

ACCUPLACER Assessment Math (Arithmetic) Practice Test with Links to Khan Academy Instruction

The ACCUPLACER assessment is used by WITC for program admission and course placement. It is important to prepare before taking this assessment so that you get a score that accurately reflects your abilities. The assessment can only be retaken a limited number of times and there is a \$15 retest fee. The following practice test was designed to help you feel prepared and confident to do your best. It was developed by The College Board and has been modified to include links to Khan Academy Instruction that explains the concepts that are being tested for each question.

This practice test was designed to give you a feel of the types of questions you can expect on the ACCUPLACER assessment and provide a quick, convenient refresher on concepts that you may not be completely familiar with. To review most of the arithmetic competencies that are assessed on the ACCUPLACER assessment, follow the following link to the full Khan Academy Arithmetic competencies: <http://www.khanacademy.org/math/arithmetic>

Strategies for preparing for the ACCUPLACER assessment:

- Complete the practice test and follow the links on the questions you get wrong. If you feel good about your results, schedule an ACCUPLACER assessment appointment and meet with a counselor to discuss the results.
- Use the links on the last page of this document to prepare for the concepts on the ACCUPLACER test either before or after completing the practice test. If you feel the online instruction has helped you prepare, consider scheduling an ACCUPLACER assessment appointment and meet with a counselor to discuss the results.
- Visit the Student Success center at any WITC campus to receive free instruction on these topics.

NOTE: In order for the links to work you must sign into Khan Academy. Signing in is free and only requires an e-mail address. If you need assistance signing in to Khan Academy or using the links on this document please visit the Educational Technology Center at any campus.

Arithmetic

This test measures your ability to perform basic arithmetic operations and to solve problems that involve fundamental arithmetic concepts. There are 17 questions on the Arithmetic tests, divided into three types.

- Operations with whole numbers and fractions: Topics included in this category are addition, subtraction, multiplication, division, recognizing equivalent fractions and mixed numbers, and estimating.
- Operations with decimals and percents: Topics include addition, subtraction, multiplication, and division with decimals. Percent problems, recognition of decimals, fraction and percent equivalencies, and problems involving estimation are also given.
- Applications and problem solving: Topics include rate, percent and measurement problems; simple geometry problems; and distribution of a quantity into its fractional parts.

Arithmetic Sample Questions

For each of the questions below, choose the best answer from the four choices given. You may use the paper you received as scratch paper.

1. $2.75 + .003 + .158 =$

- A. 4.36
- B. 2.911
- C. 0.436
- D. 2.938

[Khan Academy Link](#)

2. $7.86 \times 4.6 =$

- A. 36.156
- B. 36.216
- C. 351.56
- D. 361.56

[Khan Academy Link](#)

3. $\frac{7}{20} =$

- A. 0.035
- B. 0.858
- C. 0.35
- D. 3.5

[Khan Academy Link](#)

4. Which of the following is the least?

- A. 0.105
- B. 0.501
- C. 0.015
- D. 0.15

[Khan Academy Link](#)

5. All of the following are ways to write 25 percent of N EXCEPT

- A. $0.25N$
- B. $\frac{25N}{100}$
- C. $\frac{1}{4}N$
- D. $25N$

[Khan Academy Link](#)

6. Which of the following is closest to 27.8×9.6 ?

- A. 280
- B. 300
- C. 2,800
- D. 3,000

[Khan Academy Link](#)

7. A soccer team played 160 games and won 65 percent of them. How many games did it win?

- A. 94
- B. 104
- C. 114
- D. 124

[Khan Academy Link](#)

8. Three people who work full-time are to work together on a project, but their total time on the project is to be equivalent to that of only one person working full-time. If one of the people is budgeted for one-half of his time to the project and a second person for one-third of her time, what part of the third worker's time should be budgeted to this project?

A. $\frac{1}{3}$
B. $\frac{3}{5}$
C. $\frac{1}{6}$
D. $\frac{1}{8}$

[Khan Academy Link](#)

9. 32 is 40 percent of what number?

A. 12.8
B. 128
C. 80
D. 800

[Khan Academy Link](#)

10. $3\frac{1}{3} - 2\frac{2}{5} =$

A. $1\frac{1}{2}$
B. $\frac{1}{15}$
C. $\frac{14}{15}$
D. $1\frac{1}{15}$

[Khan Academy Link](#)

11. $2\frac{1}{2} + 4\frac{2}{3} =$

A. $6\frac{1}{6}$
B. $6\frac{5}{6}$
C. $7\frac{1}{6}$
D. $7\frac{5}{6}$

[Khan Academy Link](#)

12. What is $\frac{1,345}{99}$ rounded to the nearest integer?

A. 12
B. 13
C. 14
D. 15

[Khan Academy Link](#)

13. Three of four numbers have a sum of 22. If the average of the four numbers is 8, what is the fourth number?

A. 4
B. 6
C. 8
D. 10

[Khan Academy Link](#)

14. $46.2 \times 10^{-2} =$

A. 0.0462
B. 0.462
C. 4.62
D. 462

[Khan Academy Link](#)

15. If $\frac{3}{2} \div \frac{1}{4} = n$, then n is between

A. 1 and 3
B. 3 and 5
C. 5 and 7
D. 7 and 9

[Khan Academy Link](#)

16. What is 12% of 120?

A. 10
B. 14.4
C. 18.4
D. 28.8

[Khan Academy](#)

17. A box in a college bookstore contains books, and each book in the box is a history book, an English book or a science book. If one-third of these books are history books and one-sixth are English books, what fraction of the books are science books?

A. $\frac{1}{3}$
B. $\frac{1}{2}$
C. $\frac{2}{3}$
D. $\frac{3}{4}$

[Khan Academy Link](#)

18. The measures of two angles of a triangle are 35° and 45° . What is the measure of the third angle of the triangle?

A. 95°
B. 100°
C. 105°
D. 110°

[Khan Academy Link](#)

19. Erica bought $3\frac{1}{2}$ yards of fabric. If she uses $\frac{2}{3}$ of the fabric to make a curtain, how much will she have left?

A. $\frac{1}{6}$ yd.

B. $\frac{1}{3}$ yd.

[Khan Academy Link](#)

C. $1\frac{1}{6}$ yd.

D. $2\frac{1}{3}$ yd.

20. Jen wants to tile the floor of her kitchen. The floor is rectangular and measures 12 feet by 8 feet. If it costs \$2.50 per square foot for the materials, what is the total cost of the materials for tiling the kitchen floor?

A. \$160

B. \$200

C. \$220

D. \$240

[Khan Academy Link](#)

Links to Khan Academy major topics covered on the ACCUPLACER Math (Arithmetic) Assessment:

<http://www.khanacademy.org/math/arithmetic>