

Metric Conversions

Converting from one metric unit to another is easy if you know the order of the metric prefixes. You can remember the mnemonic: *King Henry Died Unexpectedly Drinking Chocolate Milk*. This represents kilo, hecto, deka, unit, deci, centi, milli. The base could be meter, liter, or gram. Use the foldable we did in class to help you with this.

For example: 20 centimeters = _____ millimeters.

To convert 20 centimeters into millimeters, I would begin at the the centi spot. I would have to jump one space to the right to get to milli. So I would move my decimal one place to the right. 20 centimeters = 200 millimeters. REMEMBER if there is no decimal put one at the end of the number. Now you try:

1.1 meter = _____ decimeters

2.1 meter = _____ centimeters

3.1 meter = _____ millimeters

4.1 kilometer = _____ hectometers

5.1 kilometer = _____ dekameters

6.1 kilometer = _____ meters

7.1 hectometer = _____ meters

8.1 hectometer = _____ dekameters

9.1 dekameter = _____ meters

10.1 decimeter = _____ millimeters

11.1 decimeter = _____ centimeters

12.1 centimeter = _____ millimeters

13.100 centimeters = _____ meter

14.1000 millimeters = _____ meter

15.10 decimeters = _____ meter

This method also works if you are measuring volume and mass. Convert the following metric measurements and then write what is being measured (length, volume, or mass)

16.537 mm = _____ m _____ length _____

17.425 km = _____ m _____

18.567 g = _____ Kg _____

19.963 mL = _____ L _____

20.2.5 km = _____ hm _____

21.5000 mL = _____ daL _____

22.166 mg = _____ g _____

23.43.51 cm = _____ mm _____

24.317 g = _____ mg _____

25.0.55 km = _____ dm _____

26.5.26 m = _____ cm _____

27.6.13 cg = _____ mg _____

28.436.32 m = _____ km _____

29.637.3 mL = _____ L _____

30.20.1 cL = _____ dL _____