|  |  |  |
| --- | --- | --- |
| *Review for Thursday’s test*CλeMis+ry: http://genest.weebly.com Stop in for help every day at lunch and Tues &Thurs after school! |  | Name\_\_\_\_\_\_\_\_\_\_\_\_\_Period\_\_\_\_\_\_\_\_\_\_\_\_\_ |

1. What is the empirical formula for a compound that is 40.0 grams of carbon, 6.7 grams of hydrogen, and 53.3grams of oxygen ?

|  |  |
| --- | --- |
|      | 1. How many atoms, total, are in this box? \_\_\_\_\_
2. How molecules are in this box? \_\_\_\_\_
3. The What is the **molecular** formula of this compound? \_\_\_\_
4. What is the **empirical** formula of this compound? \_\_\_\_
 |

1. 
2. Determine the molecular formula of the compound with an empirical formula of CH and a formula mass of 78.110 g/mole.
3. The molar mass of a compound is 92.0 g/mole. Analysis of a small sample indicates it contains 0.606g N and 1.390 g of O. Find its molecular formula.

|  |  |
| --- | --- |
|       | 1. How many atoms, total, are in this box? \_\_\_\_\_
2. How molecules are in this box? \_\_\_\_\_
3. What is the **molecular** formula of this compound? \_\_\_\_
4. What is the **empirical** formula of this compound? \_\_\_\_
 |

**Convert each of the following into an empirical formula:**

1. Co3H9
2. C6H12O6 (fructose)
3. C24H32O4
4. A sample of a chromium compound has a molar mass of 151.99 g/mol. Elemental analysis of the compound shows that it contains 68.43% chromium and 31.57% oxygen. What is the identity of the compound?

|  |  |  |
| --- | --- | --- |
|  |  |  |
| 1. For iodine…
 |
| How would you draw one molecule? | According to the periodic table, what is the mass of a mole of this molecule? | Find the mass of 9350000000000000 molecules of this stuff. |
|  |  |  |

1. What would be the mass of 3.08x1013 atoms of nickel?