2021 – 2022 8th grade supply list

2 boxes of tissues
2 pks Lysol/ Clorox Wipes
Small pencil sharpener
Pens (blue/black/red/green)
Pencils and erasers
Colored pencils or crayons (12 pack)
Glue sticks
1 roll of paper towels
Highlighters
Scissors
Headphones or earbuds
1 package of white computer paper

Theology

1 pocket folder
1 pks Lysol Wipes
1 boxes of tissues

Science

2-subject notebook
3 double pocket folders
Metric/inch ruler
2 rolls of masking tape
Calculator
1 package of white computer paper

Math

Medium Loose Leaf Notebook
TI 84 graphing calculator
Folder

Social Studies

1 subject notebook
Double pocket folder

Spanish:

2-pocket folder

ELA:

2 Double pocket folders
2 Composition books marble (please no spiral notebooks)
Non-clicking pens (basic ballpoint pens with caps)
Mini-stapler w/staples
To Kill A Mockingbird by Harper Lee paperback novel (Harper Perennial January 1, 2002)
Death of a Salesman by Arthur Miller paperback (Penguin plays January 1, 1976)

Supply List for Art:

grades k- 2:
box of 12 or more crayons (non washable)
3 glue sticks
1 watercolor paint set & brushes
1 box markers
scissors

grades 3-8:
sharpies- 2 black plus basic 4 pack or larger
3 glue sticks
1 watercolor paint set & brushes
1 box markers
scissors
colored pencils

ELA Summer Reading for the Incoming 8th Graders

This summer you shall read Gary D. Schmidt's follow-up to The Wednesday Wars...

Okay for Now

You will need a **composition notebook** to keep a journal of **15 minutes of reading per night** over the summer. You will briefly write about what you'd read (7 - 10 sentences minimum), and one of your parents MUST sign off on every night's reading.

Each entry must be dated, signed by a parent, and thoughtfully written.

Any unfamiliar vocabulary that you come across must be jotted down under your nightly summary and the definition must be LOOKED UP and written out as well!

Here is the link for the novel on Amazon:
https://www.amazon.com/dp/0544022807/ref=emc_b_5_i

Have a fantastic summer and see you all in September!

- Mr. Henrickson

Name:_____

Math Summer Work 2021

Incoming 8th Graders

Hello Students and Family,

Attached you will find a Summer Math Packet that will provide practice and enrichment reviewing important Math concepts from 7th grade. Next year, we will build on all of the foundational skills that we learned.

I know you have been working hard and you are well prepared to begin 8th grade. It is very important that you practice using math every day!

I do not recommend that you complete this entire packet in one sitting. You should set a target and complete some problems each week during the course of the summer, with your goal to have the entire packet completed by the end of the first week of school in September.

This review will help you keep your skills sharp over the summer.

Sincerely,

Mrs. Rogers

Algebra Diagnostic Pre-Test

50 questions -- 60 minutes

Multiple Choice

Use the answer "NOTA" (which stands for None Of The Above) if the answer is not listed

1. Evaluate $7m + 3mn$ when $m = 8$ and $n = 14$

   A) 84 B) 196 C) 392 D) 168 E) NOTA

2. Simplify: $675 \div (6 + 9 \div 3)$

   A) 15 B) 9 C) 75 D) 225 E) 135

3. $(4x^2y^3)^2 =$

   A) $8x^4y^5$ B) $16x^4y^5$ C) $4x^4y^6$

   D) $16x^2y^3$ E) NOTA

4. $(3x - 2)(4x + 1) =$

   A) $12x^2 - 8x - 2$ B) $12x^2 + 5x - 2$ C) $x^2 - 5x - 2$

   D) $12x^2 - 5x - 2$ E) NOTA

5. $(4xy^2)^{-3} =$

   A) $-64x^3y^6$ B) $\frac{1}{4x^3y^6}$ C) $\frac{1}{64x^3y^6}$

   D) $-\frac{4}{x^3y^6}$ E) NOTA

6. $(x - 4)(x + 4) =$

   A) $x^2 - 16$ B) $x^2 + 16$ C) $x^2 - 8x + 16$

   D) $x^2 + 8x + 16$ E) NOTA

7. Find the equation that best represents the following word problem:
In a certain freshman class, the number of girls is 83 less than twice the number of boys (b). The total number of students in that freshman class is 259. How many boys and girls are in that class?

A) $b + 2b = 259 - 83$ B) $b + 2b - 83 = 259$

C) $b + 83 - 2b = 259$ D) $b + 2b = 259$

E) NOTA

8. Factor: $6x^2 - 13x - 5$

A) $(6x + 5)(x - 1)$ B) $(3x + 1)(2x - 5)$

C) $(6x - 1)(x + 5)$ D) $(2x - 1)(3x + 5)$ E) NOTA

9. Which one of the following equals a negative number?

A) $(-5) + 9$
B) $(-9) + 5$
C) $9 + 5$
D) $5 + (-9) + 4$
E) $9 - (-5)$

10. Solve the system of equations: $3x + 4y = 11$
$x - 2y = -3$

A) $x = 1 \quad y = 2$
B) $x = -1 \quad y = \frac{3}{4}$
C) $x = 2 \quad y = -3$
D) $x = 1 \quad y = -2$
E) NOTA

11. Factor: $25x^2 - 16y^2$

A) $(5x - 4y)^2$ B) $5(5x - 4y)$ C) $(5x + 4y)(5x - 4y)$

D) $(5x + 2y)(5x - 8y)$ E) NOTA

12. Solve: $2x^2 + 5x - 3 = 0$

A) 3, 2 B) $-3, \frac{1}{2}$ C) $\frac{3}{2}, 1$ D) $3, \frac{1}{2}$ E) NOTA

13. If $\begin{cases} 3x + y = 10 \\ x - 4y = -1 \end{cases}$ then $y =$

A) 1 B) 3 C) -2 D) $\frac{7}{13}$ E) -1

14. Solve: $\frac{1}{3}y + 28 = -5$

A) -11 B) 11 C) 99 D) 96 E) NOTA

15. Solve: $3x + 17 - 5x = 12 - (6x + 3)$

A)2 B) 4 C) 0 D) -4 E) NOTA

16. You and three friends are eating a pizza with 12 pieces. Each person eats the same number of pieces. Let x represent the number of pieces each person eats. Which of the following equations is an algebraic model for the situation?

A) $3x = 12$ B) $\frac{1}{3}x = 12$ C) $4x = 12$

D) $\frac{1}{4}x = 12$ E) NOTA

17. $(3x + 4)^2 =$

A) $9x^2 + 12x + 16$ B) $9x^2 + 16$ C) $9x^2 + 24x + 16$

D) $9x + 16$ E) $25x^2$

18. Solve: $3x(x-4)(3x+5)=0$

A) $4, -\frac{5}{3}$ B) $-4, -\frac{5}{3}, 3, 0$ C) $-\frac{5}{3}, 4, 0$

D) 4, –5, 0 E) NOTA

19. One of the solutions of the equation: $3x^2 + 11x = 4$ is

A) 0 B) $-\frac{11}{3}$ C) 4 D) $\frac{1}{3}$ E) NOTA

20. Simplify: $(3cd^6)^3(cd)^4$

A) $27c^7d^{10}$ B) $27c^7d^{13}$ C) $9c^7d^{22}$

D) $27c^{12}d^{72}$ E) $27c^7d^{22}$

21. Simplify: $(4c^4 + 1) - (7c^3 - 3) + (2c^4 + 5c^3)$

A) $6c^4 + 2c^3 - 4$ B) $6c^4 - 2c^3 + 4$ C) $6c^4 - 2c^3 - 2$

D) $2c^4 - 2c^3 - 2$ E) $4c + 4$

22. The number ten is raised to a power between 0 and 1. The answer has to be between which two numbers?

A) 0 and 1
B) 1 and 10
C) 10 and 100 but not 5
D) 0 and 100 but not 50
E) – 10 and 0

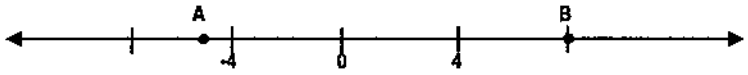
23. Which of the following is the least?

A) .27 B) $\frac{1}{4}$ C) $\frac{3}{8}$ D) $\frac{2}{11}$ E) 11%

24. If $x = 2$ and $y = -3$, then $-xy^2 =$

A) −36 B) −18 C) −12 D) 12 E) 18

25. Which is closest to the distance between A and B on the number line?



A) -9 B) -5 C) 13 D) 5 E) 12

26. Define $p \sim q$ by the equation $p \sim q = p^2q^3 - 3q$. Then $2 \sim 3 =$

A) 108 B) 27 C) 99 D) 117 E) 89

27. If $7x + 4 = -19 + 5x$, then $2x - 14$ equals

A) 23 B) -23 C) -3 D) 16 E) NOTA

28. Which of the following best describes the circled part of the statement?

$$\boxed{7x + 9} = 40$$

A) Coefficient
B) Variable
C) Term
D) Expression
E) Solution

29. Solve for x:

$5x - 10 = 2 - 2x + 10(x - 3)$

A) 6 B) 3 C) - 3 D) - 14 E) NOTA

30. Solve for r: $A = p + prt$

A) $\frac{A}{1+tp}$ B) $t(A-p)$ C) $\frac{A-p}{pt}$

D) $\frac{pt}{A-p}$ E) NOTA

31. One factor of $5x^2 - 3x - 2$ is

A) 5x+2 B) 5x-2 C) x+1 D) 5x+1 E) 5x-1

32. Write the answer in proper scientific notation: $(7 \times 10^5) \times (3 \times 10^4)$

A) 21×10^9 B) 21×10^{20} C) 2.1×10^8

D) 2.1×10^7 E) NOTA

33. Factor: $8a^2 - 17a + 2$

A) $(2a-2)(4a-1)$ B) $a(8a-17)+2$ C) $(8a-2)(a-1)$

D) $(8a+1)(a-2)$ E) $(8a-1)(a-2)$

34. Find a possible middle term to make this polynomial factorable:

$x^2 +$ _____ $+ 20$

A) 12x B) 13x C) 7x D) 3x E) -10x

35. $\frac{x^2y^6z^3}{x^2y^2} =$

A) y^4 B) y^4z^3 C) z^3 D) xyz E) y^6z^3

36. $(y^2 + 2y - 3) - (4y^2 - 5y - 2) =$

A) $-3y^2 - 9y + 5$ B) $-3y^2 - 9y + 1$ C) $-3y^2 - y + 5$

D) $-3y^2 + y - 5$ E) $-3y^2 + 7y - 1$

37. The solutions of the equation $2x^2 - 6x - 8 = 0$ are:

A) -4 and 1 B) $2, 4$ and -1 C) -2 and $\frac{1}{2}$

D) $\frac{-1}{2}$ and 2 E) -1 and 4

38. Find the x-coordinate of the system:

$3x + 3y = 4$
$x - 3y = 1$

A) $\frac{6}{5}$ B) $\frac{1}{3}$ C) 1 D) $\frac{5}{4}$ E) $\frac{5}{3}$

39. Find the slope of the line that passes through $(4, 7)$ and $(1, 3)$

A) $\frac{-4}{3}$ B) $\frac{-3}{4}$ C) $\frac{3}{4}$ D) $\frac{4}{3}$ E) 2

40. Find the slope and y-intercept of the line whose equation is $y = -\frac{3}{2}x + 4$

A) slope $= 2$, y-int $= \frac{3}{2}$ B) slope $= -\frac{3}{2}$, y-int $= 4$

C) slope $= 2$, y-int $= -3$ D) slope $= -2$, y-int $= \frac{3}{2}$

E) slope $= \frac{3}{2}$, y-int $= -2$

41. Find the equation of the line containing the point (–3, 5) and having slope: 4

A) $y = 4x - 7$ B) $y = 4x$ C) $y = -4x - 24$

D) $y = 4x + 17$ E) NOTA

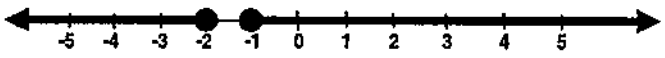
42. Solve: $4x + 5 \leq 3 + 6x$

A) $x \leq -4$ B) $x \geq 1$ C) $x \leq 4$

D) $x \geq -4$ E) $x \geq 4$

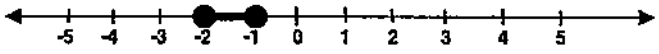
43. Which of the following graphs represents the solution of $|2x+3| \geq 1$

A) 

B) 

C) 

D) 

E) 

44. The solutions to $x^2 + 2x - 12 = -12$ are:

A) 0, – 2 B) –4, 6 C) –6, 4 D) 12, 2 E) NOTA

45. $\frac{x^2-5x}{x^2-25}=$

A) $\frac{x}{5}$ B) $\frac{-x}{5}$ C) $\frac{x}{x-25}$

D) $\frac{x}{x-5}$ E) $\frac{x}{x+5}$

46. Which pair of lines represent graphs that are perpendicular?

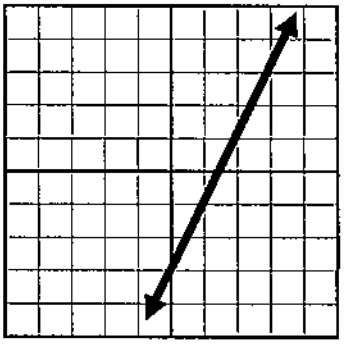
A) $y = -3x + 7$, $y = -3x + 2$ B) $y = 5x + 5$, $y = 10x + 5$ C) $2y = 4x - 16$, $y = 2x - 8$

D) $y = 9$, $x = 5$ E) $y = x$, $y = 3$

47. The graph of $x - 4y + 8 = 0$ crosses the y-axis at

A) -8 B) -2 C) 0 D) 2 E) 8

48. Which equation is graphed to the right?



A) $x + y = 2$ B) $2x - y = 3$ C) $2x + y = 3$

D) $2x - y = 5$ E) $3x + y = 2$

49. What is the first step to solving this problem:

$3x - 10 = 2(x + 3)$

A) add 10 to both sides of the equation
B) subtract 3 from both sides of the equation
C) distribute the 2 on the right side
D) divide by 3 on both sides of the equation
E) NOTA

50. A boy is mowing a rectangular lawn 40 ft. long and 30 ft. wide. He has cut all of it except for a rectangle that is 20 ft. long and 15 ft. wide. What fractional part of the lawn remains uncut?

A) $\frac{1}{4}$ B) $\frac{2}{5}$ C) $\frac{3}{125}$ D) $\frac{3}{4}$ E) NOTA