

PREVIEW

CLOSE

Quiz: Evaluating Exponential Functions

Question 1a of 15 (3 Evaluating Exponential Functions 92055)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 16, 16/1

Question: Use the function below to find $F(4)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 2^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 16.

Question 1b of 15 (3 Evaluating Exponential Functions 296530)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 81, 81/1

Question: Use the function below to find $F(4)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 3^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 81.

Question 1c of 15 (3 Evaluating Exponential Functions 296531)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 27, 27/1

Question: Use the function below to find $F(3)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 3^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 27.

Question 2a of 15 (3 Evaluating Exponential Functions 92056)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 64, 64/1

Question: Use the function below to find $F(6)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 2^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 64.

Question 2b of 15 (3 Evaluating Exponential Functions 296532)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 32, 32/1

Question: Use the function below to find $F(5)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 2^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 32.

Question 2c of 15 (3 Evaluating Exponential Functions 296533)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 64, 64/1

Question: Use the function below to find $F(3)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 4^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 64.

Question 3a of 15 (3 Evaluating Exponential Functions 92057)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 729/7, 104 1/7, 104-1/7, 104 & 1/7, 104 and 1/7, 104+1/7

Question: Use the function below to find $F(6)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = \frac{1}{7} \cdot 3^x$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 729/7.

Question 3b of 15 (3 Evaluating Exponential Functions 296534)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 243/7, 34 5/7, 34-5/7, 34 & 5/7, 34 and 5/7, 34+5/7

Question: Use the function below to find $F(5)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = \frac{1}{7} \cdot 3^x$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 243/7.

Question 3c of 15 (3 Evaluating Exponential Functions 296535)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 2187/7, 312 3/7, 312-3/7, 312 & 3/7, 312 and 3/7, 312+3/7

Question: Use the function below to find $F(7)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = \frac{1}{7} \cdot 3^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2187/7.

Question 4a of 15 (3 Evaluating Exponential Functions 92058)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 16/3, 5 1/3, 5-1/3, 5 & 1/3, 5 and 1/3, 5+1/3

Question: Use the function below to find $F(2)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = \frac{1}{3} \cdot 4^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 16/3.

Question 4b of 15 (3 Evaluating Exponential Functions 296536)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 64/3, 21 1/3, 21-1/3, 21 & 1/3, 21 and 1/3, 21+1/3

Question: Use the function below to find $F(3)$. Use the slash (/) to enter fractions

if necessary.

$$F(x) = \frac{1}{3} \cdot 4^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 64/3.

Question 4c of 15 (3 Evaluating Exponential Functions 296537)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 256/3, 85 1/3, 85-1/3, 85 & 1/3, 85 and 1/3, 85+1/3

Question: Use the function below to find $F(4)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = \frac{1}{3} \cdot 4^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 256/3.

Question 5a of 15 (3 Evaluating Exponential Functions 92059)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 7/6561

Question: Use the function below to find $F(4)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 7 \cdot \left(\frac{1}{9}\right)^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 7/6561.

Question 5b of 15 (3 Evaluating Exponential Functions 296538)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 7/729

Question: Use the function below to find $F(3)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 7 \cdot \left(\frac{1}{9}\right)^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 7/729.

Question 5c of 15 (3 Evaluating Exponential Functions 296539)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 7/59049

Question: Use the function below to find $F(5)$. Use the slash (/) to enter fractions

if necessary.

$$F(x) = 7 \cdot \left(\frac{1}{9}\right)^x$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 7/59049.

Question 6a of 15 (3 Evaluating Exponential Functions 92060)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 5/7, 35/49

Question: Use the function below to find $F(2)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 35 \cdot \left(\frac{1}{7}\right)^x$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 5/7.

Question 6b of 15 (3 Evaluating Exponential Functions 296540)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 5/49, 35/343

Question: Use the function below to find $F(3)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 35 \cdot \left(\frac{1}{7}\right)^x$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 5/49.

Question 6c of 15 (3 Evaluating Exponential Functions 296541)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 5/343, 35/2401

Question: Use the function below to find $F(4)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 35 \cdot \left(\frac{1}{7}\right)^x$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 5/343.

Question 7a of 15 (3 Evaluating Exponential Functions 296529)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 125, 125/1

Question: Use the function below to find $F(3)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 5^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 125.

Question 7b of 15 (3 Evaluating Exponential Functions 296542)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 243, 243/1

Question: Use the function below to find $F(5)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 3^x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 243.

Question 7c of 15 (3 Evaluating Exponential Functions 296543)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 625, 625/1

Question: Use the function below to find $F(4)$. Use the slash (/) to enter fractions if necessary.

$$F(x) = 5^x$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 625.

Question 8a of 15 (3 Evaluating Exponential Functions 119534)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 1/4, 0.25, .25

Question: Use the function below to find $F(1)$. Use the slash (/) to enter fractions if necessary.

$$F(t) = 2 \cdot \frac{1}{2^{3t}}$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 1/4.

Question 8b of 15 (3 Evaluating Exponential Functions 296544)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 1/2, 0.5, .5

Question: Use the function below to find $F(1)$. Use the slash (/) to enter fractions if necessary.

$$F(t) = 4 \cdot \frac{1}{2^{3t}}$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 1/2.

Question 8c of 15 (3 Evaluating Exponential Functions 296545)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: 0.125, 1/8, .125

Question: Use the function below to find $F(2)$. Use the slash (/) to enter fractions if necessary.

$$F(t) = 2 \cdot \frac{1}{2^{3t}}$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 1/8.

Question 9a of 15 (1 Evaluating Exponential Functions 119536)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: Increasing the number of times an investment is compounded in a year does *not* affect the dollar amount in the account.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 9b of 15 (1 Evaluating Exponential Functions 296546)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: Increasing the number of times an investment is compounded in a year affects the dollar amount in the account.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 9c of 15 (1 Evaluating Exponential Functions 296547)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: Decreasing the number of times an investment is compounded in a year does *not* affect the dollar amount in the account.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 10a of 15 (1 Evaluating Exponential Functions 119539)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: An exponential *growth* function represents a quantity that has a constant doubling time.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 10b of 15 (1 Evaluating Exponential Functions 296548)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: An exponential *growth* function represents a quantity that has a constant halving time.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 10c of 15 (1 Evaluating Exponential Functions 296549)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: An exponential *growth* function represents a quantity that has an increasing doubling time.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 11a of 15 (1 Evaluating Exponential Functions 119540)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: An exponential *decay* function represents a quantity that has a constant doubling time.

	Choice	Feedback
A.	True	

*B.	False
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Global Incorrect Feedback
The correct answer is: False.

Question 11b of 15 (1 Evaluating Exponential Functions 296550)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: An exponential *decay* function represents a quantity that has a decreasing halving time.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback
The correct answer is: False.

Question 11c of 15 (1 Evaluating Exponential Functions 296551)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: An exponential *decay* function represents a quantity that has a constant halving time.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback
The correct answer is: True.

Question 12a of 15 (1 Evaluating Exponential Functions 119785)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: An exponential function is written as $F(x) = a \cdot b^x$, where the coefficient a is a constant, the base b is _____ but not equal to 1, and the exponent x is any number.

	Choice	Feedback
A.	real	
B.	negative	
C.	an integer	
*D.	positive	

Global Incorrect Feedback

The correct answer is: positive.

Question 12b of 15 (1 Evaluating Exponential Functions 296552)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: An exponential function is written as $F(x) = a \cdot b^x$, where the coefficient a is _____, the base b is positive but not equal to 1, and the exponent x is any number.

	Choice	Feedback
*A.	a constant	
B.	an integer	
C.	an exponent	
D.	a variable	

Global Incorrect Feedback

The correct answer is: a constant.

Question 12c of 15 (1 Evaluating Exponential Functions 296553)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: An exponential function is written as $F(x) = a \cdot b^x$, where the coefficient a is a constant, the base b is positive but not equal to 1, and the exponent x is _____.

	Choice	Feedback
A.	negative	
*B.	any number	
C.	an integer	
D.	positive	

Global Incorrect Feedback

The correct answer is: any number.

Question 13a of 15 (2 Evaluating Exponential Functions 119787)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Exponential growth and decay functions are written in standard form as $F(t) = A_0 \bullet b^{kt}$, where A_0 is an initial amount, k is the growth rate, and t is _____.

	Choice	Feedback
A.	temperature	
B.	total	
*C.	time	
D.	altitude	

Global Incorrect Feedback

The correct answer is: time.

Question 13b of 15 (2 Evaluating Exponential Functions 296554)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Exponential growth and decay functions are written in standard form as $F(t) = A_0 \bullet b^{kt}$, where A_0 is an initial amount, k is the growth rate, and t is _____.

	Choice	Feedback
A.	temperature	
B.	total	
*C.	time	
D.	altitude	

Global Incorrect Feedback

The correct answer is: time.

Question 13c of 15 (2 Evaluating Exponential Functions 296555)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Exponential growth and decay functions are written in standard form as $F(t) = A_0 \cdot b^{kt}$, where A_0 is an initial amount, k is the growth rate, and t is _____.

	Choice	Feedback
A.	temperature	
B.	total	
*C.	time	
D.	altitude	

Global Incorrect Feedback

The correct answer is: time.

Question 14a of 15 (2 Evaluating Exponential Functions 119545)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: An exponential *growth* function describes an amount that decreases exponentially over time.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 14b of 15 (2 Evaluating Exponential Functions 296556)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: An exponential *growth* function describes an amount that increases constantly over time.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 14c of 15 (2 Evaluating Exponential Functions 296557)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: An exponential *growth* function describes an amount that decreases constantly over time.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 15a of 15 (2 Evaluating Exponential Functions 119546)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: An exponential *decay* function describes an amount that decreases exponentially over time.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 15b of 15 (2 Evaluating Exponential Functions 296558)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: An exponential *decay* function describes an amount that increases exponentially over time.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 15c of 15 (2 Evaluating Exponential Functions 296559)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: An exponential *decay* function describes an amount that decreases exponentially over time.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

PREVIEW

CLOSE

Quiz: Graphs of Exponential Functions

Question 1a of 15 (2 Graphs of Exponential Functions 91800)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The domain of the function given below is the set of all real numbers

greater than $\frac{1}{2}$.

$$F(x) = \left(\frac{1}{2}\right)^x$$

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 1b of 15 (2 Graphs of Exponential Functions 298216)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The domain of the function given below is the set of all real numbers.

$$F(x) = \left(\frac{1}{2}\right)^x$$

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 1c of 15 (2 Graphs of Exponential Functions 298217)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The domain of the function given below is the set of all real numbers greater than 1.

$$F(x) = \left(\frac{1}{2}\right)^x$$

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 2a of 15 (2 Graphs of Exponential Functions 91801)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The domain of the function given below is the set of all real numbers.

$$F(x) = \left(\frac{8}{3}\right)^x$$

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 2b of 15 (2 Graphs of Exponential Functions 298218)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The domain of the function given below is the set of all real numbers greater than 1.

$$F(x) = \left(\frac{8}{3}\right)^x$$

	Choice	Feedback
A.	True	

*B.	False
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Global Incorrect Feedback
The correct answer is: False.

Question 2c of 15 (2 Graphs of Exponential Functions 298219)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The domain of the function given below is the set of all real numbers greater than $\frac{8}{3}$.

$$F(x) = \left(\frac{8}{3}\right)^x$$

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback
The correct answer is: False.

Question 3a of 15 (2 Graphs of Exponential Functions 91802)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The range of the function given below is the set of all positive real numbers greater than 6.

$$F(x) = 6 + 2^x$$

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback
The correct answer is: True.

Question 3b of 15 (2 Graphs of Exponential Functions 298220)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The range of the function given below is the set of all positive real numbers greater than 7.

$$F(x) = 7 + 3^x$$

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 3c of 15 (2 Graphs of Exponential Functions 298221)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The range of the function given below is the set of all positive real numbers greater than 5.

$$F(x) = 5 + 4^x$$

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 4a of 15 (2 Graphs of Exponential Functions 91803)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The range of the function given below is the set of all positive real numbers less than 8.

$$F(x) = 8 - 3^x$$

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 4b of 15 (2 Graphs of Exponential Functions 298222)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The range of the function given below is the set of all positive real numbers less than 4.

$$F(x) = 4 - 4^x$$

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 4c of 15 (2 Graphs of Exponential Functions 298223)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The range of the function given below is the set of all positive real numbers less than 7.

$$F(x) = 7 - 3^x$$

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 5a of 15 (2 Graphs of Exponential Functions 91804)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which facts are true for the graph of the function below? Check all that apply.

$$F(x) = \left(\frac{3}{5}\right)^x$$

Correct Answers:

	Choice
*A.	The range of $F(x)$ is $y > 0$.
B.	The domain of $F(x)$ is $x > 0$.
*C.	The y-intercept is (0, 1).
D.	It is increasing.
*E.	It is decreasing.
F.	The x-intercept is (1, 0).

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	<p>The correct answers are:</p> <ul style="list-style-type: none"> • The range of $F(x)$ is $y > 0$. • The y-intercept is (0, 1). • It is decreasing.

Question 5b of 15 (2 Graphs of Exponential Functions 298224)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which facts are true for the graph of the function below? Check all that apply.

$$f(x) = \left(\frac{3}{7}\right)^x$$

Correct Answers:

	Choice
*A.	The range of $F(x)$ is $y > 0$.
B.	The domain of $F(x)$ is $x > 0$.

*C.	The y-intercept is (0, 1).
D.	It is increasing.
*E.	It is decreasing.
F.	The x-intercept is (1, 0).

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	<p>The correct answers are:</p> <ul style="list-style-type: none"> • The range of $F(x)$ is $y > 0$. • The y-intercept is (0, 1). • It is decreasing.

Question 5c of 15 (2 Graphs of Exponential Functions 298225)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which facts are true for the graph of the function below? Check all that apply.

$$f(x) = \left(\frac{2}{5}\right)^x$$

Correct Answers:

	Choice
*A.	The range of $F(x)$ is $y > 0$.
B.	The domain of $F(x)$ is $x > 0$.
*C.	The y-intercept is (0, 1).
D.	It is increasing.
*E.	It is decreasing.
F.	The x-intercept is (1, 0).

Attempt	Incorrect Feedback
1st	

	Correct Feedback
	Global Incorrect Feedback
	<p>The correct answers are:</p> <ul style="list-style-type: none"> • The range of $F(x)$ is $y > 0$. • The y-intercept is $(0, 1)$. • It is decreasing.

Question 6a of 15 (2 Graphs of Exponential Functions 91805)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which facts are true for the graph of the function below? Check all that apply.

$$F(x) = 3 \cdot 4^x$$

Correct Answers:

	Choice
A.	It is decreasing.
B.	The range of $F(x)$ is $y > 4$.
*C.	The domain of $F(x)$ is all real numbers.
*D.	The y -intercept is $(0, 3)$.
E.	The y -intercept is $(0, 4)$.
*F.	It is increasing.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	<p>The correct answers are:</p> <ul style="list-style-type: none"> • The domain of $F(x)$ is all real numbers. • The y-intercept is $(0, 4)$.

	<ul style="list-style-type: none"> It is increasing.
--	---

Question 6b of 15 (2 Graphs of Exponential Functions 298226)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which facts are true for the graph of the function below? Check all that apply.

$$F(x) = 2 \cdot 5^x$$

Correct Answers:

	Choice
A.	It is decreasing.
B.	The range of $F(x)$ is $y > 5$.
*C.	The domain of $F(x)$ is all real numbers.
*D.	The y-intercept is $(0, 2)$.
E.	The y-intercept is $(0, 5)$.
*F.	It is increasing.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	<p>The correct answers are:</p> <ul style="list-style-type: none"> The domain of $F(x)$ is all real numbers. The y-intercept is $(0, 2)$. It is increasing.

Question 6c of 15 (2 Graphs of Exponential Functions 298227)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which facts are true for the graph of the function below? Check all that apply.

$$F(x) = 4 \cdot 5^x$$

Correct Answers:

	Choice
A.	It is decreasing.
B.	The range of $F(x)$ is $y > 5$.
*C.	The domain of $F(x)$ is all real numbers.
*D.	The y-intercept is $(0, 4)$.
E.	The y-intercept is $(0, 5)$.
*F.	It is increasing.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	<p>The correct answers are:</p> <ul style="list-style-type: none"> • The domain of $F(x)$ is all real numbers. • The y-intercept is $(0, 5)$. • It is increasing.

Question 7a of 15 (2 Graphs of Exponential Functions 91806)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: The graph below could be the graph of which exponential function?



	Choice	Feedback
A.	$F(x) = 3 \cdot (-1.4)^x$	
B.	$F(x) = 3^x$	
*C.	$F(x) = 3 \cdot (1.4)^x$	

D.	$F(x) = 3 \cdot (0.4)^x$
----	--------------------------

Global Incorrect Feedback

The correct answer is: $F(x) = 3 \cdot (1.4)^x$.

Question 7b of 15 (2 Graphs of Exponential Functions 298228)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: The graph below could be the graph of which exponential function?



	Choice	Feedback
*A.	$F(x) = 3 \cdot (1.7)^x$	
B.	$F(x) = 3^x$	
C.	$F(x) = 3 \cdot (-1.7)^x$	
D.	$F(x) = 3 \cdot (0.7)^x$	

Global Incorrect Feedback

The correct answer is: $F(x) = 3 \cdot (1.7)^x$.

Question 7c of 15 (2 Graphs of Exponential Functions 298229)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: The graph below could be the graph of which exponential function?



	Choice	Feedback
A.	$F(x) = 3 \cdot (-1.2)^x$	
B.	$F(x) = 3^x$	
C.	$F(x) = 3 \cdot (0.2)^x$	
*D.	$F(x) = 3 \cdot (1.2)^x$	

Global Incorrect Feedback

The correct answer is: $F(x) = 3 \cdot (1.2)^x$.

Question 8a of 15 (2 Graphs of Exponential Functions 91807)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: The graph below could be the graph of which exponential function?



	Choice	Feedback
A.	$F(x) = 2 \cdot (2)^x$	
B.	$F(x) = 2^x$	
*C.	$F(x) = 2 \cdot (0.5)^x$	
D.	$F(x) = 2 \cdot (1.1)^x$	

Global Incorrect Feedback

The correct answer is: $F(x) = 2 \cdot (0.5)^x$.

Question 8b of 15 (2 Graphs of Exponential Functions 298230)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: The graph below could be the graph of which exponential function?



	Choice	Feedback
*A.	$F(x) = 2 \cdot (0.7)^x$	
B.	$F(x) = 2^x$	
C.	$F(x) = 2 \cdot (5)^x$	
D.	$F(x) = 2 \cdot (1.4)^x$	

Global Incorrect Feedback

The correct answer is: $F(x) = 2 \cdot (0.7)^x$.

Question 8c of 15 (2 Graphs of Exponential Functions 298231)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: The graph below could be the graph of which exponential function?



	Choice	Feedback
*A.	$F(x) = 2 \cdot (0.5)^x$	
B.	$F(x) = 2^x$	
C.	$F(x) = 2 \cdot (7)^x$	
D.	$F(x) = 2 \cdot (1.6)^x$	

Global Incorrect Feedback

The correct answer is: $F(x) = 2 \cdot (0.5)^x$.

Question 9a of 15 (2 Graphs of Exponential Functions 119644)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The range of $F(x) = 5 \cdot 2^x$ is all positive real numbers.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 9b of 15 (2 Graphs of Exponential Functions 327535)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The range of $F(x) = 6 \cdot 3^x$ is all positive real numbers.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 9c of 15 (2 Graphs of Exponential Functions 327538)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The range of $F(x) = 7 \cdot 4^x$ is all positive real numbers.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 10a of 15 (2 Graphs of Exponential Functions 119646)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question:

The domain of $F(x) = \left(\frac{3}{4}\right)^x$ is all negative numbers.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 10b of 15 (2 Graphs of Exponential Functions 327694)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question:

The domain of $F(x) = \left(\frac{2}{3}\right)^x$ is all negative numbers.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 10c of 15 (2 Graphs of Exponential Functions 298235)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question:

The domain of $f(x) = \left(\frac{2}{5}\right)^x$ is all negative numbers.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 11a of 15 (2 Graphs of Exponential Functions 119649)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: (0,a), y=a, 0,a

Question: In general, the y-intercept of the function $F(x) = a \cdot b^x$ is the point _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: (0, a).

Question 11b of 15 (2 Graphs of Exponential Functions 298236)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: (0,a), y=a, 0,a

Question: In general, the y-intercept of the function $F(x) = a \cdot b^x$ is the point _____.

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: $(0, a)$.

Question 11c of 15 (2 Graphs of Exponential Functions 298237)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: $(0, a)$, $y=a$, $0, a$

Question: In general, the y-intercept of the function $F(x) = a \cdot b^x$ is the point

_____.

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: $(0, a)$.

Question 12a of 15 (2 Graphs of Exponential Functions 119652)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: base

Question: The value of the _____ determines whether the graph of an exponential function increases or decreases from left to right.

Attempt	Incorrect Feedback
1st	
	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: base.

Question 12b of 15 (2 Graphs of Exponential Functions 298238)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: base

Question: The value of the _____ determines whether the graph of an exponential function increases or decreases from left to right.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: base.

Question 12c of 15 (2 Graphs of Exponential Functions 298239)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: base

Question: The value of the _____ determines whether the graph of an exponential function increases or decreases from left to right.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: base.

Question 13a of 15 (2 Graphs of Exponential Functions 119655)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The base of an exponential function can be a negative number.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 13b of 15 (2 Graphs of Exponential Functions 298240)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The base of an exponential function can only be a positive number.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 13c of 15 (2 Graphs of Exponential Functions 298241)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The base of an exponential function cannot be a negative number.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 14a of 15 (2 Graphs of Exponential Functions 119656)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: x

Question: A feature that is common to all exponential functions of the form $F(x) = b^x$ is that they have a common horizontal asymptote at the _____-axis.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: x.

Question 14b of 15 (2 Graphs of Exponential Functions 298242)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: asymptote, asytmote, assymptote, assymtote, asimtote

Question: A feature that is common to all exponential functions of the form $F(x) = b^x$ is that they have a common horizontal _____ at the x-axis.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: asymptote.

Question 14c of 15 (2 Graphs of Exponential Functions 298243)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: x

Question: A feature that is common to all exponential functions of the form $F(x) = b^x$ is that they have a common horizontal asymptote at the _____-

axis.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: x .

Question 15a of 15 (2 Graphs of Exponential Functions 119658)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: For all values of a and b that make $F(x) = a \bullet b^x$ a valid exponential function, the graph *always* has a horizontal asymptote at $y = 0$.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 15b of 15 (2 Graphs of Exponential Functions 298244)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: For all values of a and b that make $F(x) = a \bullet b^x$ a valid exponential function, the graph *always* has a horizontal asymptote at $y = 0$.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 15c of 15 (2 Graphs of Exponential Functions 298245)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: For all values of a and b that make $F(x) = a \cdot b^x$ a valid exponential function, the graph *always* has a horizontal asymptote at $y = 0$.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

PREVIEW

CLOSE

Quiz: Logarithmic Functions

Question 1a of 15 (3 Logarithmic Functions 91845)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$4^c = 256$$

	Choice	Feedback
*A.	$\log_4 256 = c$	
B.	$\log_{256} c = 4$	
C.	$\log_c 256 = 4$	
D.	$\log_4 c = 256$	

Global Incorrect Feedback

The correct answer is: $\log_4 256 = c$.

Question 1b of 15 (3 Logarithmic Functions 299275)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$5^c = 250$$

	Choice	Feedback
A.	$\log_5 c = 250$	
B.	$\log_{250} c = 5$	
C.	$\log_c 250 = 5$	
*D.	$\log_5 250 = c$	

Global Incorrect Feedback

The correct answer is: $\log_5 250 = c$.

Question 1c of 15 (3 Logarithmic Functions 299277)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$5^c = 125$$

	Choice	Feedback
A.	$\log_5 c = 125$	
B.	$\log_{125} c = 5$	
C.	$\log_c 125 = 5$	
*D.	$\log_5 125 = c$	

Global Incorrect Feedback

The correct answer is: $\log_5 125 = c$.

Question 2a of 15 (3 Logarithmic Functions 91846)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$2^c = 8$$

	Choice	Feedback
A.	$\log_2 c = 8$	
*B.	$\log_2 8 = c$	
C.	$\log_8 c = 2$	
D.	$\log_c 8 = 2$	

Global Incorrect Feedback

The correct answer is: $\log_2 8 = c$.

Question 2b of 15 (3 Logarithmic Functions 299278)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$3^c = 27$$

	Choice	Feedback
A.	$\log_3 c = 27$	
B.	$\log_c 27 = 3$	
C.	$\log_{27} c = 3$	
*D.	$\log_3 27 = c$	

Global Incorrect Feedback

The correct answer is: $\log_3 27 = c$.

Question 2c of 15 (3 Logarithmic Functions 299279)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$4^c = 64$$

	Choice	Feedback
*A.	$\log_4 64 = c$	
B.	$\log_4 c = 64$	
C.	$\log_{64} c = 4$	
D.	$\log_c 64 = 4$	

Global Incorrect Feedback

The correct answer is: $\log_4 64 = c$.

Question 3a of 15 (3 Logarithmic Functions 91847)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$e^a = 55$$

	Choice	Feedback
A.	$\ln a = 55$	
B.	$\log_a 55 = 4$	

*C.	$\ln 55 = a$	
D.	$\log_{55} 4 = e$	

Global Incorrect Feedback

The correct answer is: $\ln 55 = a$.

Question 3b of 15 (3 Logarithmic Functions 299280)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$e^a = 60$$

	Choice	Feedback
A.	$\ln a = 60$	
*B.	$\ln 60 = a$	
C.	$\log_a 60 = 4$	
D.	$\log_{60} 4 = e$	

Global Incorrect Feedback

The correct answer is: $\ln 60 = a$.

Question 3c of 15 (3 Logarithmic Functions 299281)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$e^a = 35$$

	Choice	Feedback
A.	$\ln a = 35$	
*B.	$\ln 35 = a$	
C.	$\log_a 35 = 2.5$	
D.	$\log_{35} 2 = e$	

Global Incorrect Feedback

The correct answer is: $\ln 35 = a$.

Question 4a of 15 (3 Logarithmic Functions 91848)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$e^a = 38.47$$

	Choice	Feedback
A.	$\log_{38.47} 3.65 = e$	
B.	$\ln a = 38.47$	
C.	$\log_a 38.47 = 3.65$	
*D.	$\ln 38.47 = a$	

Global Incorrect FeedbackThe correct answer is: $\ln 38.47 = a$.

Question 4b of 15 (3 Logarithmic Functions 299282)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$e^a = 47.38$$

	Choice	Feedback
A.	$\log_{47.38} 3.65 = e$	
*B.	$\ln 47.38 = a$	
C.	$\log_a 47.38 = 3.65$	
D.	$\ln a = 47.38$	

Global Incorrect FeedbackThe correct answer is: $\ln 47.38 = a$.

Question 4c of 15 (3 Logarithmic Functions 299283)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$e^a = 28.37$$

	Choice	Feedback
*A.	$\ln 28.37 = a$	
B.	$\ln a = 28.37$	
C.	$\log_a 28.37 = 3.65$	
D.	$\log_{28.37} 3.65 = e$	

Global Incorrect Feedback

The correct answer is: $\ln 28.37 = a$.

Question 5a of 15 (3 Logarithmic Functions 91849)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which exponential equation is equivalent to the logarithmic equation below?

$$c = \ln 3$$

	Choice	Feedback
A.	$e^3 = c$	
*B.	$e^c = 3$	
C.	$3^c = e$	
D.	$c^3 = e$	

Global Incorrect Feedback

The correct answer is: $e^c = 3$.

Question 5b of 15 (3 Logarithmic Functions 299284)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which exponential equation is equivalent to the logarithmic equation below?

$$c = \ln 2$$

	Choice	Feedback
A.	$e^2 = c$	

B.	$c^2 = e$	
C.	$2^c = e$	
*D.	$e^c = 2$	

Global Incorrect Feedback

The correct answer is: $e^c = 2$.

Question 5c of 15 (3 Logarithmic Functions 299286)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which exponential equation is equivalent to the logarithmic equation below?

$$c = \ln 4$$

	Choice	Feedback
A.	$e^4 = c$	
B.	$c^4 = e$	
C.	$4^c = e$	
*D.	$e^c = 4$	

Global Incorrect Feedback

The correct answer is: $e^c = 4$.

Question 6a of 15 (3 Logarithmic Functions 91850)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$70.81 = e^a$$

	Choice	Feedback
A.	$\log_a 70.81 = 4.26$	
B.	$\ln a = 70.81$	
*C.	$\ln 70.81 = a$	
D.	$\log_{70.81} 4.26 = e$	

Global Incorrect Feedback

The correct answer is: $\ln 70.81 = a$.

Question 6b of 15 (3 Logarithmic Functions 299287)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$87.18 = e^a$$

	Choice	Feedback
*A.	$\ln 87.18 = a$	
B.	$\ln a = 87.18$	
C.	$\log_a 87.18 = 3.45$	
D.	$\log_{87.18} 3.45 = e$	

Global Incorrect Feedback

The correct answer is: $\ln 87.18 = a$.

Question 6c of 15 (3 Logarithmic Functions 299288)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which logarithmic equation is equivalent to the exponential equation below?

$$67.21 = e^a$$

	Choice	Feedback
A.	$\log_a 67.21 = 2.43$	
B.	$\ln a = 67.21$	
C.	$\log_{67.21} 2.43 = e$	
*D.	$\ln 67.21 = a$	

Global Incorrect Feedback

The correct answer is: $\ln 67.21 = a$.

Question 7a of 15 (3 Logarithmic Functions 91851)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which exponential equation is equivalent to the logarithmic equation below?

$$\log 300 = a$$

	Choice	Feedback
A.	$300^a = 10$	
B.	$a^{10} = 300$	
*C.	$10^a = 300$	
D.	$300^{10} = a$	

Global Incorrect Feedback

The correct answer is: $10^a = 300$.

Question 7b of 15 (3 Logarithmic Functions 299289)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which exponential equation is equivalent to the logarithmic equation below?

$$\log 400 = a$$

	Choice	Feedback
*A.	$10^a = 400$	
B.	$a^{10} = 400$	
C.	$400^a = 10$	
D.	$400^{10} = a$	

Global Incorrect Feedback

The correct answer is: $10^a = 400$.

Question 7c of 15 (3 Logarithmic Functions 299290)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which exponential equation is equivalent to the logarithmic equation below?

$$\log 200 = a$$

	Choice	Feedback
A.	$200^a = 10$	
*B.	$10^a = 200$	
C.	$a^{10} = 200$	
D.	$200^{10} = a$	

Global Incorrect Feedback

The correct answer is: $10^a = 200$.

Question 8a of 15 (3 Logarithmic Functions 91852)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which exponential equation is equivalent to the logarithmic equation below?

$$\log 784 = a$$

	Choice	Feedback
*A.	$10^a = 784$	
B.	$a^{10} = 784$	
C.	$784^a = 10$	
D.	$784^{10} = a$	

Global Incorrect Feedback

The correct answer is: $10^a = 784$.

Question 8b of 15 (3 Logarithmic Functions 299291)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which exponential equation is equivalent to the logarithmic equation below?

$$\log 478 = a$$

	Choice	Feedback
A.	$478^{10} = a$	
B.	$a^{10} = 478$	
C.	$478^a = 10$	

*D.	$10^a = 478$
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Global Incorrect Feedback
The correct answer is: $10^a = 478$.

Question 8c of 15 (3 Logarithmic Functions 299292)

Maximum Attempts: 1
Question Type: Multiple Choice
Maximum Score: 2
Question: Which exponential equation is equivalent to the logarithmic equation below?

$\log 987 = a$

	Choice	Feedback
A.	$a^{10} = 987$	
*B.	$10^a = 987$	
C.	$987^a = 10$	
D.	$987^{10} = a$	

Global Incorrect Feedback
The correct answer is: $10^a = 987$.

Question 9a of 15 (3 Logarithmic Functions 119660)

Maximum Attempts: 1
Question Type: Text Fill In Blank
Maximum Score: 2
Is Case Sensitive: false
Correct Answer: common
Question: The *base 10* logarithm is called the _____ logarithm and is often written as $\log x$ instead of $\log_{10} x$.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: common.

Question 9b of 15 (3 Logarithmic Functions 299293)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: common

Question: The *base 10* logarithm is called the _____ logarithm and is often written as $\log x$ instead of $\log_{10} x$.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: common.

Question 9c of 15 (3 Logarithmic Functions 299294)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: common

Question: The *base 10* logarithm is called the _____ logarithm and is often written as $\log x$ instead of $\log_{10} x$.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: common.

Question 10a of 15 (3 Logarithmic Functions 119662)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: $e^y=x$, $e^y = x$, $e ^ y = x$

Question: Convert the following logarithmic equation to the equivalent exponential equation. Use the caret (^) to enter exponents.

$$y = \ln x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: $e^y = x$.

Question 10b of 15 (3 Logarithmic Functions 299295)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: $e^y=x$, $e^y = x$, $e ^ y = x$

Question: Convert the following logarithmic equation to the equivalent exponential equation. Use the caret (^) to enter exponents.

$$y = \ln x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: $e^y = x$.

Question 10c of 15 (3 Logarithmic Functions 299296)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: $e^y=x$, $e^y = x$, $e ^ y = x$

Question: Convert the following logarithmic equation to the equivalent exponential equation. Use the caret (^) to enter exponents.

$$y = \ln x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: $e^y = x$.

Question 11a of 15 (1 Logarithmic Functions 119665)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: A logarithmic function is the inverse of an exponential function.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 11b of 15 (1 Logarithmic Functions 299297)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: A logarithmic function is the same as an exponential function.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 11c of 15 (1 Logarithmic Functions 299298)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: An exponential function is the inverse of a logarithmic function.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 12a of 15 (1 Logarithmic Functions 119669)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: input

Question: A logarithmic function takes the exponential function's output and returns the exponential function's _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: input.

Question 12b of 15 (1 Logarithmic Functions 299299)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: output

Question: A logarithmic function takes the exponential function's _____ and returns the exponential function's input.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: output.

Question 12c of 15 (1 Logarithmic Functions 299301)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: logarithmic, logarhythmic, logerithmic, logarithm

Question: A _____ function takes the exponential function's output and returns the exponential function's input.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: logarithmic.

Question 13a of 15 (3 Logarithmic Functions 119671)


Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: $2^3=8$, $8=2^3$

Question: Convert the following logarithmic equation to an exponential equation using the relationship $\log_b a = c$  $b^c = a$. Use the caret (^) to enter exponents.

$$\log_2 8 = 3$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: $2^3 = 8$.

Question 13b of 15 (3 Logarithmic Functions 299302)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: $3^3=27, 27=3^3$

Question: Convert the following logarithmic equation to an exponential equation

using the relationship $\log_b a = c$  $b^c = a$. Use the caret (^) to enter exponents.

$$\log_3 27 = 3$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: $3^3 = 27$.

Question 13c of 15 (3 Logarithmic Functions 299303)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: $3^2=9, 9=3^2$

Question: Convert the following logarithmic equation to an exponential equation

using the relationship $\log_b a = c$  $b^c = a$. Use the caret (^) to enter exponents.

$$\log_3 9 = 2$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: $3^2 = 9$.

Question 14a of 15 (3 Logarithmic Functions 119672)**Maximum Attempts:** 1**Question Type:** Text Fill In Blank**Maximum Score:** 2**Is Case Sensitive:** false**Correct Answer:** $10^x = y, y = 10^x$ **Question:** Convert the following logarithmic equation to an exponential equationusing the relationship $\log_b a = c \iff b^c = a$. Use the caret (^) to enter exponents.

$$\log_{10} y = x$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: $10^x = y$.

Question 14b of 15 (3 Logarithmic Functions 299304)**Maximum Attempts:** 1**Question Type:** Text Fill In Blank**Maximum Score:** 2**Is Case Sensitive:** false**Correct Answer:** $12^x = y, y = 12^x$ **Question:** Convert the following logarithmic equation to an exponential equationusing the relationship $\log_b a = c \iff b^c = a$. Use the caret (^) to enter exponents.

$$\log_{12} y = x$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: $12^x = y$.

Question 14c of 15 (3 Logarithmic Functions 299305)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: $11^x = y, y = 11^x$

Question: Convert the following logarithmic equation to an exponential equation

using the relationship $\log_b a = c$  $b^c = a$. Use the caret (^) to enter exponents.

$$\log_{11} y = x$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: $11^x = y$.

Question 15a of 15 (3 Logarithmic Functions 119674)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: $3^n = 14, 14 = 3^n$

Question: Convert the following logarithmic equation to an exponential equation

using the relationship $\log_b a = c$  $b^c = a$. Use the caret (^) to enter exponents.

$$\log_3 14 = n$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: $3^n = 14$.

Question 15b of 15 (3 Logarithmic Functions 299306)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: $4^n=12, 12=4^n$

Question: Convert the following logarithmic equation to an exponential equation

using the relationship $\log_b a = c$  $b^c = a$. Use the caret (^) to enter exponents.

$$\log_4 12 = n$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: $4^n = 12$.

Question 15c of 15 (3 Logarithmic Functions 299307)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: $2^n=13, 13=2^n$

Question: Convert the following logarithmic equation to an exponential equation

using the relationship $\log_b a = c$  $b^c = a$. Use the caret (^) to enter exponents.

$$\log_2 13 = n$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: $2^n = 13$.

PREVIEW

CLOSE

Quiz: Graphs of Logarithmic Functions

Question 1a of 15 (2 Graphing Logarithmic Functions 91816)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which answer represents the domain of the logarithmic function given below?

$$F(x) = \log_8 x$$

	Choice	Feedback
A.	$x > 0$	
*B.	$x > 0$	
C.	$x < 0$	
D.	all real numbers	

Global Incorrect Feedback

The correct answer is: $x > 0$.

Question 1b of 15 (2 Graphing Logarithmic Functions 299347)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which answer represents the domain of the logarithmic function given below?

$$F(x) = \log_9 x$$

	Choice	Feedback
A.	$x > 0$	
B.	$x < 0$	
*C.	$x > 0$	
D.	all real numbers	

Global Incorrect Feedback

The correct answer is: $x > 0$.

Question 1c of 15 (2 Graphing Logarithmic Functions 299348)


Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which answer represents the domain of the logarithmic function given below?

$$F(x) = \log_7 x$$

	Choice	Feedback
A.	 $x > 0$	
B.	$x < 0$	
*C.	$x > 0$	
D.	all real numbers	

Global Incorrect Feedback

The correct answer is: $x > 0$.

Question 2a of 15 (2 Graphing Logarithmic Functions 91817)


Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which answer represents the domain of the logarithmic function given below?

$$F(x) = 3 + \log_{0.5} x$$

	Choice	Feedback
A.	 $x > 3$	
B.	$x < 0$	
*C.	$x > 0$	
D.	all real numbers	

Global Incorrect Feedback

The correct answer is: $x > 0$.

Question 2b of 15 (2 Graphing Logarithmic Functions 299349)

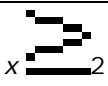
Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which answer represents the domain of the logarithmic function given below?

$$F(x) = 2 + \log_{0.6} x$$

	Choice	Feedback
*A.	$x > 0$	
B.	$x < 0$	
C.		
D.	all real numbers	

Global Incorrect Feedback

The correct answer is: $x > 0$.

Question 2c of 15 (2 Graphing Logarithmic Functions 299350)


Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: Which answer represents the domain of the logarithmic function given below?

$$F(x) = 5 + \log_{0.3} x$$

	Choice	Feedback
A.		
B.	$x < 0$	
*C.	$x > 0$	
D.	all real numbers	

Global Incorrect Feedback

The correct answer is: $x > 0$.

Question 3a of 15 (2 Graphing Logarithmic Functions 91818)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which facts are true for the graph of the function below? Check all that apply.

$$F(x) = \log_7 x$$

Correct Answers:

	Choice
<input checked="" type="checkbox"/>	A. The x-intercept is (1, 0).
<input type="checkbox"/>	B. The range is $y > 0$.
<input type="checkbox"/>	C. It is decreasing.
<input checked="" type="checkbox"/>	D. It is increasing.
<input type="checkbox"/>	E. The y-intercept is (0, 7).
<input type="checkbox"/>	F. The domain is $x > 7$.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	<p>The correct answers are:</p> <ul style="list-style-type: none"> • The x-intercept is (1, 0). • It is increasing.

Question 3b of 15 (2 Graphing Logarithmic Functions 299351)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which facts are true for the graph of the function below? Check all that apply.

$$F(x) = \log_6 x$$

Correct Answers:

	Choice
<input type="checkbox"/>	A. It is decreasing.
<input type="checkbox"/>	B. The range is $y > 0$.
<input checked="" type="checkbox"/>	C. The x-intercept is (1, 0).
<input type="checkbox"/>	D. The y-intercept is (0, 6).
<input checked="" type="checkbox"/>	E. It is increasing.

F.	The domain is $x > 6$.
----	-------------------------

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	<p>The correct answers are:</p> <ul style="list-style-type: none"> The x-intercept is (1, 0). It is increasing.

Question 3c of 15 (2 Graphing Logarithmic Functions 299352)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which facts are true for the graph of the function below? Check all that apply.

$$F(x) = \log_8 x$$

Correct Answers:

	Choice
*A.	The x-intercept is (1, 0).
B.	The range is $y > 0$.
C.	It is decreasing.
*D.	It is increasing.
E.	The y-intercept is (0, 8).
F.	The domain is $x > 8$.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are:

	<ul style="list-style-type: none"> • The x-intercept is (1, 0). • It is increasing.
--	---

Question 4a of 15 (3 Graphing Logarithmic Functions 91819)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: What is the x-intercept of the function below?

$$F(x) = \log_7(x - 2)$$

	Choice	Feedback
A.	(1, 0)	
B.	(7, 0)	
*C.	(3, 0)	
D.	(-1, 0)	

Global Incorrect Feedback

The correct answer is: (3, 0).

Question 4b of 15 (3 Graphing Logarithmic Functions 299353)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: What is the x-intercept of the function below?

$$F(x) = \log_7(x - 3)$$

	Choice	Feedback
A.	(1, 0)	
*B.	(4, 0)	
C.	(7, 0)	
D.	(-2, 0)	

Global Incorrect Feedback

The correct answer is: (4, 0).

Question 4c of 15 (3 Graphing Logarithmic Functions 299354)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: What is the x -intercept of the function below?

$$F(x) = \log_7(x - 1)$$

	Choice	Feedback
<input checked="" type="radio"/>	A. (2, 0)	
<input type="radio"/>	B. (7, 0)	
<input type="radio"/>	C. (1, 0)	
<input type="radio"/>	D. (0, 0)	

Global Incorrect Feedback

The correct answer is: (2, 0).

Question 5a of 15 (2 Graphing Logarithmic Functions 91820)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which facts are true for the graph of the function below? Check all that apply.

$$F(x) = \log_{0.125} x$$

Correct Answers:

	Choice
<input type="radio"/>	A. It is increasing.
<input checked="" type="radio"/>	*B. The range is all real numbers.
<input checked="" type="radio"/>	*C. The domain is $x > 0$.
<input type="radio"/>	D. The y -intercept is (0, 4).
<input checked="" type="radio"/>	*E. The x -intercept is (1, 0).
<input checked="" type="radio"/>	*F. It is decreasing.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback

	<p>The correct answers are:</p> <ul style="list-style-type: none"> • The range is all real numbers. • The domain is $x > 0$. • The x-intercept is (1, 0). • It is decreasing.
--	---

Question 5b of 15 (2 Graphing Logarithmic Functions 299355)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which facts are true for the graph of the function below? Check all that apply.

$$F(x) = \log_{0.521} x$$

Correct Answers:

	Choice
*A.	It is decreasing.
*B.	The range is all real numbers.
*C.	The domain is $x > 0$.
*D.	The x-intercept is (1, 0).
E.	The y-intercept is (0, 4).
F.	It is increasing.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	<p>The correct answers are:</p> <ul style="list-style-type: none"> • The range is all real numbers. • The domain is $x > 0$. • The x-intercept is (1, 0). • It is decreasing.

Question 5c of 15 (2 Graphing Logarithmic Functions 299356)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which facts are true for the graph of the function below? Check all that apply.

$$F(x) = \log_{0.725} x$$

Correct Answers:

	Choice
<input checked="" type="checkbox"/>	*A. The range is all real numbers.
<input type="checkbox"/>	B. The y-intercept is (0, 4).
<input checked="" type="checkbox"/>	*C. The domain is $x > 0$.
<input checked="" type="checkbox"/>	*D. The x-intercept is (1, 0).
<input type="checkbox"/>	E. It is increasing.
<input checked="" type="checkbox"/>	*F. It is decreasing.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	<p>The correct answers are:</p> <ul style="list-style-type: none">• The range is all real numbers.• The domain is $x > 0$.• The x-intercept is (1, 0).• It is decreasing.

Question 6a of 15 (2 Graphing Logarithmic Functions 91821)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: What is the x-intercept of the function below?

$$F(x) = \log_{0.125} (x - 2)$$

	Choice	Feedback
<input checked="" type="checkbox"/>	*A. (3, 0)	
<input type="checkbox"/>	B. (1, 0)	

C.	(-1, 0)	
D.	(0.125, 0)	

Global Incorrect Feedback

The correct answer is: (3, 0).

Question 6b of 15 (2 Graphing Logarithmic Functions 299357)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: What is the x -intercept of the function below?

$$F(x) = \log_{0.25}(x - 3)$$

	Choice	Feedback
A.	(-2, 0)	
B.	(1, 0)	
*C.	(4, 0)	
D.	(0.25, 0)	

Global Incorrect Feedback

The correct answer is: (4, 0).

Question 6c of 15 (2 Graphing Logarithmic Functions 299358)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: What is the x -intercept of the function below?

$$F(x) = \log_{0.525}(x - 1)$$

	Choice	Feedback
A.	(0, 0)	
*B.	(2, 0)	
C.	(1, 0)	
D.	(0.525, 0)	

Global Incorrect Feedback

The correct answer is: (2, 0).

Question 7a of 15 (2 Graphing Logarithmic Functions 119679)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: (1,0), 1,0

Question: The graph of a logarithmic function in the form of $F(x) = \log_b x$ will always have a vertical asymptote at the y -axis, and an x -intercept at the point _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: (1, 0).

Question 7b of 15 (2 Graphing Logarithmic Functions 299359)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: (1,0), 1,0

Question: The graph of a logarithmic function in the form of $F(x) = \log_b x$ will always have a vertical asymptote at the y -axis, and an x -intercept at the point _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: (1, 0).

Question 7c of 15 (2 Graphing Logarithmic Functions 299360)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: (1,0), 1,0

Question: The graph of a logarithmic function in the form of $F(x) = \log_b x$ will always have a vertical asymptote at the y-axis, and an x-intercept at the point _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: (1, 0).

Question 8a of 15 (2 Graphing Logarithmic Functions 119684)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The domain of $F(x) = \log_b x$ is the set of all positive real numbers.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 8b of 15 (2 Graphing Logarithmic Functions 299361)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The domain of $F(x) = \log_b x$ is the set of all real numbers.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 8c of 15 (2 Graphing Logarithmic Functions 299362)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The domain of $F(x) = \log_b x$ is the set of all negative real numbers.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 9a of 15 (1 Graphing Logarithmic Functions 119685)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The range of $F(x) = \log_b x$ is the set of all positive real numbers.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 9b of 15 (1 Graphing Logarithmic Functions 299363)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The range of $F(x) = \log_b x$ is the set of all real numbers.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 9c of 15 (1 Graphing Logarithmic Functions 299364)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The range of $F(x) = \log_b x$ is the set of all negative real numbers.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 10a of 15 (1 Graphing Logarithmic Functions 119691)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The function $F(x) = \log_2 x$ is decreasing.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 10b of 15 (1 Graphing Logarithmic Functions 299365)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The function $F(x) = \log_3 x$ is decreasing.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 10c of 15 (1 Graphing Logarithmic Functions 299366)

Maximum Attempts: 1

Question Type: True-False
Maximum Score: 2
Question: The function $F(x) = \log_5 x$ is decreasing.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback
The correct answer is: False.

Question 11a of 15 (1 Graphing Logarithmic Functions 119692)

Maximum Attempts: 1
Question Type: Text Fill In Blank
Maximum Score: 2
Is Case Sensitive: false
Correct Answer: (1,0), 1,0
Question: The x-intercept of $F(x) = \log_2 x$ is _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: (1, 0).

Question 11b of 15 (1 Graphing Logarithmic Functions 299367)

Maximum Attempts: 1
Question Type: Text Fill In Blank
Maximum Score: 2
Is Case Sensitive: false
Correct Answer: (1,0), 1,0
Question: The x-intercept of $F(x) = \log_4 x$ is _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: (1, 0).

Question 11c of 15 (1 Graphing Logarithmic Functions 299368)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: (1,0), 1,0

Question: The x-intercept of $F(x) = \log_6 x$ is _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: (1, 0).

Question 12a of 15 (2 Graphing Logarithmic Functions 119693)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The function $F(x) = \log_{0.5} x$ is decreasing.

	Choice	Feedback
*A.	True	
B.	False	

	Global Incorrect Feedback
	The correct answer is: True.

Question 12b of 15 (2 Graphing Logarithmic Functions 299369)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The function $F(x) = \log_{0.75} x$ is decreasing.

	Choice	Feedback

*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 12c of 15 (2 Graphing Logarithmic Functions 299370)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The function $F(x) = \log_{0.5} x$ is increasing.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 13a of 15 (2 Graphing Logarithmic Functions 119698)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: (1,0), 1,0

Question: The x-intercept of $F(x) = \log_{0.5} x$ is _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: (1, 0).

Question 13b of 15 (2 Graphing Logarithmic Functions 299371)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: (1,0), 1,0

Question: The x-intercept of $F(x) = \log_{0.25} x$ is _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: (1, 0).

Question 13c of 15 (2 Graphing Logarithmic Functions 299372)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: (1,0), 1,0

Question: The x-intercept of $F(x) = \log_{0.15} x$ is _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: (1, 0).

Question 14a of 15 (2 Graphing Logarithmic Functions 119701)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: For what values of b will $F(x) = \log_b x$ be an increasing function?

	Choice	Feedback
A.	$b < 0$	
B.	$b > 0$	
*C.	$b > 1$	
D.	$b < 1$	

Global Incorrect Feedback

The correct answer is: $b > 1$.

Question 14b of 15 (2 Graphing Logarithmic Functions 299373)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: For what values of b will $F(x) = \log_b x$ be an increasing function?

	Choice	Feedback
A.	$b < 0$	
B.	$b > 0$	
C.	$b < 1$	
*D.	$b > 1$	

Global Incorrect Feedback

The correct answer is: $b > 1$.

Question 14c of 15 (2 Graphing Logarithmic Functions 299374)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: For what values of b will $F(x) = \log_b x$ be an increasing function?

	Choice	Feedback
A.	$b < 1$	
*B.	$b > 1$	
C.	$b > 0$	
D.	$b < 0$	

Global Incorrect Feedback

The correct answer is: $b > 1$.

Question 15a of 15 (2 Graphing Logarithmic Functions 119704)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: For what values of b will $F(x) = \log_b x$ be a decreasing function?

	Choice	Feedback
*A.	$0 < b < 1$	
B.	$b > 0$	
C.	$b < 0$	
D.	$0 > b > -1$	

Global Incorrect Feedback

The correct answer is: $0 < b < 1$.

Question 15b of 15 (2 Graphing Logarithmic Functions 299375)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: For what values of b will $F(x) = \log_b x$ be a decreasing function?

	Choice	Feedback
A.	$b < 0$	
B.	$b > 0$	
*C.	$0 < b < 1$	
D.	$0 > b > -1$	

Global Incorrect Feedback

The correct answer is: $0 < b < 1$.

Question 15c of 15 (2 Graphing Logarithmic Functions 299376)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: For what values of b will $F(x) = \log_b x$ be a decreasing function?

	Choice	Feedback
A.	$0 > b > -1$	
*B.	$0 < b < 1$	
C.	$b < 0$	
D.	$b > 0$	

Global Incorrect Feedback

The correct answer is: $0 < b < 1$.

PREVIEW

CLOSE

Quiz: Equivalent Logarithmic Expressions

Question 1a of 15 (3 Equivalent Logarithmic Expressions 91899)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

log 2 - log 6

Correct Answers:

	Choice
*A.	$\log(2) + \log\left(\frac{1}{6}\right)$
B.	log 2
*C.	$\log\left(\frac{1}{3}\right)$
D.	log 3

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $\log(2) + \log\left(\frac{1}{6}\right)$ and $\log\left(\frac{1}{3}\right)$.

Question 1b of 15 (3 Equivalent Logarithmic Expressions 299707)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

log 2 - log 4

Correct Answers:

	Choice
*A.	$\log(2) + \log\left(\frac{1}{4}\right)$
B.	$\log 1$
*C.	$\log\left(\frac{1}{2}\right)$
D.	$\log 2$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $\log(2) + \log\left(\frac{1}{4}\right)$ and $\log\left(\frac{1}{2}\right)$.

Question 1c of 15 (3 Equivalent Logarithmic Expressions 299708)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log 2 - \log 8$$

Correct Answers:

	Choice
A.	$\log 2$
*B.	$\log(2) + \log\left(\frac{1}{8}\right)$
C.	$\log 4$
*D.	$\log\left(\frac{1}{4}\right)$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $\log(2) + \log\left(\frac{1}{4}\right)$ and $\log\left(\frac{1}{4}\right)$.

Question 2a of 15 (3 Equivalent Logarithmic Expressions 91900)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log 5 - \log 20$$

Correct Answers:

	Choice
A.	$\log 4$
B.	$\log 5$
*C.	$\log\left(\frac{1}{4}\right)$
*D.	$\log(5) + \log\left(\frac{1}{20}\right)$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback

	The correct answers are: $\log\left(\frac{1}{4}\right)$ and $\log(5)$ + $\log\left(\frac{1}{20}\right)$.
--	--

Question 2b of 15 (3 Equivalent Logarithmic Expressions 299709)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log 5 - \log 25$$

Correct Answers:

	Choice
*A.	$\log\left(\frac{1}{5}\right)$
B.	$\log 5$
C.	$\log 10$
*D.	$\log(5) + \log\left(\frac{1}{25}\right)$

Attempt	Incorrect Feedback
1st	

Correct Feedback

Global Incorrect Feedback
The correct answers are: $\log\left(\frac{1}{5}\right)$ and $\log(5)$ + $\log\left(\frac{1}{25}\right)$.

Question 2c of 15 (3 Equivalent Logarithmic Expressions 299710)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that

apply.

$$\log 4 - \log 20$$

Correct Answers:

	Choice
*A.	$\log\left(\frac{1}{5}\right)$
B.	$\log 5$
C.	$\log 4$
*D.	$\log(4) + \log\left(\frac{1}{20}\right)$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $\log\left(\frac{1}{5}\right)$ and $\log(4) + \log\left(\frac{1}{20}\right)$.

Question 3a of 15 (3 Equivalent Logarithmic Expressions 91901)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log_2 2 + \log_2 8$$

Correct Answers:

	Choice
A.	$\log 10$
*B.	$\log_2(2^4)$
*C.	4
*D.	$\log_2 16$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $\log_2(2^4)$, 4, and $\log_2 16$.

Question 3b of 15 (3 Equivalent Logarithmic Expressions 299711)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log_3 3 + \log_3 27$$

Correct Answers:

	Choice
*A.	$\log_3 81$
*B.	$\log_3(3^4)$
*C.	4
D.	$\log 10$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $\log_3 81$, $\log_2(3^4)$, and 4.

Question 3c of 15 (3 Equivalent Logarithmic Expressions 299712)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that

apply.

$$\log_5 5 + \log_5 125$$

Correct Answers:

	Choice
*A.	4
*B.	$\log_5(5^4)$
C.	log 10
*D.	$\log_5 625$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 4, $\log_5(5^4)$, and $\log_5 625$.

Question 4a of 15 (3 Equivalent Logarithmic Expressions 91902)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log_3 81 + \log_3 81$$

Correct Answers:

	Choice
*A.	8
B.	log 6561
*C.	$\log_3(3^8)$
*D.	$\log_3 6561$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 8, $\log_3(3^8)$, and $\log_3 6561$.

Question 4b of 15 (3 Equivalent Logarithmic Expressions 299714)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log_5 125 + \log_5 125$$

Correct Answers:

	Choice
*A.	6
*B.	$\log_5(5^6)$
C.	$\log 15625$
*D.	$\log_5 15625$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 6, $\log_5(5^6)$, and $\log_5 15625$.

Question 4c of 15 (3 Equivalent Logarithmic Expressions 299713)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log_2 16 + \log_2 16$$

Correct Answers:

	Choice
A.	$\log 256$
*B.	8
*C.	$\log_2(2^8)$
*D.	$\log_2 256$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 8, $\log_2(2^8)$, and $\log_2 256$.

Question 5a of 15 (3 Equivalent Logarithmic Expressions 91903)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\ln(e^2)$$

Correct Answers:

	Choice
A.	$2e$
*B.	$2 \cdot \ln e$
C.	1
*D.	2

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $2 \cdot \ln e$ and 2.

Question 5b of 15 (3 Equivalent Logarithmic Expressions 299715)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\ln(e^3)$$

Correct Answers:

	Choice
*A.	<input checked="" type="checkbox"/> $3 \ln e$
*B.	<input checked="" type="checkbox"/> 3
C.	<input type="checkbox"/> 1
D.	<input type="checkbox"/> $3e$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: <input checked="" type="checkbox"/> $3 \ln e$ and <input checked="" type="checkbox"/> 3.

Question 5c of 15 (3 Equivalent Logarithmic Expressions 299716)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\ln(e^5)$$

Correct Answers:

	Choice
A.	<input type="checkbox"/> $5e$
*B.	<input checked="" type="checkbox"/> 5
C.	<input type="checkbox"/> 1
*D.	<input checked="" type="checkbox"/> $5 \ln e$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 5 and $5 \ln e$.

Question 6a of 15 (3 Equivalent Logarithmic Expressions 91904)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log(10^5)$$

Correct Answers:

	Choice
A.	$5 \cdot 10$
*B.	5
C.	1
*D.	$5 \cdot \log 10$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 5 and $5 \cdot \log 10$.

Question 6b of 15 (3 Equivalent Logarithmic Expressions 299717)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log(10^7)$$

Correct Answers:

	Choice
A.	$7 \cdot 10$
*B.	7
*C.	$7 \cdot \log 10$
D.	1

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 7 and $7 \cdot \log 10$.

Question 6c of 15 (3 Equivalent Logarithmic Expressions 299718)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log(10^3)$$

Correct Answers:

	Choice
*A.	$3 \cdot \log 10$
B.	1
*C.	3
D.	$3 \cdot 10$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback

The correct answers are: $3 \bullet \log 10$ and 3.

Question 7a of 15 (3 Equivalent Logarithmic Expressions 91905)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log_7 7 \bullet \log_3 9$$

Correct Answers:

	Choice
A.	$2 \bullet 7$
B.	$2 \bullet 10$
*C.	2
*D.	$2 \bullet \log_7 7$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 2 and $2 \bullet \log_7 7$.

Question 7b of 15 (3 Equivalent Logarithmic Expressions 299719)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log_9 9 \bullet \log_2 8$$

Correct Answers:

	Choice
*A.	3
B.	$2 \bullet 11$

C.	$2 \cdot 9$
*D.	$3 \cdot \log_9 9$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 3 and $3 \cdot \log_9 9$.

Question 7c of 15 (3 Equivalent Logarithmic Expressions 299720)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log_5 5 \cdot \log_2 4$$

Correct Answers:

	Choice
*A.	2
B.	$2 \cdot 7$
C.	$3 \cdot 5$
*D.	$2 \cdot \log_5 5$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 2 and $2 \cdot \log_5 5$.

Question 8a of 15 (3 Equivalent Logarithmic Expressions 91906)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log_8 1 \bullet \log_3 27$$

Correct Answers:

	Choice
A.	$3 \bullet 8$
B.	$3 \bullet \log_8 8$
*C.	0
D.	1

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.

Question 8b of 15 (3 Equivalent Logarithmic Expressions 299721)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log_7 1 \bullet \log_5 25$$

Correct Answers:

	Choice
*A.	0
B.	$2 \bullet \log_7 7$
C.	$5 \bullet 7$
D.	1

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.

Question 8c of 15 (3 Equivalent Logarithmic Expressions 299722)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\log_9 1 \cdot \log_9 81$$

Correct Answers:

	Choice
A.	$9 \cdot 9$
B.	$9 \cdot \log_9 9$
C.	1
*D.	0

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.

Question 9a of 15 (2 Equivalent Logarithmic Expressions 119823)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0

Question: For any positive number b not equal to 1, $\log_b 1 = \underline{\hspace{2cm}}$.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.

Question 9b of 15 (2 Equivalent Logarithmic Expressions 299723)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0

Question: For any positive number b not equal to 1, $\log_b 1 = \underline{\hspace{2cm}}$.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.

Question 9c of 15 (2 Equivalent Logarithmic Expressions 299724)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0

Question: For any positive number b not equal to 1, $\log_b 1 = \underline{\hspace{2cm}}$.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.

Question 10a of 15 (2 Equivalent Logarithmic Expressions 119824)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1

Question: For any positive number b not equal to 1, $\log_b b = \underline{\hspace{2cm}}$.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.

Question 10b of 15 (2 Equivalent Logarithmic Expressions 299725)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1

Question: For any positive number b not equal to 1, $\log_b b = \underline{\hspace{2cm}}$.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.

Question 10c of 15 (2 Equivalent Logarithmic Expressions 299726)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1

Question: For any positive number b not equal to 1, $\log_b b = \underline{\hspace{2cm}}$.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.

Question 11a of 15 (2 Equivalent Logarithmic Expressions 120048)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: For any positive numbers a , b , and d , with $b \neq 1$, $\log_b(a \cdot d) = \underline{\hspace{2cm}}$.

	Choice	Feedback
A.	$d \cdot \log_b a$	
*B.	$\log_b a + \log_b d$	
C.	$\log_b a \cdot \log_b d$	
D.	$\log_b a - \log_b d$	

Global Incorrect Feedback

The correct answer is: $\log_b a + \log_b d$.

Question 11b of 15 (2 Equivalent Logarithmic Expressions 299728)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: For any positive numbers a , b , and d , with $b \neq 1$, $\log_b a + \log_b d = \underline{\hspace{2cm}}$.

	Choice	Feedback
A.	$d \cdot \log_b a$	
B.	$\log_b a - \log_b d$	
C.	$\log_b a \cdot \log_b d$	
*D.	$\log_b(a \cdot d)$	

Global Incorrect Feedback

The correct answer is: $\log_b(a \cdot d)$.

Question 11c of 15 (2 Equivalent Logarithmic Expressions 299729)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question:

For any positive numbers a , b , and d , with $b \neq 1$,

$$\log_b \left(\frac{a}{d} \right) = \underline{\hspace{2cm}}.$$

	Choice	Feedback
A.	$d \cdot \log_b a$	
B.	$\log_b a + \log_b d$	
C.	$\log_b a \cdot \log_b d$	
*D.	$\log_b a - \log_b d$	

Global Incorrect Feedback

The correct answer is: $\log_b a - \log_b d$.

Question 12a of 15 (2 Equivalent Logarithmic Expressions 120049)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: For any positive numbers a , b , and d , with $b \neq 1$, $\log_b(a^d) = \underline{\hspace{2cm}}$.

	Choice	Feedback
A.	$d + \log_b a$	
B.	$a^d \cdot \log_b a^d$	
*C.	$d \cdot \log_b a$	
D.	$\log_b a + \log_b d$	

Global Incorrect Feedback

The correct answer is: $d \cdot \log_b a$.

Question 12b of 15 (2 Equivalent Logarithmic Expressions 299730)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: For any positive numbers a , b , and d , with $b \neq 1$, $\log_b \underline{\hspace{2cm}} = d \cdot \log_b a$.

	Choice	Feedback
*A.	a^d	
B.	$a^d \cdot \log_b a^d$	
C.	d^a	

D.	$\log_b a + \log_b d$	
----	-----------------------	--

Global Incorrect Feedback

The correct answer is: a^d .

Question 12c of 15 (2 Equivalent Logarithmic Expressions 299731)

Maximum Attempts: 1

Question Type: Multiple Choice

Maximum Score: 2

Question: For any positive numbers a , b , and d , with $b \neq 1$, $\log_b(a^d) = \underline{\hspace{2cm}}$.

	Choice	Feedback
A.	$d + \log_b a$	
B.	$a^d \cdot \log_b a^d$	
*C.	$d \cdot \log_b a$	
D.	$\log_b a + \log_b d$	

Global Incorrect Feedback

The correct answer is: $d \cdot \log_b a$.

Question 13a of 15 (2 Equivalent Logarithmic Expressions 120050)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The log of a quotient is the log of the numerator minus the log of the denominator.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 13b of 15 (2 Equivalent Logarithmic Expressions 299732)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The log of a quotient is the log of the numerator divided by the log of

the denominator.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 13c of 15 (2 Equivalent Logarithmic Expressions 299733)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: The log of a quotient is the log of the numerator plus the log of the denominator.

	Choice	Feedback
A.	True	
*B.	False	

Global Incorrect Feedback

The correct answer is: False.

Question 14a of 15 (3 Equivalent Logarithmic Expressions 119830)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: $\log(x)$, $\log(x)$, $\log x$, $\log x$

Question: Simplify the following expression.

$$\log(x^2) - \log(x).$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: $\log(x)$.

Question 14b of 15 (3 Equivalent Logarithmic Expressions 299734)

Maximum Attempts: 1
Question Type: Text Fill In Blank
Maximum Score: 2
Is Case Sensitive: false
Correct Answer: $\log(x)$, $\log (x)$, $\log x$, $\log x$
Question: Simplify the following expression.

$$\log(x^3) - \log(x^2).$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: $\log(x)$.

Question 14c of 15 (3 Equivalent Logarithmic Expressions 299735)

Maximum Attempts: 1
Question Type: Text Fill In Blank
Maximum Score: 2
Is Case Sensitive: false
Correct Answer: $\log(x)$, $\log (x)$, $\log x$, $\log x$
Question: Simplify the following expression.

$$\log(x^4) - \log(x^3).$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: $\log(x)$.

Question 15a of 15 (3 Equivalent Logarithmic Expressions 119833)

Maximum Attempts: 1
Question Type: Text Fill In Blank
Maximum Score: 2

Is Case Sensitive: false

Correct Answer: log16, 2log4, 4log2, log 16, log(16), 2log(4), 4log(2), log (16)

Question: Simplify the following expression.

$$\log(16x^2) + 2 \log\left(\frac{1}{x}\right).$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: log 16.

Question 15b of 15 (3 Equivalent Logarithmic Expressions 299736)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: log25, 2log5, log 25, log(25), 2log(5), log (25)

Question: Simplify the following expression.

$$\log(25x^3) + 3 \log\left(\frac{1}{x}\right).$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: log 25.

Question 15c of 15 (3 Equivalent Logarithmic Expressions 299737)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: log9, 2log3, log 9, log(9), 2log(3), log (9)

Question:

Simplify the following expression.

$$\log(9x^5) + 5 \log\left(\frac{1}{x}\right).$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: $\log 9$.

PREVIEW

CLOSE

Quiz: Evaluating Logarithms

Question 1a of 15 (3 Evaluating Logarithms 91853)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.13

Question: Evaluate the following expression. Round your answer to two decimal places.

$$\log_7 9$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.13.

Question 1b of 15 (3 Evaluating Logarithms 300097)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.89

Question: Evaluate the following expression. Round your answer to two decimal places.

$$\log_9 7$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.89.

Question 1c of 15 (3 Evaluating Logarithms 300098)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.16

Question: Evaluate the following expression. Round your answer to two decimal places.

$$\log_6 8$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.16.

Question 2a of 15 (3 Evaluating Logarithms 91854)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 3.17

Question: Evaluate the following expression. Round your answer to two decimal places.

$$\log_2 9$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 3.17.

Question 2b of 15 (3 Evaluating Logarithms 300099)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.1

Question: Evaluate the following expression. Round your answer to two decimal

places.

$$\log_3 10$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.10.

Question 2c of 15 (3 Evaluating Logarithms 300100)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.18

Question: Evaluate the following expression. Round your answer to two decimal places.

$$\log_3 11$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.18.

Question 3a of 15 (3 Evaluating Logarithms 91855)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.51

Question: Evaluate the following expression. Round your answer to two decimal places.

$$\log_7 e$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.51.

Question 3b of 15 (3 Evaluating Logarithms 300101)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.48

Question: Evaluate the following expression. Round your answer to two decimal places.

$$\log_8 e$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.48.

Question 3c of 15 (3 Evaluating Logarithms 300102)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.56

Question: Evaluate the following expression. Round your answer to two decimal places.

$$\log_6 e$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
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	The correct answer is: 0.56.
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Question 4a of 15 (3 Evaluating Logarithms 91856)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.62

Question: Evaluate the following expression. Round your answer to two decimal places.

$$\log_5 e$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.62.

Question 4b of 15 (3 Evaluating Logarithms 300103)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.43

Question: Evaluate the following expression. Round your answer to two decimal places.

$$\log_{10} e$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.43.

Question 4c of 15 (3 Evaluating Logarithms 300104)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.37

Question: Evaluate the following expression. Round your answer to two decimal places.

$$\log_{15} e$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.37.

Question 5a of 15 (3 Evaluating Logarithms 91857)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 3

Question: Evaluate the following expression. You should do this problem without a calculator.

$$e^{\ln 3}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 3.

Question 5b of 15 (3 Evaluating Logarithms 300105)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 6

Question: Evaluate the following expression. You should do this problem without a calculator.

$$e^{\ln 6}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 6.

Question 5c of 15 (3 Evaluating Logarithms 300106)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 5

Question: Evaluate the following expression. You should do this problem without a calculator.

$$e^{\ln 5}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 5.

Question 6a of 15 (3 Evaluating Logarithms 91858)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: e

Question: Evaluate the following expression. You should do this problem without a calculator.

$$\ln e^e$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: e.

Question 6b of 15 (3 Evaluating Logarithms 300107)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: e

Question: Evaluate the following expression. You should do this problem without a calculator.

$$\ln e^e$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: e.

Question 6c of 15 (3 Evaluating Logarithms 300108)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: e

Question: Evaluate the following expression. You should do this problem without a calculator.

$$\ln e^e$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: e.

Question 7a of 15 (3 Evaluating Logarithms 91859)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 4

Question: Evaluate the following expression. You should do this problem without a calculator.

$$\log_4 256$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 4.

Question 7b of 15 (3 Evaluating Logarithms 300109)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 5

Question: Evaluate the following expression. You should do this problem without a calculator.

$$\log_2 32$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 5.

Question 7c of 15 (3 Evaluating Logarithms 300110)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 3

Question: Evaluate the following expression. You should do this problem without a calculator.

$$\log_5 125$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 3.

Question 8a of 15 (3 Evaluating Logarithms 91860)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2

Question: Evaluate the following expression. You should do this problem without a calculator.

$$\log_2 4$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.

Question 8b of 15 (3 Evaluating Logarithms 300111)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2

Question: Evaluate the following expression. You should do this problem without a calculator.

$$\log_{10} 100$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.

Question 8c of 15 (3 Evaluating Logarithms 300112)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2

Question: Evaluate the following expression. You should do this problem without a calculator.

$$\log_4 16$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.

Question 9a of 15 (3 Evaluating Logarithms 120037)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: n

Question: For any positive number b not equal to 1 and any number or variable n , evaluate the following expression.

$$\log_b(b^n) = \underline{\hspace{2cm}}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: n .

Question 9b of 15 (3 Evaluating Logarithms 300113)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: n

Question: For any positive number b not equal to 1 and any number or variable n , evaluate the following expression.

$$\log_b(b^n) = \underline{\hspace{2cm}}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: n .

Question 9c of 15 (3 Evaluating Logarithms 300114)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: n

Question: For any positive number b not equal to 1 and any number or variable n , evaluate the following expression.

$$\log_b(b^n) = \underline{\hspace{2cm}}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: n .

Question 10a of 15 (3 Evaluating Logarithms 120038)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: n

Question: For any positive number b not equal to 1 and any number or variable n , evaluate the following expression.

$$b^{\log_b n} = \underline{\hspace{2cm}}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: n .

Question 10b of 15 (3 Evaluating Logarithms 300115)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: n

Question: For any positive number b not equal to 1 and any number or variable n , evaluate the following expression.

$$b^{\log_b n} = \underline{\hspace{2cm}}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: n .

Question 10c of 15 (3 Evaluating Logarithms 300116)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: n

Question: For any positive number b not equal to 1 and any number or variable n , evaluate the following expression.

$$b^{\log_b n} = \underline{\hspace{2cm}}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: n .

Question 11a of 15 (3 Evaluating Logarithms 120042)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 35

Question: Complete the following equation.

$$\ln 5 + \ln 7 = \ln \underline{\hspace{2cm}}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 35.

Question 11b of 15 (3 Evaluating Logarithms 300117)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 42

Question: Complete the following equation.

$$\ln 6 + \ln 7 = \ln \underline{\hspace{2cm}}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 42.

Question 11c of 15 (3 Evaluating Logarithms 300118)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 40

Question: Complete the following equation.

$$\ln 5 + \ln 8 = \ln \underline{\hspace{2cm}}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 40.

Question 12a of 15 (3 Evaluating Logarithms 120043)

Maximum Attempts: 1

Question Type: Text Fill In Blank
Maximum Score: 2
Is Case Sensitive: false
Correct Answer: $4 \cdot \ln 3$, $4 \ln 3$, $4 \cdot \ln(3)$, $4 \ln(3)$, $4 \cdot \ln 3$, $4 \ln 3$, $4 \cdot \ln (3)$, $4 \ln (3)$
Question: Simplify the following expression. Use an asterisk (*) for multiplication.

$$\ln(3^4)$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: $4 \cdot \ln 3$.

Question 12b of 15 (3 Evaluating Logarithms 300119)

Maximum Attempts: 1
Question Type: Text Fill In Blank
Maximum Score: 2
Is Case Sensitive: false
Correct Answer: $5 \cdot \ln 3$, $5 \ln 3$, $5 \cdot \ln(3)$, $5 \ln(3)$, $5 \cdot \ln 3$, $5 \ln 3$, $5 \cdot \ln (3)$, $5 \ln (3)$
Question: Simplify the following expression. Use an asterisk (*) for multiplication.

$$\ln(3^5)$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: $5 \cdot \ln 3$.

Question 12c of 15 (3 Evaluating Logarithms 300120)

Maximum Attempts: 1
Question Type: Text Fill In Blank
Maximum Score: 2
Is Case Sensitive: false
Correct Answer: $3 \cdot \ln 2$, $3 \ln 2$, $3 \cdot \ln(2)$, $3 \ln(2)$, $3 \cdot \ln 2$, $3 \ln 2$, $3 \cdot \ln (2)$, $3 \ln (2)$

Question: Simplify the following expression. Use an asterisk (*) for multiplication.

$$\ln(2^3)$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 3*ln 2.

Question 13a of 15 (3 Evaluating Logarithms 120045)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2

Question: Evaluate the following expression.

$$\log_3 9$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 2.

Question 13b of 15 (3 Evaluating Logarithms 300122)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2

Question: Evaluate the following expression.

$$\log_9 81$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.

Question 13c of 15 (3 Evaluating Logarithms 300124)

Maximum Attempts: 1
Question Type: Numeric Fill In Blank
Maximum Score: 2
Correct Answer: 2
Question: Evaluate the following expression.

$$\log_8 64$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.

Question 14a of 15 (3 Evaluating Logarithms 120046)

Maximum Attempts: 1
Question Type: Numeric Fill In Blank
Maximum Score: 2
Correct Answer: 4
Question: Evaluate the following expression.

$$e^{\ln 4}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 4.

Question 14b of 15 (3 Evaluating Logarithms 300125)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 7

Question: Evaluate the following expression.

$$e^{\ln 7}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 7.

Question 14c of 15 (3 Evaluating Logarithms 300126)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2

Question: Evaluate the following expression.

$$e^{\ln 2}$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.

Question 15a of 15 (3 Evaluating Logarithms 120047)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.26

Question: Evaluate the following expression. Round your answer to two decimal

places.

$$\log_3 12$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.26.

Question 15b of 15 (3 Evaluating Logarithms 300127)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 3.32

Question: Evaluate the following expression. Round your answer to two decimal places.

$$\log_2 10$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 3.32.

Question 15c of 15 (3 Evaluating Logarithms 300128)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.81

Question: Evaluate the following expression. Round your answer to two decimal places.

$$\log_2 7$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.81.

PREVIEW

CLOSE

Quiz: Equivalent Exponential Expressions

Question 1a of 8 (2 Evaluating Exponential Expressions 91837)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$5^4 \cdot 5^x$$

Correct Answers:

	Choice
<input checked="" type="checkbox"/>	A. $625 \cdot 5^x$
<input type="checkbox"/>	B. 5^{4-x}
<input type="checkbox"/>	C. $(5 \cdot x)^4$
<input checked="" type="checkbox"/>	D. 5^{4+x}
<input type="checkbox"/>	E. 5^{4x}
<input type="checkbox"/>	F. 25^{4x}

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $625 \cdot 5^x$ and 5^{4+x} .

Question 1b of 8 (2 Evaluating Exponential Expressions 299657)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$7^3 \cdot 7^x$$

Correct Answers:

	Choice
A.	49^{3x}
B.	7^{3-x}
C.	$(7 \cdot x)^3$
D.	7^{3x}
*E.	7^{3+x}
*F.	$343 \cdot 7^x$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $343 \cdot 7^x$ and 7^{3+x} .

Question 1c of 8 (2 Evaluating Exponential Expressions 299658)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$3^4 \cdot 3^x$$

Correct Answers:

	Choice
A.	3^{4-x}
*B.	$81 \cdot 3^x$
C.	$(3 \cdot x)^4$
D.	3^{4x}
*E.	3^{4+x}
F.	9^{4x}

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $81 \cdot 3^x$ and 3^{4+x} .

Question 2a of 8 (2 Evaluating Exponential Expressions 91838)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$5^3 \cdot 5^x$$

Correct Answers:

	Choice
*A.	$125 \cdot 5^x$
*B.	5^{3+x}
C.	25^{3x}
D.	5^{3x}
E.	$(5 \cdot x)^3$
F.	5^{3-x}

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $125 \cdot 5^x$ and 5^{3+x} .

Question 2b of 8 (2 Evaluating Exponential Expressions 299659)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$2^5 \cdot 2^x$$

Correct Answers:

	Choice
A.	4^{5x}
B.	2^{5x}
*C.	$32 \cdot 2^x$
*D.	2^{5+x}
E.	$(2 \cdot x)^5$
F.	2^{5-x}

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $32 \cdot 2^x$ and 2^{5+x} .

Question 2c of 8 (2 Evaluating Exponential Expressions 299660)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$4^3 \cdot 4^x$$

Correct Answers:

	Choice
A.	$(4 \cdot x)^3$
*B.	4^{3+x}
C.	16^{3x}
D.	4^{3x}
*E.	$64 \cdot 4^x$
F.	4^{3-x}

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 4^{3+x} and $64 \cdot 4^x$.

Question 3a of 8 (2 Evaluating Exponential Expressions 91839)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$64^x$$

Correct Answers:

	Choice
A.	$8 \cdot 8^x$
*B.	8^{2x}
*C.	$8^x \cdot 8^x$
D.	$8^2 \cdot 8^x$
*E.	$(8 \cdot 8)^x$
F.	$8 \cdot 8^{2x}$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 8^{2x} , $8^x \cdot 8^x$, and $(8 \cdot 8)^x$.

Question 3b of 8 (2 Evaluating Exponential Expressions 299661)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$81^x$$

Correct Answers:

	Choice
*A.	9^{2x}
B.	$9 \cdot 9^x$
C.	$9^2 \cdot 9^x$
*D.	$9^x \cdot 9^x$
E.	$9 \cdot 9^{2x}$
*F.	$(9 \cdot 9)^x$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 9^{2x} , $9^x \cdot 9^x$, and $(9 \cdot 9)^x$.

Question 3c of 8 (2 Evaluating Exponential Expressions 299662)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$16^x$$

Correct Answers:

	Choice
*A.	4^{2x}
B.	$4 \cdot 4^{2x}$
C.	$4 \cdot 4^x$
D.	$4^2 \cdot 4^x$
*E.	$4^x \cdot 4^x$
*F.	$(4 \cdot 4)^x$

Attempt	Incorrect Feedback
1st	

	Correct Feedback
	Global Incorrect Feedback
	The correct answers are: 4^{2x} , $4^x \cdot 4^x$, and $(4 \cdot 4)^x$.

Question 4a of 8 (2 Evaluating Exponential Expressions 91840)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$25^x$$

Correct Answers:

	Choice
A.	$5 \cdot 5^x$
B.	$5^2 \cdot 5^x$
C.	$5 \cdot 5^{2x}$
*D.	$(5 \cdot 5)^x$
*E.	5^{2x}
*F.	$5^x \cdot 5^x$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $(5 \cdot 5)^x$, 5^{2x} , and $5^x \cdot 5^x$.

Question 4b of 8 (2 Evaluating Exponential Expressions 299663)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that

apply.

$$49^x$$

Correct Answers:

	Choice
*A.	$(7 \cdot 7)^x$
B.	$7^2 \cdot 7^x$
*C.	7^{2x}
D.	$7 \cdot 7^x$
E.	$7 \cdot 7^{2x}$
*F.	$7^x \cdot 7^x$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $(7 \cdot 7)^x$, 7^{2x} , and $7^x \cdot 7^x$.

Question 4c of 8 (2 Evaluating Exponential Expressions 299664)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$9^x$$

Correct Answers:

	Choice
*A.	$(3 \cdot 3)^x$
*B.	3^{2x}
C.	$3 \cdot 3^{2x}$
D.	$3 \cdot 3^x$
E.	$3^2 \cdot 3^x$
*F.	$3^x \cdot 3^x$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $(3 \cdot 3)^x$, 3^{2x} , and $3^x \cdot 3^x$.

Question 5a of 8 (2 Evaluating Exponential Expressions 91841)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\frac{21^x}{3^x}$$

Correct Answers:

	Choice
A.	$(21 - 3)^x$
B.	7
*C.	7^x
*D.	$\left(\frac{21}{3}\right)^x$
*E.	$\frac{7^x \cdot 3^x}{3^x}$
F.	3^x

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 7^x ,

	$\frac{7^x \cdot 3^x}{3^x} \text{ and } \left(\frac{21}{3}\right)^x$
--	--

Question 5b of 8 (2 Evaluating Exponential Expressions 299666)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\frac{27^x}{9^x}$$

Correct Answers:

	Choice
A.	$(27 - 9)^x$
*B.	$\left(\frac{27}{9}\right)^x$
C.	9^x
D.	9
*E.	$\frac{9^x \cdot 3^x}{9^x}$
*F.	3^x

Attempt	Incorrect Feedback
1st	

Correct Feedback

Global Incorrect Feedback
The correct answers are: 3^x , $\frac{9^x \cdot 3^x}{9^x}$, and $\left(\frac{27}{9}\right)^x$.

Question 5c of 8 (2 Evaluating Exponential Expressions 299667)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\frac{21^x}{7^x}$$

Correct Answers:

	Choice
A.	$(21 - 7)^x$
B.	3
*C.	3^x
D.	3^{x-7}
*E.	$\frac{7^x \cdot 3^x}{7^x}$
*F.	$\left(\frac{21}{7}\right)^x$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 3^x , $\frac{7^x \cdot 3^x}{7^x}$, and $\left(\frac{21}{7}\right)^x$.

Question 6a of 8 (2 Evaluating Exponential Expressions 91842)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\frac{25^x}{5^x}$$

Correct Answers:

	Choice
*A.	5^x

B.	5
*C.	$\left(\frac{25}{5}\right)^x$
*D.	$\frac{5^x \cdot 5^x}{5^x}$
E.	$(25 - 5)^x$
F.	25^x

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: 5^x , $\left(\frac{25}{5}\right)^x$, and $\frac{5^x \cdot 5^x}{5^x}$.

Question 6b of 8 (2 Evaluating Exponential Expressions 299668)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\frac{16^x}{4^x}$$

Correct Answers:

	Choice
A.	4
*B.	4^x
*C.	$\left(\frac{16}{4}\right)^x$
*D.	$\frac{4^x \cdot 4^x}{4^x}$
E.	$(16 - 4)^x$
F.	16^x

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answers are: 4^x , $\left(\frac{16}{4}\right)^x$, and $\frac{4^x \cdot 4^x}{4^x}$.

Question 6c of 8 (2 Evaluating Exponential Expressions 299670)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$\frac{36^x}{6^x}$$

Correct Answers:

	Choice
A.	$(36 - 6)^x$
B.	6
*C.	$\left(\frac{36}{6}\right)^x$
*D.	$\frac{6^x \cdot 6^x}{6^x}$
*E.	6^x
F.	36^x

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answers are: 6^x , $\frac{6^x \cdot 6^x}{6^x}$, and $\left(\frac{36}{6}\right)^x$.

Question 7a of 8 (2 Evaluating Exponential Expressions 91843)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$5^x$$

Correct Answers:

	Choice
*A.	$\frac{15^x}{3^x}$
B.	x^5
C.	$5 \bullet 5^{x+1}$
*D.	$\left(\frac{15}{3}\right)^x$
*E.	$5 \bullet 5^{x-1}$
F.	$\frac{15^x}{3}$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $5 \bullet 5^{x-1}$, $\frac{15^x}{3^x}$, and $\left(\frac{15}{3}\right)^x$.

Question 7b of 8 (2 Evaluating Exponential Expressions 299671)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$3^x$$

Correct Answers:

	Choice
*A.	$\frac{15^x}{5^x}$
B.	x^3
C.	$3 \bullet 3^{x+1}$
D.	$\frac{15^x}{5}$
*E.	$\left(\frac{15}{5}\right)^x$
*F.	$3 \bullet 3^{x-1}$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $3 \bullet 3^{x-1}$, $\frac{15^x}{5^x}$, and $\left(\frac{15}{5}\right)^x$.

Question 7c of 8 (2 Evaluating Exponential Expressions 299672)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$3^x$$

Correct Answers:

	Choice
*A.	$\left(\frac{18}{6}\right)^x$
B.	x^3
*C.	$\frac{18^x}{6^x}$

D.	$3 \bullet 3^{x+1}$
*E.	$3 \bullet 3^{x-1}$
F.	$\frac{18^x}{3}$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $3 \bullet 3^{x-1}$, $\frac{18^x}{3^x}$, and $\left(\frac{18}{6}\right)^x$.

Question 8a of 8 (2 Evaluating Exponential Expressions 91844)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$9^x$$

Correct Answers:

	Choice
*A.	$9 \bullet 9^{x-1}$
*B.	$\left(\frac{36}{4}\right)^x$
C.	$9 \bullet 9^{x+1}$
D.	$\frac{36^x}{4}$
*E.	$\frac{36^x}{4^x}$
F.	x^5

Attempt	Incorrect Feedback
1st	

	Correct Feedback
	Global Incorrect Feedback
	The correct answers are: $9 \cdot 9^{x-1}$, $\left(\frac{36}{4}\right)^x$, and $\frac{36^x}{4^x}$.

Question 8b of 8 (2 Evaluating Exponential Expressions 299673)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$8^x$$

Correct Answers:

	Choice
A.	x^4
*B.	$\left(\frac{32}{4}\right)^x$
C.	$8 \cdot 8^{x+1}$
*D.	$\frac{32^x}{4^x}$
E.	$\frac{32^x}{4}$
*F.	$8 \cdot 8^{x-1}$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $8 \cdot 8^{x-1}$, $\frac{32^x}{4^x}$, and $\left(\frac{32}{4}\right)^x$.

Question 8c of 8 (2 Evaluating Exponential Expressions 299674)

Maximum Attempts: 1

Question Type: Multiple Response

Maximum Score: 2

Question: Which expressions are equivalent to the one below? Check all that apply.

$$10^x$$

Correct Answers:

	Choice
A.	$\frac{50^x}{5}$
*B.	$10 \cdot 10^{x-1}$
C.	$10 \cdot 10^{x+1}$
*D.	$\frac{50^x}{5^x}$
*E.	$\left(\frac{50}{5}\right)^x$
F.	x^5

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answers are: $10 \cdot 10^{x-1}$, $\frac{50^x}{5^x}$, and $\left(\frac{50}{5}\right)^x$.

PREVIEW

CLOSE

Quiz: Solving Exponential Equations

Question 1a of 15 (3 Solving Exponential Equations 91861)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.77

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$e^x = 5.9$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.77.

Question 1b of 15 (3 Solving Exponential Equations 300211)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.93

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$e^x = 6.9$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.93.

Question 1c of 15 (3 Solving Exponential Equations 300212)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.07

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$e^x = 7.9$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 2.07.

Question 2a of 15 (3 Solving Exponential Equations 91862)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.87

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$e^x = 6.5$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 1.87.

Question 2b of 15 (3 Solving Exponential Equations 300213)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.7

Question: Solve the equation for x . Round your answer to two decimal places, and

do not include "x =" in your answer.

$$e^x = 5.5$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.70.

Question 2c of 15 (3 Solving Exponential Equations 300214)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.5

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$e^x = 4.5$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.50.

Question 3a of 15 (3 Solving Exponential Equations 91863)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.02

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$3^x = 9.1999$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.02.

Question 3b of 15 (3 Solving Exponential Equations 300215)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.6

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$4^x = 9.1999$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.60.

Question 3c of 15 (3 Solving Exponential Equations 300218)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.38

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$5^x = 9.1999$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
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	The correct answer is: 1.38.
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Question 4a of 15 (3 Solving Exponential Equations 91864)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.51

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$2^x = 5.6962$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.51.

Question 4b of 15 (3 Solving Exponential Equations 300219)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.58

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$3^x = 5.6962$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.58.

Question 4c of 15 (3 Solving Exponential Equations 300220)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.25

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$4^x = 5.6962$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.25.

Question 5a of 15 (3 Solving Exponential Equations 91865)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.37

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$3 \cdot e^x = 11.76$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.37.

Question 5b of 15 (3 Solving Exponential Equations 300221)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.16

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$4 \cdot e^x = 12.76$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 1.16.

Question 5c of 15 (3 Solving Exponential Equations 300222)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.15

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$5 \cdot e^x = 15.76$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 1.15.

Question 6a of 15 (3 Solving Exponential Equations 91866)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.51

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$4 \cdot 8^x = 11.48$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.51.

Question 6b of 15 (3 Solving Exponential Equations 300223)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.42

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$5 \cdot 9^x = 12.48$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.42.

Question 6c of 15 (3 Solving Exponential Equations 300224)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.64

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$3 \cdot 7^x = 10.48$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.64.

Question 7a of 15 (3 Solving Exponential Equations 91867)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.35

Question: Solve the equation for x . Round your answer to two decimal places and enter it below, as an expression (i.e., do not include " $x =$ " in your answer).

$$7 \cdot e^x = 27.09$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.35.

Question 7b of 15 (3 Solving Exponential Equations 300225)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.54

Question: Solve the equation for x . Round your answer to two decimal places and enter it below, as an expression (i.e., do not include " $x =$ " in your answer).

$$6 \cdot e^x = 28.09$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.54.

Question 7c of 15 (3 Solving Exponential Equations 300226)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.79

Question: Solve the equation for x . Round your answer to two decimal places and enter it below, as an expression (i.e., do not include " $x =$ " in your answer).

$$5 \cdot e^x = 30.09$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.79.

Question 8a of 15 (3 Solving Exponential Equations 91868)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.68

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$8 \cdot 9^x = 35.68$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.68.

Question 8b of 15 (3 Solving Exponential Equations 300227)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.78

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$9 \cdot 8^x = 45.68$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 0.78.

Question 8c of 15 (3 Solving Exponential Equations 300228)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.94

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$7 \cdot 9^x = 55.68$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 0.94.

Question 9a of 15 (3 Solving Exponential Equations 120054)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: -0.69

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$e^x = 0.5$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: -0.69.

Question 9b of 15 (3 Solving Exponential Equations 300229)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: -0.51

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$e^x = 0.6$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: -0.51.

Question 9c of 15 (3 Solving Exponential Equations 300230)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: -0.36

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$e^x = 0.7$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: -0.36.

Question 10a of 15 (3 Solving Exponential Equations 120055)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.49

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$5^x = 55$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.49.

Question 10b of 15 (3 Solving Exponential Equations 300231)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.23

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$7^x = 77$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.23.

Question 10c of 15 (3 Solving Exponential Equations 300232)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.34

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$6^x = 66$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.34

Question 11a of 15 (3 Solving Exponential Equations 120056)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.64

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$3 \cdot e^x = 42$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.64.

Question 11b of 15 (3 Solving Exponential Equations 300233)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.56

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$4 \cdot e^x = 52$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.56.

Question 11c of 15 (3 Solving Exponential Equations 300234)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.52

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$5 \bullet e^x = 62$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.52.

Question 12a of 15 (3 Solving Exponential Equations 120057)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.02

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$6 \bullet 4^x = 99$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.02.

Question 12b of 15 (3 Solving Exponential Equations 300235)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.83

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$7 \cdot 4^x = 89$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.83.

Question 12c of 15 (3 Solving Exponential Equations 300236)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.12

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$5 \cdot 4^x = 95$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.12.

Question 13a of 15 (3 Solving Exponential Equations 120058)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.8

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$4e^{2x} + 16 = 36$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 0.80.

Question 13b of 15 (3 Solving Exponential Equations 300237)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.8

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$5e^{2x} + 16 = 41$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 0.80.

Question 13c of 15 (3 Solving Exponential Equations 300238)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 0.8

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$3e^{2x} + 16 = 31$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 0.80.

Question 14a of 15 (3 Solving Exponential Equations 120060)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: simplify

Question: Sometimes you'll need to _____ more complicated exponential equations before using the strategies you learned.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: simplify.

Question 14b of 15 (3 Solving Exponential Equations 300239)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: simplify

Question: Sometimes you'll need to _____ more complicated exponential equations before using the strategies you learned.

Attempt	Incorrect Feedback
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1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: simplify.

Question 14c of 15 (3 Solving Exponential Equations 300240)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: simplify

Question: Sometimes you'll need to _____ more complicated exponential equations before using the strategies you learned.

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: simplify.

Question 15a of 15 (3 Solving Exponential Equations 120061)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: a

Question: To solve an equation of the form $a \cdot b^x = d$, you should first divide both sides by the coefficient _____.

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback

	The correct answer is: a .
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Question 15b of 15 (3 Solving Exponential Equations 300241)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: c

Question: To solve an equation of the form $a \cdot b^x + c = d$, you should first subtract both sides by the constant _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: c .

Question 15c of 15 (3 Solving Exponential Equations 300242)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: a

Question: To solve an equation of the form $a \cdot b^x = d$, you should first divide both sides by the coefficient _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: a .

PREVIEW

CLOSE

Quiz: Solving Logarithmic Equations

Question 1a of 15 (3 Solving Logarithmic Equations 91907)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 18.38

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$\log_4 x = 2.1$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 18.38.

Question 1b of 15 (3 Solving Logarithmic Equations 300265)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 29.37

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$\log_5 x = 2.1$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 29.37.

Question 1c of 15 (3 Solving Logarithmic Equations 300266)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 43.06

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$\log_6 x = 2.1$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 43.06.

Question 2a of 15 (3 Solving Logarithmic Equations 91908)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 12.51

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$\log_3 x = 2.3$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 12.51.

Question 2b of 15 (3 Solving Logarithmic Equations 300267)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 5.66

Question: Solve the equation for x . Round your answer to two decimal places, and

do not include "x =" in your answer.

$$\log_2 x = 2.5$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 5.66.

Question 2c of 15 (3 Solving Logarithmic Equations 300268)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 11.21

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$\log_3 x = 2.2$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 11.21.

Question 3a of 15 (3 Solving Logarithmic Equations 91909)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 134.22 - 134.29

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$\ln x = 4.9$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 134.29.

Question 3b of 15 (3 Solving Logarithmic Equations 300269)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 364.81 - 365.04

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$\ln x = 5.9$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 365.04.

Question 3c of 15 (3 Solving Logarithmic Equations 300270)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 991.57 - 992.27

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$\ln x = 6.9$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
--	----------------------------------

	The correct answer is: 992.27.
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Question 4a of 15 (3 Solving Logarithmic Equations 91910)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 60.31 - 60.34

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$\ln x = 4.1$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 60.34.

Question 4b of 15 (3 Solving Logarithmic Equations 300272)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 22.19 - 22.2

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$\ln x = 3.1$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 22.20.

Question 4c of 15 (3 Solving Logarithmic Equations 300273)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 8.16 - 8.17

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$\ln x = 2.1$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 8.17.

Question 5a of 15 (3 Solving Logarithmic Equations 91911)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 9.02 - 9.03

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$15.4 = 7 \cdot \ln x$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 9.03.

Question 5b of 15 (3 Solving Logarithmic Equations 300274)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 6.05

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$14.4 = 8 \bullet \ln x$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 6.05.

Question 5c of 15 (3 Solving Logarithmic Equations 300275)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 9.33

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$13.4 = 6 \bullet \ln x$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 9.33.

Question 6a of 15 (3 Solving Logarithmic Equations 91912)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 16.44

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$2 \bullet \ln x = 5.6$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 16.44.

Question 6b of 15 (3 Solving Logarithmic Equations 300276)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 12.59 - 12.6

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$3 \bullet \ln x = 7.6$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 12.60.

Question 6c of 15 (3 Solving Logarithmic Equations 300277)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 8.58

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$4 \bullet \ln x = 8.6$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 8.58.

Question 7a of 15 (3 Solving Logarithmic Equations 91913)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 13.46

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$5 + 8 \cdot \ln x = 25.8$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 13.46.

Question 7b of 15 (3 Solving Logarithmic Equations 300278)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 16.92

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$6 + 7 \cdot \ln x = 25.8$$

Attempt	Incorrect Feedback
1st	
	Correct Feedback
	Global Incorrect Feedback
	The correct answer is: 16.92.

Question 7c of 15 (3 Solving Logarithmic Equations 300279)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 11.27

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$4 + 9 \bullet \ln x = 25.8$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 11.27.

Question 8a of 15 (3 Solving Logarithmic Equations 91914)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 13.46

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$7 + 6 \bullet \ln x - 22.6 = 0$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 13.46.

Question 8b of 15 (3 Solving Logarithmic Equations 300280)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 10.71

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$6 + 7 \bullet \ln x - 22.6 = 0$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 10.71.

Question 8c of 15 (3 Solving Logarithmic Equations 300281)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 18.54

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$8 + 5 \cdot \ln x - 22.6 = 0$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 18.54.

Question 9a of 15 (3 Solving Logarithmic Equations 120063)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 19.42

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$\log_3 x = 2.7$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 19.42.

Question 9b of 15 (3 Solving Logarithmic Equations 300282)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 10.56

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$\log_4 x = 1.7$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 10.56.

Question 9c of 15 (3 Solving Logarithmic Equations 300283)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 11.18

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$\log_5 x = 1.5$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 11.18.

Question 10a of 15 (3 Solving Logarithmic Equations 120064)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.22

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$\ln x = 0.2$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.22.

Question 10b of 15 (3 Solving Logarithmic Equations 300284)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.35

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$\ln x = 0.3$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.35.

Question 10c of 15 (3 Solving Logarithmic Equations 300285)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 1.49

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$\ln x = 0.4$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 1.49.

Question 11a of 15 (3 Solving Logarithmic Equations 120065)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 148.34 - 148.41

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$3 \bullet \ln x = 15$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 148.41.

Question 11b of 15 (3 Solving Logarithmic Equations 300286)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 403.18 - 403.43

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$3 \bullet \ln x = 18$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 403.43.

Question 11c of 15 (3 Solving Logarithmic Equations 300287)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 20.08 - 20.09

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$7 \bullet \ln x = 21$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 20.09.

Question 12a of 15 (3 Solving Logarithmic Equations 120066)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.83

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$5 + 6 \bullet \log_2 x = 14$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.83.

Question 12b of 15 (3 Solving Logarithmic Equations 300288)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 2.21

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$6 + 7 \bullet \log_2 x = 14$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 2.21.

Question 12c of 15 (3 Solving Logarithmic Equations 300289)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: 5.66

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$4 + 4 \bullet \log_2 x = 14$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: 5.66.

Question 13a of 15 (3 Solving Logarithmic Equations 120069)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: -2400

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$\log_7(1 - x) = 4$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: -2400.

Question 13b of 15 (3 Solving Logarithmic Equations 300290)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: -1295

Question: Solve the equation for x. Round your answer to two decimal places, and do not include "x =" in your answer.

$$\log_6(1 - x) = 4$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: -1295.

Question 13c of 15 (3 Solving Logarithmic Equations 300291)

Maximum Attempts: 1

Question Type: Numeric Fill In Blank

Maximum Score: 2

Correct Answer: -342

Question: Solve the equation for x . Round your answer to two decimal places, and do not include " $x =$ " in your answer.

$$\log_7(1 - x) = 3$$

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: -342.

Question 14a of 15 (2 Solving Logarithmic Equations 329795)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: You can solve an equation of the form $\log_b x = a$ by using the definition of a logarithm to write an equivalent exponential equation.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback
The correct answer is: True.

Question 14b of 15 (2 Solving Logarithmic Equations 329796)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: You can solve an equation of the form $\log_b x = a$ by using the definition of a logarithm to write an equivalent exponential equation.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback
The correct answer is: True.

Question 14c of 15 (2 Solving Logarithmic Equations 329797)

Maximum Attempts: 1

Question Type: True-False

Maximum Score: 2

Question: You can solve an equation of the form $\log_b x = a$ by using the definition of a logarithm to write an equivalent exponential equation.

	Choice	Feedback
*A.	True	
B.	False	

Global Incorrect Feedback

The correct answer is: True.

Question 15a of 15 (2 Solving Logarithmic Equations 120071)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: a

Question: Sometimes you'll need to simplify more complicated logarithmic equations before using the strategy you learned. For example, to solve an equation of the form $a \bullet \log_b x = d$, you should first divide both sides of the equation by the coefficient _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: <i>a</i> .

Question 15b of 15 (2 Solving Logarithmic Equations 300294)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: c

Question: Sometimes you'll need to simplify more complicated logarithmic

equations before using the strategy you learned. For example, to solve an equation of the form $c + a \bullet \log_b x = d$, you should first subtract both sides of the equation by the constant _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: c .

Question 15c of 15 (2 Solving Logarithmic Equations 300295)

Maximum Attempts: 1

Question Type: Text Fill In Blank

Maximum Score: 2

Is Case Sensitive: false

Correct Answer: a

Question: Sometimes you'll need to simplify more complicated logarithmic equations before using the strategy you learned. For example, to solve an equation of the form $a \bullet \log_b x = d$, you should first divide both sides of the equation by the coefficient _____.

Attempt	Incorrect Feedback
1st	

	Correct Feedback

	Global Incorrect Feedback
	The correct answer is: a .
