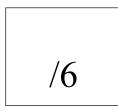
The Mole: One Step Conversions: Quiz 2c

Make sure to <u>SHOW ALL WORK and</u> <u>INCLUDE UNITS!</u>

- 1. How many moles are 1.20×10^{25} atoms of phosphorous?
- 2. Find the mass in 2.6 mol of lithium oxide.
- 3. What is the volume of 1.2 moles of water vapor at STP?

Make sure to SHOW ALL WORK and

Class _____



Date _____

Class _____ Date _____ Name_____ Answers: 1. See Below: $\left(\frac{1 \, mol}{6.02 x 10^{23} a toyns}\right)$ a. 1.20 x 10^{25} atoms P x $\frac{1}{6}$ = 19.9 moles P b. 2.6 mol $Li_2Ox \frac{29.88g}{1 \text{ mol}} = 78 \text{ g } Li_2O$ (22.4 L)

 $= 27 L H_2O$

c. 1.2 mol $H_2O x$