

Name: _____

Date: _____

Residual = actual - predicted. A residual PLOT with no pattern means the linear model fits well; a pattern means it doesn't. Last two a

1. Actual 20, predicted 18. Residual?

show your work

2. Actual 15, predicted 19. Residual?

show your work

3. A residual of 0 means what?

show your work

4. Positive residual: the model under-
or over-predicted?

show your work

5. Line $y = 2x + 1$. At $x = 3$ the actual is 8. Find the residual.

show your work

6. Line $y = 2x + 1$. At $x = 5$ actual is 9. Residual?

show your work

7. A residual plot shows points scattered randomly. Good fit or bad?

show your work

8. A residual plot shows a clear U-shape. What does that mean?

show your work

9. Line $y = 3x + 2$. Data $(1,6), (2,7)$. ★ CHALLENGE
find both residuals and say if the fit looks good.

show your work

10. For $y = x + 4$, data $(2,7)$ gives ★ CHALLENGE
residual $+1$ and $(5,8)$ gives residual -1 . What pattern, and does the model fit?

show your work