



COLORADO MSL SYSTEM PROJECT 2015-16: System Design

Since the 2013-14 school year, Colorado districts have been creating and implementing Measures of Student Learning (MSL) systems that comprise the 50% of an educator's evaluation that is based on student academic growth. To help districts in this effort, The Colorado Education Initiative (CEI) has partnered with Slope Research (Slope) to gather information about MSL system design and implementation from school districts across Colorado. This report provides an overview of how a sample of Colorado districts designed their MSL systems.

Slope collected self-reported information from 56 districts representing 31 percent of all Colorado districts and 46 percent of Colorado's teachers and students. The respondents represent a variety of settings and cover a large proportion of important teacher and student demographic groups (see **Figures 1, 2, and 3**).

Figure 1. Proportion of Districts Participating by Setting



Figure 2. Proportion of Students and Teachers in the State Included in Participating Districts

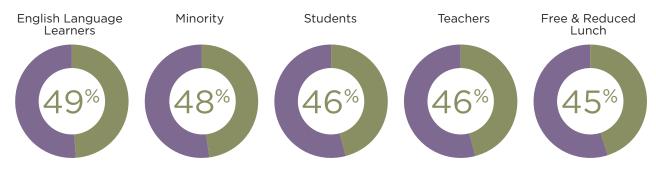
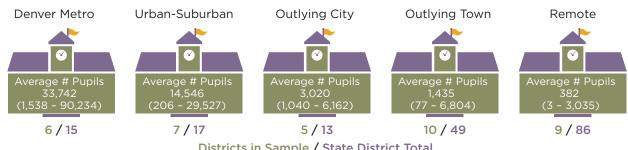


Figure 3. District Setting in Detail



Districts in Sample / State District Total

Respondents in this year's MSL study received specific feedback on their MSL systems and processes based on a review by a panel of experts convened by Slope and CEI. The panel included research staff and experts from Slope, CEI, and CDE, a representative from a school district, and members of the academic community. In order to provide a useful way for districts to compare their systems to other MSL systems around the state, we created MSL systems that typify the systems in place in participating districts based on information we collected about their MSL pies. We created a system for each of CDE's five district setting classifications. These systems give a sense of how districts with similar student populations and geographic considerations approach important factors in creating and implementing MSLs. (See statewide and district setting group typical MSL systems in Figures 4 and 5).

Key Findings:

- Respondents struggled with the inability to use state assessment data during the 2015-16 school year¹. Many respondents said that the systems they used this year represented a temporary, stopgap system, and noted that they would make changes in the future.
- Many respondents designed a single MSL system that covers many teacher categories. In the past, more districts attempted to create many MSL systems that covered a wide range of teacher categories.
- The use of student learning objectives² (SLOs) increased again this year. 61 percent of respondents reported that they used SLOs as a major component of their MSL systems this year. The inability to use state assessment data and desire to focus on local assessments were both drivers of the increased use of SLOs this year.
- Fewer respondents have perfectly balanced systems (25 percent collective measures and 25 percent individual measures) this year and individual attribution is weighed more heavily than collective attribution nearly across the board.

During the 2015-16 school year, H.B. 15-1323 specified that for that school year only, districts and local school boards could not use the 2014-15 results of the new state assessments in their MSL systems. Those assessments are CMAS science and social studies, CMAS PARCC English language arts and math. State assessment results from 2014-15 could be used as baseline data only, not as final results.

² SLOs are a process where teachers (individual teachers or groups) set meaningful goals for learning over time based on the baseline performance of students and identify assessments to measure those goals."

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Each district in the state uses a variety of assessments and measures in myriad ways. The distribution of individual and collective measures can vary greatly from district to district along with the number of measures used, the targets used for each measure, and the weights for each measure. In addition to the self-reported information on the characteristics and features of MSL systems, Slope also collected more specific information from 37 districts about the measures and assessments used and the various associated weights and targets. We condensed that information into a set of typical MSL systems we might see at the state level and within district setting groups. These pies represent a typical MSL system but not necessarily an exemplar or average system.

Figure 4 displays a system that is representative of the MSL systems we observed from the 37 districts that provided specific pie data for this study. This pie illustrates some of the key findings you will read about throughout this study. For example, respondents tended to weight individual measures of student learning more heavily than collective measures. Respondents were also more likely to use fewer measures (around three) in their MSL systems when, in previous years, we saw more districts using a larger number of measures in their systems. This reduction in the number of measures in the systems we observed may be due to the lack of availability of state data for the 2015-16 school year. In addition to the smaller number of measures used in the MSL systems we observed, Figure 3 also shows that the state trend in MSLs in the 2015-16 school year was toward more local control or selection of assessments and measures, as is exemplified by the significant weight associated with SLOs and teacher selected assessments.

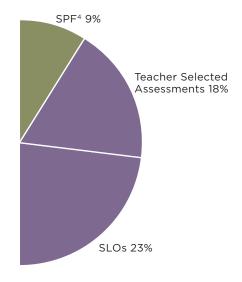


Figure 4: Typical MSL Statewide System³

³ See Appendix A for a definition of each assessment/measure.

⁴ Due to legislation prohibiting the use of certain state test data during the 2015-16 school year (see footnote 1) there was no SPF or DPF produced. Therefore, any district using SPF or DPF is using a previous year's data.

Figure 5 shows what the typical MSL system looks like in each of the CDE district setting categories. In each of the district settings, respondents weighted individual measures of student learning more heavily than collective measures. The Denver Metro school districts assigned the lowest weight to collective measures of student learning (2 percent) while collective attribution was highest among outlying cities and remote respondents. In all setting categories except urban-suburban districts, individual measures of student learning were dominated by SLOs and teacher selected assessments. Urban suburban districts were the only responding districts to use vendor assessments with any regularity.

Figure 5: MSL Systems by District Settings Denver Metro Urban-Suburban **Outlying City** (n=6)(n=7)(n=5)**DPF 11% SPF 11% SPF 15%** DIBELS 13% **SLOs 13%** Teacher Selected Teacher Selected Assessments 13% Assessments 35% **SLOs 13%** Outlying Town Remote (n=10)(n=9)SPF 6% ACT, DIBELS or SPF 11% DPF 7% Teacher Team Selected Selected Assessments Assessments 35% 35% SLOs 13% **SLOs 13%**

Each district may have one to numerous MSL systems that apply to different teacher types (usually based on content areas and grade levels taught). This means that a district may have one set of MSLs that each teacher in the district uses, or many different sets of MSLs used by different categories of teachers within the district. Each of the 37 respondents that provided us information on their MSL system provided details on the various assessments and measures used across the different teacher categories. In an effort to summarize this information, we created **Figures 5 and 6** that display the top five assessments and measures, both individual and collective, used by respondents in each of the district settings (if at least five were used) and the percentage of respondents within each setting using those assessments or measures.

Figure 6 shows the most commonly used collective measures of student learning by respondents in each district setting. What is clear is that even though current year (2015-16 school year) SPF data was not available to districts, SPF remained the most popular, or at least among the most popular, options to measure collective student learning in all district settings. DPF was one of the most commonly used collective measures statewide and in three of the settings, and vendor assessments were used in some fashion in all of the settings. Only respondents from remote districts used collective SLOs regularly, although at lower weights than SPF and DPF.

Figure 6: Top Five Collective Attribution Measures by District Setting and
The Percentage of Districts Using each Measure

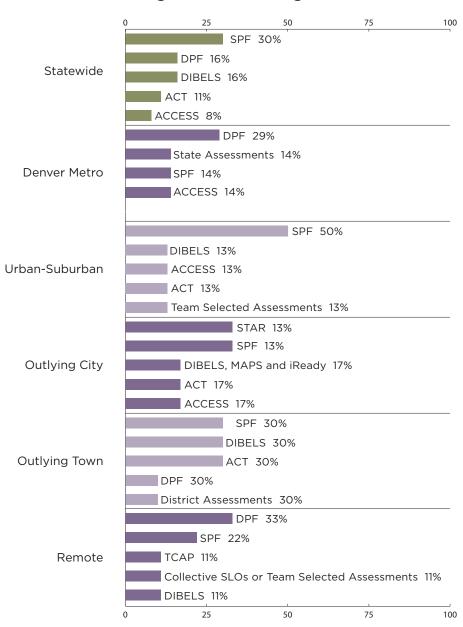
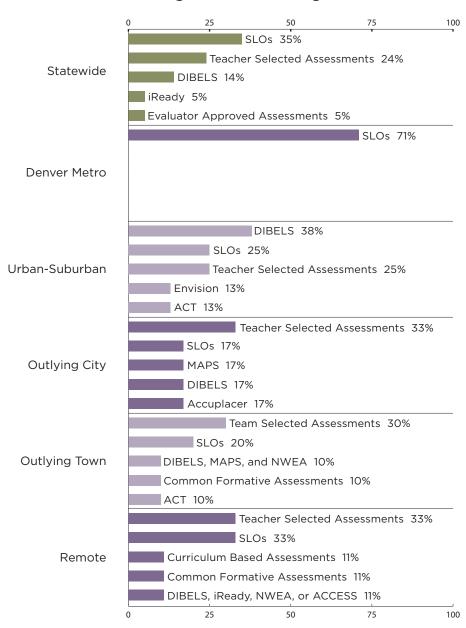


Figure 7 shows the most commonly used individual measures of student learning by respondents in each district setting. SLOs, the most commonly used individual measure of student learning statewide, was either the most or second most popular individual measure of student learning in each of the district setting categories. This is indicative of a move toward greater use of SLOs by respondents in this year's study. Districts in the Denver Metro, urban-suburban, and outlying city setting categories seemed to rely on SLOs, team selected assessments and vendor assessments overall. Whereas districts in outlying towns and remote district settings were more heavily focused on teacher selected assessments and SLOs.

Figure 7: Top Five Individual Attribution Measures by District Setting and The Percentage of Districts Using each Measure



APPENDIX A: Assessment/ Measure Definitions

Abbreviation	Assessment/Measure Description
ACCESS	Assessing Comprehension and Communication in English State-to-State (ACCESS) for English language learners is an English language proficiency exam administered annually to all English language learners (grades K-12).
ACCUPLACER	ACCUPLACER is a series of computer-adaptive tests to evaluate knowledge in math, reading, and writing, aimed at assessing students preparing for college-level courses.
ACT	Colorado ACT (CO ACT) is a college entrance exam with state-designated exam dates in April and May.
DIBELS	Dynamic Indicators of Basic Early Literacy Skills (DIBELS) measures literacy skills (grades K-6).
DPF	The District Performance Framework (DPF) is Colorado's measure of district performance based on four key indicators: academic achievement, academic longitudinal growth, academic gaps, and postsecondary and workforce readiness.
enVision	enVision is a Common Core aligned curriculum with assessments available in an online platform.
i-Ready	i-Ready is a diagnostic tool that can measure growth in reading and mathematics and is aligned to the Common Core (grades K-12).
MAPs	Measures of Academic Progress (MAPs) is an assessment tool from NWEA which is computer based for grades 2-12 for reading, language usage, and math.
SLO	Student Learning Objectives (SLOs) are a process where teachers (individual teachers or groups) set meaningful goals for learning over time based on the baseline performance of students and identify assessments to measure those goals (teachers may do so individually or use school- or district-determined assessments and targets; they may also use multiple assessments to measure the same goal).
SPF	The School Performance Framework (SPF) is Colorado's measure of school performance based on four key indicators: academic achievement, academic longitudinal growth, academic gaps, and postsecondary and workforce readiness.
STAR	STAR is a series of computer-adaptive assessments for reading, math, and early literacy (grades K-12).
TCAP	Transitional Colorado Assessment Program (TCAP) was Colorado's standards-based summative assessment in reading, writing, and math (grades 3-10). TCAP was replaced by CMAS in 2015 for science and social studies and in 2016 for English language arts and math.