KINGSTON CITY SCHOOLS - SUMMER 2020 Gr 7 Accelerated Mathematics Review

Dear Students,

Congratulations! You've completed a very interesting school year...a first for us all. With that said, we understand that with this interesting year came some challenges to "learning" the mathematics we planned to teach to prepare you for success in the years ahead. We would like to continue to support you by recommending you take some time over the summer to log into IXL and work to master our 7th grade Accelerated curriculum as well as take some time to improve your knowledge base, wherever you are at this time. Below is a recommendation for keeping skills fresh for a strong start as 8th grade Algebra students!

LOG INTO IXL thru Clever (Otherwise, IXL.com username 6digitID@kingstoncsd password initials12345)



Here, you can see a list of all our NY State standards accompanied by the IXL skill that you can work on to master the concepts within that standard. Some of these skills were assigned this school year but revisiting them is a great way to refresh your memory of all the concepts covered throughout accelerated grade 7.

In addition to practicing skills listed with our state standards, another way to prepare yourself for moving on is using IXL's DIAGNOSTIC TOOL. Using this tool provides IXL with data that will generate a personalized set of skills you can work on to improve your math level, no matter where you are presently.



Math 7 Accelerated IXL Skills Review



Students are welcome to practice any 7th or 8th grade math skills. We suggest a focus the skills we've listed below. For tutorials to support your understanding of any of these skills, copy and paste the skill name into a Khan Academy search. We understand this list appears lengthy. After all, we have accomplished a lot this year! Our goal for sharing this information, is simply to supply you with a reliable resource for accessing review, as needed. Know that by addressing any of these practice recommendations, you are doing so for your own well-being and confidence for entering Algebra. We wish you a summer filled with much needed re-connection with your family and friends and look forward to seeing you very soon.

Go to Grade 8 Math on IXL and look for these skills

C. Operations with integers

- C1. Integer addition and subtraction rules
- C2. Add and subtract integers using counters
- C3. Add and subtract integers
- C4. Add and subtract three or more integers
- C5. Add and subtract integers: word problems
- C6. Integer multiplication and division rules
- C7. Multiply and divide integers
- C8. Evaluate numerical expressions involving integers

V. Expressions and properties

- V1. Write variable expressions: one operation
- V2. Write variable expressions: two or three operations
- V3. Write variable expressions from diagrams
- V4. Write variable expressions: word problems
- V5. Evaluate one-variable expressions
- V6. Evaluate multi-variable expressions
- V7. Evaluate absolute value expressions
- V8. Evaluate radical expressions
- V9. Evaluate rational expressions
- V10. Identify terms and coefficients
- V11. Sort factors of variable expressions
- V12. Properties of addition and multiplication
- V13. Multiply using the distributive property
- V14. Write equivalent expressions using properties
- V15. Add and subtract like terms
- V16. Add and subtract linear expressions
- V17. Factors of linear expressions
- V18. Identify equivalent linear expressions I
- V19. Identify equivalent linear expressions II
- V20. Identify equivalent linear expressions: word problems

W. One-variable equations

- W1. Which x satisfies an equation?
- W2. Write an equation from words
- W3. Model and solve equations using algebra tiles
- W4. Write and solve equations that represent diagrams
- W5. Properties of equality
- W6. Identify equivalent equations
- W7. Solve one-step equations
- W8. Solve two-step equations
- W9. Solve multi-step equations
- W10. Solve equations involving like terms
- W11. Solve equations with variables on both sides
- W12. Solve equations: mixed review

F. Exponents and roots

- F1. Understanding exponents
- F2. Evaluate exponents
- F3. Solve equations with variable exponents
- F4. Exponents with negative bases
- F5. Exponents with decimal and fractional bases
- F6. Understanding negative exponents
- F7. Evaluate negative exponents
- F8. Multiplication with exponents
- F9. <u>Division with exponents</u>
- F10. Multiplication and division with exponents
- F11. Power rule
- F12. Evaluate expressions using properties of exponents
- F13. Identify equivalent expressions involving exponents I
- F14. Identify equivalent expressions involving exponents II
- F15. Square roots of perfect squares

New! Estimate positive square roots

- F19. Solve equations using square roots
- F20. Cube roots of positive perfect cubes