

Identify the Controls and Variables-



Grandpa thinks that a special juice will increase the energy of older people. He creates two groups of 50 seniors each and assigns each group the same task (in this case, they're supposed to dance for one hour). Group A is given the special juice to drink while they dance. Group B is not given the special juice. After an hour, Grandpa counts how many seniors are still able to dance. Group A has 23 seniors still dancing at the end of the hour, Group B has 28 seniors still dancing at the end of the hour.

Identify the:

1. Control Group -
2. Independent Variable -
3. Dependent Variable -
4. What should Grandpa's conclusion be? -
5. How could this experiment be improved? –



Chief Wiggum notices that his police car is covered in a purple stain. His friend Barney tells him that pineapple juice will get rid of the purple stain. Chief Wiggum decides to check this out by spraying half of the car with pineapple juice. He sprays the other half of the car with water. After 3 days of "treatment" there is no change in the appearance of the purple stain on either side of the car.

1. What was the initial observation? -

Identify the-

2. Control Group -
3. Independent Variable -
4. Dependent Variable -
5. What should Wiggum's conclusion be? –

Groundskeeper Willie believes that mice exposed to microwaves will become extra strong (maybe he's been reading too much Radioactive Man). He decides to perform this experiment by placing 10 mice in a microwave for 10 seconds. He compared these 10 mice to another 10 mice that had not been exposed. His test consisted of a heavy block of wood that blocked the mouse food. He found that 8 out of 10 of the microwaved mice were able to push the block away. 7 out of 10 of the non-microwaved mice were able to do the same.



Identify the-

1. Control Group –
2. Independent Variable –
3. Dependent Variable -
4. What should Groundskeeper Willie's conclusion be? –
5. How could Groundskeeper Willie's experiment be improved? –



Dr. Hibbert was told that a cough medicine was the newest best thing on the market, it even claims to reduce coughing for 50% longer. Interested in this product, he buys the cough medicine and compares it to his usual product. One test subject (A) is given the original cough medicine, and another test subject (B) was given the Experimental cough medicine. Subject A reported coughing for 60 minutes. Subject B reported coughing for 90 minutes.

Identify the-

1. Control Group
2. Independent Variable
3. Dependent Variable
4. Explain whether the data supports the advertisements claims about its product.