Seventh-Grade Mathematics, Part 1 (MATH-031)

Mathematics 7th Grade Math, Part 1 Syllabus

📖 Course Description

7th Grade Math, Part 1 is divided into three units:

1. Our Number System
2. Proportional Reasoning
3. The Geometry of Scale Models

Prerequisites

There are no prerequisites for this course.

Course Materials

There are no textbooks required for this course. All content can be found within the course lesson pages.

Students may use a handheld graphing or scientific calculator or a Desmos online calculator (Desmos scientific calculator or Desmos graphing calculator).

Course Policies

For information about resubmitting assignments, retaking quizzes, how long students are given to complete the course, and other questions, please contact your AK Grad instructor.

◎ Course Outcomes

As students complete the course assignments, they will increase their knowledge, improve a 21st-century skill, and develop an attribute.

Knowledge: 7th Grade Math, Part 1

In this course, *knowledge* refers to the subject matter and content students will learn while completing the readings, practices, quizzes, and assignments.

On successful completion of this course, students will be able to do the following:

1. Extend previous understandings of addition, subtraction, multiplication and division to rational numbers and integers.
2. Analyze proportional relationships and use them to solve real-life applications and mathematical problems.
3. Draw, construct, and describe geometrical shapes.

4. Interpret mathematical results in the context of the situation and reflect on whether the results make sense.

21st-Century Skill: Creativity—Idea Generation

As students complete this course's assignments, they will gain skills in *Idea Generation*. This skill is part of creativity.

Attribute: Diligence

This course focuses on developing the attribute of *diligence* in the context of mathematics.

✏️Grading and Assignments

The letter grade in this course will be based on these assignments and exams.

Grading Scale

Assignment or Exam	Grading	Percent of Total Grade
Topic Assignments	Computer Graded	20%
Application Problems	Teacher Graded	15%
Module Quizzes	Computer Graded	35%
Content Guides	Teacher Graded	10%
Mid-Course Quiz and Final Exam	Computer Graded	20%

Topic Assignments

Each module consists of 3 topics. Most topics have one assignment where students will be asked to demonstrate their knowledge of the content learned from the lesson material. In some modules, there will be an application problems page instead of the third topic. Students will have unlimited attempts on topic assignments.

Content Guides

Every module will have a content guide to help students take notes on the key topics in the lessons. Students will submit them for a grade in Modules 3, 7, 11, and 15. Content guides are graded based on completion, so students will get full points if they have everything filled out.

Application Problems

At the end of some modules, students will have application problems that challenge them to apply what they learned to real-world problems. There are instructions, templates, and a rubric provided to help students be successful in completing this portion of the course. The 21st Century Skill of *Idea Generation* is taught through the completion of these projects as well.

Module Quizzes

At the end of each module, students will take a quiz that covers all topics taught. Module quizzes will allow for two attempts on each question.

Exams

Students will complete these exams during the course.

Mid-Course Quiz: The mid-course quiz is found in Module 8 and covers all of the material learned in Modules 1-7.

Final Exam: The final exam is found in Module 16 and is a comprehensive final that covers all material learned in the course from Modules 1-15.

Final Grade

The letter grade will be calculated according to these percentages.

Grading Scale

Percent to Letter Grade Calculation	
A	100% – 93%
A−	92% – 90%
B+	89% – 87%
B	86% – 83%
B−	82% – 80%
C+	79% – 77%
C	76% – 73%
C−	72% – 70%
D+	69% – 67%
D	66% – 63%
D−	62% – 60%
F (fail)	59% – 0%