



Findings and Results of Root Cause Analysis for Comprehensive Support and Improvement Schools

Vanguard Collegiate Middle School

September, 2019



COLLEGE OF
EDUCATION

CENTER FOR EDUCATIONAL
INNOVATION AND IMPROVEMENT



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This report was prepared by the University of Maryland College Park Center for Educational Innovation and Improvement at the College of Education and in partnership with the Bowie State University College of Education and the

Morgan State University School of Education & Urban Studies. The Root Cause Analysis process was facilitated by Erin Janulis and David Rease Jr., who also co-authored this report.

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I. INTRODUCTION

The purpose of this report is to share outcomes of a Root Cause Analysis (RCA) conducted to support Vanguard Collegiate Middle School in identifying underlying causes of school performance problems. The report provides an overview of the RCA process, school profile, problem statement, the RCA conducted at the school, and recommendations to address the root causes.

The Maryland Every Student Succeeds Act (ESSA) Consolidated State Plan requires schools that have been identified for comprehensive support and improvement (CSI) engage in an RCA process facilitated by a third party. CSI schools are defined as follows: the lowest achieving five percent of Title I schools, high schools that do not graduate one third or more of their students, or schools that have federal school improvement grants. Vanguard Collegiate Middle School was identified as a CSI school as one of the lowest achieving 5 percent of Title I schools. Outcomes of the RCA must be used to inform the development of intervention plans to improve school performance.

CSI schools that were identified in the 2018-2019 school year have three years to exit CSI status. CSI school leaders will receive a leadership coach to support the development and implementation of the intervention plan. CSI principals will be required to participate in the Leading for School Improvement Institute, which provides customized professional learning experiences to support school improvement. CSI principals will be required to engage in monitoring visits by the Maryland State Department of Education (MSDE) to ensure that progress is being made toward school improvement goals.

The MSDE established a memorandum of understanding with the University of Maryland College Park to facilitate the RCA process. The University of Maryland College Park collaborated with the American Institutes for Research to develop RCA tools and train field teams. Field teams consisted of researchers, data analysts, and education practitioners from Bowie State University, Morgan State University, Johns Hopkins University, and other organizations. Field team members worked with all CSI schools to go through an RCA process. MSDE will support each school to engage in a long-term continuous improvement process that includes RCA outcomes, recommended interventions, and evaluations of employed interventions. As part of this procedure, CSI schools were first required to go through a needs-assessment process that was used to drive the RCA work.

I. INTRODUCTION

RCA Process for CSI Schools

A Root Cause Analysis Facilitator Guide was developed to promote consistency in the root cause analysis process. The Facilitator Guide contains protocols designed to engage school leaders and stakeholders in identifying a specific problem and prioritizing root causes for the problem.

There was a four-step process used to facilitate the root cause analysis:

1. Craft a Problem Statement Based on Data
2. Brainstorm Causal Factors
3. Analyze Underlying Causes to Identify Root Causes
4. Prioritize Root Causes for Intervention

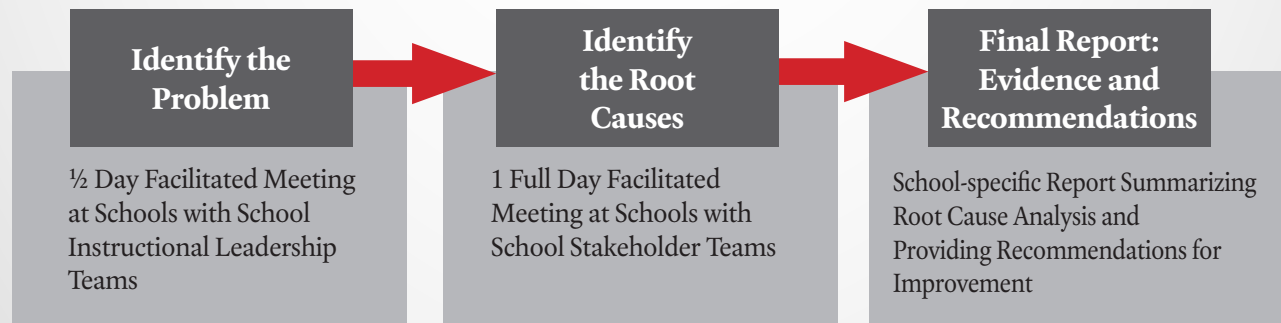
The root cause analysis process translates the successes and challenges identified through the CSI needs assessment into priorities to inform actionable improvement planning. The work with schools was staged in three steps: 1) identify

the problem; 2) identify the root causes; 3) draft a school report with recommendations for improvement.

First, the RCA team worked with school leadership teams to craft a problem statement in a half-day meeting. Using the available school, school system, and state data, the school team selected a problem that relates to their CSI status and provides a direction for the root cause analysis.

Second, the facilitators returned to the school for a full-day meeting with the school's stakeholder team to better understand the root causes of the problem. Once the stakeholders worked through the process of determining the root causes, they prioritized those root causes based on importance, feasibility, and alignment to CSI status.

As a third and final step, the RCA teams created these school-specific reports with recommendations for addressing the problem and root causes in improvement planning.



I. INTRODUCTION

An RCA starts with asking the question: What problem do we face that, if solved or mitigated, would most effectively lead to our desired outcomes (in this case significant improvement in student outcomes that would lead to the school being removed from CSI status)? This “Problem Statement” is then studied and interrogated by a team of stakeholders through the RCA process that answers questions such as:

- Why do we get these outcomes?
- Who are the people involved in this problem?
- What policies, procedures, or rules contribute to this problem?
- What resources are currently engaging with this problem?
- What environmental issues impact this problem?

This process led to a small number of “root causes” to the problem designed to help school stakeholders design strategies and programs that are more likely to lead to significant improvement for students. In addition, the process will include conducting research on the problem and prioritized root causes and recommending evidence-based strategies for improvement.

II. SCHOOL PROFILE

School Name: Vanguard Collegiate Middle School
 5000 Truesdale Ave, Baltimore, MD 21206
 (443) 642-2069

Total Teachers: 24

Student Demographics

Total Students	Asian	Black African Americans	Hispanic/Latino	White	Other	% Economically Disadvantaged	% English Learners	% Students with Disabilities
405	<10	355	11	18	12	68.47%	17.98%	22.41%

Vanguard Collegiate Middle School MSDE School Report Card Profile 6-8

Academic Progress		School Quality and Student Success		Academic Achievement		Progress in Achieving English Language Proficiency	
Student Growth Percentile in Math	41	Students Not Chronically Absent	71.5%	% Proficient in Math	7.6%	% English Learners Making Progress Toward Learning English	73.3%
Student Growth Percentile in ELA	38			Average Performance Math	1.8		
Credit for Well Rounded Curriculum N/A	55.8%	Access to Well Rounded Curriculum	0%	% Proficient in ELA	11.2%		
				Average Performance ELA	1.8		
Earned Points:	11.2/30	Earned Points:	5.5/25	Earned Points:	4.6/20	Earned Points:	7.3/10
Total Earned Percent:				34%			

To view this school's full report card, visit www.mdreportcard.org

III. PROBLEM STATEMENT

Description of the Process

A half-day meeting facilitated by a two-member RCA team was convened at Vanguard Collegiate Middle School on April 11, 2019 for day one of the RCA process. Members included the school leadership team, consisting of a local school system leader (i.e., principal supervisor, school improvement leader), and other key school staff. The primary goal of this meeting was to craft a “problem statement” that would drive the RCA. A problem statement is defined as a statement describing a situation, issue, barrier, impediment, or challenge that a school must address to significantly improve student outcomes, related particularly to those outcomes that led to the school being placed on the CSI list.

The goals of the first day were as follows: 1) to determine a problem statement to drive the analysis of the root causes, and 2) to identify stakeholders for day two of the RCA.

The primary data sources reviewed were the MSDE CSI Needs Assessment Report, the Maryland State School Report Card, and the School Climate Survey data and qualitative data from school stakeholders.

Problem Statement Criteria

Participants arrived at a problem statement by examining how CSI schools were identified; by using data to understand why the school received CSI status; by organizing data trends into themes; by evaluating the feasibility of addressing those themes; and by prioritizing addressable themes to identify the RCA area of focus. The problem statement was crafted based on the following criteria:

1. *How important is the problem to addressing our needs?*

Importance is determined by whether student outcomes will be improved, teacher efficacy is increased, and/or organizational systems will be improved.

2. *How feasible is it to address this problem?*

Feasibility is defined by the availability of adequate resources, staff, and capacity, and whether there is sufficient support and buy-in.

3. *How aligned is the problem to our needs?*

The problem statement should be related to the reason the school was identified as a CSI school. Also the school should be able to address the problem and its root causes by the effective selection and implementation of evidence-based practices.

Day One Summary

Many of the conversations on this day focused on the nature of students’ academic needs in the school. A few of the instructional staff stated that their diagnostic assessments indicate that a majority of sixth grade students arrive lacking foundational skills (i.e., decoding, phonemic awareness, basic computation), which are prerequisites to accessing a rigorous grade level curriculum.

Additionally, some team members saw the structures that have been created for English language learner (ELL) students in the school (pull-out classes, gradual entry into general education, academic support from extracurricular activities) as a model for what could be done for other students who struggle academically. The sense was also that early, targeted interventions would benefit students greatly during their tenure at Vanguard and set them up for success in high school.

III. PROBLEM STATEMENT

Key Data Themes

Data Source	Key Takeaways
Maryland State School Report Card	<ul style="list-style-type: none"> • 14.1% ELLs and 23% students with disabilities: total of 37.1% of students with academic challenges • 85% economically disadvantaged • 7% met target in mathematics • 11.4% met target in ELA • ELLs perform above average for the district • Students have shown growth in iReady®, but still not proficient on state assessments • Average performance levels for ELA and mathematics is 1.8 out of 5 points earned • Students average a “2” on state assessments • 30% of students are chronically absent, which feeds into the lack of assessment participation
Parent Survey	<ul style="list-style-type: none"> • Low survey participation from parents, so no parent results were tabulated
MSDE CSI Needs Assessment Report	<ul style="list-style-type: none"> • Cohorts improving on state assessments from sixth to seventh but not from seventh to eighth • Improvements in assessments on iReady from the beginning to the end of the year • The school has more male students than female with largely female teaching roles • Mathematics: iReady: 100% of students were NOT tested • Eighth higher diagnostic data overall: ~16% (mathematics), ~17% (ELA) • Instructional leaders partially complete plans and interventions due to competing priorities • Trend: increases in certified teachers • Attendance has remained the same (88-89%) • Teacher effectiveness is low on the ratings scale • Decreased number of students from sixth to eighth grade

III. PROBLEM STATEMENT

Themes Across Data Sources (Topics) (1 being highest priority)	Ranking
70-80% of sixth grade students enter the school more than two grades behind in both mathematics and ELA.	1
Boys score lower in ELA than girls.	2
ELA scores improve over three years, but still 69% of students are not proficient.	3
Less than 5% of students are proficient in mathematics across all grades.	4
ELL students are making good strides.	5

Final Problem Statement

Sixth-grade students at Vanguard Collegiate Middle School are significantly below grade level in ELA and mathematics, as demonstrated by their scores on the state assessments.

Evidence Base for Problem Statement

This section represents a brief research summary of the evidence related to the significance and/or impact of the problem statement identified above.

Transitions are often cited as a key moment for learning loss to take place. Much attention, in particular, focuses on the impact of the

transitions to middle and high schools. Research finds that compared to those who attend K-8 schools, students who transition from elementary school to middle school experience greater academic losses, particularly those who attend middle schools made up of groups of students from multiple elementary schools (Alspaugh, 1998; Gutman & Midgley, 2000). Both of these scenarios are at play at Vanguard Collegiate. The school is one of only a few remaining middle schools in Baltimore City, and students at Vanguard matriculate from multiple elementary schools from across the city. Furthermore, given that student achievement gains from a year of education can diminish as students' progress in school, focusing on sixth grade achievement, the youngest grade band served at Vanguard, is well-supported by research.

IV. ROOT CAUSE ANALYSIS OF THE PROBLEM STATEMENT

Day Two Summary

The team at Vanguard convened again on April 30, 2019 for day two of the RCA process. Day two was devoted to working with the school's stakeholder team to identify and prioritize the root causes of the problem so the causes could be addressed in the school's improvement planning efforts.

Stakeholders began the day by reviewing the problem statement developed by the instructional leadership team on Day One. Following this review, they comprehensively brainstormed causal factors that contributed to the problem using a "Fishbone" activity. Individual causal factors were then organized into themes and a causal factor statement was crafted for each theme. Using the "5 Whys Activity," stakeholders were encouraged to dig deeper to causal factor statements were then by asking "why" questions in order to arrive at underlying causes. Underlying causes were then collectively ranked in order to arrive at a prioritized list of root causes.

Specifically, the goals for day two included:

- Determine factors contributing to the problem statement.
- Identify underlying causes of the problem and determine which underlying causes are primary "root" causes.
- Prioritize the root causes for the importance of impacting student outcomes and the feasibility of implementing strategies to address them.

Day two focused on the impediments to success for Vanguard's sixth graders. Knowing that sixth grade students arrive at Vanguard already below grade level, the stakeholder team took the time to dig deeply to focus on why the school and staff have not had more success catching these students up. Although many team members indicated that this issue was a daunting prospect, most acknowledged that they could do more to address this problem.

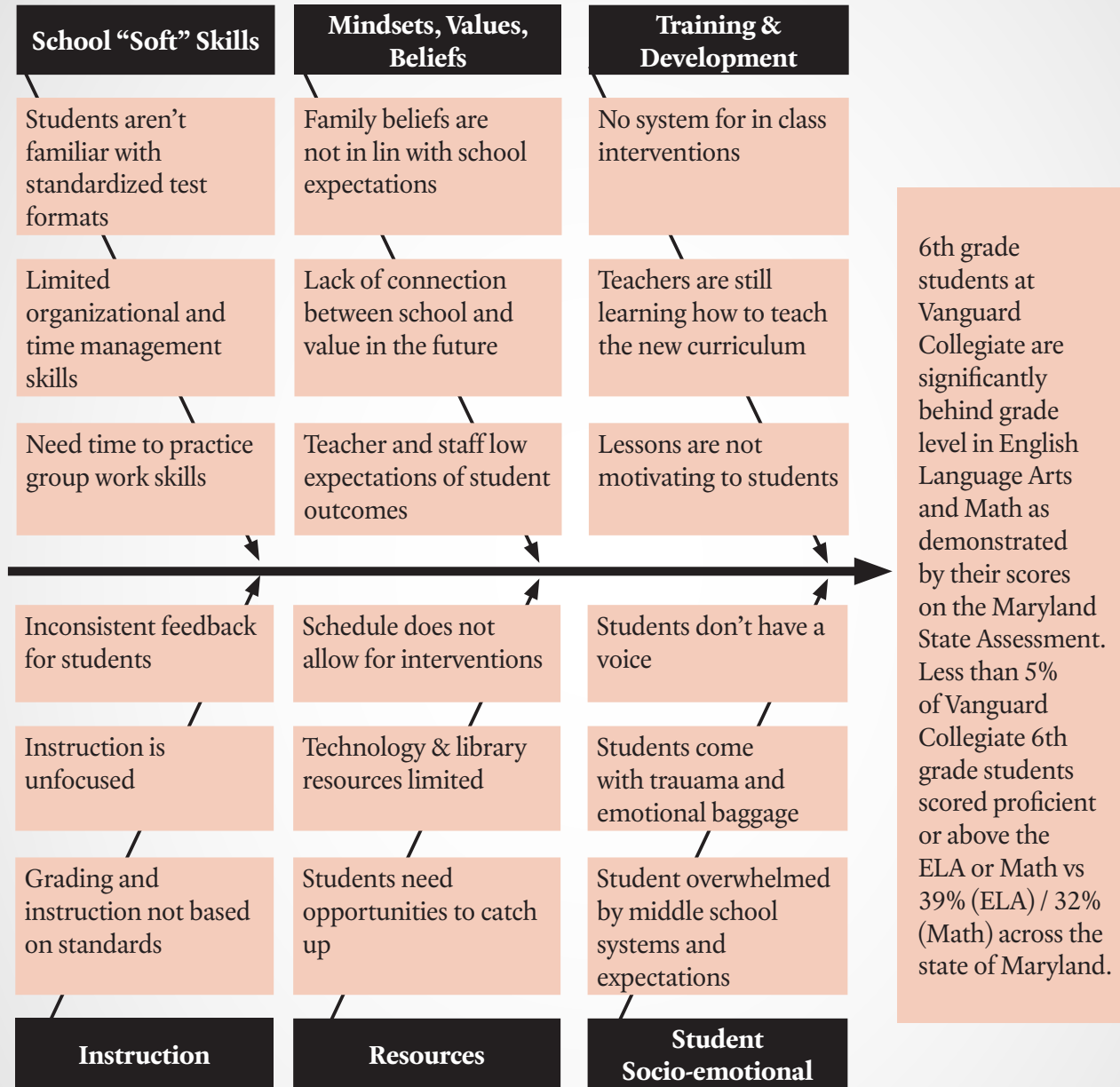
Two key themes emerged out of the conversation. First, the students need to receive a rigorous curriculum with appropriate scaffolds. Many agreed that for a variety of reasons (unfamiliarity and skepticism with the curriculum, limited technological resources, insufficient time for essential interventions), sixth grade students were not receiving this high-quality instruction. The second theme that emerged was the need to support students' socio-emotional and "soft" skills development (e.g., organization, test taking, perseverance, etc.). Stakeholders indicated that sixth graders struggle greatly with these skills, and skill underdevelopment impedes students' abilities to learn and demonstrate their learning effectively.

Casual Factors

The "Fishbone" diagram represents the stakeholder group's initial assessment of all of the individual factors contributing to the existence or recurrence of the problem statement.

IV. ROOT CAUSE ANALYSIS OF THE PROBLEM STATEMENT

Vanguard Collegiate Fishbone: Exploring Causes



IV. ROOT CAUSE ANALYSIS OF THE PROBLEM STATEMENT

Prioritized Root Causes

Following several group exercises, the stakeholder group came to consensus on the priority root causes. These are the causes most critical to addressing the problem based on the criteria of importance, feasibility, and alignment.

Final Output. Prioritized Root Causes:	Ranking
The current curriculum does not have the space and time for interventions to occur in content areas.	1
Sixth grade students are not fully supported during their transition to middle school, particularly as they confront conflicting values, systems, and structures from their community and previous school experiences.	2
Teachers have not had a chance to see the curriculum work successfully (for students who are multiple grade levels behind) and, consequently, question the appropriateness of the curriculum for Vanguard students.	3

Evidence Base for Prioritized Root Causes

During the RCA process, several staff members supported the following observations:

1. The curriculum is rigorous and at grade level, but it is beyond the immediate grasp of the student population since the majority of students are more than two grade levels behind.
2. Teachers have not received sufficient support in understanding the curriculum.
3. The support they have received in understanding the curriculum does not assist them with making it accessible to the population at Vanguard Collegiate.

Leading education research often refers to a “guaranteed and viable curriculum” as the most important cornerstone to ensure students have the opportunity to learn content and skills that will prepare them for career success (Marzano, 2003). Having a “guaranteed” curriculum means

that all students have the required time and supports (where necessary) to access the content. During the RCA process, staff stated that “the current curriculum does not have space/time for interventions to occur in content areas.” This statement -suggests that the school, along with the local school system, should determine how to support teachers in using a rigorous, at grade-level curriculum, in a school where a high percentage of students are more than two grade levels behind. “Teachers haven’t had a chance to see it [the curriculum] work and do not believe it [the curriculum] works with this population...”. These circumstances were at least, in part, fueled by poor roll out and weariness of another new curriculum. Intervention blocks and programs like Eureka!®, iReady, and Strategic Adolescent Reading Intervention (cited as potentially useful during the RCA process) can be helpful. Yet, the only way they can support students in getting closer to meeting the grade-level expectations of state assessments is if they aid students in developing the specific, standards-based skills that they need.

IV. ROOT CAUSE ANALYSIS OF THE PROBLEM STATEMENT

Additionally, there was a consensus that students at Vanguard have to engage in code switching, of a sort, in order to navigate community norms that differ in some ways from the norms of Vanguard Collegiate. Transparent dialogue among community members (teachers, students, families, professionals who support the school) about valuing and using strategies for success in each subset of students' communities can help students in developing the toolbox they need to experience increased social and academic success at school.

Vanguard Collegiate will need to create and strengthen structures for the school community to develop the skills and knowledge to promote a strong learning environment. In the short term, the school can focus on structures that encourage consistent communication with families and the community, among staff members, and between staff and students.

Rudasill and Niehaus (2014) detail how student supports decline during the first year that sixth graders attended a middle school distinct from their elementary school and combined with students from multiple elementary schools.

Students' perception data revealed that students with high levels of support from schools had a less likelihood of forming strong bonds with peers with "deviant" behaviors. Alarming, and confirmatory to their hypothesis, students reporting a decline in school supports over the school year reported an uptick in their associations with students exhibiting "deviant" behaviors. "The middle school environment may be particularly incongruent with the values, priorities, and social demands of a high-poverty neighborhood, thus exacerbating the poor fit inherent in the transition to middle school." This direct quotation from the report has an uncanny connection to the prioritized root cause statement from Vanguard Collegiate: "Sixth-grade students are not prepared for the transition to middle school, particularly as they confront conflicting values, systems, and structures from their community and previous school experiences." Rudasill and Niehaus place the onus of improvement on how school leaders choose to structure the student support environment. It seems, then, that the diagnosis in the root cause has consistency with this research.

V. RECOMMENDATIONS FOR IMPROVEMENT

Recommendations for Evidence-Based Improvement

Final recommendations for this report have been developed by the University of Maryland College Park in consultation with RCA facilitators and leaders at MSDE. Recommendations were developed using the following process:

- Reviewing the ideas, notes, and stakeholder perspectives gathered throughout the Root Cause Analysis process;
- Conducting a scan of the research literature related to the problem statement and prioritized root causes identified throughout the process. While a comprehensive research analysis was outside the scope of this

project, the team reviewed research using the standards of evidence model outlined in the Every Student Succeeds Act (ESSA) to offer research that had moderate or strong evidence of effectiveness (Level 2 or Level 1 on the ESSA framework);

- Compiling, organizing and categorizing over 150 recommendations submitted by UMD/RCA facilitators.

These recommendations are offered by the University of Maryland College Park in consultation with MSDE. They represent only a portion of the potential strategies and interventions that will become a part of the school's three-year improvement plan developed in concert with the MSDE Title I office.

V. RECOMMENDATIONS FOR IMPROVEMENT

RECOMMENDATION

Four Domains Domain of Rapid School Improvement¹

Maximize professional learning focused on planning, instruction, and improving learning conditions for students.

Establish or significantly strengthen a school-wide cycle of professional learning – coaching, observations, and team planning – that includes an aligned focus across core instructional activities. Several studies link teacher professional learning with improvements in instruction and quality of learning environments (Vescio, Ross, & Adams, 2008). Professional learning opportunities are most effective when they are part of coherent school-wide efforts that link content, assessments, and reflection, rather than episodic professional workshops (Akiba & Liang, 2016). Two effective professional learning strategies include professional learning communities and job-embedded professional learning.

Professional Learning Communities: Teachers need time spent planning and learning with colleagues in collaborative planning time and/or professional learning communities (PLCs) that are focused on teaching and learning not on administrative or organizational demands. Research shows that PLCs are most successful when they are designed and supported with specific attention to leadership, group dynamics, trust, and respect (Vangrieken, Meredith, Packer, & Kyndt, 2017). PLCs can form around topics that teachers can explore together, plan for, and build upon together using peer observations and deeper capacity-building on areas of need, such as social emotional learning or trauma-informed teaching. Authentic PLCs include the following features:

- Dedicated time for the PLC
- Teacher-led and based on specific needs of students
- Supported by school leaders with training and development activities

Job Embedded Professional Learning: Research emphasizes the importance of professional learning that emphasizes explicit strategies for conducting active teaching, assessment, observation, and reflection rather than just abstract discussions (Darling-Hammond & Richardson, 2009).

*Talent
Development*

*Instructional
Transformation*

V. RECOMMENDATIONS FOR IMPROVEMENT

RECOMMENDATION

Four Domains Domain of Rapid School Improvement¹

Provide extended learning and instructional time in ELA and mathematics in the form of an extended school day or an extended school year that includes summer or Saturday school.

*Cultural
Transformation*

Extended learning time is a strategy for increasing the amount of time that students receive instruction, engage in learning opportunities that build their motivation, or get academic intervention and support in areas where they are struggling. A systematic review of the research evidence on extended learning found positive results under certain conditions and implementation features, and with particular target students (Kidron & Lindsay, 2014). Specifically, increased learning time promoted student achievement in literacy and mathematics when 1) it was led by a certified teacher, and 2) it targeted students performing below academic standards. The findings show a positive effect on student achievement at the elementary level and mixed results at the middle grades; the research review did not examine extended learning time for high schools.

When designing an extended learning time approach for an elementary or middle school, there are five research-based recommendations for implementation (Beckett et al., 2009):

1. Align the out-of-school program academically with the school day.
2. Maximize and incentivize student participation and attendance.
3. Adapt instruction to individual and small group needs.
4. Provide engaging learning experiences.
5. Assess program performance and use the results to improve the quality of the program.

¹The MSDE uses the Center on School Turnaround at WestEd's Four Domains for Rapid School Improvement: A Systems Framework as a framework for continuous improvement. The framework identifies four areas as central to rapid and significant improvement: turnaround leadership, talent development, instructional transformation, and culture shift. The recommendations in this report are aligned to the four domains as a way to organize and frame the improvement efforts. For more information: <https://centeronschoolturnaround.org>.

V. RECOMMENDATIONS FOR IMPROVEMENT

RECOMMENDATION

Four Domains
Domain of Rapid
School Improvement¹

Create summer bridge or advisory structure to support the sixth-grade transition from elementary to middle school.

Culture Shift

Given the specific needs of Vanguard students, the designers of the advisory structure will see success by clarifying the specific goals of the advisory:

- Support students in making good academic and social choices.
- Normalize students to an academic culture.
- Develop positive perceptions of the school community.

Undergirding this, however, is the adult culture that believes in the purpose of the advisory structure, values the structure as a necessary component of the school's improvement work, and holds adults accountable for supporting all aspects of the advisory structure.

Fite and Frazer (2019) surveyed students in a small, midwestern school to determine their perceptions of what was useful in supporting the transition to middle school. Greater than 70 percent of students cited their parents, friends, teachers, and locker time before school as being helpful during the transition, whereas fewer than 20 percent of students cited school administrators, school orientation, summer transition programs, and after-school programs as being supportive in their transition. Although this study had a small sample size, it is still informative to the designers of transition and advisory programs at Vanguard. The study shows that advisory programs can be used to foster stronger organization for students and to explicitly support the relationship development among students and between students and staff. Furthermore, it illustrates how these formal structures can be communicated through students' existing social networks.

VI. CONCLUSION AND NEXT STEPS

Collaboratively with the Local School System (LSS) and stakeholders, Comprehensive Support and Improvement (CSI) school teams will develop intervention plans that identify SMART (Specific, Measurable, Achievable, Realistic, Time-bound) intervention goals with measurable annual outcomes and progress indicators that will guide schools toward meeting annual targets and exit criteria in three years. The outcomes of the root cause analysis must be used to inform the development of the SMART intervention goals and identification

of evidence-based strategies included in the intervention plan. Any evidence-based strategy must meet the Every Student Succeeds Act (ESSA) evidence requirements (level 1, 2, or 3). Intervention Plans will be approved by the school, LSS, and the Maryland State Department of Education (MSDE), and monitored annually by staff from the LSS and the MSDE. Additional information and resources are available on the MSDE Resource Hub. <https://www.marylandresourcehub.com/>

APPENDICES

Appendix A: List of Stakeholders

	Name	Position
Day 1 April 11, 2019	Lisa Langston	<i>Literacy Coach</i>
	Regina Thompson	<i>Parent</i>
	Shanekwa Winfield	<i>Teacher</i>
	Tiamo Johnson	<i>Teacher</i>
	Lori Sappington	<i>Literacy Academic Content Liaison</i>
	Shelton Standley	<i>Mathematics Academic Content Liaison</i>
	Catherine Robinson	<i>School Counselor</i>
	Yasmeen Davis	<i>Staff Specialist, Data Monitoring and Compliance</i>
	Theodora Johnson	<i>Teacher</i>
	Esther Wallace	<i>Principal</i>
Day 2 April 30, 2019	Name	Position
	Lisa Langston	<i>Literacy Coach</i>
	Regina Thompson	<i>Parent</i>
	Luz Camunae	<i>Science Teacher</i>
	Tiamo Johnson	<i>Teacher</i>
	Shelton Stanley	<i>Mathematics Academic Content Liaison</i>
	Erin Bindel	<i>Speech Pathologist</i>
	Yasmeen Davis	<i>Staff Specialist, Data Monitoring and Compliance</i>
	Johnetta Mukes	<i>Teacher</i>
	Rosalyn Carter	<i>Assistant Principal</i>
	Selina Gladden	<i>Teacher</i>
	Pamela Wesson	<i>Teacher</i>
	Cheryl Harrison Murray	<i>Teacher</i>
Ofelia Areillo	<i>Teacher</i>	
Esther Wallace	<i>Principal</i>	
	<i>Student</i>	
	<i>Student</i>	

APPENDICES

Appendix B: Bios of Facilitators

Erin Janulis is a graduate assistant with the Center for Educational Innovation and Improvement and a fourth-year doctoral student in the Education Policy Studies Program in the Department of Teaching and Learning, Policy and Leadership at



UMD. Prior to pursuing her PhD she spent five years teaching middle and high school English and social studies in high poverty schools throughout Colorado. During this time, she served not only as a classroom teacher but also an active member of her schools' response to intervention team, school culture committee, AVID elective teacher, and data team lead. Her research focuses largely on policies and issues related to teacher retention in high poverty schools, particularly the ways school culture, climate, and leadership alter patterns of teacher attrition. She has also worked for the Maryland Equity Project for three years writing policy and data briefs on teacher staffing and school discipline trends in the state of Maryland. Erin received her Bachelor of Arts in English and political science, Master of Arts in communication from the University of Illinois Urbana Champaign, and teaching certification from the University of Denver.

David Rease, Jr. began his career as a secondary social studies teacher in the Durham Public Schools. From there, he joined the turnaround team for the North Carolina Department of Public Instruction, supporting schools



across the state with their improvement efforts. Later, he joined the McREL International, based in Denver, CO, as a consultant with the systemic improvement team. Rease spent several years supporting the Prince George's County Public School system in Maryland (as a consultant for Pursue Excellence, LLC and then as the executive director of the Systemic Improvement Office) in its efforts to scale an improvement process throughout schools and the district offices. While Rease has held a variety of professional roles as an educator, he also brings specific knowledge about comprehensive needs assessments from his work with schools and districts across North Carolina. He led teams through a multi-day analysis of school data, including interviews with parents, staff, and students; performance and other qualitative data analyses; and report preparation. He holds a Bachelor of Arts from Columbia University, a Master of Arts in Teaching from Duke University, and an EdLD from the Harvard Graduate School of Education.

APPENDICES

Appendix C: Citations of research

Alspaugh, J. W. (1998). Achievement loss associated with the transition to middle school and high school. *The Journal of Educational Research*, 92(1), 20-25.

Gutman, L. M., & Midgley, C. (2000). The role of protective factors in supporting the academic achievement of poor African American students during the middle school transition. *Journal of youth and adolescence*, 29(2), 223-249.

Marzano, R. J. (2003). *What works in schools: Translating research into action*. Alexandria, VA: Association for Supervision and Curriculum Development.

Rudasill K. M., & Niehaus K., 2014. Connectedness and deviant peer affiliation among sixth-grade students from high poverty neighborhoods. *Journal of Early Adolescence*, 34(7) 896-922.

Vescio, V., Ross, D., & Adams, A. (2008). A review of research on the impact of professional learning communities on teaching practice and student learning. *Teaching and Teacher Education*, 24(1), 80-91.

INTERVENTION CITATIONS

Akiba, M., & Liang, G. (2016). Effects of teacher professional learning activities on student achievement growth. *The Journal of Educational Research*, 109(1), 99-110.

Beckett, M., Borman, G., Capizzano, J., Parsley, D., Ross, S., & Schirm, A. (2009). *Structuring out-of-school time to improve academic achievement: A practice guide* (NCEE 2009-012). Washington, DC: National Center for Education Evaluation and Regional Assistance (NCEE), Institute of Education Sciences, US Department of Education.

Darling-Hammond, L. & Richardson, N. (2009). Research review / teacher learning: What matters?. *Educational Leadership*, 66(5), 46-53.

Dynarski, M., Clarke, L., Cobb, B., Finn, J., Rumberger, R., & Smink, J. (2008). *Dropout prevention: A practice guide* (NCEE 2008-4025). Washington, DC: National Center for Educational Evaluation and Regional Assistance (NCEE), Institute of Education Sciences, US Department of Education.

Fite P., & Frazer A. (2019). Youth perceptions of what is helpful during the middle school transition and correlates of transition difficulty. *Children & Schools*, 41(1), 55-64.

Harris, D. M., & Kiyama, J. M. (2015). The role of school and community-based programs in aiding Latina/o high school persistence. *Education and Urban Society*, 47(2), 182-206.

Kidron, Y., & Lindsay, J. (2014). *The effects of increased learning time on student academic and nonacademic outcomes: Findings from a meta-analytic review* (REL 2014-015). Washington, DC: National Center for Education Evaluation and Regional Assistance, Institute of Education Sciences, Regional Educational Laboratory (REL) Appalachia, US Department of Education.

Mitchell, A. B., & Stewart, J. B. (2012). The effects of culturally responsive mentoring on the high school to college matriculation of urban African American males. *Spectrum: A Journal on Black Men*, 1(1), 79-93.

Pyle, N., & Wexler, J. (2012). Preventing students with disabilities from dropping out. *Intervention in School and Clinic*, 47(5), 283-289.

Rumberger, R., Addis, H., Allensworth, E., Balfanz, R., Bruch, J., Dillon, E., Duardo, D., Dynarski, M., Furgeson, J., Jayanthi, M., Newman-Gonchar, R., Place, K., & Tuttle, C. (2017). *Preventing dropout in secondary schools* (NCEE 2017-4028). Washington, DC: National Center for Education Evaluation and Regional Assistance (NCEE), Institute of Education Sciences, US Department of Education.

APPENDICES

INTERVENTION CITATIONS

Vangrieken, K., Meredith, C., Packer, T., & Kyndt, E. (2017). Teacher communities as a context for professional development: A systematic review. *Teaching and Teacher Education*, 61, 47-59.

