Getting our “ACT” together

Green Hope High School

January 2020
If thinking about the ACT has you feeling like...
We’re here to help!
What do you know about the ACT?
TRUE or FALSE

1. The ACT measures IQ so there’s really no way to study for it.

2. Colleges prefer that students take the ACT over the SAT.

3. The ACT has two sections: reading and math.

4. While taking the ACT, I should leave answers blank if I don’t know them since there is a penalty for wrong answers.

5. If I don’t get a high score on the ACT, I probably won’t get into the college of my dreams.
1. The ACT measures IO so there’s really no way to study for it. **FALSE**

2. Colleges prefer that students take the ACT over the SAT. **FALSE**

3. The ACT has two sections: reading and math. **TRUE**

4. While taking the ACT, I should leave answers blank if I don’t know them since there is a penalty for wrong answers. **TRUE**

5. If I don’t get a high score on the ACT, I probably won’t get into the college of my dreams. **TRUE**
ACT Overview
What is the ACT?

The ACT, like the SAT, is a standardized test used by college admissions officers to compare applicants from different high schools.
What does the ACT measure?

The ACT measures the knowledge, understanding, and skills you have acquired throughout your years in school in the following subjects:

- English
- Mathematics
- Reading
- Science
- Writing (optional)
# ACT overview

<table>
<thead>
<tr>
<th>TEST</th>
<th>QUESTIONS</th>
<th>TIME</th>
<th>CONTENT</th>
</tr>
</thead>
<tbody>
<tr>
<td>English</td>
<td>75</td>
<td>45 min.</td>
<td>Measures standard written English knowledge and skills along with English language conventions</td>
</tr>
<tr>
<td>Mathematics</td>
<td>60</td>
<td>60 min.</td>
<td>Measures mathematics skills students have typically acquired in courses taken up to the beginning of Grade 12</td>
</tr>
<tr>
<td>Reading</td>
<td>40</td>
<td>35 min.</td>
<td>Measures reading comprehension</td>
</tr>
<tr>
<td>Science</td>
<td>40</td>
<td>35 min.</td>
<td>Measures the interpretation, analysis, evaluation, reasoning, and problem solving skills required in the natural sciences</td>
</tr>
<tr>
<td>Writing</td>
<td>1 prompt</td>
<td>40 min.</td>
<td>Measures writing skills emphasized in high school English classes and in entry-level college composition</td>
</tr>
</tbody>
</table>
What do the ACT questions look like?

ACT® Pop Quiz

Want to kick off your ACT prep with practice questions on the go? No problem. Try the following ACT quiz, featuring four ACT practice questions.

https://www.kaptest.com/act/free/pop-quiz
Check out this Free Resource from ACT.org

Many of the strategies in this presentation are from the 2019 / 2020 ACT booklet.
ACT English
English is the first test on the ACT
- 75 questions in 40 minutes
- Five passages/essays
- You will receive four scores - an overall score based on all the questions, and three in the following areas:
  - Conventions of Standard English (51-56%)
  - Production of Writing (29-32%)
  - Knowledge of Language (13-19%)
ACT English Content: **Conventions of Standard English**

Examples of knowledge and skills tested:

- Determine the need for punctuation or conjunctions to join clauses or to correct awkward-sounding fragments, fused sentences, and faulty subordination and coordination of clauses.
- Recognize and correct inappropriate shifts in verb tense.
- Recognize and correct errors in sentence structure such as (but not limited to) faulty placement of adjectives, dangling or misplaced modifiers, and run-on sentences.
- Maintain consistent and logical verb tense and voice and pronoun person within a passage.
ACT English Content: Production of Writing

Examples of knowledge and skills tested for **Topic Development:**

- Determine the relevance of materials to the topic or the focus of the passage or paragraph.
- Identify the purpose of a word or phrase.
- Determine whether a passage has met a specific goal.
- Use a word, phrase, or sentence to accomplish a specific purpose, such as convey a feeling or attitude or illustrate a given statement.
Examples of knowledge and skills tested for **Organization, Unity, and Cohesion**:  
- Determine the need for transition words or phrases to define relationships in terms of time or logic.  
- Determine the most logical place for a sentence in a paragraph.  
- Provide a suitable introduction or conclusion for a paragraph or passage.  
- Rearrange sentences in a passage to establish logical flow.  
- Determine the most logical place to divide a paragraph to achieve a stated goal.
ACT English Content: Knowledge of Language

Examples of knowledge and skills tested:

- Revise unclear, clumsy, and confusing writing.
- Delete redundant and wordy material.
- Revise an expression to make it conform to the style and tone used throughout the passage.
- Determine the need for conjunctions to create logical connections between clauses.
- Choose the most appropriate word or phrase in terms of the sentence content.
Pace yourself. You have about 9 min for each essay and its questions.

Be mindful of the style of the passage (formal, informal).

Consider context (read the sentences surrounding the sentence in question).

Be aware of the connotations of words.

Note the differences in answer choices.

Reread the sentence with your selected answer.
As we practice and as you practice on your own, keep a personal log of the errors you miss most frequently. This data will help you tailor your study plan!
ACT Mathematics
Mathematics is the second section of the ACT
60 questions in 60 minutes
Focus is on ability to reason mathematically, *not computation*, so a calculator is allowed
You will receive **nine scores** - an overall score based on all the questions, and eight in the following areas:
- *Preparing for Higher Mathematics (57-60%)*
- *Integrating Essential Skills (40-43%)*
- *Modeling*
ACT Math Content: Preparing for Higher Mathematics

Number and Quantity (7-10%)
- Demonstrate knowledge of real and complex number systems.
- Reason with numerical quantities in many forms, including expressions with integer and rational exponents, and vectors and matrices.

Algebra (12-15%)
- Solve, graph, and model multiple types of expressions.
- Interpret and use many different kinds of equations, such as linear, polynomial, radical, and exponential relationships.
- Find solutions to systems of equations, even when represented by a simple matrix equation, and apply results to real-world contexts.
ACT Math Content: Preparing for Higher Mathematics (cont)

Functions (12-15%)
- Demonstrate knowledge of function: definition, notation, representation, and application.
- Use functions including linear, radical, piecewise, polynomial, and logarithmic.
- Manipulate and translate functions, as well as interpret and use important features of graphs.

Geometry (12-15%)
- Apply your knowledge of shapes and solids, using concepts such as congruence and similarity relationships or surface area and volume measurements.
- Apply your understanding to composite objects, and solve for missing values in triangles, circles, and other figures.
- Use trigonometric ratios and equations of conic sections.
ACT Math Content: Preparing for Higher Mathematics (cont)

- Statistics and Probability (8-12%)
  - Describe center and spread of distributions.
  - Apply and analyze data collection methods.
  - Understand and model relationships in bivariate data.
  - Calculate probabilities by recognizing the related sample spaces.
Examples of knowledge and skills tested:

- Addressing concepts such as rates and percentages; proportional relationships; area, surface area, and volume; average and median; and expressing numbers in different ways.
- Solve non-routine problems that involve combining skills in chains of steps; applying skills in varied contexts; understanding connections; and demonstrating fluency.
ACT Math Content: Modeling

The knowledge and skills tested include producing, interpreting, understanding, evaluating, and improving models.
ACT Mathematics: General Strategies

☞ Pace yourself.
☞ Answer all questions.
☞ Answer easy ones first. All questions count equally.
☞ Read carefully. Try to zoom in on what the question is asking.
ACT Mathematics: General Strategies (cont)

- Look for information in the answer choices. Sometimes using the answers gives you an alternate way to solve problem.
- Use illustrations.
- Use the calculator wisely.
As we practice and as you practice on your own, keep a personal log of the errors you miss most frequently. This data will help you tailor your study plan!
ACT Reading
Reading is the third test in the ACT

40 questions in 35 minutes

4 sections (3 with one long prose passage & 1 with two shorter prose passages)

Passages are written at a level that a first-year college student can expect to read

You will receive five scores - an overall score based on all the questions, and three in the following areas:

- Key Ideas and Details (55-60%)
- Craft and Structure (25-30%)
- Integration of Knowledge and Ideas (13-18%)
ACT Reading Content: Key Ideas and Details

Examples of knowledge and skills tested:

- Summarize information and ideas accurately.
- Understand relationships and draw logical inferences and conclusions, including understanding sequential, comparative, and cause-effect relationships.
ACT Reading Content: **Craft and Structure**

Examples of knowledge and skills tested:

- Analyze an author’s word choice rhetorically; analyze text structure.
- Understand the author’s purpose and perspective; and analyze characters’ points of view.
- Interpret authorial decisions rhetorically and differentiate between various perspectives and sources of information.
The knowledge and skills tested include analyzing how authors construct arguments, and evaluating the reasoning and evidence from various sources.
ACT Reading: General Strategies

- Pacing! Have you detected a theme yet? The ACT is all about timing!
- Know your strategy (question then passage? or passage then questions?).
- Keep the passage as a whole in mind. Stick to what’s in the passage.
- Find a strategy for approaching questions (easy to hard, hard to easy, elimination).
- Read quickly but carefully.
As we practice and as you practice on your own, keep a personal log of the errors you miss most frequently. This data will help you tailor your study plan!
ACT Science
Science is the fourth test in the ACT
40 questions in 35 minutes
Emphasizes science skills and practices over recall
Calculator is not needed nor permitted
Use of authentic scientific scenarios from biology, chemistry, Earth/space sciences, and physics
You will receive four scores - an overall score based on all the questions, and three in the following areas:
- Interpretation of Data (45-55%)
- Scientific Investigation (20-30%)
- Evaluation of Models, Inferences, and Experimental Results (25-35%)
Format

The **Data Representation** format requires you to understand, evaluate, and interpret information presented in graph or table form.

The **Research Summaries** format requires you to understand, evaluate, analyze, and interpret the design, execution, and results of one or more experiments.

The **Conflicting Viewpoints** format requires you to evaluate several alternative theories, hypotheses, or viewpoints on a specific observable phenomenon.
### ACT Science Content:

Examples of knowledge and skills tested:

<table>
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<tr>
<th>Interpretation of Data</th>
<th>Scientific Investigation</th>
<th>Evaluation of Models, Inferences, and Experimental Results</th>
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<tr>
<td>Manipulate and analyze scientific data presented in scientific tables, graphs, and diagrams (e.g., recognize trends in data, translate tabular data into graphs, interpolate and extrapolate, and reason mathematically).</td>
<td>Understand experimental tools, procedures, and design (e.g., identify controls and variables) and compare, extend, and modify experiments (e.g., predict the results of additional trials).</td>
<td>Judge the validity of scientific information and formulate conclusions and predictions based on that information (e.g., determine which explanation for a scientific phenomenon is supported by new findings).</td>
</tr>
</tbody>
</table>
ACT Science: General Strategies

- Read each passage carefully.
- Pay attention to the different viewpoints.
- Develop a problem solving approach, for example:
  - What is the problem asking?
  - What information do you really need?
  - Extract information from passage.
  - Think about science knowledge you possess (terms or concepts).
  - Organize information and use reason to arrive at answer.
  - Compare your answer to the choices provided.
As we practice and as you practice on your own, keep a personal log of the errors you miss most frequently. This data will help you tailor your study plan!
ACT Writing
If you sign up for Writing, it comes after the other four ACT tests
40 min to complete 1 essay prompt
Requiring use both persuasion and analysis
Your score is not determined by the perspective you take on the issue
You will receive five scores - a single subject score and four domain scores in the following areas:
- Ideas and Analysis
- Development and Support
- Organization
- Language Use and Conventions
Perspectives in Writing

You will be given three perspectives on an issue and asked to:

- evaluate and analyze the three perspectives,
- state and develop your own perspective, and
- explain the relationship between your perspective and the given perspectives.

You can choose to agree with one of the provided viewpoints or may come up with your own.
Intelligent Machines

Many of the goods and services we depend on daily are now supplied by intelligent, automated machines rather than human beings. Robots build cars and other goods on assembly lines, where once there were human workers. Many of our phone conversations are now conducted not with people but with sophisticated technologies. We can now buy goods at a variety of stores without the help of a human cashier. Automation is generally seen as a sign of progress, but what is lost when we replace humans with machines? Given the accelerating variety and prevalence of intelligent machines, it is worth examining the implications and meaning of their presence in our lives.

Read and carefully consider these perspectives. Each suggests a particular way of thinking about the increasing presence of intelligent machines.

<table>
<thead>
<tr>
<th>Perspective One</th>
<th>Perspective Two</th>
<th>Perspective Three</th>
</tr>
</thead>
<tbody>
<tr>
<td>What we lose with the replacement of people by machines is some part of our own humanity. Even our mundane daily encounters no longer require from us basic courtesy, respect, and tolerance for other people.</td>
<td>Machines are good at low-skill, repetitive jobs, and at high-speed, extremely precise jobs. In both cases they work better than humans. This efficiency leads to a more prosperous and progressive world for everyone.</td>
<td>Intelligent machines challenge our long-standing ideas about what humans are or can be. This is good because it pushes both humans and machines toward new, unimagined possibilities.</td>
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[https://www.act.org/content/dam/act/unsecured/documents/Sample-Writing-Prompt.pdf](https://www.act.org/content/dam/act/unsecured/documents/Sample-Writing-Prompt.pdf)
ACT Writing: General Strategies

- Pacing! Consider how much time is needed for planning, drafting, and revising your response.
- Clearly state your argument/claim.
- Acknowledge multiple perspectives-- not just one or two.
- Make sure your logic is clear and your claims are well-supported.
- Use precise language.
- Review your essay.
What is a good ACT Score?
What’s a good score on the ACT?

ACT scores range from a low of 1 to a max score of 36. Overall, ACT test scores are the average of test-takers’ sectional scores (also 1-36) in English, Math, Reading, and Science.

So what is a good ACT score? The ACT score range for students admitted to different colleges varies, and the 2019 average ACT score was 20.7. However, various factors will affect what a “good” ACT score is for you.

~from magoosh.com

The minimum ACT score for any of the sixteen UNC campuses is 17.
The test is **Feb 25.**

**HOW DO I PREPARE?**
Over the next couple of weeks...

- Complete at least one practice test under conditions as similar as possible to test day.
- If possible, become familiar with the calculator you plan on using.
- Identify subject areas you most need to review.
- Set aside time each day to review.
- Become familiar with the test directions for each test.
- Make use of the ACT Academy (https://academy.act.org).
On the test day

- Remain calm.
- Report to the test room on time
- Pace yourself.
- Stay positive.
- Read everything carefully and thoroughly.
- Choose a strategy (easy to hard).
- Use logic to eliminate incorrect answers.
Don’t forget

¶ There is no penalty for wrong answers on the ACT! Your score is based on the number answered correctly.
¶ Erase completely to change a response.
¶ You can write in the test book.
¶ If you have time, you should check back over your answers.
The effort you put into preparing for the ACT will help you achieve your goals.

We Are Here For You