Potions and Poisons Pilot Regional Test

School \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Code \_\_\_\_\_\_\_\_\_\_\_\_\_

Names 1 \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 2\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

|  |  |
| --- | --- |
|  | Points |
| Page 1 |  |
| Page 2 |  |
| Page 3 |  |
| Total |  |
| Clean Up Penalty |  |
| Total |  |
| Tie Breaker |  |
| Final Score |  |
| Rank |  |

Potions and Poisons Pilot Regional Test

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| 3 | 1 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | | Identify the picture on the screen | |
| 3 | 2 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | | Identify the picture on the screen | |
| 3 | 3 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | | Identify the picture on the screen | |
| 3 | 4 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | | Identify the picture on the screen | |
| 3 | 5 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | | What is the poison produced by this plant? | |
| 3 | 6 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | | Identify the picture on the screen | |
| 3 | 7 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | | Identify the picture on the screen | |
| 3 | 8 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | | Identify the picture on the screen | |
| 3 | 9 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | | Identify the picture on the screen | |
| 2 | 10 | \_\_\_\_\_\_\_\_\_\_\_\_\_ | | What type of reaction is the addition of powder 1 to water an example of?  A) ppt B) gas C) exothermic D) color change | |
| 2 | 11 |  | | Add 2 pieces of substance S to water. Test the solution with your conductivity meter, thermometer, pH paper, etc. Is this an example of a chemical or physical change? | |
| 6 | 12 |  | | What evidence do you have to support your position? | |
| 2 | 13 |  | | How many chemicals were in mixture Grape Illusion ? | |
| 2 | 14 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | When you dissolve powder 4 in water, do you get an A) acid B) base C) neither D) both | |
| 2 | 15 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | When you put the two chemicals before you (2 & 3) together, is this an example of  A) chemical reaction B) mixture C) compound | |
|  |  |  | |  | |

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| 16  14 | Sol | Con | Abs |  | Take the stock solution of CuSO4 solution and dilute it 1 ml of the solution to 10 ml using distilled water for the rest, then dilute that again 1:10, and one more time. Take the absorbance of all four of the solutions @ 634 nm and make a plot of absorbance vs. concentration |
| 1 | 1 M |  |
| 2 |  |  |
| 3 |  |  |
| 4 |  |  |
| 17  10 |  | | | | Plot the Absorbance vs. the concentration |
| |  |  |  |  |  |  |  |  |  |  | | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | | Ab s o r b a n c e |  |  |  |  |  |  |  |  |  | |  |  |  |  |  |  |  |  |  |  | |  |  |  |  |  |  |  |  |  |  | |  |  |  |  |  |  |  |  |  |  | |  |  |  |  |  |  |  |  |  |  | |  |  |  |  |  |  |  |  |  |  | |  |  |  |  |  |  |  |  |  |  | |  |  |  |  |  |  |  |  |  |  | | Concentration Copper | | | | | | | | | | | | | | | |

|  |  |  |  |
| --- | --- | --- | --- |
| 3 | 18 | Balance the equation | \_\_\_HCl + \_\_\_ NaOH 🡪 \_\_ NaCl + \_\_\_H2O |
| 3 | 19 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | Chromatography is used to take apart a A) chemical reaction B) mixture C) compound |
| 3 | 20 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | Oil and Vinegar do not mix. The reason for this is? |
| 3 | 21 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | Why is it important to not mix cleaning chemicals that contain hydrochloric Acid with cleaning chemicals that contain bleach? |
| 3 | 22 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | Kool Aid drink (liquid) is a an example of  A) A compound B) a colloid C) a suspension D) a solution |
| 3 | 23 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | What happens to Vitamin C that is stored for 5 years? |
| 3 | 24 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | What is the chemical in Poison Ivy that causes rashes in people? |
| 3 | 25 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | Is poison Ivy poisonous to everyone? Explain |
| 3 | 26 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | What medical classification is given collectively to such chemicals as lead, mercury, etc. A) light non-metals B) heavy non-metals C) light metals D) heavy metals |
| 3 | 27 | Balance the Equation | \_\_HOCl(aq) + \_\_ HC2H3O2(aq)🡪 \_\_\_Cl2(g) + \_\_H2O + \_\_C2H3O2- |
| 3 | 28 | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | Kool Aid powder is an example of a   1. Compound B) mixture C) suspension D) colloid | |