

**CHAPTER**  
**7** **Quiz**  
**Section B**

Select the best answer.

1. Solve  $4^{x-4} = 0.5^{5-2x}$ .

- A  $x = 1$   
 B  $x = 2$   
 C  $x = 3$   
 D There is no solution.

2. Solve  $5^{2x} = 20$ .

- F  $\frac{\log 10}{\log 25}$       H  $\frac{\log 20}{\log 10}$   
 G  $\frac{\log 20}{\log 25}$       J  $\frac{2\log 20}{\log 5}$

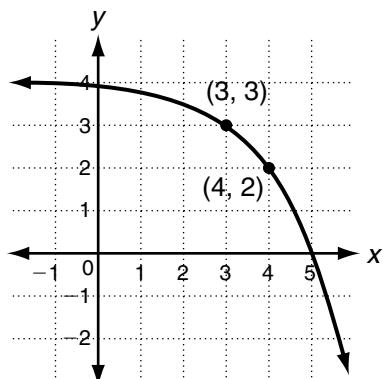
3. What is the sum of the solutions of the equation  $\log_2(x+2) + \log_2(3-x) = 2$ ?

- A -1      C 1  
 B 0      D 2

4. Which of the following is equal to  $2e^{2\ln 4} - \ln e^8$ ?

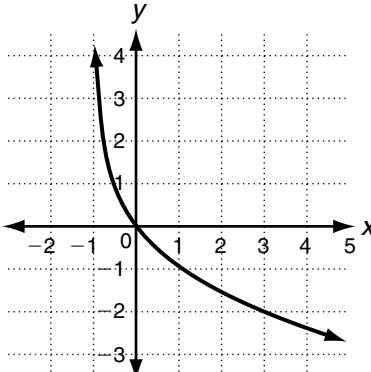
- F 8      H 24  
 G 16      J 32

5. What could be the function shown in the graph?



- A  $a(x) = \log_2(x-5) + 2$   
 B  $b(x) = -2^{x-3} + 4$   
 C  $c(x) = \log_2(5-x) + 2$   
 D  $d(x) = 2^{3-x} + 4$

6. What could be the function shown in the graph?



- F  $f(x) = -\log_2(x+1)$   
 G  $g(x) = 2^{1-x} - 2$   
 H  $h(x) = -\log_2(x) - 1$   
 J  $j(x) = 2^{2-x} - 1$

7. If the data below is from an exponential function, what is the value of  $a$ ?

<b>x</b>	2	3	<b>a</b>
<b>y</b>	4	6	13.5

- A 4      C 6  
 B 5      D 7

8. What is the y-intercept of the function  $f(x) = e^x + 7$ ?

- F  $\ln(-7)$   
 G 7  
 H 8  
 J  $e + 7$

9. The data below is from an exponential function. What is the value of the constant ratio?

<b>x</b>	-2	0	2	4	6
<b>y</b>	$\frac{1}{3}$	1	3	9	27

- A -3  
 B -2  
 C 2  
 D 3

## **Answer Key** continued

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**22.** F

**23.** D

**24.** H

**25.** A

**26.** J

**27.** D

**28.** F

**29.** C

**30.** G

**31.** C

**32.** G

**33.** B

**34.** F

**35.** D

**36.** J

**37.** B

**38.** H

**39.** A

**40.** J

**41.** A

**42.** G

**43.** C

**44.** F

## **CHAPTER 7**

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### **Section Quiz: Section A**

**1.** C

**2.** F

**3.** D

**4.** J

**5.** D

**6.** H

**7.** C

**8.** J

**9.** C

**10.** J

**11.** B

**12.** F

**13.** A

**14.** G

### **Section Quiz: Section B**

**1.** D

**2.** G

**3.** C

**4.** H

**5.** B

**6.** F

**7.** B

**8.** H

**9.** D

### **Chapter Test Form A**

**1.** A

**2.** A

**3.** B

**4.** B

**5.** A

**6.** D

**7.** B

**8.** B

**9.** B

**10.** D

**11.** A

**12.** A

**13.** A

**14.** B