TEST NAME: CFA \#2 Review (Calculator Inactive) TEST ID: 3496290<br>GRADE: 07 - Seventh Grade<br>SUBJECT: Mathematics<br>TEST CATEGORY:School Assessment

## 01/13/20, CFA \#2 Review (Calculator Inactive)

Student:
Class:
Date:

1. What is the value of $x$ if $5 x+55=35$ ?

A $\quad 20$
B. -4
C. 18
D. 90
2. What value of $\boldsymbol{x}$ makes the equation $6 x+12=42$ true?

A 2
B. 5
C. 8
D. 9
3. What is the value of $\boldsymbol{x}$ in the equation $24-2 x=16$ ?

A 4
B. 8
C. 12
D. 20
4. Solve for $\boldsymbol{x}$ : $-15+3 x=7$

A $-2 \frac{2}{3}$
B. $-\frac{7}{12}$
C. $2 \frac{2}{3}$
D. $7 \frac{1}{3}$
5. Which value for $\boldsymbol{x}$ satisfies the equation $3 x-6=15$ ?

A 3
B. 7
C. 18
D. 27
6. What are all the values of $\boldsymbol{x}$ that make the inequality $8-3 x<20$ true?

A $\quad x>-4$
B. $x>15$
C. $x<-4$
D. $x<15$
7. If $3 x+4 \leq-11$, what is the solution for $\boldsymbol{x}$ ?

A $x \geq-5$
B. $x \leq-5$
C. $x \geq-18$
D. $x \leq-18$
8. What is the solution for $\boldsymbol{x}$ if $-4 x+6>10$ ?

A $x<8$
B. $x>8$
C. $x<-1$
D. $x>-1$
9. If $7-2 x \geq 15$, what is the solution for $\boldsymbol{x}$ ?

A $x \geq 10$
B. $x \geq-4$
C. $x \leq 10$
D. $x \leq-4$
10. What are all possible values of $\boldsymbol{x}$ if

$$
\frac{2}{3} x+3>9 \text { ? }
$$

A
B.
C.
D.

$$
\begin{gathered}
x>4 \\
x>8 \\
x>9 \\
x>18
\end{gathered}
$$

11. If Andrea does 5 more hours of community service, she will have at least the $\mathbf{1 2}$ hours of service required by her school. This can be represented by the inequality below, where $x$ stands for the number of hours of community service that Andrea has already done.

$$
x+5 \geq 12
$$

Which number line BEST represents all values of $x$ that satisfy this inequality?
A.

C.

D.

12. Which of the following number lines represents the solution to the inequality $2 x+2 \geq 10$ ?

A

B.

C.

D.

13. If $3 m+1>7$, what is one possible value for $\boldsymbol{m}$ ?
A. 3
B. 2
C. 1
D. 0
14. In the image below, $\angle E F G$ is a right angle.


What is the value of $x$ ?
A 78
B. 72
C. 42
D. 36
15. In the figure below, $\angle P Q R$ and $\angle T Q S$ are vertical angles.


What is the value of $x$ ?
A 16
B. 32
C. 48
D. 66
16. Two lines intersect in the figure below.


What is the value of $x$ ?
A 17
B. 20
C. 24
D. 89
17. What is the value of $x$ in the figure below?


A 27
B. 30
C. 32
D. 95
18. Two lines intersect creating angles with the measures shown below.


What is the value of $x$ ?
A 13
B. 19
C. 26
D. 52
19. In the figure below, line $E H$ and line segment $F J$ are perpendicular.


What is the value of $x$ ?
A 13
B. 15
C. 17
D. 19
20. Line $S T$ is perpendicular to line $P R$.


What is the measure of $\angle S Q U$ ?
A $32^{\circ}$
B. $58^{\circ}$
C. $90^{\circ}$
D. $148^{\circ}$

