|  |  |  |
| --- | --- | --- |
| **Problem** | **Independent Variable** | **Dependent Variable** |
| 1. What is the effect of the amount of fertilizer on the growth rate of lawns? |  |  |
| 2. What is the effect of water temperature on the pH of a stream?  \*pH refers to acidity and alkalinity |  |  |
| 3. Does the amount of glue added to soap bubbles have an affect on how long a bubble will last? |  |  |
| 4. Does the amount of exercise have an affect on the pulse rate of humans? |  |  |
| 5. What is the connection between a student’s GPA and the amount of time they spend watching TV each week? |  |  |
| 6. Do fish gills beat faster in increased temperatures of water? |  |  |

|  |  |  |  |
| --- | --- | --- | --- |
| **Problem** | **Independent Variable** | **Dependent Variable** | **Hypothesis**  **(make sure it is an "If…., then" statement)** |
| 7. Do grapes taste sweeter if there is less rain during the growing season? |  |  |  |
| 8. How does salinity (amount of salt) affect the amount of oxygen dissolved in ocean water? |  |  |  |
| 9. How does the pupil of the eye respond to light?  \*Think of all aspects of light…don’t limit yourself to amount. |  |  |  |
| 10. How does soap affect the growth rate of bacteria?  \*Think of all aspects of soap…don’t limit yourself to amount. |  |  |  |

\*\***Double check your work. Are your independent variables (IV) above being manipulated/changed by the experimenter? Does your dependent variable (DV) change as a result of what happened to the IV? Do your hypotheses use "If…, then" statements that predict the outcome based on the changes (you indicated) made to the IV?**