

PSY 10 - Analysis of Psychological Data

Quiz # 12

Professor Depaoli

5/2/2017

Red Scantron Instructions

1. Use pencil to fill out your Scantron.
2. Bubble your name and ID number on front.
3. Do NOT put a zero before your ID number.
4. Use the same ID number as the first quiz (no extra zero).
5. Use the same name as the first quiz.
6. Make heavy, **dark** marks that fill the circle **completely** and **precisely**.
7. If you need to correct any answer, make sure you erase the original one **completely**.

A researcher hypothesizes that students who sleep more hours per day will have a better overall life satisfaction because they are healthier than students who sleep fewer hours per day. The researcher finds that $M_X = 7$ and $SS_X = 16$ from hours slept, $M_Y = 4$ and $SS_Y = 12$ from life satisfaction, and $SS_{XY} = 8$ from both. (2 points each)

1. What is the predictor variable?
(a) Health (b) Sleep (c) Students (d) Life Satisfaction
2. What is the criterion variable?
(a) Health (b) Sleep (c) Students (d) Life Satisfaction
3. Compute the slope.
(a) 0.25 (b) 0.50 (c) 0.75 (d) 2.00
4. Compute the y -intercept.
(a) -10 (b) -1.25 (c) 0.50 (d) 2.25
5. True or False? Using the method of least squares answers the question “Does the equation of a straight line describe this pattern?”
(a) True (b) False

Equations: $Y = bX + a$ $b = SS_{XY}/SS_X$ $a = M_Y - bM_X$

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