**SCIENCE 2023/2024 HOMEWORK #5** 

NAME:



1. Imagine you can stack atoms on top of each other one by one, like a tower of blocks. How many atoms will it take to make a tower as tall as a human?

(In other words, a human is how many atoms tall? ©)



Hint: start with writing the height of a human – you can google the average height or measure your own height – just make sure to use metric units; then recall the size of a single atom (Lecture #5, slide 5); now calculate!

2. Match the words from the word bank to their meaning. You may need to review Lecture #5.

A. \_\_\_\_\_\_ is the amount of 3D space that a substance or shape occupies or contains.

B. is the amount of material in an object.

C. \_\_\_\_\_\_ is anything that takes up space and has mass.

D. is how much matter is contained in a unit of volume.

WORD BANK: matter, volume, density, mass