

Scatter Plots & Least Squares Lines

Scatter plots: graph of ordered pairs that describe a relationship between data

In general, there tends to be a correlation between two variables when there appears to be a line about which the data points cluster.

Positive Correlation:

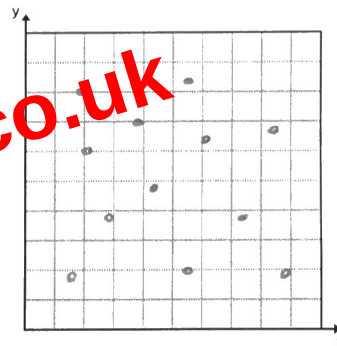
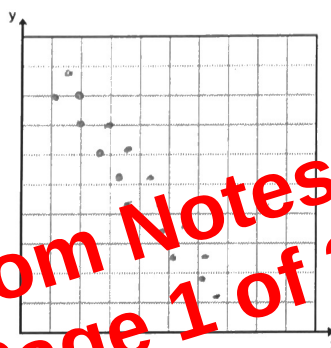
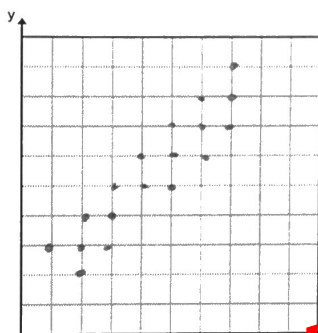
as x increases,
y increases

Negative Correlation:

as x increases,
y decreases

No Correlation:

no relationship
between x & y



Preview from Notesale.co.uk
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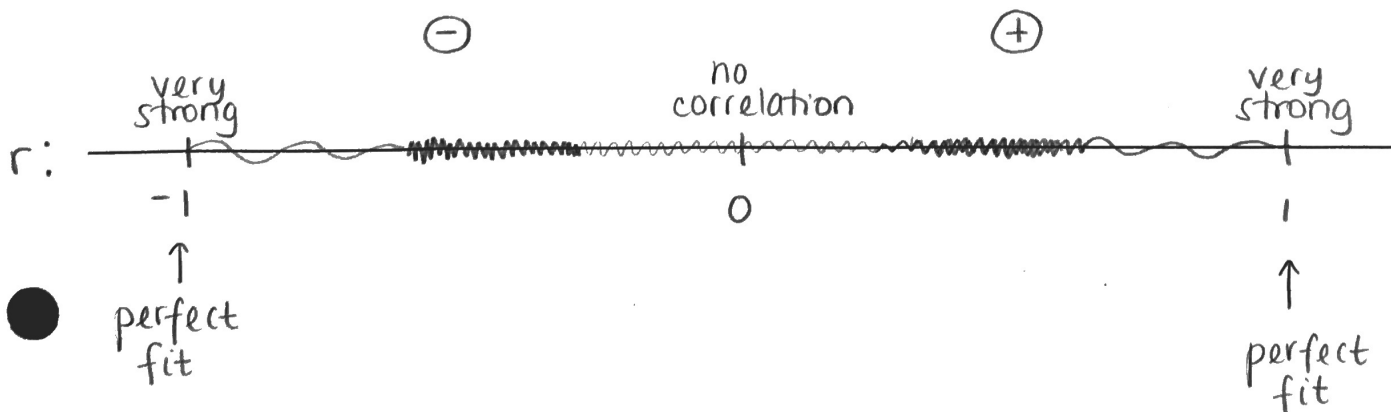
If you think there may be a correlation, you can use your calculator to find a

linear regression line, also called a least-squares line.

Least-Squares Line: linear model for a data set (line of best fit)

Correlation Coefficient: (r) indicates how closely the data pts. cluster around the least-squares line

****The closer the correlation coefficient is to -1 or 1, the better the least-squares line fits the data!****



*** $\pm$ do not describe strength ***