | 41/50<br>Sessions | 51+<br>Sessions |  |  |  |
| 1.8% ***   | 1% *             | 1.5% **          | 1.5 % **          | 3.8% ***          | 4.1% ***          | 6.2% ***          | 1%              |  |  |  |

Note. + p<0.10, \* p<0.05, \*\* p<0.01, \*\*\* p<0.001

Models are restricted to schools that offer OSSE-funded tutoring. All models controlled for demographic characteristics, prior year test scores, and prior year attendance, and include fixed effects for student grade level.

<sup>&</sup>lt;sup>3</sup> Based upon a 180-day school year

# **Appendix**

Table A1 displays the features of HIT programs provided by the initial cohort of grantees operating HIT programs from July 2022 through March 2023.

**Table A1. Features of Initial Cohort of OSSE HIT Grantees** 

|                              | Grade<br>Level | Subject   | Days/<br>Week | Mins/<br>Week | Session<br>Length<br>(Mins) | During<br>School | OST      | Group Size |
|------------------------------|----------------|-----------|---------------|---------------|-----------------------------|------------------|----------|------------|
| Blueprint Schools            | MS             | Math      | 4             | 180           | 30 – 60                     | ✓                | <b>√</b> | 3          |
| City Year                    | ES, MS,<br>HS  | ELA, Math | 2-3           | 90            | 30 – 45                     | ✓                | <b>√</b> | 3          |
| GW Math Matters              | MS             | Math      | 2             | 90            | 45                          | <b>√</b>         | <b>√</b> | 1-3        |
| Kid Power                    | ES             | ELA       | 3             | 105           | 35                          |                  | <b>√</b> | 3          |
| The Literacy Lab             | ES             | ELA       | 5             | 125           | 20 – 30                     | ✓                |          | 1          |
| Maryland Teacher<br>Tutors   | ES, MS,<br>HS  | ELA, Math | 3             | 195           | 65                          | ✓                | <b>√</b> | 3          |
| Reading Partners             | ES             | ELA       | 2             | 90            | 45                          | <b>√</b>         |          | 1          |
| Saga Education               | HS             | Math      | 2-3           | 90            | 45                          | <b>√</b>         |          | 4          |
| Springboard<br>Collaborative | ES             | ELA       | 2-3           | 90            | 30 – 45                     |                  | <b>√</b> | 3          |

**Note.** Information based upon grantees' reports of their programs as designed. ES=elementary school, MS= middle school, HS= high school, OST= Out of School Time