S17 ABC2 - FINAL (10603801)

Due: Fri, May 5, 2017 02:45 PM EDT

Question | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 | 15 | 16 | 17 | 18 | 19 | 20

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1. Question Details ABC TangLine V1 slope-int form mod1 [2644848]

Find the equation for the line tangent to the curve $y = 3+x^2$ at $x = 2$. Give your answer in *slope-intercept* form.

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2. Question Details ABC trig_inverse arctan [2639320]

Find the exact value of:

(a) $\arctan\left(0\right)$

(Enter your answer in radians.)

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3. Question Details ABC SPECIAL 3 - Q3 V1 [2694586]

Solve for t :

$$\frac{2t+3}{t} = -2.$$

$t =$

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4. Question Details ABC complete_square V1 [2599922]

Rewrite by completing the square:

$y^2-10y+29 =$.

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5. Question Details ABC SPECIAL 3 - Q5 v1 [2694587]

Find the exact value of:

$\cos\left(\frac{\pi}{6}\right) =$

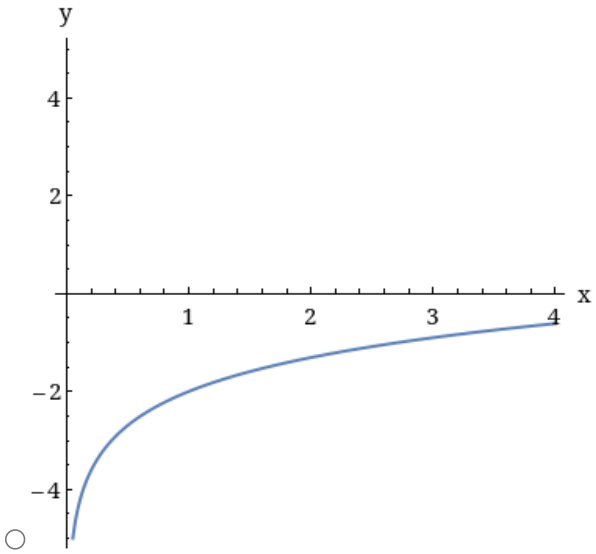
6. Question Details ABC explog/natural V1 Rev1 (med) [2654245]

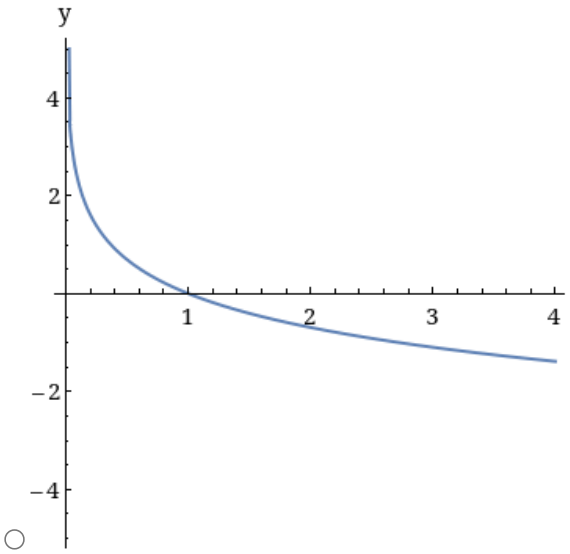
Simplify as far as you can :

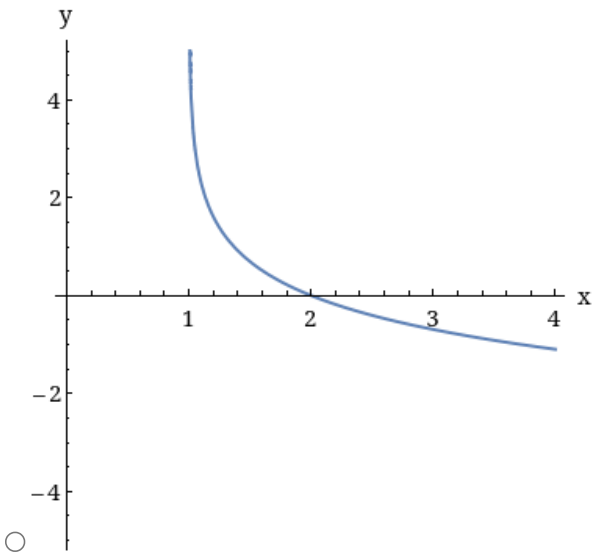
$$\ln\left(9e^3\right) - \ln\left(3\,e^2\right)$$

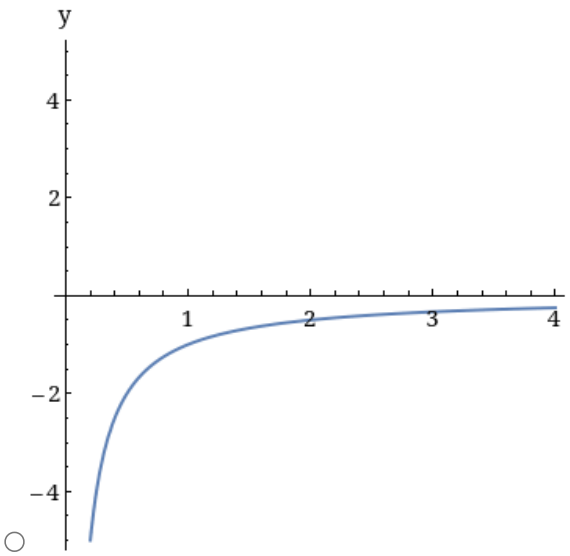
7. Question Details ABC SPECIAL 2 Q7 [2690957]

Which graph shows the function $y=f(x) = -\ln(x)$









8. Question Details ABC SPECIAL 3 Q8 V1 [2694588]

Solve for t :

$$\log_{10}(t+2) = 0.$$

$t =$

9. Question Details ABC SPECIAL Q9 V1 [2679364]

If $f(t) = -2t^4 - 5t^2 - 7t - 10$,
then find the derivative

$f'(t) =$

10. Question Details ABC SPECIAL 3 Q10 V1 [2694589]

If $f(t) = 2\sin(t)$,
then find the derivative

$f\,'(t) =$

11. Question Details ABC SPECIAL 3 Q11 V1 [2694590]

If $y = 2e^{4x}$,
then find the derivative

$\frac{dy}{dx} =$

12. Question Details ABC SPECIAL 3 Q12 V1 [2694591]

If $y = \ln\left(x^6\right)$,
then find the derivative

$\frac{dy}{dx} =$

13. Question Details ABC SPECIAL 3 Q13 V1 [2694592]

Find the derivative of $f(x) = \sqrt{x}\left(3+e^x\right)$.

$f\,'(x) =$

14. Question Details ABC SPECIAL 3 Q14 V1 [2694593]

Find the derivative of $f(x) = \frac{4-3x}{\sin x}$.

$f\,'(x) =$

15. Question Details ABC SPECIAL 3 Q15 V1 [2694594]

Find the derivative of $f(x) = \dfrac{x^3}{\cos(x)}$.

$f'(x) =$ _____

16. Question Details ABC aderiv 2.0 V3 (sqrt) [2694595]

Find a function $f(t)$ whose derivative is:
$f'(t) = \sqrt{t} + 4\sin(t)$.

$f(t) =$ _____ $+ C$.

17. Question Details ABC SPECIAL 3 Q17 V1 [2694598]

Evaluate the indefinite integral:

$\int \sin\left(4x+1\right) dx =$ _____ $+ C$.

18. Question Details ABC SPECIAL 3 Q18 V1 [2694599]

Evaluate the indefinite integral:

$$\int \frac{4x^2}{x^3+4}\,dx = \text{\_\_\_\_\_} + C.$$

19. Question Details ABC SPECIAL 3 Q19 V1 [2694600]

Evaluate the definite integral:

$\int_0^2 t^2+1\ dt =$ _____ .

20. Question Details ABC SPECIAL 3 Q20 V1 [2694601]

Evaluate the definite integral:

$\int_0^{\pi/3} \cos(2t)\ dt =$ _____ .

Assignment Details