Math Textbook Adoption Evaluation Rubric

Name of Reviewer _____School _____Date _____

Name of Instructional Materials/Publisher _____ORIGO Education *Stepping Stones 2.0*_____Grade Level ____K-5_____

Rubric for answering questions:

1 - Low - The instructional materials contain limited support for this element. Support is not embedded or consistently present.

2 - Medium - The instructional materials contain support for this element, but it is not always embedded or consistently present.

3- High - The instructional materials contain embedded support for this element so that it is consistently present.

Instructional Focus of all Resources	Rating 1, 2, or 3	Comments/Examples
1. Is this resource in alignment with grade level SCCCR math standards and mathematical processes?		ORIGO has provided a correlations document identifying the lessons that support the SCCR standards. Each *Stepping Stones* lesson specifies the mathematical processes addressed in the lesson and describes how those processes are developed/expressed in the lesson. In each module, there is a chart summarizing the mathematical processes across all lessons in that module.
2. Each topic provides a correlation to standards covered within.		Each module/lesson includes specific learning targets which address the focus and intent of the SSCR. The Lesson Content/Learning Target charts for each module summarize the learning targets, the content standards and mathematical processes addressed in each lesson, and the major content headings. Additionally, the content standards, process standards, and learning targets are clearly labeled in each lesson. Assessments are also labeled.
3. It builds conceptual understanding through a logical sequence of related mathematical ideas.		The *Stepping Stones 2.0* program is structured to progress from the mastery of concepts through language and fluency through the mastery of skills in a spaced learning and practice approach that allows ideas to build upon each other. *Stepping Stones* builds understanding of mathematical concepts through a spaced learning design that introduces content in small pieces, the way the brain prefers to learn, and provides practice for concepts and skills throughout the program. Concepts are carefully developed through a model that introduces each new concept through concrete materials and contextual situations using student language. Concrete

		materials and experiences are then linked to representational/pictorial models, and pictorial models are linked to abstract/symbolic representations. Careful attention is given to connecting ideas from one lesson to the next, across mathematical strands, and from one grade to the next. This is accomplished through specific language and discourse as well as through connecting mathematical models from one lesson to another.
4. Does it provide an appropriate balance of conceptual understanding, procedural skills, and real-life problem-solving applications?		In *Stepping Stones*, students are introduced to each operation conceptually, before strategies and skills are developed. Students engage in work that builds understanding of the work of each operation through various types of problems. Students master skills over time as they engage in four deliberate phases of learning. Skills and strategies are introduced through lessons, reinforced and practiced through exercises and games, and extended across the program into related areas of mathematics. In this way, students master critical skills and procedures such as basic facts or algorithms through conceptual understanding and regular use. This ensures that they develop all four tenets of fluency: flexibility, appropriate strategy use, efficiency, and accuracy. Spaced practice, a research-proven strategy for building fluency, requires deliberate practice between units of instruction to allow learning to settle in the brain before the next idea is developed. The sequence of lessons as well as the design of Maintaining Concepts and Skills is deliberately crafted to maximize student learning. Embedded in the lessons are sample focus questions for teachers to engender differing thinking strategies from students. Teachers are expected to close the lesson by engaging students in a reflective time where different strategies are discussed and analyzed for their mathematical soundness and effectiveness.
5. Does it provide opportunities to use reading, writing, and mathematical discourse by requiring students to share their thinking or strategies?		Students are provided many opportunities to explain their thinking and engage in the mathematical processes with classmates including the construction of mathematical arguments. The beginning of each lesson includes an explanation of the process standards that are the focus of the lesson. Many of these process standards, especially standards 2 and 3, require that students evaluate and share strategies. Teachers are encouraged to support this work, including the use of sentence stems and sample questions provided to encourage discourse in each lesson; this practice is typically elaborated in the ELL support section of each module. Students are sometimes asked to write about math in their daily

		journal. Maintaining concepts and skills in lessons 4, 8, and 12 of each of the twelve modules in grades 1-5 includes a section that provides written application of mathematical vocabulary and understanding. Additionally, the Thinking Tasks in Modules 3, 6, 9, and 12, for grades 3-5 normally include a writing task.
6. Does it use multiple representations such as real-life examples, drawings, equations, verbal descriptions, and graphs to facilitate learning (concrete, numerical, graphical, geometrical, and symbolic) and are relevant?		A variety of application resources are provided within the program. Contextual situations are used to introduce and practice concepts and skills within lessons. In addition, Maintaining Concepts and Skills, in lessons 4, 8, and 12 includes word problems. Under the More Math tab for each module, a variety of application problems, including Investigations, Problem Solving, Enrichment, and Cross-Curricular activities, are available for study.
7. Does it provide mathematical tasks with a range of challenge that students can use in both individual and collaborative settings?		Lessons include a range of learning opportunities from independent practice through small group learning to whole class instruction. Depending on the activity and instructional goals, teachers may group students homogeneously or heterogeneously for any given task. A range of challenge can also be found in the Differentiation section for each lesson and in the More Math applications for each grade level. Specifically, the *Tinking Tasks* in grades 3-5 in the quarterly modules (3,6,9,12) are exemplar challenge problems.
8. Do activities promote student inquiry, reflection, critical thinking, problem-solving, and sense making?		*ORIGO Stepping Stones 2.0* encourages a student-centered classroom where risk is minimized by promoting student discourse, thinking strategies, and solution methods. Student-to-student collaboration is fostered through games, small group problem-solving activities, and investigations. Lessons are carefully designed so that: 1. The elaboration of the process standards helps teachers to move students toward inquiry, reflection, and critical thinking. 2. The suggested questions and focus on discourse also promote inquiry, reflection and critical thinking. 3. The Step Ahead section, requires students to apply their learning from the lesson in a different context, giving them the opportunity to utilize their critical thinking, problem solving, and sense making skills. 4. Differentiation and More Math activities provide additional application of these same skills. 5. Reflection is Step 4 of each daily lesson, and is an integral part of the program.

Instructional Focus of all Resources	Rating 1, 2, or 3	Comments/Examples
9. The material is user-friendly and accurate with an appealing format and font.		The digital teacher edition provides everything the teacher needs to teach and differentiate each lesson in one place. It contains links to specific ORIGO resources that support whiteboard and interactive game activities that may be utilized for whole group, small group, or individual activities. These activities are user-friendly and provide students opportunities to develop conceptual understanding, procedural fluency, reasoning, and engage with the Mathematical Processes. The abundant pictorial representations are appealing and help students to internalize strategies and become proficient with mental math. The colors and ORIGO characters are appealing to students.
10. Digital access is easy to use.		*ORIGO Stepping Stones* is a web-based resource. There is no software to download or systems to maintain. *ORIGO Stepping Stones* can be used on any device that has access to the internet. The coding is done in HTML5 allowing both laptop and mobile device usage.
11. Program integrates ways to communicate/correspond with parents regarding the goals and objectives of the curriculum.		Each module includes a parent newsletter designed to share information about the mathematics students are learning with parents. Newsletters assist parents in helping students at home and foster the working relationship between teacher and parent. Each module contains a two-page letter that summarizes the content addressed in the module including the core focus, ideas for home, and vocabulary. These are available to download or print in English and Spanish directly from the digital teacher edition. In addition, ORIGO One videos, available as a channel in Stepping Stones or on Vimeo, are designed to share with parents to show them the strategies being taught and explain some of the features of the curriculum such as spaced practice. An online webpage delivers parent information to support the newsletter.
12. It includes suggestions for effective pacing of instruction, including short- and long-term planning. How well does it work with District pacing		The *Stepping Stones 2.0* core program is organized in a systematic, linear way that is comprehensive and clear. Each grade consists of 12 modules with 12 lessons in each module (grades 1-5) and 6 two-day lessons in each module for Grade K. Every Grade begins with lesson contents and learning targets identified. The content is organized around the research-based principle of spaced practice, where concepts are introduced and developed through smaller chunks, more repeated exposure, and systematic practice between groups of lessons. The content has been organized to address the major content of mathematics for each grade before the end of Module 10,

		while maintaining the program's unique structure and approach to teaching. The pacing of *Stepping Stones* is consistent, approximately 3 weeks per module. ORIGO will collaborate with your district to provide assistance in using *Stepping Stones* within district pacing.
13. What professional learning is available to support teachers and collaboration		A primary uniqueness of *ORIGO Stepping Stones 2.0* is the Professional Learning support that is delivered at point-of-use within each module of each grade level. *ORIGO MathEd* videos support teachers at all levels of experience and expertise in implementing curriculum successfully and helps teachers continuously improve their practice to drive student achievement. Teachers are trained using experts in K-5 mathematics education. Further, this online Professional Learning (*MathEd*) allows district and campus leaders to include this content in their Professional Learning Communities through the use of the Facilitator's Notes for each video found in the *MathEd* channel. The Facilitator's Notes provide information on how to conduct a 60 to 90-minute professional learning session complete with target questions designed to bring about the conversations necessary to promote meaningful learning with groups of teachers. Moreover, to further support teachers in effective teaching strategies, key lessons have been identified in every *Stepping Stones 2.0* module that include *Steps In Acti*on videos. These in-class videos highlight real teachers teaching the given lesson with a grouping of students. *ORIGO ONE* videos (brief one-minute video presentations about key ideas) are available both for teachers and parents.
14. Materials may be used in several instruction models including small group and math workshop		ORIGO lessons are designed with the whole group, small group, whole group structure of many workshop or guided math models in mind (Step 2: Number sense routine; Step 3: Whole group focus lesson followed by differentiation in small groups; Step 4: Whole group reflection). These lessons are also quite flexible and may fit a small group with stations or task model or a task and share model. Knowing that there are a variety of structures for workshop or guided math, the ORIGO Learning Services Team will work with each district to include their model of choice in the implementation sessions.

Student Textbook	Rating 1, 2, or 3	Comments/Examples
15. Does the textbook include a spiral (cumulative) review?		Yes, *ORIGO Stepping Stones 2.0* carefully builds understanding of mathematics so that all of the pre-requisite topics are in place before the next topics are connected. Key ideas and skills of these topics have been identified and placed in smaller blocks over time. In the lessons that follow, work is included to master what was taught alongside the other content development. This approach, called "spaced-learning", is backed by research including John Hattie's *Visible Learning for Mathematics* which supports spaced practice and allows students processing time to develop a deep mathematical understanding. When students come to a new topic, it can be easily connected. The work for the content within each module focuses on the key concepts or skills that are introduced, reinforced and, to some extent, practiced. Additional work to "cement" these concepts occurs during the *Maintaining Concepts and Skills* and *More Math* work until the concepts/skills are used to build the next part of the structure. The work cycles through again to extend the use of the concepts/skills or to introduce another concept/skill.
16. Instructional materials provide access to the standards by all students, including ELL, at-risk, high achieving, and special needs.		Differentiation activities for students are a part of each lesson and specialized notes provide descriptions of how students might approach the mathematics of the lesson in different ways allowing teachers to prepare for all student types. *Stepping Stones 2.0* includes a range of representations and models for mathematics, with a focus on visual and verbal/contextual models, and it provides access for students from a range of personal and linguistic backgrounds. The Sequence Navigator and the prerequisite skills in the Mathematics Focus tab enable teachers to easily identify lessons and activities for students who need adjusted instruction at any level.
17. Tasks apply to the diversity of students and their abilities/interests and are set in the real world with cultural experiences.		*Stepping Stones* lessons are free from bias and designed around visual representations, supported by concrete materials, abstract symbols, language, and real-world applications, to provide access to rigorous mathematics for each and every learner. A variety of supports are available to teachers through the mathematics tab and icons on each lesson page. Differentiation is available at the lesson level while enrichment and cross-cultural links are weaved throughout the program in More Math section at the module level.
18. Manipulatives that are grade level appropriate are provided for each student		The program follows the Concrete-Representational-Abstract instructional model in its design. Teachers begin instruction using

		manipulative materials included either with the program, *The Number Case*, or already available in the classroom. Students progress from building mathematical ideas using these concrete materials to work with visual representations (two-dimensional pictures) which show what is happening in the mathematics. Visual representations are powerful because they are easy to transfer from early understanding (e.g., building ten) to more advanced understanding (e.g., building a whole with fractions or decimals). As students master the strategies represented by the various visual models included in the program, they move to representing mathematics abstractly, using symbols and traditional algorithms and notation. This instructional sequence is grounded in the work of Piaget and Bruner. It is well-supported in the research literature around Piagetian programs.
19. Appropriate academic and content-specific vocabulary in the context of the learning experience is accessible, introduced, reinforced, reviewed and augmented with visual representations when appropriate.		ORIGO lessons are designed to carefully move students from their everyday language to the language they use in mathematics when working with concrete materials, to mathematical language, and finally to symbolic or abstract language. Each module includes key vocabulary terms. There are printable vocabulary cards for each module under the Mathematics tab. Teachers can use these materials to develop mathematics word walls and to focus student attention on the precise language of mathematics. Lessons 4, 8, and 12 of each module provide written practice of mathematical language through Maintaining Concepts and Skills activities.

Teacher Edition	Rating 1, 2, or 3	Comments/Examples
20. The teacher's edition provides support for the teacher through adult-level explanations, examples, useful annotations, strategies, and methodologies of instruction.		The teacher's edition includes a number of resources to support teachers in improving their own knowledge of mathematics as necessary. At the beginning of each module, the Mathematics tab includes a number of tools: 1) Mathematics Focus - a short essay describing the mathematics of the module in teacher-friendly adult language. This page also includes direct links to related *MathEd* Videos. These are 15- to 20-minute video-based professional learning sessions about the mathematics taught in each module. In this tab pre-requisite skills and common errors and misconceptions are identified to support teacher instruction. 2) Research Into Practice - This section includes a more academic discussion of the research behind the instructional strategies and tools used in the module. This section includes references and suggestions for accessible additional reading. 3) The Mathematical Practices tab includes information about which lessons cover which of the mathematical processes, and also includes professional videos on each. Together, these three elements provide a strong foundation in the mathematics for any teachers who want additional support. Each lesson also provides support for the teacher. A beginning paragraph helps teachers to focus on the most important elements of the lesson as well as the mathematical processes addressed in each lesson. Lesson notes include suggestions for ELL students for each step of the lesson. Common errors and misconceptions for the lesson and ways to avoid them are included in lesson notes when appropriate. Selected lessons at each grade level include Steps in Actions videos which feature teachers teaching portions of the lesson to a classroom of students.
21. Material reflects a variety of ways to differentiate instruction and model content to support all learners.		The Navigation at the top right of each lesson provides direct links to the previous and subsequent lessons in the same learning progression. Teachers may also view a complete progression of lessons through different topics using the dropdown menu of the sequence navigator. Differentiation for each lesson provides additional guidance for students requiring Extra Help, Extra Practice, or Extra Challenge.

Assessment	Rating 1, 2, or 3	Comments/Examples
22. Are assessments available in a variety of formats such as multiple choice, open-ended, multi-step tasks, etc. for assessing student learning?		A variety of assessment strategies ensure students are able to show what they know, and what their learning needs are, at each stage in the learning process. Assessments are carefully aligned to learning targets and to instruction, so students have a coherent mathematics learning experience. Formative and summative assessments are embedded in the program to provide a steady flow of information about student learning. 1. Formative assessment is part of every module in *Stepping Stones*. These assessments can be found in the assessment tab and include several forms of formative assessment. There are pre-tests, observation & discussion guides, and journal & portfolio guides. Icons on each lesson page link the observation/discussion and journal/portfolio tasks directly to each lesson. These tasks provide teachers with the information they need to adjust whole class or small group instruction quickly to ensure every student remains on target for learning the mathematics assigned to their grade. 2. Every module also includes summative assessments. The Check-Ups are more formal written tests and typically include both multiple choice and open-ended questions. Interviews are used for fluency checks and other summative assessments where students need to tell or show their learning. Performance tasks are provided, with rubrics, to assess student learning using more open-ended assignments. Quarterly assessments in Modules 3, 6, 9, and 12 measure cumulative progress for each quarter of instruction and also include both multiple choice and open-ended questions.
23. Online assessments are editable		If your district has Clever or a Clever-type interface we can connect you to digital student assessments for grades 3-5 on both a modular and quarterly level, however these assessments are not editable. Additionally, the teacher edition includes assessments that may be printed and provided to the student or done in an interview situation.

24. Program provides strategies for gathering information about students' prior knowledge and background as well as to identify common student errors and misconceptions.		*Stepping Stones* provides information about pre-requisite skills for each module under the Mathematics Tab for the module. Formative assessment is part of every module in *Stepping Stones*. These assessments can be found in the assessment tab and include several forms of formative assessment. There are pre-tests, observation & discussion guides, and journal & portfolio guides. Icons on each lesson page link the observation/discussion and journal/portfolio tasks directly to each lesson. These tools and tasks provide teachers with the information they need to ensure students have the prior knowledge they need for each module. In each lesson, there are icons in the teachers notes that highlight what types of student information is available within the lesson. The Maintaining Concepts and Skills questions in the even numbered lessons include a question that links to upcoming content and provides teachers with information about students' prior knowledge for future lessons as well.
25. Are there provisions for adapting instructional activities to accommodate a variety of needs and abilities?		The ELL suggestions for each lesson provide methods to adapt the instruction for any students with language needs. The Differentiation activities for each lesson include activities for students who need extra help, extra practice, or extra challenge. The various tasks under the More Math tab (Investigations, Problem Solving, Enrichment, Cross Curricula Links, Thinking Tasks) include multiple entry points and can be solved with a variety of strategies and representations. Thinking Tasks include DOK levels.
26. Teachers can easily assess student progress and access student/class information.		Suggestions for formative assessment options are included on each lesson page. The student journal page serves as a quick check for understanding or exit ticket for each lesson. Scoring information is provided for all assessments. Rubrics and answer keys can be seen under the resources tab for the summative and quarterly assessments. A variety of recording options available in the assessments tab in each module are available for helping teachers use the information gained from these assessments. Online reporting is available for the digital student assessments and can be analyzed from a student, classroom or standard/question perspective.

Technology	Rating 1, 2, or 3	Comments/Examples
27. Are virtual manipulatives readily accessible, easy to use, and designed to help students conceptualize mathematics ideas?		*Stepping Stones 2.0* is a web-based application and is device agnostic. The program works well with smartboard technology and offers the capability of digital resources to be 'cast' to student devices during instruction, including virtual manipulatives, games, and Big Book Tools. Each lesson has a preloaded 'playlist' of the resources needed to teach the lesson and teachers may customize this list to bring in additional resources.
28. Are digital resources available in a variety of multimedia formats with the ability to edit/print worksheets on demand?		*Stepping Stones 2.0* provides a variety of digital tools so teachers are able to use technology to enhance instruction. These tools are embedded into the activities found in *Lessons, Differentiation* and *More Math* or can be accessed through the *Channels* Tab in the top left corner of the *Slate* interface and are compatible with SMART board. technology. • *Flare* offers exciting interactive online teaching tools designed to enhance learning and facilitate discourse. These tools can easily be customized to meet a variety of needs to provide a flexible, easy-to-use resource to optimize whole-class or small-group learning. Currently there are over a dozen tools to choose from. • *Fundamentals* are digital board games for two players and allow the teacher to play against the class or pairs of students can take turns for further practice or differentiation. These games have simple rules and serve to reinforce and practice thinking strategies related to number and computation. There are over 160 games to choose from. • The *Big Book Teaching Tools* bring to life the characters from the *ORIGO Big Books* series. These engaging and easy-to-use interactive tools allow teachers and students to change the mathematics and further develop the concepts from all 12 titles in each grade. The addition of *Big Book Tunes* really brings your mathematics classroom alive. There is a song for every title in the storybook series. The tunes are an additional cost resource.

		• All digital tools can be used in a classroom setting or broadcast to small groups or individual students from the teacher through the *SlateCast* function. *SlateCast* is a purpose-built screen sharing tool within *Slate* that gives the teacher the ability to share or 'cast' the screen to a central display, directly to students, or both simultaneously from any device. All student practice pages are available to print through the Resource Tab from any device.
29. Technical assistance is readily available and instructions for access are easily understood by students and teachers.		*ORIGO Stepping Stones* is a web-based resource. There is no software to download or systems to maintain. Each teacher has their own unique username and password to access the system. ORIGO Education can work with your current rostering system to add *Stepping Stones* to your regular login. ORIGO offers hotline support and email support for all our customers.
	Total Points	**Overall Comments**