

June 29, 2021

The Hon. Phil Mendelson, Chairman  
Council of the District of Columbia  
1350 Pennsylvania Avenue, N.W.  
Washington, DC 20004

Dear Chairman Mendelson and Councilmembers:

I write regarding the budget recommendations included in the Council-mandated education data audit, [Managing What Matters: More and Better Data Needed to Improve D.C. Schools](#) and to correct additional and repeated misstatements in the Office of the State Superintendent of Education's *Supplemental Responses Fiscal Year 2022 Budget Oversight* that was circulated on June 25, 2021.

The audit recommended purchase of a state-level Student Information System to assist OSSE in completing the work of a statewide longitudinal data system. The Office of the D.C. Auditor (ODCA) previously shared a draft budget amendment to this end. In response to Council inquiries we also provided draft Budget Support Act language to require a plan for the collection of course information and to create an Early Warning System, an initiative originally authorized by the Council in 2012.

Attached is an annotated version of the OSSE submission and a brief summary of the major points follows.

### **SLDS**

OSSE states that "OSSE has a statewide longitudinal data system (SLDS) consistent with the requirements in D.C. Code Section 38-2609." The Code section written in 2007 requires a "data warehouse" and does not define an SLDS. That same year the U.S. Department of Education began providing SLDS grants to states and in the last 15 years the definitions of an SLDS have been developed and refined. The U.S. Department of Education defines a Student Longitudinal Data System as one that "[collects and maintains detailed, high quality, student- and staff-level data that are linked across entities and over time, providing a complete academic and performance history for each student.](#)"

Of 18 required data elements the District fails to collect three (student courses, credits and grades; student-teacher linkages and information on student supports.) Another seven elements we collect only in part including on enrollment. The Council has requested enrollment counts at multiple times in the year. A fully-functioning SLDS has robust internal auditing functions and up-to-date entry and exit data for all students so that Council or others can know and use current District enrollment data across all LEAs, schools, student subgroups, and students at any time. Since the audit was released in March the Council has not required nor has OSSE provided a single example of longitudinal data use.

### **Statewide Student Information System**

OSSE writes: "OSSE has a state SIS, eSchoolPlus, which is used by 17 LEAs [local education agencies] at this time." With this statement OSSE acknowledges that we do not have a state-level Student Information System. By definition, a *statewide SIS* as recommended in the audit would be used by OSSE to receive, maintain, and use data from all of the District's 68 Local Education Agencies. Not having a statewide SIS

can be harmful to students as shown in the recent [DCist article](#) about high school senior Aaliyah Jones whose diploma was pulled back after graduation, in part because we have no system in which LEAs can easily transfer student records to one another in real time, one function of a statewide SIS.

### **Coursework Collection**

On collecting coursework data, OSSE states, "The next meaningful improvement that we will make is the creation of a course coding system, which if successful, will allow OSSE to increase its data collection and reporting efforts, but may not be applicable to all secondary courses across the District." Spending time and resources to develop the District's own system would put OSSE out of step with other states and federal recommendations. The National Forum on Education Statistics developed a course coding system now in use in a majority of states. Other states have typically taken one year to provide guidance to LEAs on coding courses using the [School Courses for the Exchange of Data Classification System](#) (SCED) which was designed by state and local leaders and could accommodate all secondary courses.

### **Early Warning System**

A D.C. student Early Warning System (EWS) was authorized by the Council in Bill 19-648, "Raising the Expectations for Education Outcomes Omnibus Act of 2012." OSSE nevertheless writes that the agency "has not indicated that it will develop a state-level early warning system." Today the District's public schools hold back 18% of ninth graders, a circumstance other urban systems addressed successfully with systems to identify students who may be at risk of failure in time to provide additional individually-targeted supports. Multiple studies have shown the effectiveness of an EWS for preventing dropout and increasing student success. Statistical models predicting individual student success in DC can only make robust predictions if they are informed by citywide student data. In a system with the level of student mobility experienced in the District, efforts at the individual school level, while laudable, are simply not adequate to identify all of our students in need.

I hope this information is useful to the Council as you seek to fulfill your responsibilities for oversight of education policy and practice in the District of Columbia. If you would like more information on these or other elements of the education data audit, please let me or ODCA Education Research Director Erin Roth ([erin.roth@dc.gov](mailto:erin.roth@dc.gov)) know.

Thank you.

Sincerely yours,

A handwritten signature in blue ink that reads "Kathleen Patterson". The signature is written in a cursive, flowing style.

Kathleen Patterson  
District of Columbia Auditor

cc: Councilmembers  
Officers of the Council

Attachment



DISTRICT OF COLUMBIA

OFFICE OF THE STATE SUPERINTENDENT OF

**EDUCATION**

## **Supplemental Responses Fiscal Year 2022 Budget Oversight**

The following slides show annotated responses to OSSE's "Supplemental Responses Fiscal Year 2022 Budget Oversight" document submitted to the Committee of the Whole, including annotations of pages five through eight using screenshots of the responses.

Submission

To

Committee of the Whole  
The Honorable Phil Mendelson, Chairman  
Council of the District of Columbia

### Statewide Longitudinal Data System SLDS

Contrary to the Auditor's report, and as asserted in our testimony before your Committee on March 19, 2021, OSSE has a statewide longitudinal data system (SLDS) consistent with the requirements in D.C. Code 38-2609. Any statement to the contrary is wholly inaccurate. We collect and maintain detailed data on our students including enrollment, attendance, assessment, discipline, and postsecondary enrollment. We also collect and maintain detailed data on faculty and staff. We have data quality and governance protocols in place, and these data are linked across entities and over time. OSSE has demonstrated to the Committee its ability to conduct analysis using longitudinal data about our students. Our LEAs can see data related to their students' educational history to serve them effectively through extensive visualization tools.

OSSE disagrees with the approach recommended by the Office of the District of Columbia Auditor to purchase a commercial off the shelf (COTs) product to replace our SLDS. It is misguided and an oversimplification to suggest that purchasing a COTs product is a panacea to improving data quality and access.

DC Code 38-2609 does not require an SLDS, it requires a "data warehouse." These are not the same thing. Further, OSSE staff shared multiple times during audit interviews that the agency does not have a "data warehouse."

The audit shows in detail that OSSEs attendance and discipline data collections are invalid. OSSE maintains different values for public charter school attendance, and it is unclear which is accurate. In addition, public charter schools submitted different discipline data to the federal government than to OSSE and it is unclear which is accurate. Further, OSSE collects but does not use or report on postsecondary persistence or graduation.

If OSSE had sufficient data quality and governance protocols in place they would not have two major invalid data collections. OSSE still does not have data stewards for all data elements, one of the most foundational data governance strategies outlined by the Department of Education in multiple technical assistance documents in addition to many other missing data governance products, responsibilities, and documentation.

OSSE data is not linked over time. The files ODCA received had to be significantly cleaned and linked and there was no evidence of any longitudinal links. Further, the audit read every single public report in the audit scope (2013-2019), and beyond through 2020 and did not find a single instance of longitudinal data use further cementing that these data are not linked over time.

ODCA did not suggest that a statewide student information system is a panacea to the audit findings, however, it is the most efficient and effective path forward.

LEAs have expressed great interest in the data capacities not available in DC but available in other states and described in the audit. OSSE currently only shows them data they already have available and submitted themselves to OSSE.

## State Student Information System (SIS)

Contrary to the Auditor's report, and as asserted in our testimony before your Committee on March 19, 2021, OSSE has a state SIS, eSchoolPlus, which is used by 17 LEAs at this time. OSSE provides access to this statewide student information system for LEA use in the status quo, but we do not mandate its use. We mandate certain data collections consistent with federal and local law and issue guidelines for accurate collection and reporting. We believe that approach is appropriate and has led to a strong, reliable data collection and reporting system.

This is incorrect. OSSE describes here a student information system used by local education agencies, provided by the state. This is not a statewide student information system (Statewide SIS or SSIS). A statewide SIS is for use by OSSE, not LEAs. The audit provided detailed evidence of flaws and risks in OSSE's data system, not LEAs, and the recommendations are for OSSE. A statewide SIS would provide urgently needed functionality including real time data sharing between LEAs and OSSE and real time sharing of student records between LEAs as well. Currently OSSE uses an ad hoc, created "automated data transfer system" for sharing some data between LEAs and OSSE. The audit provides detail on the problems with using a system without needed controls and only for some data and not others. This ad hoc, open system has produced the invalid data collections OSSE currently has.

Again, a statewide SIS is for use by OSSE not LEAs. The audit findings and recommendations all pertain to OSSE systems and practices not LEAs. Statewide SIS's are now quite advanced and do not require that LEAs use a specific SIS on their end.

The audit shows in detail that OSSE's data are not reliable or valid.

OSSE has made tremendous progress towards improving collection and reporting of education data during the Bowser Administration, and we have carefully prioritized our time and resources to ensure that we are making meaningful improvements. The next meaningful improvement that we will make is the creation of a course coding system which, if successful, will allow OSSE to increase its data collection and reporting efforts.

This is not an easy task, and it will require a significant amount of work for OSSE and LEAs. In the status quo, schools and LEAs are afforded significant autonomy to design their course offerings and their delivery to serve their communities well, and we do not aim to curtail that autonomy. These instructional decisions should be made as close to students and educators as possible- not by bureaucrats that do not design lesson plans or lead classrooms. Yet, for courses that are similar enough across all LEAs, for example Algebra I or World History I, we aim to create a new standard set of course codes used across the District in all schools by creating detailed course definitions that are then used to create linkages to students taking those courses and educators instructing those courses. OSSE aims to use approximately \$2 million in ESSER funding to develop and pilot this course coding system with a select group of LEAs within 18-24 months of award.

Although it is too soon to make firm commitments about the data that we will collect in the future and on what timeline, conducting this work is foundational to doing much of the work stakeholders have stated they would like to see- including the collection of course grades, credit accumulations, and the ability to link teachers of record to student outcomes in their courses.

The National Forum on Education Statistics has already created a coding system used in the majority of other states (SCED). It is inefficient and risky to waste local effort and funds creating something that national, state, and local experts have already created, used, and improved, and shared with all states and districts for free. There is no reason why using an already created system that has been successful in many other states would not be successful in the District.  
<https://nces.ed.gov/forum/sced.asp>

Other states which have implemented SCED codes, like Rhode Island, budgeted for about 1.5M in expenditures for a complete course coding and collection system in their 2009 federal SLDS grant application. RI has a comparable number of LEAs, schools, and students to DC. The RI FY09 SLDS Grant Project Application can be found [here on their state grantee page of the NCES SLDS program website](#).

Proposed budget details on page 42 of the full scanned pdf of the different project application components:  
Initiative 2A-2B:  
Uniform Course Classification System/e-Transcripts  
\$1,477,700

Proposed work described for that Outcome 2 begins on page 23. Detailed work proposed, is on pages 26-29.

Student courses, credits, and grades continue to be shown to be more predictive of student success than standardized test scores. The District will be left without this critical information again according to this budget proposal. Meanwhile, other states are planning for learning recovery and needed resources using information about credit and grades for all secondary students in the state.

These statements reflect a misunderstanding of the substance and goal of course codes. Course codes are completely unrelated to instructional decisions. States with many more LEAs, schools, students, and courses than DC use SCED course codes. They simply provide a method to code each course. 5-digit SCED codes provide a course subject and number and 12-digit SCED codes provide more information like course sequence and Carnegie units.

A complete student course collection is often leveraged in other states to provide a method to link secondary students to their teachers of record. Often student - teacher linkages are planned and implemented alongside a full and complete student course collection, which is not reflected here in OSSE's proposal.

The \$4.1 million capital investment represents the second year in a four-year initiative known as Data Modernization. We began this effort in FY21 to further modernize our data infrastructure, building on the existing data infrastructure capital improvement project (CIP) first appropriated in FY17. This investment will allow us to more seamlessly and efficiently leverage our vast data resources in order to provide more access to accurate and actionable data that can be used to support our efforts to close achievement gaps across the city. Over the course of its four-year implementation plan, we will be specifically focusing on five areas of improvement:

- *Data Standards:* We are building OSSE-specific data standards that will allow us to seamlessly map across LEA, State, and national data sets. While our systems and data today integrate with LEA data, the underlying work required to make this happen is more burdensome on users than it needs to be. New standards will significantly reduce administrative burden for collection and reporting on both LEAs and OSSE.
- *System Integration and Improvements:* We are building and integrating foundational data systems with our new standards which will improve data quality and access for users. Some examples include:
  - Integration with the newly awarded early learning system
  - Integration with our soon to be awarded Special Education Data System (SEDS)
  - A new application to support self-service access for key data for both internal and external users by FY23
  - Revamped SLED and a modernized approach to data collection from LEAs
  - A new master data management system to house and manage the authoritative source of our information about our partner entities.

The National Forum on Education Statistics has already created substantial documentation and assistance around data standards, including CEDS, the Common Educational Data Standards. There is no reason to create data standards unique to the District, in fact, this will mean that they are unlikely to align to national standards.  
<https://ceds.ed.gov/>

System integration and master data management is a benefit of a statewide SIS and most efficiently achieved through this pathway.

Two core components of an SLDS that directly inform and relate to all infrastructure investments and decision-making are data governance and stakeholder engagement. The data audit describes these components and their importance in detail. Notably, governance and engagement are both related to the sustainability of data infrastructure investments. OSSEs proposal here does not reflect data infrastructure or engagement work that aligns with these principles.

Fundamentally this work is about our data *infrastructure* – that is, the technologies and processes underpinning our data resources. As such this project is a *prerequisite* for making expansion of data collection and reporting easier in the future than it is today. This will be a significant contribution towards making more of our data more widely available to stakeholders to support their decision making and programming in service to our students.

Early Warning Systems are tools that use a student's history to attempt to predict future outcomes and potentially flag students as at risk of dropping out and potentially requiring individual interventions. OSSE is always reviewing ways to better serve our students, families, schools, and LEAs. OSSE supports ongoing LEA and school level efforts to use data to assess student risk and provide appropriate interventions and supports. However, a top down, one size fits all statewide student identification system based on algorithms and rigid required interventions instead of relationships and context is not a prudent approach. As such, OSSE has not indicated that it will develop a state-level early warning system used across the District.

To support our LEAs in making timely, appropriate and effective interventions for students most at risk, we are making more meaningful strides in supporting our LEAs and schools with tools to identify students with needs, so they may take the steps to address them. OSSE provides easy access to data to guide school and LEA decision-making and prompt intervention with students and families. Specifically, we are doing this in two new and exciting ways. First, this year, we will roll out a new tool for LEAs to view key data in one place. Second, we will conduct substantive analysis regarding students' postsecondary pathways, with a special focus on students who have disengaged or are predicted to disengage based on our analysis. Finally, as described earlier in this submission, OSSE is focused on launching our course collection efforts which will provide even more information to schools and LEAs.

The description OSSE provides here shows a lack of understanding of a key support for LEAs, schools, and students in the District. First, Early Warning System models do not just use student's history to predict future outcomes, this is not possible. They also require using longitudinal, district-wide data on all student pathways in the District. Second, the statistical model is just one piece of the system. A full system requires significant stakeholder engagement, local LEA and school customization of both the model and potential targeted resources, training, support, and professional development. Third, interventions are not typically required. Instead, LEAs and schools select and customize their responses and targeted supports to student need, supported by evidence of need identified in the model and resources available across the District. Fourth, an Early Warning System can predict any outcome, not just drop out or disengagement. LEAs and schools may decide from a variety of relevant student outcomes and choose one or many in collaboration with the SEA such as, retention, postsecondary enrollment, disengagement or others. LEAs may also build on the state model. OSSE's new proposed analysis on predicted postsecondary disengagement is an EWS with a different outcome. These confusing and contradictory statements show a misunderstanding of what Early Warning Systems are at a critical time to support students most in need in the District.

Here are some of the many examples of benefits and best practices in Early Warning Systems. Other states and districts are currently leveraging these systems for urgently needed learning recovery including awarded [federal grant opportunities to use longitudinal data in support of recovery](#). The district examples shown here are only possible because of state level investments. EWSs require student data across the state to be effective tools for LEAs and schools, especially in DC with high mobility across LEAs.

- [Forum EWS Guide](#) containing case studies from multiple states and districts.
- [Early Warning Systems Tools and Resources from the Everyone Graduates Center, Johns Hopkins University's School of Education](#)
- [What Works Clearinghouse, Preventing Dropout in Secondary Schools Educators Practice Guide](#)
- [A practitioner's guide to implementing Early Warning Systems: Education Northwest – Northwest Regional Educational Laboratory \(REL\)](#)
- [Institute of Education Sciences \(IES\)- Early Warning Systems Summary](#)
- USED OPEPD PPSS September 2016, [Issue Brief: Early Warning Systems](#).
- National Association of Secondary School Principals (NASSP) December 3, 2020, [Heeding Early Warning Signs to Keep Students on Track for Graduation](#).
- [This article summarizes the emerging research and practice examining the development, use, and conditions influencing the use of early warning indicators](#) from the Chicago Consortium on School Research (CCSR). Also from CCSR, [a new early-warning indicator for elementary schools](#).
- Chicago Public Schools, Sept 2020, [Mayor Lightfoot and Chicago Public Schools Announce Record-High Graduation Rate. Record High Graduation Rate of 82.5% Driven by Academic Progress by Latinx Students; District Implements Changes to Calculation Based on Principal Feedback to Ensure Greater Accuracy](#)