

HMH Education Company

Supplemental English Mathematics, 8

HMH Math 180 Flex Texas, 8

MATERIAL TYPE	ISBN	FORMAT	ADAPTIVE/STATIC
Supplemental	9798202140556	Digital	Adaptive

Rating Overview

TEKS SCORE	TEKS BREAKOUTS ATTEMPTED	ERROR CORRECTIONS (IMRA Reviewers)	SUITABILITY NONCOMPLIANCE	SUITABILITY EXCELLENCE	PUBLIC FEEDBACK (COUNT)
100%	17	3	Flags Not in Report	Not Applicable	0

Quality Rubric Section

RUBRIC SECTION	RAW SCORE	PERCENTAGE
1. Intentional Instructional Design	21 out of 21	100%
2. Progress Monitoring	19 out of 19	100%
3. Supports for All Learners	36 out of 37	97%
4. Depth and Coherence of Key Concepts	16 out of 16	100%
5. Balance of Conceptual and Procedural Understanding	38 out of 38	100%
6. Productive Struggle	21 out of 21	100%

Breakdown by Suitability Noncompliance and Excellence Categories

SUITABILITY NONCOMPLIANCE FLAGS BY CATEGORY	IMRA REVIEWERS	PUBLIC	Flags NOT Addressed by November Vote
1. Prohibition on Common Core	0	0	0
2. Alignment with Public Education's Constitutional Goal	0	0	0
3. Parental Rights and Responsibilities	0	0	0
4. Prohibition on Forced Political Activity	0	0	0
5. Protecting Children's Innocence	0	0	0
6. Promoting Sexual Risk Avoidance	0	0	0
7. Compliance with the Children's Internet Protection Act (CIPA)	0	0	0

SUITABILITY EXCELLENCE FLAGS BY CATEGORY	IMRA REVIEWERS
Category 2: Alignment with Public Education's Constitutional Goal	0
Category 6: Promoting Sexual Risk Avoidance	0

IMRA Quality Report

1. Intentional Instructional Design

Materials support educators in effective implementation through intentional course and lesson-level design.

1.1 Course-Level Design

GUIDANCE	SCORE SUMMARY	RAW SCORE
1.1a	All criteria for guidance met.	5/5
1.1b	All criteria for guidance met.	3/3
1.1c	All criteria for guidance met.	2/2
1.1d	All criteria for guidance met.	2/2
1.1e	All criteria for guidance met.	2/2
—	TOTAL	14/14

1.1a – Materials include an alignment guide outlining the TEKS, ELPS, and concepts covered, with a rationale for learning paths across grade levels (vertical alignment) and within the same grade level (horizontal alignment) as designed in the materials.

The materials include an *Alignment Guide* outlining the Texas Essential Knowledge and Skills (TEKS), English Language Proficiency Standards (ELPS), and concepts covered with a rationale for vertical and horizontal learning paths. While the TEKS and ELPS coverage in the *Alignment Guide* is not inclusive of all of the TEKS, *Math 180* is a supplemental math product focused on rebuilding the foundational math skills needed for algebra readiness. Professional learning resources further detail learning progressions with vertical and horizontal alignment and rationales, but without the direct TEKS references alongside objectives. While a rationale for learning paths is present, an explicit rationale for the prioritization of specific skills at each grade level is not included.

The grade 8 materials include a *Program Guide* that outlines the concepts covered, offering a detailed overview of each topic.

The grade 8 *Alignment Guide* provides a list of TEKS and ELPS that could be addressed within the adaptive content. The guide specifies which modules, activities, or learning paths correspond to which standards. Vertical and horizontal alignment charts are provided to illustrate the logical progression of learning for students, depicting how mathematical concepts are interconnected and sequenced to reinforce skills. Additionally, the materials explain the process for generating adaptive learning paths, highlighting how these pathways align with the overall structure and progression of the program.

The professional learning page for each topic, located in the *Program Guide*, includes a learning progression. The learning progressions for each topic show the vertical alignment and horizontal

alignment by listing the current objectives covered for the topic, prerequisite objectives, upcoming objectives, and the grade level standards that are connected, along with a rationale for the objectives.

1.1b – Materials include an implementation guide with usage recommendations and strategies for effective educator use, such as just-in-time supports, advanced learning, or as a course.

The *Program Guide* offers comprehensive teacher resources, including guidance on proper implementation, strategies for differentiation, and instructions for navigating the online interface. The program is adaptable and provides tailored learning activities, interventions, and extensions for all students, based on question data as students progress through the program.

The materials have a *Program Guide* that is not grade specific and that serves as the implementation guide. The *Program Guide* contains guidance on usage for different features such as, placement recommendations, professional learning, learning matrix, assessment tools, locations of teacher support, and information about the various areas in the Student Applications. The Student Application is adaptive for each topic. For example, in the "Learn Zone," students have access to just-in-time support while completing problems in the "Try" section and also in the "Practice" session. The program adapts to student needs in the "Practice" session based on their performance and delivers feedback for incorrect responses.

The materials provide a document in the *Teacher's Corner* called Program Activity Report that provides guidance to educators to make instructional decisions based on data from the Student Application. The document gives suggestions for educators to form groups according to the students' performance level color. The document also provides educators with an example of students with different color levels on how to group the students and what tools they should use for additional practice.

The "Teacher Success Pathway" includes videos to support teacher implementation. The "Placing Students" video guides teachers on how to manually adjust student placement, as needed, based on progress monitoring. The "Planning for Instruction" video explores resources to support students at their differing levels in the Student Application.

1.1c – Materials include a TEKS correlation guide with recommended skill entry points based on diagnostic assessment results.

Adaptive materials for all grade levels include diagnostic tools such as the Baseline Scan I and Baseline Scan II assessments that assess students' current understanding and provide answer documents with TEKS alignment.

The materials contain a *TEKS Correlation Guide* on the Baseline Scan I and Baseline Scan II answer keys.

The materials provide recommended skill entry points in the "Placement Guide" aligned to the TEKS and the "Topic at a Glance" that are TEKS aligned to the series and lesson.

1.1d – Materials include protocols with corresponding guidance for unit and lesson internalization.

The *Program Guide* includes an "Instructional Focus" for a larger grouping of related topics, as well as a "Conceptual Focus," and a "Procedural Focus" for each unit.

The "Resources for Differentiated Instruction" (RDI) lessons located in the Resources tab include lesson breakdowns designed for teachers to facilitate small group instruction with selected students. These lessons provide key vocabulary, review of prior learning, and suggest probing questions, along with their corresponding answers. Some answer keys include completed examples for teacher review. Additionally, each lesson offers assignments that include practice opportunities, extensions, and reflective activities.

Educators can view all the lessons and zones available to their grade 8 students. This feature allows them to support students in real time by accessing the specific problem or lesson a student is working on.

The "Student Application Flow" in the *Math 180 Flex Program Guide* provides guidance on how students can progress through the content in the Student Application. The "Learning Matrix" provides educators with an overview of concepts in each block.

In each Master Class video, teachers are supported with block, topic, and lesson internalization by answering, "What are some of the challenges my students face as they are using the *Math 180* Student Application?" and "What instructional strategies and visual models are they using, and how can I support their learning?" The materials provide videos to understand the strategies and visual models students will encounter as they work through a series of the Student Application to help teachers better understand how to support them.

1.1e – Materials include resources and guidance for instructional leaders to support educators with implementing the materials as designed.

Administrators have a dedicated login credential that allows access to videos, articles, and other resources specifically curated to support teachers. These materials include practical tools for implementing effective differentiation strategies, guidance on collaborative data practices, and best practices for classroom visits when observing this curriculum.

The resource "Visiting a *Math 180 Flex* Class: What to Look For" assists instructional leaders as they observe a *Math 180 Flex* classroom to support the teacher. A downloadable "*Math 180 Flex* Look Fors & Reflection Guide" offers a list of indicators to monitor as they collaborate with educators in implementing the materials as intended.

1.2 Lesson-Level Design

GUIDANCE	SCORE SUMMARY	RAW SCORE
1.2a	This guidance is not applicable to the program.	N/A
1.2b	All criteria for guidance met.	5/5
1.2c	All criteria for guidance met.	2/2
—	TOTAL	7/7

1.2a – If designed to be static, materials include detailed lesson plans with learning objectives, teacher and student materials, lesson components with suggested timeframes, and assessment resources aligned with the TEKS and ELPS.

This guidance is not applicable because the program is not designed to be static.

1.2b – If designed to be adaptive, materials include detailed lesson overviews with learning objectives, lesson components with suggested timeframes, and assessment resources aligned with the TEKS and ELPS.

The materials provide educators with detailed lesson overviews. The Boost lessons provide statements and questions educators can use as they set up the activity, engage students, explore the concept, and extend their understanding. Teachers can use the *Alignment Guide* to see the TEKS aligned with the lessons.

The materials include overviews with learning objectives aligned to the ELPS, as outlined in the "Language Support at a Glance" document for each instructional block. These documents offer educators guidance and suggested tasks to support emergent bilingual students.

The materials recommend that students engage with the content in the self-paced zones in the Student Application for a minimum of 20 minutes per day to effectively support their learning outcomes. The *Flex Program Guide* states, "Establish a schedule that maximizes the amount of time students spend on the Student Application—best results are achieved when students engage in Student Application learning at least 20 minutes a day, in or out of class. The optimal average session length is 16–18 minutes."

The materials include mSkills assessments that adapt to student progress. The answer documents provide the TEKS and ELPS alignment for each assessment question with explanations for all possible answer choices.

1.2c – Materials contain support for families in Spanish and English for each unit, with suggestions on supporting the progress of their student(s).

The materials include letters for families in both English and Spanish that generally outline the topics students will be learning, and block-level letters providing an overview of the *Math 180 Flex* program and concepts.

The Family Letter to families "explains the focus of the lesson or unit and the development of the procedural skill within the block."

2. Progress Monitoring

Materials support educators in effective implementation through frequent, strategic opportunities to monitor and respond to student progress.

2.1 Instructional Assessments

GUIDANCE	SCORE SUMMARY	RAW SCORE
2.1a	All criteria for guidance met.	2/2
2.1b	All criteria for guidance met.	2/2
2.1c	Materials include assessments. Assessments are not designed to be digital assessments or digital assessments are not designed for print. The materials do not include content and language supports that educators can enable or disable to support individual students.	Not Scored
2.1d	All criteria for guidance met.	4/4
2.1e	All criteria for guidance met.	4/4
—	TOTAL	12/12

2.1a – Materials include the definition and intended purpose for the types of instructional assessments.

The *Program Guide* and accompanying materials provide a detailed overview of various assessment types, including the purpose of each assessment, instructions for use, targeted skills or concepts, and the types of results generated for educators.

The materials do not provide formal definitions for assessment types; however, the intended purpose of assessments is described within the lesson materials, including what students do, what is assessed, the frequency of assessment, and how educators can use the generated data to inform instructional strategies.

2.1b – Materials include guidance to ensure consistent and accurate administration of instructional assessments.

The *Program Guide* provides step-by-step instructions for administering assessments, guidance on time allocation, preparation tips, and best practices when assessing students.

The materials provide strategy lessons (e.g., mSkills Strategy Lessons) to familiarize students with question formats and problem-solving strategies, along with guidance for teachers on reviewing mindset strategies and reflecting on student performance before administering assessments.

2.1c – Digital assessments include printable versions and accommodations, including text-to-speech, content and language supports, and calculators, that educators can enable or disable to support individual students.

The mSkills assessments in *Math 180 Flex* are accessible in both digital and printable formats.

The "Success Zone" within the Student Application includes a standard calculator feature that can be enabled or disabled to accommodate individual student needs. Teachers have complete control over calculator access and may turn it on or off at the class level or for specific students. By default, the calculator is disabled.

Math 180 Flex includes text-to-speech functionality for assessments, but it does not provide built-in content or language supports for digital assessments. Teachers can enable and disable the text-to-speech for individual students. Students have access to read-aloud buttons, which can be used to have questions and answer choices read aloud to them in English or Spanish.

2.1d – Materials include diagnostic assessments with TEKS-aligned tasks or questions, including interactive item types with varying complexity levels.

The materials include two diagnostic assessments—Baseline Scan I and Baseline Scan II—that are administered at the beginning of the year. The questions are TEKS-aligned.

These assessments are composed of multiple-choice and interactive item types aligned to a range of the TEKS standards. The assessments reflect multiple levels of complexity. For example, Baseline Scan II includes, Depth of Knowledge (DOK) 1: "Identifying Equivalent Ratios," DOK 2: "Solving Application Problems Involving Proportions," and DOK 3: "Analyzing and Solving Scenarios Related to Proportional Reasoning."

2.1e – Materials include a variety of formative assessments with TEKS-aligned tasks or questions, including interactive item types with varying complexity levels.

The mSkills assessment is administered when students complete a Block of instruction. This formative assessment evaluates students' mastery, application, and comprehension of the Block material.

Each "Flex mSkills Assessment Answer Key" provides the TEKS alignment for each question. The materials include formative assessment tasks and questions designed with varying levels of complexity.

The "Success Zone" functions as a formative assessment, featuring a variety of problem types and difficulty levels. The TEKS alignments for each "Success Zone" are provided in the corresponding answer key.

2.2 Data Analysis and Progress Monitoring

GUIDANCE	SCORE SUMMARY	RAW SCORE
2.2a	All criteria for guidance met.	3/3
2.2b	All criteria for guidance met.	1/1
2.2c	All criteria for guidance met.	2/2
2.2d	This guidance is not applicable to the program.	N/A
2.2e	All criteria for guidance met.	1/1
—	TOTAL	7/7

2.2a – Instructional assessments include scoring information and guidance for interpreting student performance, including rationale for each correct and incorrect response.

The "Scoring Rubric" found in the *Math 180 Flex Program Guide* assists teachers with interpreting student performance.

The materials include "mSkills Assessment Answer Keys," which provide rationales for both correct and incorrect answer choices for the multiple-choice questions. Additionally, explanations are included for open-ended questions.

The adaptive materials include guidance for educators to intervene with identified students. The "mSkills Assessments Answer Keys" provide step-by-step directions on how to find the correct answer for text-input questions. For multiple-choice questions, the answer keys provide rationale for both correct and incorrect answers.

2.2b – Materials provide guidance for the use of included tasks and activities to respond to student trends in performance on assessments.

The *Program Guide* provides detailed support for teachers, including best practices for ensuring appropriate Student Application usage, evaluating student performance, and conducting effective student conferences.

The *Program Guide* also directs educators to the available Boost and Stretch lessons. The Boost lessons are designed for students who require additional reinforcement, while the Stretch lessons are intended for students who have mastered the content but still need support in integrating their learning from *Math 180 Flex* with the core classroom instruction.

The online platform identifies student trends in the data and provides educator guidance on how to use the data to adjust instruction, form targeted small groups to provide reteaching or enrichment opportunities. Boost lessons provide targeted intervention for students who need additional support in

mastering key mathematical concepts. Stretch lessons are designed to challenge students and extend their learning.

2.2c – Materials include tools for teachers to track student progress and growth, and tools for students to track their own progress and growth.

The materials include a printable tracker for students to put a checkmark on each completed lesson within the instructional blocks and are available in English and Spanish.

The materials include a student dashboard where students can track key performance indicators like overall progress through the program, learning segments (units) completed, session counts, performance levels (e.g., "Explore Zone," "Learn Zone," and "Success Zone"), and session duration.

The materials include a Program Activity Report that provides tools for educators to monitor student progress. The report displays results from the Student Application and the Mindset Scan, which provides students with an opportunity to reflect on their own learning strategies, attitudes, and behaviors. *The Program Guide* provides instructions on how to read and interpret the report.

The materials provide a Summary Reports section for each class for teachers to track student assessments. Reports include student results on assessments, progress over time, and student usage.

The materials include an educator dashboard that automatically compiles real-time student assessment data into tables and reports, highlighting areas of strength and weakness by color in the Program Activity Report.

2.2d – If designed to be static, materials provide prompts and guidance to support educators in conducting frequent checks for understanding at key points throughout each lesson or activity.

This guidance is not applicable because the program is not designed to be static.

2.2e – If designed to be adaptive, materials provide frequent checks for understanding at key points throughout each lesson or activity.

In the "Success Zone," students address problems categorized by concept rather than solely by the TEKS standards. This approach promotes strong vertical alignment in student understanding.

Students progress at their own pace, with varying levels of scaffolding and feedback to promote autonomous success. The application gradually shifts from guided to independent practice through the use of visual models, corrective feedback, and available support resources.

3. Supports for All Learners

Materials support educators in reaching all learners through design focused on engagement, representation, and action/expression for learner variability.

3.1 Differentiation and Scaffolds

GUIDANCE	SCORE SUMMARY	RAW SCORE
3.1a	All criteria for guidance met.	1/1
3.1b	All criteria for guidance met.	4/4
3.1c	All criteria for guidance met.	2/2
3.1d	The materials do not provide content and language supports that can be enabled or disabled by the educator.	2/3
3.1e	All criteria for guidance met.	2/2
—	TOTAL	11/12

3.1a – Materials include explicit educator guidance for lessons or activities scaffolded for students who have not yet reached proficiency in prerequisite or grade-level concepts and skills.

The materials include detailed educator guidance for lessons that are scaffolded to support students who have not yet achieved proficiency in grade-level concepts and skills, as outlined in the *Math 180 Flex Program Guide*. The guide instructs teachers to incorporate the "Connect," Boost, and Focus lessons, which are designed to offer additional support for students who have not yet demonstrated proficiency in the *Math 180* lessons. Online programs feature lessons that assess students' understanding of prerequisite and grade-level concepts through targeted questions. The program dynamically adjusts by providing additional explanations tailored to students' responses.

Boost and Focus lessons are designed to provide more targeted intervention for students who need extra support in specific areas and reinforce foundational skills needed to complete the topic. These lessons include scaffolded supports, such as step-by-step instruction, visual aids, and guided practice, to help students build foundational understanding and close learning gaps. For grade 8 learners, Boost Lesson 1A gives educators explicit guidance to instruct students on plotting points that will help support students in graphing linear equations.

3.1b – Materials include explicit educator guidance for language supports, including pre-teaching and embedded supports for developing academic vocabulary and unfamiliar references in text.

The resource includes guidance for educators on utilizing sentence stems to assist students in articulating their reasoning during problem-solving tasks using academic vocabulary, as well as strategies to differentiate instruction based on varying levels of language proficiency.

In the Student Application, a glossary is embedded in the corner of each problem. The glossary is searchable and includes both Spanish and English academic vocabulary words and definitions. The materials include embedded supports for unfamiliar references within the text, such as images illustrating the situation.

The materials provide educators with sentence frames to support student discussions during problem-solving activities, as well as embedded guidance on effectively modeling the use of these frames in classroom discussions.

The *Math 180 Flex Pre-Teaching Language Support* provides a list of academic vocabulary and unfamiliar references in text for educators to view for upcoming lessons, and steps to effectively pre-teach the vocabulary.

3.1c – Materials include explicit educator guidance for enrichment and extension activities for students who have demonstrated proficiency in grade-level and above grade-level content and skills.

The materials offer comprehensive teacher guidance for enrichment and extension activities tailored for students who have demonstrated proficiency in grade-level and above-grade-level content and skills, as outlined in the *Math 180 Flex Program Guide*. The guide recommends implementing the Stretch lessons for students who have demonstrated mastery of the current lessons and are prepared for additional challenges and to enrich their learning. These lessons provide opportunities for students to analyze situations, apply their learning to new contexts, and solve complex problems. The materials also include Step-Up lessons designed for students who have demonstrated proficiency in the foundational material and are prepared to extend their understanding by integrating their learning with Algebra 1 concepts. These lessons offer students opportunities to articulate their reasoning, assess their thought processes, and analyze various scenarios.

The materials include specific prompts for advanced questioning during discussions, such as asking students to justify their problem-solving strategies or compare different mathematical approaches. In the "Explore" section of Stretch lessons, students compare multiple strategies to solve a similar problem. The Stretch Lesson 2A: "Solve Proportional Pan Balance Problems," includes materials designed to support educators, such as a lesson summary, mathematical background emphasizing the importance of this content area, and an overview of relevant mathematical thinking skills.

3.1d – Digital materials include accommodations, including text-to-speech, content and language supports, and calculators that educators can enable or disable to support individual students.

Math 180 Flex digital materials offer built-in support for diverse learners. These supports are available throughout the Student Application, including the student dashboard.

A calculator is accessible within the Student Application in both the "Learn Zone" and "Success Zone" for *Math 180 Flex*. Teachers have full control over calculator availability and can enable or disable it at both the class and individual student levels.

The materials provide an option to enable text-to-speech to enable or disable audio instructions for individual students. The materials also allow the educator to pick English or Spanish audio for students, or allow the students to select their preference for English or Spanish.

While the materials allow for text-to-speech, it does not provide content and language support for students. However, students have access to read-aloud buttons, which they can use to have questions and answer choices read aloud to them in English or Spanish.

3.1e – Materials include educator guidance on offering options and supports for students to demonstrate understanding of mathematical concepts in various ways, such as perform, express, and represent.

The materials provide various methods for students to demonstrate their understanding, including interactive visual models and tools, diagram drawing, written explanations of solutions, and participation in problem-solving activities. The online dashboard offers educators resources for scaffolding these approaches and providing additional support, ensuring students have flexible options for showcasing their learning. Comprehensive teacher guidance for lessons includes sentence prompts and suggested strategies to facilitate student learning.

The materials provide students with opportunities to demonstrate their understanding of mathematical concepts through various methods, such as using tables and graphs to represent solutions to equations. For instance, in Block 2, Topic 2, Practice Question 3 of the "Proportional and Linear Relationship Series," students utilize a table to illustrate their comprehension of an equation by substituting different values for the variable x to observe corresponding outcomes.

3.2 Instructional Methods

GUIDANCE	SCORE SUMMARY	RAW SCORE
3.2a	All criteria for guidance met.	5/5
3.2b	This guidance is not applicable to the program.	N/A
3.2c	All criteria for guidance met.	3/3
3.2d	All criteria for guidance met.	2/2
3.2e	All criteria for guidance met.	2/2
—	TOTAL	12/12

3.2a – Materials include explicit (direct) prompts and guidance for educators to build knowledge by activating prior knowledge, anchoring big ideas, and highlighting and connecting key patterns, features, and relationships through multiple means of representation.

The materials provide Learning Progressions that detail the sequential development of skills and knowledge, aiding educators in identifying students' learning needs and building upon foundational concepts. These progressions serve as a guiding framework that connects Topics, Blocks, and current grade-level content, facilitating the effective introduction and reinforcement of key concepts over time.

In the Boost Fractions lesson, the instruction focuses on the core concept of fractions using fraction tiles, which facilitates students' understanding of whether a fraction is greater than a whole through visual reference. Educators are encouraged to highlight and connect key patterns, features, and relationships with the fraction tiles to develop students' comprehension of fraction values.

The materials include a *Teacher Corner* that provides videos for each topic. In these videos, educators observe *Math 180 Flex* teachers and experts as they demonstrate instructional routines, strategies, and high-leverage practices. These resources assist teachers in developing a conceptual understanding and anchoring key ideas to *Math 180* strategies and interactive visual models.

3.2b – If designed to be static, materials include educator guidance for effective lesson delivery and facilitation using various instructional approaches.

This guidance is not applicable because the program is not designed to be static.

3.2c – Materials include multi-tiered intervention methods for various types of practice and structures and educator guidance to support effective implementation.

The materials provide opportunities for multi-tiered intervention methods in the Boost lessons scaffolded problems to rebuild key concepts for students who need extra support. Additionally, the Stretch lessons

offer opportunities to practice non-routine problems, challenge advanced learners, and extend their understanding by connecting foundational skills to grade-level content.

The materials offer multi-tiered interventions that support students through various practice models. For example, students receive targeted instruction through teacher-led activities in RDI lessons, work on self-paced tasks that promote mastery, and use adaptive learning platforms that deliver interactive exercises, instant feedback, and personalized progression based on individual needs and mastery levels.

The materials include educator guidance to support implementation through reporting and data tools. *Math 180 Flex* offers reporting features and assessments to help teachers monitor student progress and inform instructional decisions for multi-tiered intervention. The adaptive technology identifies individual student needs and provides targeted instruction accordingly. The *Program Guide* explains how technology supports instruction and intervention by delivering content based on student readiness, addressing the needs of both individuals and groups.

3.2d – Materials include enrichment and extension methods that support various forms of engagement, and guidance to support educators in effective implementation.

The materials provide guidance to assist educators in the effective delivery of the Stretch and Step-Up lessons, which serve as enrichment and extension activities. These resources include teacher-facing lesson plans for both the Stretch and Step-Up components, outlining each section to support student engagement and comprehension. For instance, in Stretch: "Solve Number Riddles With Division" lesson, the educator receives instructions for preparing the lesson and is directed to facilitate student collaboration in pairs or to follow additional guidance for supporting students through the practice pages.

The materials include options for differentiation to meet the diverse needs of learners, such as challenges for advanced learners and scaffolding for those who require additional support. Stretch lessons provide enrichment for students who have demonstrated proficiency in Block content. In these lessons, students apply multiple strategies to solve a range of non-routine problems that build upon mathematical skills they have already mastered.

The "Explore Zone" has Anchor videos and interactive simulations connecting math to careers, cultural events, and students' lives. These materials support various forms of engagement by allowing students to explore mathematical decision-making in realistic scenarios, such as in grade 8 students are tasked with creating a delivery route in the "Explore Zone." Additionally, the program provides guidance for educators to effectively implement these tools, ensuring that all students can access and benefit from the enrichment activities.

3.2e – Materials include prompts and guidance to support educators in providing timely feedback during lesson delivery.

The materials include guidance and tools that support educators in providing timely feedback during lesson delivery. The program features real-time dashboards that display student responses, pace, and accuracy as students work through tasks. Educators can monitor progress live, receive alerts identifying student errors, and access suggested feedback to provide. Online tools prompt educators to record feedback during or after digital lessons, and the materials offer general guidance on the type of feedback to leave students.

While working in the Student Application, students receive immediate corrective feedback, including responses tailored to common wrong answers. Teachers can monitor progress through the Program Activity Report, which provides actionable data such as percent correct, time on task, and usage patterns. In the Practice portion of a "Learn Zone" lesson, when appropriate, the platform offers targeted prompts and guidance if students encounter difficulties, without immediately revealing the answer.

3.3 Support for Emergent Bilingual Students

An emergent bilingual student is a student who is in the process of acquiring English and has another language as the primary language. The term emergent bilingual student replaced the term English learner in the Texas Education Code 29, Subchapter B after the September 1, 2021 update. Some instructional materials still use English language learner or English learner and these terms have been retained in direct quotations and titles.

GUIDANCE	SCORE SUMMARY	RAW SCORE
3.3a	This guidance is not applicable to the program.	N/A
3.3b	All criteria for guidance met.	4/4
3.3c	All criteria for guidance met.	1/1
3.3d	All criteria for guidance met.	8/8
3.3e	This guidance is not applicable to the program.	N/A
—	TOTAL	13/13

3.3a – If designed to be static, materials include educator guidance on providing and incorporating linguistic accommodations for all levels of language proficiency [as defined by the English Language Proficiency Standards (ELPS)], which are designed to engage students in using increasingly more academic language.

This guidance is not applicable because the program is not designed to be static.

3.3b – If designed to be adaptive, materials include embedded linguistic accommodations for all levels of language proficiency [as defined by the English Language Proficiency Standards (ELPS)], which are designed to engage students in using increasingly more academic language.

The materials include a "Language Support at a Glance" document for each learning block. These documents guide educators on supporting three levels of language proficiency: pre-production and beginning emergent bilingual students, intermediate and high-intermediate emergent bilingual students, and advanced emergent bilingual students.

The student instructional videos effectively support intermediate to advanced emergent bilingual students by utilizing visuals and highlighted graphics to introduce key terms. Additionally, features such as closed captioning, adjustable playback speed (0.75x), and the ability to pause and review written supports enhance comprehension for non-native English speakers with higher proficiency levels, helping students better understand and apply academic vocabulary in context.

The materials also include partial response construction to help students build academic phrasing step-by-step; however, the online program only supports English and Spanish.

3.3c – Materials include implementation guidance to support educators in effectively using the materials in state-approved bilingual/ESL programs.

Each block includes an overview of "Language Support at a Glance." The materials provide guidelines for reviewing language goals embedded within each lesson's objectives. Additionally, there are recommendations for teaching multilingual learners language specific to math instruction. A section on "Focus Language Expectations" outlines the primary ELPS for the block.

The program overview materials do not address or align with state-approved bilingual or English as a Second Language (ESL) program models, such as dual language immersion or ESL pull-out programs. The only implementation guidance is available in the "Language Support at a Glance" pages.

The materials include a Spanish-language version of the family letter for each block outlining the upcoming content; however, the materials do not guide educators in integrating these materials within a state-approved bilingual or ESL program.

3.3d – Materials include embedded guidance to support emergent bilingual students in developing academic vocabulary, increasing comprehension, building background knowledge, and making cross-linguistic connections through oral and written discourse.

Lessons embed sentence stems (e.g., *function, domain, range,*), turn-and-talk discussions, and partner prompts to interpret graphs and real-world functions (e.g., *slope* and *y-intercept* of a taxi fare). These routines build academic vocabulary, comprehension, and background knowledge through structured oral practice.

Exit Tickets, lesson reviews, and graph-to-equation tasks require students to write definitions, explanations, and justifications using terms like linear equation and solution set. Prompts connect new concepts to familiar contexts (e.g., splitting a bill, comparing plans) and include teacher supports like sentence starters and evidence-based writing guides, strengthening comprehension and background knowledge in writing.

"Language Support at a Glance" provides guidance for leveraging Spanish cognates (e.g., *evidencia*) and addressing phrasing differences across languages (e.g., Cantonese, Hmong, Mandarin, Vietnamese). Teachers are encouraged to have students compare solutions in their home language and to share orally or in writing, promoting both oral and written cross-linguistic connections.

3.3e – If designed for dual language immersion (DLI) programs, materials include resources that outline opportunities to address metalinguistic transfer from English to the partner language.

This guidance is not applicable because the program is not designed for dual language immersion (DLI) programs.

4. Depth and Coherence of Key Concepts

Materials are designed to meet the rigor of the standards while connecting concepts within and across grade levels/courses.

4.1 Depth of Key Concepts

GUIDANCE	SCORE SUMMARY	RAW SCORE
4.1a	All criteria for guidance met.	2/2
4.1b	All criteria for guidance met.	4/4
—	TOTAL	6/6

4.1a – Practice opportunities throughout learning pathways (including instructional assessments) require students to demonstrate depth of understanding aligned to the TEKS.

Practice opportunities and instructional assessments throughout the learning pathways and program require students to demonstrate depth of understanding aligned to the TEKS. Within the "Learn Zone," students engage in interactive activities that assess their conceptual understanding of TEKS-aligned content. In grade 8, in the block on slope of a line, students begin by using slope to determine rate, then move to looking for patterns in slope, and then to analyzing slope to write equations.

In the "Success Zone," problems become increasingly complex as students demonstrate proficiency, further deepening their understanding of mathematical concepts. This structure supports both practice and assessment opportunities that align with the TEKS and promote progressive mastery.

4.1b – Questions and tasks, including enrichment and extension materials, increase in rigor and complexity, leading to grade-level and above grade-level proficiency in the mathematics TEKS.

The materials are organized by concept rather than TEKS, enabling students to develop and apply vertically aligned skills within broader topics. The "Success Zone Answer Key" demonstrates alignment to the TEKS and highlights progressive skill development from early elementary through high school, increasing in both complexity and depth.

In the "Success Zone," the activities are designed to push students beyond their current proficiency levels and toward grade-level proficiency and contain the TEKS alignments.

The materials include Stretch activities designed for students who demonstrate proficiency in a lesson topic. These activities engage students in analyzing and solving problems using various problem-solving strategies. They also provide supplementary practice problems, with the level of difficulty increasing through additional exercises and a challenge problem.

4.2 Coherence of Key Concepts

GUIDANCE	SCORE SUMMARY	RAW SCORE
4.2a	All criteria for guidance met.	1/1
4.2b	All criteria for guidance met.	1/1
4.2c	All criteria for guidance met.	4/4
—	TOTAL	6/6

4.2a – Materials demonstrate coherence across concepts horizontally within the grade level by connecting patterns, big ideas, and relationships.

The materials demonstrate horizontal coherence by systematically connecting patterns, big ideas, and relationships within a grade level, ensuring that each instructional block builds on prior knowledge and links to future concepts.

In the "Brain Arcade," students have the opportunity to reinforce and practice skills and concepts encountered in previous lessons through engaging, interactive games and activities. For instance, students can review foundational concepts, such as performing basic calculations with rational numbers, to support their understanding and mastery.

The learning progression within the materials is organized through pathways in the "Learn Zone." This feature includes a "Master" section for each topic, comprising questions designed to reinforce previously taught skills and concepts.

4.2b – Materials demonstrate coherence vertically across concepts and grade bands, including connections from grades 3–12, by connecting patterns, big ideas, and relationships.

The materials demonstrate vertical coherence by systematically connecting patterns, big ideas, and relationships within a grade level, ensuring that each instructional block builds on prior knowledge and links to future concepts.

In grade 8, in the "Linear and Nonlinear Functions" unit, students derive and understand linear equations, preparing them to model linear relationships between quantities using functions. The unit incorporates grades 6 through Algebra 1 TEKS in the learning progression.

4.2c – Materials demonstrate coherence across lessons or activities by connecting students' prior knowledge of concepts and procedures to the mathematical concepts to be learned in the current grade level and future grade levels.

The materials are organized by concept rather than by grade-level TEKS, resulting in units that integrate standards from multiple grades. In grade 8, in the "Linear and Nonlinear Functions" unit, students derive

and understand linear equations, preparing them to model linear relationships between quantities using functions. The unit incorporates the TEKS ranging from grade 6 through Algebra 1 in the learning progression.

The materials offer interleaved practice activities that reinforce previously learned skills and concepts across various learning pathways.

In the "Learn Zone," there are review questions mixed into the "Master" part of the practice so students regularly revisit and practice previously learned concepts.

4.3 Coherence and Variety of Practice

GUIDANCE	SCORE SUMMARY	RAW SCORE
4.3a	All criteria for guidance met.	2/2
4.3b	All criteria for guidance met.	2/2
—	TOTAL	4/4

4.3a – Materials provide spaced retrieval opportunities with previously learned skills and concepts across learning pathways.

In the "Brain Arcade," students have the opportunity to reinforce and practice skills and concepts encountered in previous lessons through engaging, interactive games and activities.

The learning progression within the materials is organized through pathways in the "Learn Zone." This feature includes a "Master" section for each topic, consisting of questions designed to reinforce previously taught skills and concepts.

4.3b – Materials provide interleaved practice opportunities with previously learned skills and concepts across learning pathways.

In grade 8, students engage with ordered pairs, tables, and graphs—all concepts introduced earlier in the year—as they progress through a learning pathway on identifying functions. Students apply their understanding of these representations to determine which is the most efficient to use in identifying functions.

In the "Learn Zone," there are review questions mixed into the "Master" part of the practice so that students regularly revisit and practice previously learned concepts.

5. Balance of Conceptual and Procedural Understanding

Materials are designed to balance conceptual understanding, procedural skills, and fluency.

5.1 Development of Conceptual Understanding

GUIDANCE	SCORE SUMMARY	RAW SCORE
5.1a	All criteria for guidance met.	3/3
5.1b	All criteria for guidance met.	2/2
5.1c	All criteria for guidance met.	1/1
—	TOTAL	6/6

5.1a – Questions and tasks provide opportunities for students to interpret, analyze, and evaluate mathematical concepts and complex, real-world situations.

Math 180 Flex integrates real-world challenges and career simulations to help students understand how mathematical concepts apply in everyday life and professional contexts. This approach facilitates the connection between classroom learning and practical applications, as demonstrated through activities in the "Explore Zone" and thematic content throughout the program. However, not all "Explore Zone" modules include simulations; out of the seven different concept series, only four feature simulation components. These simulations cover activities such as using decimals to design landscapes, employing fractions to create aquariums, and applying multiplication to plan a carnival.

In grade 8, students demonstrate their ability to interpret, analyze, and evaluate mathematical concepts and complex, real-world situations by modeling the costs of two plumbing companies using linear equations. They calculate slope and y-intercepts, write cost equations, and graph these relationships to compare service rates. Through tasks like determining which company offers the best value for different job durations and when costs are equal, students apply critical thinking and problem-solving strategies to make informed, real-world decisions.

5.1b – Questions and tasks provide opportunities for students to create concrete models and representations of mathematical situations.

The materials include questions and tasks that offer students opportunities to develop and utilize concrete representations of mathematical concepts, such as fraction models. For instance, in Block 1, Topic 1 of the "Fractions Series," students work with fraction models to demonstrate their understanding of comparing fractions.

The materials include questions and tasks designed to enable students to utilize various representations for organizing mathematical concepts. For example, in the Block 2, Topic 2, Practice Question 2 "Proportional and Linear Relationship Series," students use a table to represent solutions to an equation to visually recognize the relationship between the x and y variables.

The *Math 180 Flex* Student Application has interactive problems where students create and manipulate models and pictorial representations. These engage students and allow them to explore mathematical concepts in a dynamic and interactive way. In grade 8, students use an automated motion model to create a table as a representation of a mathematical situation.

5.1c – Questions and tasks provide opportunities for students to apply conceptual understanding to new problem situations and contexts.

The materials incorporate questions and tasks that enable students to apply their conceptual understanding to new problem statements and contexts. In the "Success Zone," students demonstrate the application of mathematical concepts and skills developed in the "Learn Zone" across a variety of mathematical contexts, including nonroutine and real-world problem situations. The types of problems include Word Play, where students utilize their math skills to solve contextual problems with varying levels of support, and Wild Card, where students apply new knowledge to complex, multi-step, and contextualized challenges.

Students tackle nonroutine and real-world context problems that require them to apply learned skills and concepts. In the "Brain Arcade," games like "Sea Level" and "Space Golf" challenge students to apply their understanding of numbers, operations, and relationships in engaging and adaptive environments. Students practice estimation, reasoning, and strategic thinking in new contexts.

Designed for students who have mastered foundational skills, Stretch lessons provide nonroutine problems that require flexible application of concepts. These lessons connect *Math 180* content to more advanced topics, such as Algebra 1, and challenge students to think critically.

5.2 Development of Fluency

GUIDANCE	SCORE SUMMARY	RAW SCORE
5.2a	All criteria for guidance met.	2/2
5.2b	All criteria for guidance met.	3/3
5.2c	All criteria for guidance met.	3/3
5.2d	All criteria for guidance met.	1/1
—	TOTAL	9/9

5.2a – Materials provide tasks that are designed to build student automaticity and fluency necessary to complete grade-level mathematical tasks.

The "rain Arcade" is a collection of math games designed to support students in developing fluency, flexibility, and confidence with key skills both within and beyond *Math 180* lessons. The games provide engaging learning environments that emphasize reasoning, estimation, multiple representations, and strategic mathematical thinking. There is comprehensive practice of fundamental math calculations with rational numbers, aimed at fostering strong automaticity in math facts and operations.

In grade 8, the program includes a "Brain Arcade" feature that provides interactive games designed to reinforce students' fluency and automaticity with various mathematical concepts. Students have ongoing, unrestricted access to these activities for additional practice. The activities are aligned with grade-level standards and help students develop mastery in areas such as multiplying and dividing rational numbers.

5.2b – Materials provide opportunities for students to practice the application of efficient, flexible, and accurate mathematical procedures throughout learning pathways.

In grade 8, opportunities for efficiency appear in Solve Linear Equations, where students solve multi-step equations using inverse operations and combining like terms.

Flexibility is present in Analyze Functions, as students interpret and transition between function tables, graphs, and equations.

Accuracy is practiced in Work with Systems of Equations, where students solve using substitution, elimination, and graphing, while verifying solutions for correctness.

5.2c – Materials provide opportunities for students to evaluate mathematical representations, models, strategies, and solutions for efficiency, flexibility, and accuracy throughout learning pathways.

The materials provide a "Success Zone" feature for each topic within every block and series, supporting student evaluation of mathematical representations, models, strategies, and solutions for efficiency, flexibility, and accuracy. Within the "Success Zone," students engage with "Find or Fix" and "Who's Right"

questions in two specific Series: "Fractions, Decimals, and Integers" and "Rates and Ratios." These tasks prompt students to assess accuracy by identifying errors in solved problems or determining which solution is correct. For example, in the "Proportional and Linear Relationships Series," students analyze a double number line to identify and correct inaccuracies.

The "Who's Right / What's Right?" question type encourages students to select one or more correct answers, promoting exploration of different methods to reach a solution. These instructional features collectively provide structured opportunities for students to reflect on and evaluate mathematical approaches with attention to efficiency, flexibility, and accuracy.

5.2d – Materials contain guidance to support students in selecting the most efficient approaches when solving mathematics problems.

The materials provide guidance to assist students in identifying progressively more efficient strategies for solving mathematics problems. The lessons are extensively scaffolded to support students' learning as their problem-solving efficiency improves, ensuring students maintain a solid understanding of the underlying concepts.

The materials offer scaffolded lessons designed to assist students in developing increasingly efficient problem-solving strategies within the provided RDI lessons.

5.3 Balance of Conceptual Understanding and Procedural Fluency

GUIDANCE	SCORE SUMMARY	RAW SCORE
5.3a	All criteria for guidance met.	2/2
5.3b	All criteria for guidance met.	3/3
5.3c	All criteria for guidance met.	6/6
—	TOTAL	11/11

5.3a – Materials explicitly state how the conceptual and procedural emphasis of the TEKS are addressed.

The alignment guides to the TEKS direct teachers to specific activities within the "Learn Zone."

The "Learning Matrix" lists the conceptual and procedural emphasis for each Block, and the "Topic at a Glance" lists the TEKS for each Block to make the connection of how the conceptual and procedural emphasis of the TEKS are addressed.

5.3b – Questions and tasks provide opportunities for students to use concrete models, pictorial representations, and abstract models as required by the TEKS.

The materials provide opportunities for students to employ visual representations. Grade 8 TEKS include regularly creating tables and graphs by TEKS 8.5A. These visual tools include abstract models, where students develop equations to describe relationships and representations of real-world scenarios as mandated by TEKS 8.5I.

The "Learn Zone" tasks of the *Math 180* Student Application allow students to use pictorial representations and abstract models, as required by the TEKS.

Students use pictorial models such as motion graphs and tables (pictorial), and solve problems using equations and proportional reasoning (abstract). Students interact with concrete models to build understanding around Transformations, then transition to pictorial representations that illustrate mathematical relationships, and finally apply abstract reasoning to solve problems.

5.3c – Materials include supports for students in connecting, creating, defining, and explaining concrete and representational models to abstract (symbolic/numeric/algorithmic) concepts, as required by the TEKS.

In *Math 180 Flex* classrooms, teachers are provided differentiated Boost and Boost Focus lessons. These lessons help students connect visual models such as diagrams, tables, and step-by-step visuals to abstract mathematical thinking, including symbolic reasoning and algorithmic strategies. Scaffolded supports such as guided practice and visual aids help students define, explain, and apply mathematical models. The lessons did not include concrete models as required by the TEKS.

The materials have a "Learn Zone" in the Student Application. The materials include pictorial representations that students use to build a foundational understanding of concepts.

The materials include supports for students in defining and explaining concrete and representational models in relation to abstract concepts, as required by the TEKS. Students are asked to articulate connections across representations and justify how models illustrate underlying mathematical ideas.

5.4 Development of Academic Mathematical Language

GUIDANCE	SCORE SUMMARY	RAW SCORE
5.4a	All criteria for guidance met.	1/1
5.4b	All criteria for guidance met.	2/2
5.4c	All criteria for guidance met.	1/1
5.4d	All criteria for guidance met.	2/2
5.4e	All criteria for guidance met.	2/2
—	TOTAL	8/8

5.4a – Materials provide opportunities for students to develop academic mathematical language using visuals, manipulatives, or other language development strategies.

The Student Application begins each lesson with an instructional video demonstrating key mathematical vocabulary through animations. The visuals illustrate how mathematical terms are used in context, aiding students in visualizing abstract concepts and understanding precise academic language. Sentence stems are provided for reflection questions and for various question types within the "Success Zone," such as Math Talk, where students select the most appropriate term for a process or number to effectively communicate their mathematical reasoning.

The materials offer comprehensive modeling to facilitate students' visual understanding of essential academic vocabulary. Models such as bar diagrams, number lines, tables, and graphs support students in comprehending key concepts, including ratios, rates, equivalency, and slope.

In Grade 8, students distinguish between linear and nonlinear graphs. In the "Linear and Nonlinear Relationships Series," Block 2, Topic 2, Lesson 3: "Identify Nonlinear Relationships," students utilize tables and graphs to assess whether ordered pairs represent equivalent ratios and plot these pairs on a graph. This visual approach enhances students' understanding of "linear" and "nonlinear" concepts through visual representation.

5.4b – Materials include embedded educator guidance to scaffold, support, and extend students' use of academic mathematical vocabulary in context when communicating with peers and educators.

The *Math 180 Flex Program Guide* includes a section with professional learning pages dedicated to each topic within the Student Application. These pages highlight key vocabulary words relevant to each topic by bolding them to inform educators. However, the guide does not provide guidance on how to scaffold or support students in using these academic vocabulary terms for effective communication with peers and educators, or how to extend their use of these terms.

In grade 8, in the Boost 3C Lesson: "Solve Linear Systems Algebraically," in the "Extend" section, teachers are guided to partner students and pose the prompts "Describe the graphs of two equations that have no

solutions. What has to be true for the ordered pair to be a solution?" This language opportunity helps extend students' academic vocabulary when communicating with peers and educators.

5.4c – Materials include embedded guidance to support student application of appropriate mathematical language and academic vocabulary in discourse.

Language objectives are included at the beginning of each topic in the *Teaching Guide*. These outline key academic vocabulary and mathematical terms students are expected to use.

"Language Support at a Glance" documents are included at the start of each instructional block. These documents provide educators with sentence stems and structured prompts that support students in using appropriate academic language during both oral and written discourse.

Within lessons, student-facing prompts (e.g., "Explain how you found the answer,") and Exit Tickets often ask students to justify their reasoning using mathematical terms introduced earlier.

Activities such as turn-and-talks and structured partner discussions are supported by guidance that encourages students to apply the vocabulary in context (e.g., explaining integer rules, proportional reasoning, or equations using targeted academic language).

The materials include embedded guidance for student application of mathematical language by providing consistent scaffolds and tools to help students build and apply math-specific academic vocabulary in discourse.

5.4d – Materials include embedded guidance to facilitate mathematical conversations allowing students to hear, refine, and use math language with peers.

"Language Support at a Glance" documents (included at the beginning of each instructional block) guide educators in structuring opportunities for peer conversations. These include sentence stems, partner discussion prompts, and turn-and-talks, all of which promote students' using and refining mathematical language with each other.

In the Stretch and Step-Up lessons, students are explicitly asked to justify reasoning, compare strategies, and discuss problem-solving approaches with a partner or small group. The teacher guide includes prompts for facilitating these conversations (e.g., "How did your method differ from your partner's?" or "Explain why this strategy works?").

During Exit Tickets and Check for Understanding tasks, students respond to open-ended prompts such as "Why did you choose that operation?", or "How does your answer compare to your partner's?", which allows them to hear and respond to mathematical language from their peers.

The *Teaching Guide* includes consistent prompts for educators to ask students to share strategies, explain reasoning, and reflect aloud—fostering an environment where math talk is not only encouraged but scaffolded.

5.4e – Materials include embedded guidance to anticipate a variety of student answers including exemplar responses to questions and tasks, including guidance to support and/or redirect inaccurate student responses.

The "Professional Learning" section of the *Program Guide* notes common misconceptions about topics. For example, in "Fraction and Decimal Relationships," teachers are informed that struggling students often think fractions and decimals represent different values. *Math 180* addresses this misconception by using fractions to define decimals. A visual of the skill is available in the "Learn Zone" for the misconception, providing the teacher with support and a strategy for helping students.

Math 180 includes Skills assessments for each topic. The answer documents for each mSkills assessment provide embedded guidance, including rationales for incorrect answers. These rationales enable teachers to understand the reasoning behind student errors.

The RDI lessons offer teachers exemplary responses to questions; however, a limitation is that they do not include guidance on addressing and redirecting inaccurate student responses effectively.

5.5 Process Standards Connection

GUIDANCE	SCORE SUMMARY	RAW SCORE
5.5a	All criteria for guidance met.	1/1
5.5b	All criteria for guidance met.	2/2
5.5c	All criteria for guidance met.	1/1
—	TOTAL	4/4

5.5a – TEKS process standards are integrated appropriately into the materials.

The materials embed Grade 8 process standards appropriately by allowing students to engage in reasoning, make connections across concepts, and apply math to real-world situations. Multiple "Learn Zone" problems apply concepts to society, the workplace, and everyday life. For example, in "Proportional and Linear Relationships," Block 3, Topic 1, students are given problems about savings accounts, subscription purchases, restaurant orders, airplanes, and allowances.

The learning pathways have the process standards integrated into the Student Application materials. The "Explore Zone" has Anchor videos and interactive simulations connecting math to careers, cultural events, and students' lives. The materials support various forms of engagement by allowing students to explore mathematical decision-making in realistic scenarios. For example, in grade 8, students are tasked with creating a delivery route in the "Explore Zone."

5.5b – Materials include a description of how process standards are incorporated and connected throughout the learning pathways.

The *Math 180 Flex Program Guide* overviews the processes integrated into each lesson and highlights eight mathematical habits of mind aligned with specific TEKS process standards.

The *Math 180 Flex Program Guide* includes a "Mathematical Thinking" section that details how process standards are integrated and interconnected throughout the curriculum. This section describes how students will cultivate effective mathematical habits, demonstrate mathematical reasoning through modeling, and emphasize precision and perseverance in their work.

The "Try" section in each lesson models mathematical reasoning, including how to make sense of problems and look for and use structure, helping students understand the thinking behind the math. The materials provide opportunities for students to process their mathematical thinking in ways that align with 8.1(A)—applying mathematics to problems encountered in everyday life, society, and the workplace—and 8.1(E)—creating and using representations to organize, record, and communicate mathematical ideas.

5.5c – Materials include an overview of the TEKS process standards incorporated into each lesson.

In *Math 180 Flex Grade 8*, the TEKS process standards are incorporated into each topic through tools such as the *Teacher Dashboard* and printable lesson guides.

In Block 1, Topic 1: "Linear Relationships," the materials reference process standards including 8.1D, which involves communicating mathematical ideas using multiple representations, and 8.1F, which focuses on analyzing mathematical relationships to connect and communicate ideas.

Process standards are listed in the "TEKS Standards Overview Table" included in the teacher-facing materials, helping educators understand how each lesson aligns with the TEKS process expectations and how those expectations are reflected in student tasks and discussions.

6. Productive Struggle

Materials support students in applying disciplinary practices to productive problem-solving, including explaining and revising their thinking.

6.1 Student Self-Efficacy

GUIDANCE	SCORE SUMMARY	RAW SCORE
6.1a	All criteria for guidance met.	3/3
6.1b	All criteria for guidance met.	3/3
6.1c	All criteria for guidance met.	3/3
—	TOTAL	9/9

6.1a – Materials provide opportunities for students to think mathematically, persevere through solving problems, and to make sense of mathematics.

The materials provide students with multiple opportunities to think mathematically, persevere through solving problems, and make sense of mathematics. Throughout the lessons, students are prompted to model concepts using visuals such as number lines and tape diagrams, then connect these representations to symbolic reasoning. The program includes scaffolded instruction that guides students step-by-step through mathematical processes, helping them understand and make sense of the underlying concepts.

In Stretch lessons and Step-Up activities, students are encouraged to evaluate different strategies, justify their own thinking, and respond to open-ended questions, which promotes mathematical reasoning and reflection. Students are also asked to revise and explain incorrect responses, compare methods, and engage in written reflections through Exit Tickets.

Additionally, the adaptive technology in the "Learn Zone" and "Success Zone" requires students to attempt problems multiple times, make corrections, and persist in finding solutions with limited support. These features together support students in developing mathematical understanding while building perseverance and problem-solving skills.

6.1b – Materials support students in understanding, explaining, and justifying that there can be multiple ways to solve problems and complete tasks.

The materials provide students with multiple models, strategies, and representations across lessons—such as number lines, diagrams, equations, and contextual reasoning—to help students understand that there is often more than one way to solve a mathematical problem. For example, students are guided through step-by-step strategies but are also encouraged to explore alternatives in Stretch lessons, where they apply prior knowledge in new ways.

Throughout the lessons, sentence stems and guiding questions prompt students to explain their thinking. In practice and review problems, students are asked to describe how they solved the problem and why they chose a particular method. In the "Success Zone" and Step-Up lessons, students respond to prompts like, "How did you solve this?" or "What other strategy could you have used?" which encourage students to articulate their reasoning and explore different approaches.

Students are regularly asked to justify their chosen strategy and evaluate the strategies used by others. In grade 8, in the lesson "Compare Unit Rates," students complete "Who's Right?" problems in which they evaluate two students' approaches and decide which one is correct.

6.1c – Materials are designed to require students to make sense of mathematics through multiple opportunities for students to do, write about, and discuss math with peers and/or educators.

The materials provide multiple opportunities for students to actively engage in mathematical tasks alongside their peers and educators, promoting collaborative problem-solving and exploration of concepts. Students often work together during lessons to apply mathematical procedures using models, manipulatives, and interactive activities, fostering shared understanding.

Throughout the program, structured discussion prompts and sentence frames guide students in articulating their mathematical thinking. These supports encourage students to explain their reasoning, compare different solution strategies, and refine their mathematical language in oral discourse with classmates and educators.

Writing about mathematics is integrated through frequent reflection opportunities such as Exit Tickets, where students justify their answers and explain the strategies they used. Additionally, in lessons with "Who's Right?" or "Find or Fix" problems, students write about which solution is correct and provide reasoning to support their choice.

Together, these features create a learning environment where students consistently do math, discuss ideas, and write about their understanding in meaningful ways, supporting deep comprehension and reasoning.

6.2 Facilitating Productive Struggle

GUIDANCE	SCORE SUMMARY	RAW SCORE
6.2a	All criteria for guidance met.	8/8
6.2b	All criteria for guidance met.	4/4
—	TOTAL	12/12

6.2a – Materials support educators in guiding students to share and reflect on their problem-solving approaches, including explanations, arguments, justifications, and multiple points of entry.

The materials include Boost lessons designed for students who have not yet met the level of proficiency in their learning pathways. The teacher-facing lesson pages guide educators in posing encouraging questions to students to explain their problem-solving strategies. In grade 8, Boost Lesson 3c: "Subtract Positive and Negative Numbers," prompts instructors to ask students, "What strategy can you use to begin creating the puzzle?" as they work through a problem. These questions encourage students to articulate the benefit of using the problem-solving strategy and to share multiple points of entry as they work through an exercise. This question prompts students to articulate their approach to using the open number line as a problem-solving tool.

In the "Extend" portion of the lesson, the materials include guidance for incorporating opportunities for student pairs to explain their strategies. The guide suggests educators pair students, have them work on additional problems, and circulate the room with sample questions they could ask students as they work. One sample question for students is, "What strategy was most useful to help you solve the problem?" This question provides students with an opportunity to reflect and explain their problem-solving approach.

RDI lesson materials assist educators in facilitating student sharing and reflection on their problem-solving strategies through explanation. These resources guide teachers on how to support students in reflecting on their thinking and sharing their justification for their approach.

The "Check Understanding" section of the RDI lessons includes sample narration to guide teachers to discover student thinking and elicit proper student responses. For example, in the "Rates and Ratios," RDI Boost, Lesson 1B: "Identify Patterns in Tables" asks, "How is using multiplicative reasoning helpful in this problem?" and RDI Boost Lesson 2A: "Relate Addition and Multiplication to Rates" asks, "Which method was more efficient to use? Why?" These types of questions provide opportunities for students to reflect and share their justification and make an argument for a problem-solving approach.

RDI lessons provide a strategy bank, highlighting up to two strategies for a lesson, as well as prompts to support students in justifying and refining their thinking, while sharing and reflecting on their approaches

using multiple points of entry. The "Check Understanding" section of the RDI lessons includes sample narration to guide teachers to discover student thinking and elicit proper student responses.

6.2b – Materials include prompts and guidance to support educators in providing explanatory feedback based on student responses and anticipated misconceptions.

Instructional videos at the beginning of each Block model strategies and procedures so that teachers are able to anticipate common misconceptions and guide students effectively.

The RDI has Boost and Stretch lessons that provide targeted support for students struggling with foundational concepts or excelling beyond the core content. These lessons include teacher narratives and sample student responses to help educators address misconceptions.

For example, in the "Proportional and Linear Relationships," Block 3, Topic 1, Lesson 1: "Write a Linear Equation From a Graph," Practice Problem 1, when students respond incorrectly to the fill-in-the-blanks for Step 1, a pop-up appears stating, "Look at the y-axis to find the value from which the second line starts." If, on the second attempt, the student does not provide a correct answer, the program provides the correct answer. If a student responds incorrectly to Steps 2 through 4, the program says, "Try again. I know you can do this," or "Read the instructions and try again."

Using adaptive technology, the "Learn Zone" and "Practice" of the Student Application provide students with an immediate response to address errors. The responses provide the same general feedback. For example, in the lesson "Evaluate Equivalent Ratios" from "Rates and Ratios," Block 3, Topic 2, Practice Problem 1, when students respond incorrectly, the program encourages by saying, "Review this step and try again," "Look at your work and try again," or "Try again."