① $\frac{90\text{mg}}{5\text{ml}} = \frac{2.5\text{mg}}{x}$

$40x = 12.5$

$x = 0.31$ per dose

② $\frac{250\text{mg}}{1\text{ml}} = \frac{200\text{mg}}{x}$

$250x = 200$

$x = 0.8\text{ml}$

③ 66 lb = 30 Kg $66/2.2 = 30$

④ 10mg = 10,000 mcg $10 \times 1000 = 10{,}000$

⑤ 50,000mg = 50 gm $50{,}000 \div 1000 = 50\text{gm}$

⑥ 5000 g = 5 Kg $5000 \div 1000 = 5\text{gm}$

⑦ $\frac{50\text{mg}}{1\text{ml}} = \frac{30\text{mg}}{x}$

$50x = 30$

$x = 0.6\text{ml}$

27.2 lbs = 12.36 = 12.4 Kg

1mg / Kg = 12.4 mg

2mg / Kg = 24.8 mg

dose a little high

(8) 88 lbs = 40 kg

0.4 mg/kg/dose = 40 x 0.4 = 16 mg/dose

$$\frac{2\text{ mg}}{0.5\text{ ml}} = \frac{16\text{ mg}}{X}$$

$2X = 16 \times 0.5$

$2X = 8$

$X = 4$ ml/dose

(9) 1500ml over 12 hours

1500ml ÷ 12 = 125 ml/Hr

(10) $\frac{1\text{ gram}}{50\text{ml}}$ 50ml over 30 minutes

$$\frac{60\text{ gtts}}{1\text{ml}} = \frac{X\text{ gtts}}{50\text{ml}}$$

$X = 60 \times 50$

$X = 3000$ gtts

3000 gtts ÷ 30 min = 100 gtts/min

(11) $\frac{1\ gram}{50\ ml}$

$\frac{15\ gtt}{1\ ml} = \frac{X\ gtt}{50\ ml}$

$1X = 750\ gtt$

$750\ gtts \div 45\ min = 16.67 = \underline{17\ gtt/min}$

(12) $200\ lbs = 90.9\ Kg$

$1.5\ mg/Kg \times 90.9\ Kg = 136.4\ mg$

$= 136\ mg\ @\ 12^{e}$

(13)

$$\frac{4\text{ mg}}{\text{ml}} = \frac{12\text{ mg}}{x}$$

$$4x = 12$$

$$x = 3\text{ ml total}$$

$$3\text{ ml} \div 4 = 0.75 = 0.8\text{ ml/dose}$$

(14)

$$\frac{100\text{ mg}}{1\text{ TAB}} = \frac{250\text{ mg}}{x\text{ TAB}}$$

$$100x = 250$$

$$x = 2.5\text{ tabs daily}$$