Connecting math content, rigor, and adaptive instruction for student success.
Program Overview + Digital Sampler

Connecting math content, rigor, and adaptive instruction for student success.
Glencoe High School Math Series

Confidently tailor your instruction with comprehensive materials to meet the individual learning needs of every student.

The accelerated pace of change in education over the last few years has created acute shifts in the delivery, consumption, and evaluation of mathematics education. As a result, educators need relevant content in multiple formats to engage students and focus on developing skills leading to achievement in the classroom and in the real-world.

Helping educators immerse students in math and prepare them for the future is what McGraw-Hill Education is all about. We deliver the most effective, innovative, and inspiring learning experiences for high school mathematics.

Featuring Four Math Programs

The Glencoe High School Math Series includes everything you need to guide your students with materials that lead them to success in the classroom, and creates confidence in their future.
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### DIGITAL RESOURCES GUIDE

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Connecting Math and Rigor

As your partner, we provide diverse resources focused on Standards for Mathematical Practices and challenge students’ critical thinking.

Be Empowered to Teach Confidently

**Rigor** has a strong emphasis on conceptual understanding for encouraging critical thinking with students, and is embedded throughout the *Glencoe High School Math Series*.

Each chapter starts out with a preview of Performance Tasks. Concepts and skills are built upon throughout each chapter so that by the end students will be able to complete the rich multi-step tasks.

**Performance Task Preview**

You can use the concepts and skills in this chapter to solve problems about running your own lawn-care business. Understanding linear functions will help you finish the Performance Task at the end of the chapter.
The Interactive Student Guide* is an engaging resource that will help students be even more successful, and is included digitally with your Glencoe High School Math Series.

The Interactive Student Guide is standard-aligned and emphasizes conceptual understanding and rigor.

Expand Mathematical Connections:
- Students can reflect on comprehension and application
- Internalize concepts to develop “second nature” recall
- Develop higher-order thinking skills
- Self-correct and discuss math concepts
- Demonstrate concept mastery

MP Standards for Mathematical Practice

The goal of the Standards for Mathematical Practice is to help develop students to use critical thinking, procedural fluency and conceptual understanding.

- Teaching strategies for the Mathematical Practices are incorporated in each chapter of the Teachers Edition
- Mathematical Practice Study Tips are embedded in the margins of the Student Edition
- Questions throughout are labeled with a Mathematical Practice logo to help students make the correlations to those practices

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Study Tip

Sense-Making: When the x-coefficient is a fraction, select numbers from the domain that are multiples of the denominator. It will simplify your calculations.
Adaptive and Personalized Instruction

Glencoe High School Math Series has adaptive and personalized instructional tools built into the program, you can take command, make data-informed decisions, and provide the individualized instruction each student needs.

LearnSmart®

Personalized study resources your students need today – to master state assessments tomorrow

LearnSmart® uses adaptive review with technology-enhanced questions to measure student accuracy, number of attempts, time spent, requests for help and confidence level to predict what course topics a student is most likely to forget and revisits those topics using engaging resources to build retention.
Trust ALEKS® to make informed instructional decisions

With the purchase of ALEKS® you are enabled to find out where your students are to inform your decisions on where whole-class instruction begins. This adaptive, personalized learning solution uses artificial intelligence to predict what content students are ready to learn and easily target individualized instruction, remediation, and acceleration.

* Contact your McGraw-Hill Education sales representative to learn how ALEKS can enhance your current math curriculum.
Bring Math to Life

With the *Glencoe High School Math Series* digital resources in ConnectED, you can create an interactive learning center and empower students to live the math through exploration and investigation!

**Draw out your students’ excitement for math with *The Geometer’s Sketchpad*®**

This interactive learning tool challenges students to drag, sketch, and model activities to deepen their conceptual understanding and application of abstract math concepts.

Integrated at the lesson level are engaging exercises that increase comprehension of abstract math concepts by helping students:

- Formalize key concepts
- Test mathematical hypothesis
- Visualize abstract math concepts
Help students deepen their understanding of math with truly interactive resources

The eToolkit virtual manipulatives empowers students to take learning into their own hands with opportunities to modify concrete models and see how changes they make impact the formula.

BrainPOP® supports individual and whole-class learning with animations that provide clear and concise explanations of select topics. Students can’t help but be drawn in and you are fully supported with a variety of resources at your fingertips.

Personal Tutors are embedded and available to students at point-of-use to explain math concepts and help them apply or review lesson material.
Ensure Student Success

Promoting Conceptual Understanding

Performance Tasks are important to helping students learn concepts and skills. Each chapter has a preview of a performance task that will help students understand the concepts as they work through each lesson. Students will be asked to finish the task at the end of the chapter.

Modeling Through Reasoning

Practicing reasoning and modeling is done in the Multi-Step Questions that are incorporated into the Preparing for Assessment page at the end of each lesson. Students can look for structure in different situations in the multi-step questions found throughout each lesson and chapter.

Students will be prepared to be successful on the new kinds of assessments that measure deeper understanding, critical-thinking, and problem-solving skills.
Use precise and customized tests with eAssessment

Using eAssessment makes it easy to create customized assessments for your state’s content standards test practice, schedule homework, receive immediate results, and generate student proficiency reports.

Effectively and immediately provide support to improve achievement for every student.

Solutions with a Click of a Button

eSolutions Manual replaces the traditional solutions manual with a digital version that you can access 24/7 and use to create custom reports. This manual allows for significantly more flexibility than the traditional solutions manual. You can create sets of answers or solutions for your own use or to help students assess their own work.

Using the “view online” feature in class allows you to project on a screen or interactive whiteboard in a presentation style. The questions are displayed one at a time and can be shown in steps to help students work the question as you project it.
Meeting Needs of All Students

Confidently tailor your instruction with comprehensive materials to meet the individual learning needs of every student.

Built-In Differentiated Instruction

*Glencoe’s High School Series* fully supports the 3-tier RtI model with print and digital resources to diagnose students, identify areas of need, and conduct short, frequent assessments for accurate data-driven decision making. Every lesson provides easy-to-use resources that consider the needs of all students.

Comprehensive resources are found throughout the program.

- Teacher Edition with strategies to modify activities and lesson content.
- Multilingual eGlossary with definitions for each vocabulary word in 13 languages
Spark excitement about the impact of math in the real world using these Differentiated Instruction resources:

- Recommendations to personalize instruction for every student.
- Leveled exercise sets, reference resources, and dynamic digital tools.
- Differentiated homework options.
- English Learner and Vocabulary tips throughout each lesson that connect the math meaning to every day meaning.

Using Glencoe High School Math Series’ 3-Tier RTI model to reach every student

**Tier 1**

**On Level**

**IF** students miss 25% of the exercises or less,

**THEN** choose a resource:
- SE Lessons 5.1, 5.2, and 5.3
- Go Online!
  - Skills Practice
  - Chapter Project
  - Self-Check Quizzes

**Tier 2**

**Strategic Intervention**

**IF** students miss 50% of the exercises,

**THEN** choose a resource:
- Quick Review Math Handbook
- Go Online!
  - Study Guide and Intervention
  - Extra Examples
  - Personal Tutors
  - Homework Help

**Tier 3**

**Intensive Intervention**

**IF** students miss 75% of the exercises,

**THEN** choose a resource:
- Use Math Triumphs, Alg. 1
- Go Online!
  - Extra Examples
  - Personal Tutors
  - Homework Help
  - Review Vocabulary

**Using Open Education Resources**

With our ConnectED platform, teachers who have created their own resources are able to upload them into the Glencoe High School Math Series. They can assign them to students or add to their customized Lesson Presentations.

Teachers can reference the OER suggestions in the planning pages before each lesson in their Teacher’s Edition.