

Mathematics for Veterinary Technicians
Test 2 Practice

Name: _____ Date: _____

Questions cover work from chapter 1 thru 9. Show your work!!!!

Identify the correct concentration from the following medicine bottles and tablets. Write your answers to the right of the label or bottle.

<p>NDC 0093-3147-01 New Product Appearance CEPHALEXIN Capsules USP 500 mg*</p> <p>Rx only</p> <p>100 CAPSULES TEVA</p>	1.		<p>NDC 0002-1031-02 100 TABLETS No. 1544</p> <p style="text-align: center;"><i>Lilly</i> </p> <p>PHENOBARBITAL TABLETS, USP 15 mg</p> <p>WARNING—May be habit forming.</p>	2.	
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3. Compute the answers:

a. 27.12×9.82

b. 0.575×2.87

4. Compute the answers to two decimal places:

a. $25.025 \div 0.78$

b. $982.4 \div 1.31$

5. Convert the following to scientific notation:

a. 12,435,000,000

_____ . _____ x 10

b. 0.0001025

_____ . _____ x 10

6. Convert the following to standard notation:

c. 3.907×10^7

d. 9.335×10^{-7}

7. Change to percent

a. $2\frac{1}{8}$

b. $\frac{5}{8}$

c. -3.99

d. 7.99

8. What is

a. 35% of 56 kg

b. 11.1% of 32kg

c. 3.75% of 200 ml

d. 0.75% of 13 oz

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9. Change to decimal

a. 81% b. 0.55%

c. 133% d. 0.05%

10. Change to a fraction (lowest terms please)

a. -65% b. 44%

c. 55.5% d. 0.33%

11. We ordered 312 kilogram of lab chemicals.

a. What percentage did we use if we utilized 77 lbs?

b. What percentage is left over?

12. Convert the following to the proper unit of measurement

a. 35 g / 100 ml b. 0.1 g / 100 ml

13. Convert the following to the proper unit of measurement

a. 11g of dextrose in 100 ml solution b. 14.99 ml of sodium chloride in 100 ml solution

14. Convert the following Packed Cell Numbers to the proper unit of measurement

a. 55 dog₁ b. 60 dog₂

15. Convert the following solutions to percents

a. 26 ml of dextrose in 100 ml b. 15.5 ml of formalin in 100 ml

c. 0.25 ml of formalin in 100 ml d. 6 ml of formalin in 100 ml

16. Reduce the ratio to fraction form

a. 9:45 b. 15:100

17. Solve the following. Be sure to show units where applicable

a. $\frac{70 \text{ mg}}{1 \text{ cap}} = \frac{N \text{ mg}}{12 \text{ cap}}$

b. $\frac{76 \text{ mg}}{100 \text{ ml}} = \frac{50 \text{ mg}}{N \text{ ml}}$

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18. Calculate the conversion and show the calculation in the box to the right of the answer

10 tsp =	<input type="text"/>	ml	<input type="text"/>
200 kg =	<input type="text"/>	lb	<input type="text"/>
45 cm =	<input type="text"/>	in	<input type="text"/>
2500 ml =	<input type="text"/>	L	<input type="text"/>
3 fl oz =	<input type="text"/>	ml	<input type="text"/>
1.35 kg =	<input type="text"/>	g	<input type="text"/>
88 mg =	<input type="text"/>	g	<input type="text"/>
3 gal =	<input type="text"/>	qt	<input type="text"/>
12 qt =	<input type="text"/>	c	<input type="text"/>
6 pt =	<input type="text"/>	c	<input type="text"/>
150 ml =	<input type="text"/>	L	<input type="text"/>
4 tbsp =	<input type="text"/>	fl oz	<input type="text"/>
0.5 gr =	<input type="text"/>	mg	<input type="text"/>
50 gr =	<input type="text"/>	mg	<input type="text"/>
0.5 gal =	<input type="text"/>	cups	<input type="text"/>
7 qts =	<input type="text"/>	gal	<input type="text"/>
20°C =	<input type="text"/>	°F	<input type="text"/>
-5°F =	<input type="text"/>	°C	<input type="text"/>

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19. Our X-rays in 2012 were \$50. This year they will be 8% higher. What will be the new cost?
20. If 1 tablet contains 65 mg of drug, how many milligrams of drug does 10 tablets have?
21. We have 5 dogs for every 2 cats. What is the ratio of cats to dogs?
22. The veterinarians orders 375 mg of medication in every 100 ml of liquid. How much medication is required in 350 ml of liquid?
23. Tonya works at an animal clinic and receives a 10% discount. What would Tonya pay for the \$500 treatment?
24. A patient receives a total of 65g of medication. If the patient received the total over a 10-day period and was given 3 doses a day, what was the strength of each dose?
25. When performing an estimate platelet count, these cells are counted per high power field and the total from 10 fields are all added together. Next this is multiplied by 15000. You observe 10 fields and the fields have a total number of 88 platelets. What is the final count of platelets? Please provide your answer in scientific notation.