From Week 1

NR 226 Math Calculation Practice

Week 1

1. A person with diabetes admitted with hyperglycemia is to receive 12.5 mg of Glyburide by mouth daily. The available supply of the medication is 5 mg tablets that are scored in half.
   How many tablets should the nurse administer? ← remember a nurse gives a dose of medication

tabs $\frac{1\text{ tab}}{5\text{ mg}} \times \frac{12.5\text{ mg}}{D} = \frac{12.5\text{ mg}}{5\text{ mg}} =$ 2.5 tabs

2. A patient has an order to receive erythromycin 7 g IVPB BID. The pharmacy sends erythromycin 400 mg/5 mL. How many mL should the nurse administer? (Round to the tenth, if needed)

mL $\frac{5\text{ mL}}{400\text{ mg}} \times \frac{1000\text{ mg}}{1\text{ g}} \times \frac{7\text{ g}}{D} = \frac{35{,}000}{400} =$ 87.5 mL

3. A patient is to receive 7500 units of heparin SQ TID. The nurse has on hand 10,000 units/ 1mL. How many mL should the nurse administer? (Round to the tenth, if needed)

mL $\frac{1\text{ mL}}{10{,}000\text{ U}} \times \frac{7500\text{ U}}{D} = \frac{7500}{10{,}000} = 0.75 =$ 0.8 mL

4. A If 1 L of water weighs 1 kg, and the patient gains 18 lbs in 2 days, what is the patient's weight gain in kg? (Round to the hundredth, if needed) B Approximately how many liters of water did this patient gain in 2 days?

A. $\frac{18\text{ lbs}}{2.2} = 8.181818 = 8.18\text{ kg}$ $\frac{1\text{ L}}{1\text{ kg}} \times \frac{8.18\text{ kg}}{?} = 8.18\text{ L}$ or about 8 L

I = 900mL. O = 670mL

5. The nurse is caring for a patient with fluid restrictions. The nurse needs to perform accurate I/O for this patient. Calculate the patient's 4 hour intake and output amounts:

Intake: 6 oz water, 1 cup of coffee, 4 oz of jello, IV NS rate of 90mL/hr
Output: Chest tube drainage-280 mL, Foley- 310, ~~Hemovac drain-80~~

6 oz H_2O
8 oz Coffee
4 oz Jello

18 oz × (30) + 360 = 900mL + 90 × 4 hr = 360mL

6. A patient is to receive Solucortef 1600 mg/day divided in 6 doses. How many mg of Solucortef will the patient receive with each dose? (Round to the hundredth place)
   How many mg will the patient receive in 12 hours? (Round to the hundredth place)

1600mg ÷ 6 = 266.666 = 266.67 mg / dose
266.67 × 3 = 800.01 mg / 12 hrs

7. The healthcare provider orders Erythromycin 100 mg in ~~250 mL Normal Saline~~. The infusion device is set at 50mL/hour. How many hours will it take to infuse the IV medication? (Give the answer in hours)

50mL / hr

→ asking hrs — $\frac{1\text{ hr}}{50\text{ mL}} \times \frac{250\text{ mL}}{D} = \frac{250}{50} =$ 5 hrs