SACRAMENTO CITY UNIFIED SCHOOL DISTRICT
BOARD OF EDUCATION

Agenda Item #__9.4__

Meeting Date: January 23, 2014

Subject: Common Core Implementation

- ☒ Information Item Only
- ☐ Approval on Consent Agenda
- ☐ Conference (for discussion only)
- ☐ Conference/First Reading (Action Anticipated: _____)
- ☐ Conference/Action
- ☐ Action
- ☐ Public Hearing

Segment/Department: Academic Office/Curriculum & Instruction

Recommendation: None

Background/Rationale:
In 2010, the California State Board of Education adopted the Common Core State Standards (CCSS) for English Language Arts (ELA) and mathematics, joining 45 other states and the District of Columbia. These college- and career-ready standards, which are internationally benchmarked and anchored in research, are more rigorous, and clearly define what students should know and be able to do each year and upon graduation. These standards serve as the primary vehicle for meeting the goals outlined in Pillar One of the district's Strategic Plan 2010-14 and Principle I of the NCLB Waiver, which is ensuring all students are college-career ready upon graduation.

Although full implementation will not take place until the 2014-2015 school year, the district launched its transition to the Common Core State Standards for ELA in January 2011 and mathematics in August 2012. The district uses its locally developed CCSS Framework to drive the work. The framework emphasizes the three major components of the standards. Additionally, it highlights four key drivers: equity; curriculum; teaching and learning; and assessment that are used to propel the work.

To measure students' understanding of the CCSS, the state will administer the California Assessment of Student Performance and Progress (CAASPP), consisting of ELA and mathematics computer-based tests, to students in grades 3-8, and 11. These new assessments will replace the California Standards Tests (CST). The results will inform the district of its students' readiness for success in college and career.

Financial Considerations:
The budget that supports the implementation of the CCSS addresses professional learning, substitutes or stipends, and instructional materials. Sources of funding are a combination of the Common Core State funds and a foundation K-8 math grant.

Documents Attached:

1. Executive Summary CCSS
2. Implementation Plan 2013-2015
3. Sample Units of Study (ELA and Math)
4. Sample Math Parent Guide
5. Parent Workshop Flyer

Estimated Time of Presentation: 90 minutes
Submitted by: Olivine Roberts, Ed.D., Chief Academic Officer
Approved by: Sara Noguchi, Ed.D., Superintendent

Board of Education Executive Summary

Academic Office

Common Core Implementation
January 23, 2014

I. Overview

In the past, every state developed a different set of academic standards with varying degrees of rigor and expectations. To address this disparity, the Common Core State Standards (CCSS) Initiative, a state-led effort coordinated by the National Governors Association Center for Best Practices and the Council of Chief State School Officers, was developed and yielded a set of common, rigorous learning expectations in English Language Arts (ELA) and mathematics. These college- and career-ready standards, which are internationally benchmarked and anchored in research, clearly define what students should know and be able to do each year and upon graduation. In 2010, the California State Board of Education adopted the CCSS, joining 45 other states and the District of Columbia. As a result, this initiative is promoting collaboration across state lines in the approaches to professional learning and the development of instructional materials and assessments.

Although full implementation will not take place until the 2014-2015 school year, the district launched its transition to the Common Core State Standards for ELA in January 2011 and mathematics in August 2012. The district uses its locally developed CCSS Framework to drive the work. The framework emphasizes the importance of the Content Standards for math and ELA, the 6 Instructional Shifts for math and ELA, and the Standards for Mathematical Practices (Math) and College and Career Ready Descriptors (ELA). In addition it highlights the following four key levers:

- *Equity* - ensuring access to the Common Core for all students (EL, special education, GATE, low-performing, etc).
- *Curriculum* - implementing CCSS-aligned curriculum resources; developing units of study consisting of classroom assignments/tasks, task-specific criteria, and instructional plans.
- *Teaching and Learning* - engaging in continuous analysis of the impact of the teaching on learning through the examination of student work, classroom observations, and reflective practice.
- *Assessments* - developing a balanced assessment system that is comprised of formative assessment, summative assessment, peer assessment, and self-assessment measures. Assessments are designed to align with the academic rigor of the standards and the California Assessment of Student Performance and Progress (CAASPP) items developed by the Smarter Balanced Assessment Consortium.

The district uses an inquiry-based collaborative design methodology to build the capacity of its leaders, teachers, and instructional aides. Moreover, the district continues to build an

infrastructure of support that focuses on addressing the key levers plus an additional essential element, communications and stakeholder engagement. The CCSS initiative is a sea change that requires both cultural and instructional changes, which will take ample time to implement successfully. Progress is being made, but there is much work to be done.

To measure students' understanding of the CCSS, the state will implement the California Assessment of Student Performance and Progress (CAASPP) assessments using the Smarter Balanced Assessment Consortium (SBAC) computer-based tests to students in grades 3-8, and 11 in both ELA and mathematics. Between April and May, students in these grades plus a small sample of students in grades 9-10 will participate in a field test, which is a low-stakes trial run of the new assessment system a year prior to the operational administration of the assessments in 2015. These new assessments, which measure higher-order thinking skills and more rigorous content, will replace the current California Standards Tests (CST). The assessments items will be represented in multiple formats, including selected response and open-ended response. While the district will not receive the field test data from the state, the results from the operational assessments in 2015 and beyond will inform the district of its students' readiness for success in college and career.

II. Driving Governance

At the heartbeat of Pillar One of the district's Strategic Plan 2010-2014 and Principle I of the NCLB Waiver is the charge to prepare our students for college-career readiness. Implementation of the CCSS is the district's primary vehicle to actualize this Pillar. As such, the clarion call motivated the district to begin transitioning to the CCSS immediately after the state's adoption in 2010. To date, the district continues to move forward with its implementation and is transforming teaching and learning.

III. Budget

The budget that supports the implementation of the CCSS covers professional learning, substitutes or stipends, and instructional materials. Sources of funding are a combination of the Common Core State funds and a foundation K-8 math grant.

Common Core State Funds (include Dependent Charter Schools) • Mathematics Professional Learning for Gr. 9-12 Teacher Teams • ELA Professional Learning for Gr. K-12 Teacher Teams • Professional Learning for Instructional Aides	$8,810,400

• On-Site Collaborative Learning Time (6 hours) for Teachers • Instructional Materials (Gr. K-9 Math Adoption & ELA Supplemental)	
Foundation K-8 Math Grant • Mathematics Professional Learning for K-8 Teacher Teams • Leadership Capacity Building • Coaching Support	$1,200,000
Total	**$10,010,400**

IV. Goals, Objectives and Measures

The district is fully committed to implementing a college- and career-ready curriculum designed to ensure students graduate with a solid post-secondary foundation. Its goal is to empower and engage both school-based and district staffs in strengthening their understanding of the CCSS as a means of yielding high levels of student learning. The district endeavors to implement the standards with fidelity and provide an infrastructure of support based on research, reform initiatives, and exemplary practices. This includes quality professional learning that is continuous and fosters a deepening of subject matter knowledge and a greater understanding of learning for improving classroom practice and student learning, as well as customized, targeted support including coaching to continuously reflect upon and improve practice. Standards-aligned instructional materials, comprised of a blended model of print and digital media, are embedded within the infrastructure of support.

Using multiple measures, the district will assess the quality and effectiveness of the implementation of the CCSS. The quality of the professional learning and the fidelity of implementation of the instructional materials will be determined via perception data through surveys, evaluations of professional learning, observations of instruction in the classroom, and examination of student work. All results will be used to inform programmatic and systematic changes.

V. Major Initiatives

SCUSD has instituted a multi-faceted approach to CCSS implementation and has identified five major components for implementation. These components include a focus on staff capacity

building, pedagogy and instructional materials, assessment for learning, communications and stakeholder engagement, and technology infrastructure. Below we describe the key strategies and actions for each component.

Staff Capacity Building

Staff capacity building has focused on increasing staff's knowledge of the differing and increased expectations of the CCSS and expanding their repertoire of tools and strategies to support implementation. The district recognizes that capacity building is needed for a wide range of staff members in order for the implementation of CCSS to have maximum impact on student achievement. Thus, staff capacity building has included professional learning sessions and workshops for an array of staff members including site administrators, teachers, instructional aides, and district level staff.

Leadership Capacity Building

SCUSD's capacity building for principals has occurred primarily through the monthly principals' meeting structure. These sessions have expanded from a focus on CCSS awareness building to a concentration on deepening principals' knowledge of CCSS aligned ELA and math curriculum design, instructional delivery, and assessment practices, as well as expanding their professional toolkits for leading the implementation charge. During the 2013-2014 school year, the district is also working with assistant principals and site instructional coordinators in a similar capacity.

Teacher Capacity Building

SCUSD continues its transition to the CCSS by engaging teams of teacher leaders from each school in the district in on-going, job-embedded professional learning (Training of Trainers model) and providing an infrastructure of instructional coaching support through the work of district training specialists. Sites establish an ELA and a math leadership team comprised of five to seven teachers who attend district professional learning sessions four times throughout the year. These teachers also participate in two site-based release days for additional planning. The district's CCSS professional learning utilizes an inquiry-based collaborative design methodology in which teachers work with colleagues to analyze the standards, study relevant research on evidence-based effective instructional practices, "try on" the types of assignments and tasks students will encounter, design lessons/units of study, and analyze student work.

Additionally, all teachers in the district are provided the opportunity to collaborate with their colleagues on CCSS implementation and further address local areas of need during one release day or six (6) hours of CCSS Collaborative Learning Time. Using a needs assessment, teacher teams identify their areas of strength and growth and develop an action plan addressing the identified areas of growth. This designated period affords teachers time to learn more about the standards (practices/descriptors, instructional shifts, and content), design lessons, examine student work, or address implications for teaching and learning.

In addition to the math and ELA professional learning sessions described above, the district has also begun professional learning focused on supporting English Learners with access to the CCSS. The district has convened a cadre of teacher leaders called the *ELD Trailblazers.* This group's activities focus on expanding the learning from the ELA CCSS sessions and integrating the newly adopted ELD standards as well as instructional strategies to facilitate academic discourse and academic language acquisition for English Learners. Nine schools are taking part in the ELD Trailblazers cohort.

The CCSS are also an emphasis in all of the professional learning offered by the district. This includes sessions for visual and performing arts and physical education teachers. Because the ELA CCSS place a strong emphasis on literacy as a shared responsibility in all disciplines, these sessions have focused on the integration of the standards for literacy in science, social science, and career and technical subjects. In the sessions, teachers learn how to incorporate more reading and writing into these subjects areas and develop lessons that build and deepen students' content knowledge and literacy competencies.

Support Staff Capacity Building

Recognizing the critical role that support staff plays in successful implementation of the CCSS, the district has intentionally designed professional learning sessions, workshops, and presentations to build the capacity of these staff members to assist in implementation of the CCSS. The district has begun a professional learning series for instructional aides. These sessions concentrate on the role of the aide and specific strategies, such as questioning techniques, they can employ in assisting students in meeting the demands of the CCSS. In addition, the district has conducted CCSS workshops and presentation for central office staff in various departments including Youth Development, Special Education, Child Development, Linked Learning, GATE, Assessment Research, and Evaluation, and Integrated Support Services to build greater awareness of their role in CCSS implementation.

Pedagogy and Instructional Materials

The CCSS require a major shift in what counts as teaching and learning and place greater emphasis on deep conceptual understanding and performance-based measures to demonstrate understanding. The district's current ELA and mathematics instructional materials, adopted prior to the new standards, are not aligned to these new expectations. Another key lever in the district's implementation of the CCSS is therefore an increased emphasis on curriculum design and effective pedagogy/instruction.

To address the dearth of curricular resources, the district has instituted the design of units of study as a key strategy for curricular development in math and ELA. Teachers as well as district training specialists are actively engaged in the design of both units of study and lesson plans. Teachers of English and math will implement a replacement unit of study for ELA and math in the spring of 2014 and will engage in reflective practice to assess the impact of instruction on

student learning.
In addition, the district is also in the process of developing CCSS aligned curriculum maps/scope and sequence documents for ELA and math in grades K-8, which will guide further curriculum development and instruction beginning in the 2014-2015 school year. At the high school level, the district will convene teams of teachers in the spring of 2014 to revise the courses of study for English and math in grades 9-12.

The district will engage in the process of adopting instructional materials for math and selecting supplemental materials for ELA in March of 2014. SCUSD will convene a committee of teachers to review and analyze instructional materials submissions on the California Department of Education's (CDE) approved list and make recommendations. The committees will use the comprehensive Publishers' Criteria, which are endorsed by the authors of the CCSS for use when evaluating alignment of instructional materials. Stakeholders will have the opportunity to review this list and provide feedback. The Board of Education will approve a singular textbook series for grades K-8 and Integrated Math-I. If an aligned textbook series cannot be found, the district will provide schools with supplementary mathematics instructional materials to augment the current adopted series.

The district is also in the process of developing a bank of locally developed electronic resources that will include sample lessons/units, exemplars of student work, and videos of effective instruction including models of research-based and best practices that support English Learners, students with disabilities, struggling students, as well as Gifted and Talented students. The amalgamation of this rich and varied set of resources will serve to expand the instructional toolkit of SCUSD teachers and provide an infrastructure of support for implementation of the CCSS.

Assessment for Learning
The advent of the CCSS requires that assessment practices, both summative and formative, change from a sole emphasis on multiple choice assessment items to those that allow greater insight into student thinking and understanding. Hence, another key lever in the district's CCSS implementation is a focus on shifting the district's assessment practices with greater emphasis on classroom-based, curriculum-embedded formative assessment practices.

Central to this shift is building staff's awareness and knowledge of the changing nature of assessment practices. Thus, a key component of the districts professional learning is an emphasis on formative assessment practices and assessment for learning. In the development of the units of study and lesson plans, teachers learn approaches to continuously assess student learning through the use of rich and rigorous tasks aligned to the CCSS that require students to demonstrate understanding through talk and discussion as well as in written form.

This shift in assessment practices is also evidenced in the districts' actions to embed assessment

items similar to those being used by the California Assessment of Student Performance and Progress (CAASPP) into its benchmark assessment system. This year, students in grades 3-8 are being assessed with a sampling of math and ELA constructed response items. The assessment tasks will provide students with experience in responding to open-ended assessment items and allow the district to gather data on how students perform on these types of items. Data from the assessment items will be used to guide instruction and inform professional learning planning.

The district is also redesigning its K-6 standards-based report card to align to the CCSS math and ELA standards. The report cards will undergo a rigorous vetting process where focus groups of teachers, school leaders, students, and parents provide input and inform subsequent revisions. The CCSS aligned report cards will be utilized in the 2014-2015 school year.

Communications and Stakeholder Engagement
Understanding the importance of building the knowledge base of its parents and community about the CCSS alongside its teachers and leaders, the district has made a focus on communications and stakeholder engagement a significant element in its CCSS implementation. The district has taken great strides to deepen stakeholder awareness and knowledge about the CCSS.

SCUSD is currently hosting a math and ELA Common Core Parent Workshop series to inform parents/guardians and community partners of the educational changes resulting from the upcoming implementation of the CCSS. Each workshop is constructed as a three-part series with sessions designed to introduce parents to the components of the ELA and math CCSS. Participants take on the role of students and engage in the type of work students will encounter. In addition, they learn practical strategies for supporting their children at home and how to partner with their children's schools. These workshops are hosted at an elementary, middle, and high school in each of the three geographic regions of the district to provide greater access.

The district has also developed a user-friendly webpage (http://www.scusd.edu/common-core), which offers a productive flow of information to keep stakeholders abreast of the work such as the development of new district- resources for teachers, leaders, and parents. For example, posted on the webpage are the locally developed CCSS parent guides for mathematics (http://www.scusd.edu/post/parent-guides-math-common-core) that include a description of what students will learn in in each grade, activities that parents can do at home to support their child's learning, and a snapshot of the new assessments. ELA parent guides are in draft form and will be posted to the website in the upcoming months.

In addition, the district has begun to engage the various district parent advisory groups and has made CCSS presentations to the District Advisory Committee (DAC), District English Learner

Advisory Committee (DELAC), and Community Advisory Committee (CAC) to date. The district will continue to expand its engagement with advisory groups to include the Parent Teacher Association (PTA) and Gate Advisory Committee. The district also worked with both the parent advisory groups and its collective bargaining partners including representatives from UPE, SCTA and SEIU to develop the district plan for the use of the state funds for CCSS implementation.

Technology Infrastructure

While technology has been an essential in the teaching and learning of mathematics and ELA, 21st century skill requirements along with the California Assessment of Student Performance and Progress (CAASPP) assessments are altering the instructional terrain and provoking a shift in its influence. In preparation to navigate this new environment, the district has made the development of its technology infrastructure another major component in its CCSS implementation.

The district is adopting an approach that fosters a student-centric model of digital media content creation. This approach will equip teachers with the necessary skills to utilize the CCSS to challenge students with rigorous instructional tasks as well as hardware and software that provide the students with the tools to demonstrate understanding of the standards through created digital media products such as: videos, blogs, wikis, audio content, and electronic texts.

To ensure the capacity to develop this technology-rich environment, the district is currently exploring increasing the student-to-computer ratio from an 11:1 (CAASPP ready for testing) to a 1:1 blended (laptops and tablets) environment. Funding for this proposal comes from technology funds secured by a recent bond measure. In addition to the already existing plan to increase hardware, as part of the technology plan, the district is replacing its Student Information System (SIS). Currently, the district is in the implementation phase of a video repository system, “Show and Share.” It integrates with the district’s data center and allows personnel to post video or digital media (Word documents, PowerPoint, PDF, and Audio) within a public or private (password enabled) web browser. The district is also implementing the use of Cisco TelePresence technology in two pilot middle schools to extend the digital media possibilities with professional development, content experts or peer-groups around the world.

Furthermore, in order to make certain that sites are prepared to facilitate the new on-line testing of the CAASPP, multiple and layered trainings will be provided. First, an Apple Professional Development Specialist will train sites on staff and student use of the devices. Second, three Technical Assessment Specialists will work directly with sites to set-up testing rotations as well as train on proctoring the assessment. Finally, the Assessment, Research and Evaluation Department will provide trainings for site staff on the specific student behaviors to look for both before and during testing. This information will inform the instruction and development around device use for next year, ensuring that all students feel prepared to demonstrate their full knowledge on computer-based testing.

A robust technology infrastructure, one that includes, but extends far beyond the capacity to complete the requisite state assessments, is essential if SCUSD students are to truly be college and career ready as outlined by the CCSS and envisioned in the Pillar I of district's Strategic Plan 2010-2014.

VI. Results

Although state assessments and standardized measures to assess student progress towards meeting the CCSS have yet to be implemented, current indicators of progress and results from the district's implementation of the CCSS are outlined below:

- Discussions during principal meetings and walkthroughs with principals reveal that site leaders have greater capacity to recognize the instructional shifts that should be evidenced in CCSS math and ELA classrooms.
- After a year of participation in professional learning, teachers, overwhelmingly, are enthusiastic about the CCSS, express an expanded capacity to teach in the way that the CCSS requires, and have increased expectation for their students.
- Classroom observations indicate that teachers are requiring students to explain their thinking and provide evidence to support their claims.
- Teachers are honoring students varying approaches to problem solving in mathematics.
- Students' work samples reveal that students are increasingly able to support their ideas and assertions with textual evidence.

Feedback from parent workshops indicate that parents are enthusiastic about the upcoming changes and desire to continue to learn more about what the new standards will mean for their children's education.

VII. Next Steps

The district began making inroads into CCSS implementation in the 2010-2011 school year, and therefore, has learned many lessons over the past three years. Key lessons learned are outlined below:

- Changing the district's instructional culture is hard work, messy, and takes time. The implementation of the CCSS is provoking a 180-degree change that will alter the current landscape. This transformation will not occur overnight and requires time for teachers, leaders, students, and parents to learn what is needed to transition.
- Learning is the doing and the doing is the learning. The demands of the CCSS require both teachers and leaders to engage in action learning through a hands-on, minds-on approach that includes knowledge construction, applied learning, and reflective practice. There is no shortcut to deep learning and changed instructional practice.

- Infrastructure of support is vital. As a means of deepening the knowledge base and grounding the initiatives, it is imperative that the implementation is undergirded with a robust infrastructure of support.
- School and district leadership matter. Bringing the CCSS to fruition is a huge undertaking that requires commitment from all layers of the system. The district recognizes that both school and district leaders must demonstrate shared value, collective responsibility, and mutual accountability to warrant a successful and lasting implementation and to transform teaching and learning.

These lessons learned are shaping the current CCSS implementation, and the ones learned moving forward will inform implementation in the upcoming years in a continuous cycle of improvement.

Next steps in the district's CCSS implementation include, but are not limited to the following:

- Continue to provide professional learning for leaders, teachers, instructional aides, and support staff that will deepen their ability to provide integrated instruction of the CCSS.
- Expand the integration of instructional supports for diverse student populations including Universal Design for Learning, Specially Designed Academic Instruction in English, Culturally and Linguistically Responsive Teaching and Learning, into the professional learning sessions and Units of Study.
- Build upon the growing bank of electronic resources including the expansion of available units of study, samples of student work, and videos of instructional practice.
- Convene grade-level teams to engage in the process of the review and adoption of instructional materials for mathematics and supplemental materials for ELA. Seek Board approval of recommended instructional materials.
- Refine the district's CCSS-aligned assessment practices including the development of benchmark assessment items and scoring processes.
- Expand the district's parents/stakeholders communication and engagement strategies to reach more parents.

Use the California Assessment of Student Performance and Progress (CAASPP) data to revise and amend the district's technology readiness plan as well as its instructional program.

CCSS Implementation Plan 2013-2015

Area of Focus	Strategy/ Activity	Description	2013-2014 (Begin Date - End Date)	2014-2015 (Begin Date - End Date)
Professional Development	Leadership Capacity Building	Continue to provide leadership seminars for principals, and add assistant principals and site instructional coordinators (principals meet monthly, all others quarterly):		
		• Focus on change management	Aug.-June	Aug.-June
		• Deepen understanding of components of the CCSS: mathematical practices, instructional shifts, & content standards	Aug.-June	Aug.-June
		• Address CCSS instructional implications	Aug.-June	Aug.-June
		• Identify and address site-specific changes to instructional practices to better address the needs of SwD, ELs, low-achieving, and high-achieving students	Sept.-June	Sept.-June
		• Create structures to sustain collaborative teams	Aug.-June	Aug.-June
		• Assist with the development/implementation of site-based professional learning plans	Aug.-June	Aug.-June
		• Continue to build assessment literacy aligned to SBAC (including key elements, such as: item format, Webb's Depth of Knowledge, assessment claims and targets, Achievement Level Descriptors, and analysis of sample items with accompanied rubrics)	March-June	Aug.-June
		• Cultivate assessment practices and processes that promote a balanced assessment culture	March-June	Aug.-June
		• Identify and implement formative classroom assessment strategies	March-June	Aug.-June
		• Establish common expectations for high quality student work and teacher practice	Nov.-June	Oct.-June
		• Provide professional learning modules with facilitators' guides		
		District Instructional Coaches (Training Specialists)		
		• Participate in a series of lesson studies within the context of a unit of study via a collaborative, supportive forum, to explore and reflect on: a. The deliberate use of mathematics content and practices plus questioning strategies as a means to encourage and deepen mathematical thinking of all students	Oct.-June	Oct.-June

Area of Focus	Strategy/ Activity	Description	2013-2014 (Begin Date - End Date)	2014-2015 (Begin Date - End Date)
		b. The use of genre-based study within English Language Arts, including close reading of complex texts, writing within the three text types, and academic discourse		
		• Infuse core elements of Social Emotional Learning (SEL) into the curricula and classroom practices as an added complement to the CCSS implementation	Sept.-June	Sept.-June
		• Build capacity to support sites in providing a seamless integration of ELD standards within the implementation of the CCSS	Sept.-June	Sept.-June
	Teacher Capacity Building	• Continue to convene ELA and math teacher teams (including teachers of SwD and EL) from each school to participate in quarterly district-wide professional learning (Training of Trainers model)	Oct.-June	Oct.-June
		• Maintain the use of Training of Trainers model to build capacity of on-site colleagues (during staff meetings, release days, common planning time, grade level/department/pathway meetings)	Oct.-June	Oct.-June
		• Continue to emphasize within professional learning the Smarter Balanced assessments, addressing key elements such as item format, Webb's Depth of Knowledge, assessment claims and targets, Achievement Level Descriptors, and analysis of sample items with accompanied rubrics	Oct.-June	Oct.-June
		• Embed the ELD Standards, Universal Design for Learning (UDL), Culturally Responsive Teaching and Learning, and differentiation of instruction within professional learning sessions	Oct.-June	Oct.-June
		• Integrate technology within the development of units of study and SBAC-aligned assessments	Oct.-June	Oct.-June
		• Provide on-site, job-embedded coaching support (lesson design, demonstration lessons, classroom observations, reflective practice, analysis of student work) via district instructional coaches	Oct.-June	Oct.-June
		• Identify teacher leaders that will serve as model teachers of effective practices and help to build the capacity of both on-site colleagues as well as teachers across the district	Jan.-June	
		• Engage the teacher leaders in building the capacity of both on- and off-site colleagues, and in serving as demonstration classrooms		Oct.-June

Area of Focus	Strategy/ Activity	Description	2013-2014 (Begin Date - End Date)	2014-2015 (Begin Date - End Date)
		of effective practice • Provide professional learning modules with facilitators guides, accessible via the district web site **ELA Teams** • Sustain the focus on the construction and application of knowledge through the creation and implementation of units of study (utilizing the locally developed framework for instructional design) with embedded SBAC-aligned assessments addressing: a) Three Instructional Shifts: text complexity, text-dependent questions and academic language; b) College/Career-Ready Descriptors: demonstrate independence, value evidence, and comprehend as well as critique; c) Literary analysis and response (opinion/argumentation genre) • Continue the focus on the construction and application of knowledge through the creation and implementation of units of study (utilizing the locally developed framework for instructional design) with embedded SBAC-aligned assessments addressing: a) Three Instructional Shifts: text complexity, text-dependent questions and academic language b) College/Career-Ready Descriptors (all) c) Genre-based focus-reading literary and informational texts and the three writing text types • Integrate strategies to support ELs and language minority speakers, low-achieving students, and SwD within the CCSS professional learning experiences for teachers: o Analyze the language demands encompassed in the CCSS-aligned performance tasks and practice strategies for explicitly teaching the language of the genre, using the ELD standards o Deconstruct sentences from complex text to make meaning of the text o Analyze and simulate the academic discourse patterns needed to address varying tasks, purposes and audiences o Use the UDL principles, to address the ELA curriculum as a vehicle of	Oct.-June Aug.-June Aug.-May Oct.-June	Oct.-June Aug.-June Aug.-May Oct.-June

Area of Focus	Strategy/ Activity	Description	2013-2014 (Begin Date - End Date)	2014-2015 (Begin Date - End Date)
		providing multiple means of representation, expression, and engagement for students to demonstrate what they know, and engage them in meaningful, authentic learning.		
		Math Teams		
		• Sustain the focus on the construction and application of knowledge through the creation and implementation of units of study (utilizing the locally developed framework for instructional design) with embedded SBAC-aligned assessments addressing: a) Three mathematical practices (2, 3 and 7) b) Two instructional shifts: deep understanding and application c) Conceptual understanding of two-three domains per grade band (e.g. K-2: Counting & Cardinality; Operations & Algebraic Thinking; and Number & Operations in Base Ten; and Gr. 3-5: Number & Operations – Fractions; Operations & Algebraic Thinking; and Number & Operations in Base Ten)	Aug.-June	Aug.-June
		• Continue the focus on the construction and application of knowledge through the creation and implementation of units of study (utilizing the locally developed framework for instructional design) with embedded SBAC-aligned assessments addressing: a) Two mathematical practices (5 & 8) b) Three instructional shifts: deep understanding, application, and dual intensity c) Conceptual understanding of two-three domains per grade band (e.g. Gr. 3-5: Number & Operations – Fractions; Operations & Algebraic Thinking; and Number & Operations in Base Ten; and Gr.6-7: Ratios & Proportional Relationships; The Number System; and Expressions & Equations)	Aug.-June	Aug.-June
		• Integrate strategies to support ELs and language minority speakers, low-achieving students, and SwD in the space of the CCSS professional learning experiences for teachers: o Analyze and simulate the academic discourse patterns needed to address varying tasks, purposes and audiences o Use the UDL principles, to address the		Aug.-June

Area of Focus	Strategy/ Activity	Description	2013-2014 (Begin Date - End Date)	2014-2015 (Begin Date - End Date)
		math curriculum as a vehicle of providing multiple means of representation, expression, and engagement for students to demonstrate what they know, and engage them in meaningful, authentic learning. **ELD Teams** • Continue to provide summer institute and ongoing professional learning opportunities to support teacher teams in building their understanding of the ELD standards as a foundation for analyzing the language demands of academic texts and to explicitly teach the features of that language to ensure that ELs fully engage with the genres/text types within the ELA CCSS	Aug.-June	Aug.-June
	Support Staff Capacity Building	• Provide customized professional learning focused on the ELA and math content standards, the Standards for Mathematical Practice, and College Career Ready Descriptors, plus the ELD Standards for instructional aides	Dec.- May	Sept.-June
		• Provide customized professional learning focused on the Standards for Mathematical Practice and College Career Ready Descriptors and ELD Standards for speech pathologists, school psychologists, and counselors	Aug.-June	Aug.-June
		• Facilitate on-going CCSS professional learning for staff including but not limited to members of Special Education; Multilingual Literacy; GATE; Linked Learning; Child Development; Assessment, Research and Evaluation (ARE); and Extended Learning	Sept.-June	Sept.-June
Assessment for Learning	Formative Assessment	• Continue to analyze the relationship between model (SBAC) assessment items and the content standards addressed within the units of study	July-June	July-June
		• Simulate the on-line SBAC Practice Assessment and use the results to inform practice	Jan.-June	Sept.-March
		• Expand the integration of CORE assessments within the development and implementation of units of study	Oct.-June	Sept-June
		• Embed SBAC-aligned assessment items (using the SBAC item specifications) within the district benchmark assessments.	Jan.-June	

Area of Focus	Strategy/ Activity	Description	2013-2014 (Begin Date - End Date)	2014-2015 (Begin Date - End Date)
		• Implement SBAC-aligned benchmark assessments		Sept.-June
		• Continue to examine and analyze student work	Sept.-June	Sept.-June
		• Continue to use the data inquiry methodology to identify learner-centered problems, problems of practice, and modify instruction	Sept.-June	Sept.-June
		• Develop aligned K-6 standards-based report cards outlining grade-specific expectations	Oct.-April	
		• Implement K-6 standards-based report cards		Aug.-June
Curriculum and Pedagogy	Instructional Design and Delivery	• Continue to provide resources including protocols, strategies, and research to facilitate implementation of the instructional shifts and the mathematical practices	July-June	Sept.-June
		• Integrate technology tools as learning resources	Oct.-June	Oct.-June
		• Expand usage of observational tools (Teachscape, Phil Daro 5x8 Card, Student Achievement Partners' CCSS Instructional Practice Guides, etc.) to inform teacher practice and student learning	Aug.-June	Aug.-June
		• Continue to use the locally developed framework for instructional design to create replacement units of study	July-June	Sept.-June
		• Integrate CCSS within the Linked Learning approach (develop integrated units of study)	Oct.-June	Sept.-June
		• Implement replacement units of study with SBAC-aligned embedded assessments including CORE assessments, and use results to inform modifications during and after instruction	Oct.-June	
		• Implement CCSS-aligned units of study		Sept.-June
		• Continue to use the data inquiry methodology to identify learner-centered problems, problems of practice, and modify instruction	Sept.-June	Sept.-June
		• Use varied instructional strategies (differentiated instruction, UDL, Culturally and Linguistically Responsive Teaching & Learning [CLRTL], Specially Designed Academic Instruction in English [SDAIE], etc.) for quality delivery of instruction	Oct.-June	Oct.-June
		• Building the SEL Competencies thru CCSS-ELA	Oct.-June	Oct.-June
		• Continue to augment current curriculum resources utilizing the Basal Alignment and Anthology Alignment materials	Aug.-June	Aug.-June
		• Continue to organize curriculum around	Aug.-June	July-June

Area of Focus	Strategy/ Activity	Description	2013-2014 (Begin Date - End Date)	2014-2015 (Begin Date - End Date)
		mathematical practices and instructional shifts		
		• Expand and refine the creation of curriculum maps/scopes & sequences, and courses of study	July-June	July-June
		• Establish and implement a quality-control process for vetting teacher-developed resources	March-June	Aug.-June
		• Expand electronic resource library (units of study, lessons, tasks, student work, professional learning modules, videos of practice, etc.)	Aug.-June	Aug.-June
		• Engage in the adoption of instructional materials using the Publishers' Criteria	March-June	
		• Implement adopted instructional materials		Aug.-June
Differentiated Student Support	Students with Disabilities (SwD)	• Expand inclusive practices from 10 to 14 schools as a means of providing access to high level content instruction in a heterogeneous learning environment	Sept.-June	Sept.-June
		• Utilize the UDL as a framework for lesson design, delivery and impact of student learning	Sept.-June	
		• Align the IEP content and process to the CCSS (Content Standards, Standards for Mathematical Practice and the ELA College Career Ready Descriptors (see page 7 of the ELA CCSS)	Sept.-June	
		• Begin developing a bank of CCSS aligned IEP goals (IEP goal bank within the SEIS system is not currently aligned to CCSS)		July-June
		• Revise the accommodations and modifications to ensure access to and success with the CCSS	Sept.-June	Sept.-June
		• Align IEP transition plan goals to the CCSS	Sept.-June	Sept.-June
		• Monitor the progress of SwD and use the resulting data to differentiate instruction, and provide in-time interventions	July-June	July-June
		• Coordinate and facilitate parent informational sessions and interactive workshops	Oct.-Nov.	Oct.-Dec.
		• Conduct teacher, leader, and staff workshops focusing on paradigm shifts, instructional implications, gap analyses related to SBAC	Oct.-June	Oct.-June
		• Provide customized professional learning for itinerant staff including speech pathologists, school psychologists, and program specialists	Aug.-June	Aug.-June
	English Learners (ELs)	• Continue to support teachers to analyze the language demands of academic texts and to explicitly teach the features of that language to ensure that ELs fully engage in the CCSS	Aug.-June	Aug.-June
		• Maintain the use of a gradual release	Sept.-June	Sept.-June

Area of Focus	Strategy/ Activity	Description	2013-2014 (Begin Date - End Date)	2014-2015 (Begin Date - End Date)
		methodology to build student independence • Review the secondary course-taking patterns for ELs and make recommendations for scheduling • Begin to implement recommendations for scheduling	 Oct.-Jan. April-June	 July-Jan.
	Low-Achieving Students	• Monitor the progress of low-achieving students and use the resulting data to differentiate instruction, and provide in-time interventions • Support teachers to analyze the language demands of academic texts and to explicitly teach the features of that language to ensure that low-achieving students fully engage in the CCSS • Support teachers to engage students in productive struggle by providing scaffolding that builds students' independence and perseverance	Sept.-June Aug.-June Oct.-June	Sept.-June Aug.-June Oct.-June
	High-Achieving Students	• Continue to augment the ELA curricular resources for GATE (William and Mary curriculum) • Continue to provide ongoing professional learning that addresses differentiation of instruction • Enhance support for students as they struggle to develop the ability to make their thinking visible	Sept.-June Oct.-June Sept.-June	Sept.-June Oct.-June Sept.-June
Communications and Stakeholder Engagement	Community Engagement	• Continue to Utilize an Array of Communication Tools (Electronic, Face-to-Face, Web-based, Print, etc.) to Engage Stakeholders • Conduct CCSS Parent Workshop - Series in the Three Geographical Regions • Equip School Sites with Tools and Strategies to Engage Parents • Continue to Engage with Union, Parent Advisory Committees, Postsecondary Institutions, and Community Organizations • Inform the Board of Education via Presentations, Reports, Superintendent's Board Updates, etc. • Expand Parent/Community Web-based Resource Library	Sept.-June Oct.-May Sept.-June Sept.-June July-June Sept.-June	July-June Oct.-May Sept.-June Sept.-June July-June Sept.-June
Continuous Improvement Cycle	Collaborative Reflection and Revision	• Resume meetings of the CCSS Curriculum Council (parents, teachers, administrators, students, central office staff, community partners, and postsecondary partners) designed to guide the implementation of the CCSS	Oct.-June	Oct.-June

Area of Focus	Strategy/ Activity	Description	2013-2014 (Begin Date - End Date)	2014-2015 (Begin Date - End Date)
		• Identify and use lessons learned to revise long-term plan and develop year-specific CCSS-aligned professional learning and support systems	May-June	May-June
		• Engage in on-going self-reflection and use findings to inform plan revision	Nov.-June	Sept.-June

DRAFT

Mathematics Unit of Study
Ratio Relationships

Grade: 6	**Topic:** Ratios	**Length of Unit:** 8-12 days

Focus of Learning

Common Core Standards:

Understand ratio concepts and use ratio reasoning to solve problems.

6.RP.1 Understand the concept of a ratio and use ratio language to describe a ratio relationship between two quantities. For example, "The ratio of wings to beaks in the bird house at the zoo was 2:1, because for every 2 wings there was 1 beak." "For every vote candidate A received, candidate C received nearly three votes."

6.RP.3 Use ratio and rate reasoning to solve real-world and mathematical problems, e.g., by reasoning about tables of equivalent ratios, tape diagrams, double number line diagrams, or equations.

a. Make tables of equivalent ratios relating quantities with whole number measurements, find missing values in the tables, and plot the pairs of values on the coordinate plane. Use tables to compare ratios.

Mathematical Practices:

1. Make sense of problems and persevere in solving them.
2. Reason abstractly and quantitatively.
3. Construct viable arguments and critique the reasoning of others.
4. Model with mathematics.
5. Use appropriate tools strategically.
6. Attend to precision.
7. Look for and make use of structure.
8. Look for and express regularity in repeated reasoning.

Enduring Understanding(s): *Students will understand that…*

1) A ratio expresses the relationship between two quantities.
2) Ratio reasoning can be applied to many different types of mathematical and real-life problems.
3) A ratio is a distinct entity, different from the two measures that make it up.

Essential Questions: *These questions will guide student inquiry.*

1) Why are ratios important?
2) How are ratios used in everyday life?
3) What kind of problems can I solve with ratios?
4) When is it useful to be able to relate one quantity to another?
5) How can I compare two different quantities?

Student Performance

Knowledge: *Students will understand/know…*

- A ratio compares two related quantities
- Ratios can be represented in multiple formats including *for each, per, to, each, %, 1:5, 1/5, 0.2, etc.*
- There are two kinds of ratio; part:part and part:whole
- Appropriate use of mathematical strategies for solving problems involving ratios and rates such as tables of equivalent ratios, tape diagrams, double number lines, graphs or equations

Application: *Students will be able to...*

- Use ratio language
- Write ratios to describe the relationship between two quantities
- Make and manipulate tables of equivalent ratios
- Use tables to compare ratios
- Plot pairs of values on the coordinate plane
- Use double number lines to solve problems
- Use tape diagrams to solve problems
- Propose, justify and communicate solutions
- Use ratio reasoning to solve real-world and mathematical problems

Assessments (Attached)

Suggested Formative Assessments:

- MARS – 7th grade 2006 "Square Tiles" (Use after Lesson 2)
- SBAC-MAT.06.CR.1.000RP.A.174 (Use after Lesson 2)
- Illustrative Mathematics 6.RP Walkathon 1

Post-Assessment (Culminating Task):

- Bead Bracelets

Learning Experiences (Lesson Plans Attached)

Days	Lesson Sequence	Materials
	Lesson 1: Introduction to Ratios *Students will know:* • A ratio compares two related quantities • Ratios can be represented in multiple formats including *for each, per, to, each, %. 1/5, etc.* *Students will be able to:* • Use ratio language to describe the relationship between two quantities	
	Lesson 2: Writing Ratios *Students will know:* • A ratio compares two related quantities • Ratios can be represented in multiple formats including *for each, per, to, each, %, 1:5, 1/5, etc.* *Students will be able to:* • Write ratios to describe the relationship between two quantities	**Suggested Formative Assessments:** • MARS – 7th grade 2006 "Square Tiles" • SBAC-MAT.06.CR.1.000RP.A.174
	Lesson 3: Problem Solving with Ratios (tables of equivalent ratios) *Students will know:* • Appropriate use of mathematical strategies for solving problems involving ratios and rates such as tables of equivalent ratios, tape diagrams, double number lines, graphs or equations *Students will be able to:* • Use tables to compare ratios • Make and manipulate tables of equivalent ratios • Plot pairs of values on the coordinate plane	
	Lesson 4: Graphing Ratios *Students will know:* • Appropriate use of mathematical strategies for solving problems involving ratios and rates such as tables of equivalent ratios, tape diagrams, double number lines, graphs or equations *Students will be able to:* • Plot pairs of values on the coordinate plane • Make and manipulate tables of equivalent ratios	
	Lesson 5: Problem Solving with Ratios (double number lines) *Students will know:* • Appropriate use of mathematical strategies for solving problems involving ratios and rates such as tables of equivalent ratios, tape diagrams, double number lines, graphs or equations *Students will be able to:* • Use double number lines to solve problems	
	Lesson 6: Problem Solving with Ratios (tape diagrams) *Students will know:* • Appropriate use of mathematical strategies for solving problems involving ratios and rates such as tables of equivalent ratios, tape	**Suggested Formative Assessment:** • Illustrative Mathematics-6.RP.A.3 "Mixing Concrete"

	diagrams, double number lines, graphs or equations *Students will be able to:* • Use tape diagrams to solve problems	
	Review and Assessment - Ratios *Students will:* • Propose, justify and communicate solutions	**Interim Assessment:** • MARS – 6th grade 2002 "Grandpa's Knitting"

Resources

Online	Text
Georgia Department of Education https://www.georgiastandards.org/Common-Core/Pages/Math.aspx **Illustrative Mathematics** http://www.illustrativemathematics.org/ **Inside Mathematics/MARS tasks** http://www.insidemathematics.org/ ; http://map.mathshell.org/materials/index.php **Massachusetts Department of Elementary and Secondary Education** http://www.doe.mass.edu/candi/model/units/Mathg6-RatioRates.docx **North Carolina Department of Public Instruction** http://www.dpi.state.nc.us/acre/standards/common-core-tools/#unmath **Progressions for the Common Core State Standards in Mathematics** http://ime.math.arizona.edu/progressions/ **Smarter Balanced Assessment Consortium** http://www.smarterbalanced.org/smarter-balanced-assessments/#item **Utah State Office of Education** http://schools.utah.gov/CURR/mathelem/Core-Curriculum/Ratios-and-Proportional-Reasoning.aspx	**McGraw-Hill. *California Mathematics: Concepts, Skills, and Problem Solving, Grade 6*. New York: McGraw-Hill Companies, Inc. 2008. Print.** **National Council of Teachers of Mathematics. *Developing Essential Understanding of Ratios, Proportions & Proportional Reasoning: Grades 6 – 8*. Virginia: National Council of teachers of Mathematics, Inc. 2011.** **Shoseki, Tokyo. *Mathematics International: Grade 6*. 2012. (Japanese Text)** **Van de Walle, John, and LouAnn Lovin. *Teaching Student-Centered Mathematics: Grades 5-8.* Vol. 3. Boston: Pearson, 2006.**

ELA Unit of Study Guide

"Reading and Writing Informational Texts: We Will Survive"

Grade: K	**Topic:** In this unit, students will be researchers, investigators, and detective and will be equipped with the tools to help them read informational texts. The focus will be on the features of informational texts (authors, title, title pages, visuals), but primarily on helping students to understand that when they read non-fiction books, they are reading for information. The unit will integrate science as students explore the theme of Survival.	**Length of Unit:** 6 weeks

Focus of Learning

Common Core Standards:

Reading:

RI K.4 With prompting and support, ask and answer questions about unknown words in a text.
RI K.6 Name the author and illustrator of a text and define the role of each in presenting the ideas or information in a text.
RI K.7 With prompting and support, describe the relationship between illustrations and the text in which they appear.
RI K.9 With prompting and support, identify basic similarities in and differences between two texts on the same topic (e.g., in illustrations, descriptions, or procedures)

Writing:

W K.2 Use a combination of drawing, dictating and writing to compose informative/explanatory texts in which they name what they are writing about and supply some information about the topic.
W K.7 Participate in shared research and writing projects.
W K.8 With guidance and support from adults, recall information from experiences or gather information from provided sources to answer a question.

Speaking and Listening:

SL K.1 Participate in collaborative conversations with diverse partners about kindergarten topics and texts with peers and adults in small and larger groups.
SL K.5 Add drawings or other visual displays to descriptions as desired to provide additional detail.

Language:

L K.5 With guidance and support from adults, explore word relationships and nuances in word meanings.

a) **Sort common objects into categories (e.g., shapes, foods) to gain a sense of the concepts the categories represent.**
b) **Distinguish shades of meaning among verbs describing the same general action (e.g., walk, march, strut, prance) by acting out the meanings.**

L K.6 Use words and phrases acquired through conversations, reading and being read to, and responding to texts.

ELD Standards/Language Objectives:

ELD PI.K.1. Exchanging ideas with others through oral collaborative conversations on a range of social and academic topics
ELD PI.K.6. Reading closely literary and informational texts and viewing multimedia to determine how meaning is conveyed explciitly and implicitly through language
ELD PI.K.9. Expressing information and ideas in formal oral presentations on academic topics
ELD PI.K.12 .Selecting and applying varied and precise vocabulary and language structures to effectively convey ideas
ELD PII.K.5. Modifying to add details
ELD PII.K.6. Connecting ideas

Students Who are College and Career Ready:

1. **Demonstrate independence.**
2. **Build strong content knowledge.**
3. **Respond to the varying demands of audience, task, purpose, and discipline.**
4. Comprehend as well as critique.
5. **Value evidence.**
6. Use technology and digital media strategically and capably.
7. Come to understand other perspectives and cultures.

Enduring Understanding(s): Students will understand that…

- We can get information about a topic through reading and listening.
- We can share information with others through speaking and writing.
- How we present information effects how well we are understood.

- Every living thing has a basic instinct for survival and is uniquely equipped for survival.

Guiding Questions: These questions will guide student inquiry.

- What can we learn from reading and writing informational books?
- How do living things survive?
- How do living things get what they need?
- How do living things protect themselves?

Student Performance

Knowledge: Students will understand/know…

- Author
- Illustrator
- Title Page
- Title
- Non fiction
- Plants are living things.
- Plants need water, sunlight, air, and nutrients from the soil to survive.
- Animals need food, water, air, and shelter to survive.
- Plants and animals have special characteristics to help them survive.
- Plant vocab: air, light, water, soil, root, stem, leaves, flower, seeds, fruit, soil, grow
- Animal vocab: food, water, air, shelter, insects, reptiles, snake, lizard, mammal, habitat, birds, wings, feathers, structures, behavior, fish, fins, reef, coverings, skin, scales, fur, shell, weather, predators, grow, change
- Environment vocab: earth, landforms, mountains, valleys, plains, hills, canyons, deserts, river, stream, lake, ocean
- ELA vocab: author, illustrator, label, describe, description, communicate, topic, information, categories, verb
- Science vocab: observe, predict, compare, classify, sort, alike, different, model
- Math vocab: measure, count, estimate, compare, pattern

Skills: Students will be able to…

- Use the target vocabulary in speaking and writing to communicate information to others.
- Name the author and illustrator.
- Describe the role of the author and illustrator in presenting information in given texts.
- Describe the relationship between the illustrations and the text in which they appear.
- Identify basic similarities and differences between two texts on the same topic.
- Use a combination of drawing, dictating, and drawing to compose informational texts which name the topic and supply some information about the topic.
- Stay on topic when composing informational texts.
- Compose illustrations that add detail or description to discussions and written compositions.
- Use appropriately specific verbs to describe movement.
- Contribute ideas to shared writing projects.
- Take turns appropriately when sharing ideas in small groups and as a whole class.
- Pull details from a text that answer a particular question.
- Sort plants and animals into categories based on a specific characteristic.

Assessments (Attached)

Assessments: pre-assessment, formative, and post-assessment/culminating task

Pre-assessments:

Teacher will read aloud two informational text on the same topic to students and ask them questions about the text. The Teacher will chart the students' responses. Students will create a book about the topic explaining what they have learned using a combination of pictures and letters. Teacher will ask students to explain their drawings (answers) with prompts and will write down their oral responses.

Other Assessments

- Teacher observation notes from small group, one-to-one, and whole class discussions.
- Student science journals/notebooks.
- Science worksheets.
- Teacher observation notes from shared writing projects.
- Student journals/notebooks.

- Sorting activity results and student notes.
- Writing and Reading notebook
- Gallery walk of plants and animals – students place sticky notes on large chart paper (pictures of animals and/or plants are on the posters) and identify what they know about a specific animal or plant. Student names are on the sticky notes for follow-up at a later date.

Culminating Assessments:

Students will:

- Choose an animal or plant that they would like the zoo/wildlife preserve/Effie Yeaw Center/aquarium to adopt.
- After reading several books on the topic, compose an all about book determining what information to include. Possible topics may include what the plant/animal needs to survive, its natural habitat, and the specific structures and/or behaviors that make it suited to life in that habitat.
- Compose a model habitat for the zoo/wildlife preserve/Effie Yaw Center/aquarium that addresses the survival needs of that particular plant/animal.
- Present the habitat and animal/plant information to a panel of school personnel and representatives from the zoo/wildlife preserve/Effie Yaw Center/aquarium.

Learning Experiences (Lesson Plans Attached)

Lessons	**Materials**
Lessons 1-2: Students take a live or virtual field trip to Zoo/Wildlife Preservation/Effie Yeaw/aquarium. Prior to the fieldtrip, students study brochures and pamphlets about the place and make predictions about what they will see and do and develop a set of questions they want to try and answer. Students keep an inquiry journal and write and draw pictures of what they learned and noticed	**Lesson 1-2:** • Informational brochures about the place they will visit • Science Inquiry Journal
Lessons 3-5- How Non-Fiction Works Students learn about how non-fiction works exploring the difference between fiction and nonfiction, how to set themselves up to read non-fiction (reading the book cover and exploring text features), asking questions before reading, learning from pictures, looking more closely at pictures	**Lesson 3-5:** • **I**nformational texts • Chart paper • Pencils • Reader's Notebook
Lessons 6-10: How Non-fiction Works Students learn about how non-fiction works exploring other features of non fiction— headings, captions, labels), using the questions in the text, connecting ideas in the text.	**Lesson 6-10:** • **I**nformational texts • Chart paper • Pencils • Reader's Notebook
Lessons 11-20: Using What We Know about Non-Fiction to Learn More About A Topic Read books on plants, animals, and insects aloud and have students: • Draw and label the parts of a plant and compare and contrast plants • Explore what else they want to know about the topic • Skim for information • Use table of contents for information • Use headings for information • Use bold print • Read more than one book on a topic • Summarize (orally and with pictures and words) • Respond to Rhythm, rhyme, and alliteration in non-fiction text	**Lessons 11-20:** • **I**nformational texts • Chart paper • Webs, Venn Diagrams, T-Charts • Reader's Notebook • Crayons
Lessons 21-25 Students examine the features of "All About books" and plan, draft, peer revise, and peer edit, and publish their all about books. Students also prepare their model habitat.	**Lessons 21-25** Sample all about books Paper Pencils crayons
Lessons 26-30 Students prepare and practice their presentation providing peer feedback on presentation skills. Students present their all about books to the teachers and staff from zoo/wildlife preserve/Effie Yeaw Center/aquarium.	**Lesson 26-30**

Texts and Resources
• *It Could Still be a Mammal* by Alan Fowler • *How a Seed* Grows by Jordan • *Are You a Ladybug* by Allan and Humphries • *Mosquito* by Jill Bailey • Science textbook • Ranger Rick • Time for Kids

Sacramento City Unified School District

3rd Grade Parent Guide for Understanding the Math Common Core

	Operations and Algebraic Thinking	Number and Operations in Base 10	Number and Operations - Fractions	Measurement and Data	Geometry
Students will be able to:	• Solve multiplication and division problems using a variety of strategies. • Solve word problems using multiplication and division within 100. • Identify and explain patterns in arithmetic such as the connection between multiplication and division. • Fluently multiply and divide within 100.	• Use understanding of place value to round whole numbers. • Multiply single digit whole numbers by 10. • Fluently add and subtract within 1000 using strategies involving place value.	• Understand unit fractions, such as 1/2 or 1/3; represent unit fractions on a number line by dividing one whole into 2 or 3 parts. • Understand that fractions such as 2/3 are represented as 2 segments of 1/3. • Recognize that fractions with the same endpoint on a number line are equivalent. • Generate simple equivalent fractions. • Compare two fractions based on their sizes.	• Tell and write time to the nearest minute. • Solve word problems involving elapsed time. • Measure and estimate volume and size in standard units. • Generate and represent data in a variety of ways. • Understand area of a rectangle and how it relates to multiplication and addition. • Understand perimeter as the measure of the sides of a figure.	• Recognize similarities and differences between shapes, for example, how squares compare to rectangles. • Break apart shapes into equal areas represented by fractions (e.g., the diagonals of a square divide it evenly into four equal parts).
Schools will support by providing opportunities to:	• Show multiplication and division in a variety of ways. • Solve multiplication and division problems with a variety of unknowns (3×__=12, 3×4=__, __×4=12). • Extend knowledge using properties of operations (e.g., if students know a fact such as 8x4=32 then they also know 4x8=32, 32÷8 = 4 and 32÷4 = 8).	• Deepen understanding of place value using base 10 blocks and other manipulatives. • Understand how moving from one place value to another is like multiplying or dividing by 10.	• Understand that a fraction is a whole broken up into equal parts. • Solve problems that require expressing fractions as fair-sharing. • Explain why two fractions are equivalent (e.g., “Justify why 1/2 is the same as 2/4.”). • Explore real-world situations that involve comparisons with fractions (e.g., 1/3 of a cake is larger than 1/4 of the same cake).	• Solve word problems involving addition and subtraction of time intervals using clocks or number lines. • Solve word problems involving mass and volume using scales or drawings. • Conduct real-world experiments to collect and interpret data. • Represent data as bar graphs, and line plots. • Engage in tasks that involve covering regions with unit squares to find area.	• Sort and classify shapes and describe their groupings in geometric terms. • Use manipulatives and drawings to represent unit fractions as equally divided areas.
Parents can support by:	• Ask your child to divide snacks into baggies in equal portions. • Ask questions such as: “If 5 bags of bagels hold six bagels each, how many bagels are there?”.	• Asking questions such as: “What digit is in the hundreds’ place of 2,764?” • Ask number riddles like: “I have 11 hundreds, 23 tens, and 15 ones. Who am I?” • Write a four digit number and ask, “How many thousands are there? Hundreds? Tens? Ones?”	• Providing opportunities to help in the kitchen by cutting fruits and vegetables into equal parts. • Ask questions about the size of a serving and compare servings.	• Ask your child, ”What time is it? What time will it be when we eat dinner in three hours?” • Measure weight on a scale and record data on a two-column chart. • Calculate perimeter and area in the garden or other areas of your home.	• Cut or fold a piece of paper and name the resulting fractional parts using halves, fourths, eights, thirds, and sixths. • Have your child go on a “Shape Hunt” in your home; identify shapes, ask questions about how the shapes are the same or different.

Third Grade Students:

- Solve multiplication and division word problems within 100.
- Understand place value to round whole numbers, multiply by 10, and fluently add and subtract within 1000.
- Solve one- and two-step word problems using addition, subtraction, multiplication, and division.
- Use equations to represent word problem situations.
- Begin developing an understanding of fractions as numbers by representing unit fractions, such as ½ and ¼, using manipulatives, pictures, and on a number line.
- Solve problems using measurement of length, volume, time, and volume.
- Sort and classify geometric shapes.

Resources:

Sacramento City Unified School District
http://www.scusd.edu/common-core
✓ Links to documents for California (CCS) Common Core Standards, including videos for the Standards for Mathematical Practice

Parent-Teacher Association
http://www.pta.org/446.htm
✓ Parent Guides including key items that children should be learning in mathematics in each grade.

California Department of Education
http://www.cde.ca.gov/re/cc/index.asp
✓ Informational flyers provide overviews and highlights of the Math CCS
✓ Handouts for parents on transitioning to CCS
✓ Link to *Council of Great City Schools Parent Roadmaps*
✓ Links to *Smarter Balanced Assessments*

How Parents Can Support:

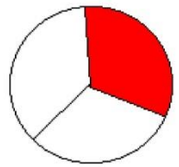
- Determine how many calories are in a large bag of your family's favorite snack food by reading and interpreting the given nutritional information.
- Tell time with your child. Ask them what time it will be when their favorite half-hour TV show is over.
- At your neighborhood playground, find as many geometric shapes as possible. With your child, talk about what makes shapes similar or different.
- Go online and play games together such as Math Man, Number Monster or The Timernator from www.coolmath.com
- Share how you use math in your daily life.
- Encourage your child to be persistent if a problem seems difficult.
- When your child gets stuck on homework, some questions to ask are:
    1) Can you tell me what you know now?
    2) What do you need to find out?
    3) Can you make a drawing or picture to get started?
    4) Can you show me what you did that didn't work?

Created by Sacramento City Unified School District

How Things Have Changed:

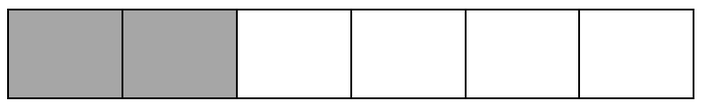
Expectations of students have changed a great deal with the adoption of the Common Core State Standards in Mathematics. While getting the right answer is still a great achievement, students are now required to think mathematically, communicate their thinking, and justify their reasoning while continuing to develop a greater level of understanding of how math works.

Previous California Standards Assessment:
Which fraction is represented below?



Answer: 1/3

Common Core Standards Assessment:
Ms. Francis drew the following picture on the board, then asked her students what fraction it represents.



a) Emily said that the picture represents 2/6. Label the picture to show how Emily's answer can be correct.

b) Raj said that the picture represents 2/3. Label the picture to show how Raj's answer can be correct.

c) Alejandra said that the picture represents 2. Label the picture to show that Alejandra's answer can be correct

SCUSD PARENTS and GUARDIANS

Sacramento City Unified School District

Be Ready Be Informed Be Involved

JOIN US for REGIONAL PARENT WORKSHOPS

Learn more about the CA Common Core State Standards

English Language Arts Workshop Series

East	West	Central
LOCATION Elementary School Focus **David Lubin** *3535 M Street* Middle School Focus **Sutter Middle School** *3150 I Street* High School Focus **Rosemont High School** *9594 Kiefer Blvd* **DATES** (for all locations) Part 1: October 8, 2013 Part 2: January 29, 2014 Part 3: March 11, 2014 **TIME:** 6:00-7:30p.m.	**LOCATION** Elementary School Focus **Harkness Elementary** *2147 54th Avenue* Middle School Focus **John Still K-8** *2200 John Still Drive* High School Focus **Kennedy High School** *6715 Gloria Drive* **DATES** (for all locations) Part 1: October 29, 2013 Part 2: February 12, 2014 Part 3: April 8 2014 **TIME:** 6:00-7:30p.m.	**LOCATIONS** Elementary School Focus **Nicholas Elementary** *6601 Steiner Drive* Middle School Focus **Will C Wood Middle School** 6201 Lemon Hill Avenue High School Focus **Hiram Johnson High School** *6879 14th Avenue* **DATES** (for all locations) Part 1: November 6, 2013 Part 2: January 30, 2014 Part 3: April 29, 2014 **TIME:** 6:00-7:30p.m.

Mathematics Workshop Series

East	West	Central
LOCATIONS Elementary School Focus **Golden Empire Elementary** *9045 Canberra Drive* Middle School Focus **Kit Carson Middle School** *5301 N Street* High School Focus **Rosemont High School** *9594 Kiefer Blvd* **DATES** (for all locations) Part 1: October 16, 2013 Part 2: January 14, 2014 Part 3: April 8, 2014 **TIME:** 6:00-7:30p.m.	**LOCATIONS** Elementary School Focus **Matsuyama Elementary** *7680 Windbridge Drive* Middle School Focus **California Middle School** *1600 Vallejo Way* High School Focus **Luther Burbank High School** *3500 Florin Road* **DATES** (for all locations) Part 1: October 22, 2013 Part 2: January 29, 2014 Part 3: April 29, 2014 **TIME:** 6:00-7:30p.m.	**LOCATIONS** Elementary School Focus **Pacific Elementary** 6201 41st Street Middle School Focus **Rosa Parks Middle School** 2250 68th Avenue High School Focus **West Campus High School** 5022 58th Street **DATES** (for all locations) Part 1: October 30, 2013 Part 2: February 12, 2014 Part 3: March 25, 2014 **TIME:** 6:00-7:30p.m.

Childcare and Translation Provided

For more information, contact Dr. Iris Taylor at iris-taylor@scusd.edu or 916-643-9120