1.

2. Consider the image below.



The length of the pencil is \_\_\_\_\_

- a. 12 cm
- b. 12.4 cm
- c. 12.40 cm
- d. 12.5 cm

3. A tablet contains 250 mg of penicillin while the solution form of the same antibiotic contains 250 mg of penicillin/5 mL. If a doctor was to prescribe that one-half of a scored tablet be taken four times a day, how many mL of the solution would be equivalent to this daily dosage?

- a. 5.0 mL
- b. 20. mL
- c. 2.5 mL
- d. 10. mL

4. Aluminum has a density of 2.70 g/ mL. What volume is occupied by a block of aluminum that weighs 4.32 kg?

- a. 0.000625 mL
- b. 0.625 mL
- c. 1.60 mL
- d. 1.60 L

5. Fill in the blanks, respectively, with a letter (A or B) to represent the balance and more or less to describe the precision.

The density of a metal block was determined based on mass measurements using two different balances. The results are shown below.

Density (g/mL)	Density (g/mL)
Balance A	Balance B

9.76	9.89
9.59	9.78
9.89	9.99

The density determined using balance \_\_\_\_\_\_ is \_\_\_\_\_ precise.

ANSWER: A, less B, more

6. Fill in the blank with the appropriate number (0, 1, 2, 3 etc.).

The following calculation was carried out to determine the volume of a rectangular solid.

 $15.55 \text{ cm} \times 12.0 \text{ cm} \times 0.557 \text{ cm} = 105.80233350 \text{ cm}^3$ 

The answer should be

- a. 110
- b. 106
- c. 105
- d. 105.8
- e. 105.80
- 7. In an ampule, Sublimaze 2 mL containing 50 mcg/mL is available. The order is to administer Sublimaze 0.05 mg intravenously (IV). (Note: mcg is another abbreviation for  $\mu$ g.)
- a. How many mcg will you be giving?
- b. How many mL will you be giving?

## Answers:

- 1 removed
- 2 c
- 3 d
- 4 d
- 5 A less, B more
- 6 b
- 7 a: 50 mcg
  - b: 1 mL