

# HESI A2

## Conversions Cheat Sheet

### METRIC TABLE

MASS	1,000 micrograms (mcg)	=	1 milligram (mg)
	1,000 milligrams (mg)	=	1 gram (g)
	1,000 grams (g)	=	1 kilogram (kg)
	2.2 pounds (lbs)	=	1 kilogram (kg)

VOLUME	30 milliliters (ml)	=	1 ounce (oz)
	1 millimeters (ml)	=	1 cubic centimeters (cc)
	1 teaspoon (tsp)	=	5 millimeters (ml)
	1,000 millimeters (ml)	=	1 Liter (L)
	3 teaspoons (tsp)	=	1 tablespoon (tsp)
	1 tablespoon (tbsp)	=	15 milliliters (ml)
	2 tablespoons (tbsp)	=	1 ounce (oz)

### Examples

If a doctor is converting a medical dose for a prescription of 2 grams into milligrams, what will the dosage be?

- a. 200mg
- b. 0.2 mg
- c. 2000mg
- d. 20mg

$$1,000 \text{ mg} = 1\text{g}$$

$$2 \times 1,000 = 2,000 \text{ mg}$$

How much hydrochloric acid (HCL) is necessary to make 25 liters of a 5:1 solution of water (in liters) to HCL (in grams)?

$$\frac{5 \text{ L}}{1 \text{ g}} = \frac{25 \text{ L}}{x \text{ (g)}}$$

$$\frac{x \text{ (g)}}{x} = \frac{25\text{g}}{5} \quad \text{Then Divide by 5}$$

$$\frac{5 \text{ L}}{1 \text{ g}} = \frac{25 \text{ L}}{x \text{ (g)}}$$

$$x = 0.5\text{g}$$

Multiply Across  
 $1 \times 25$  is 25