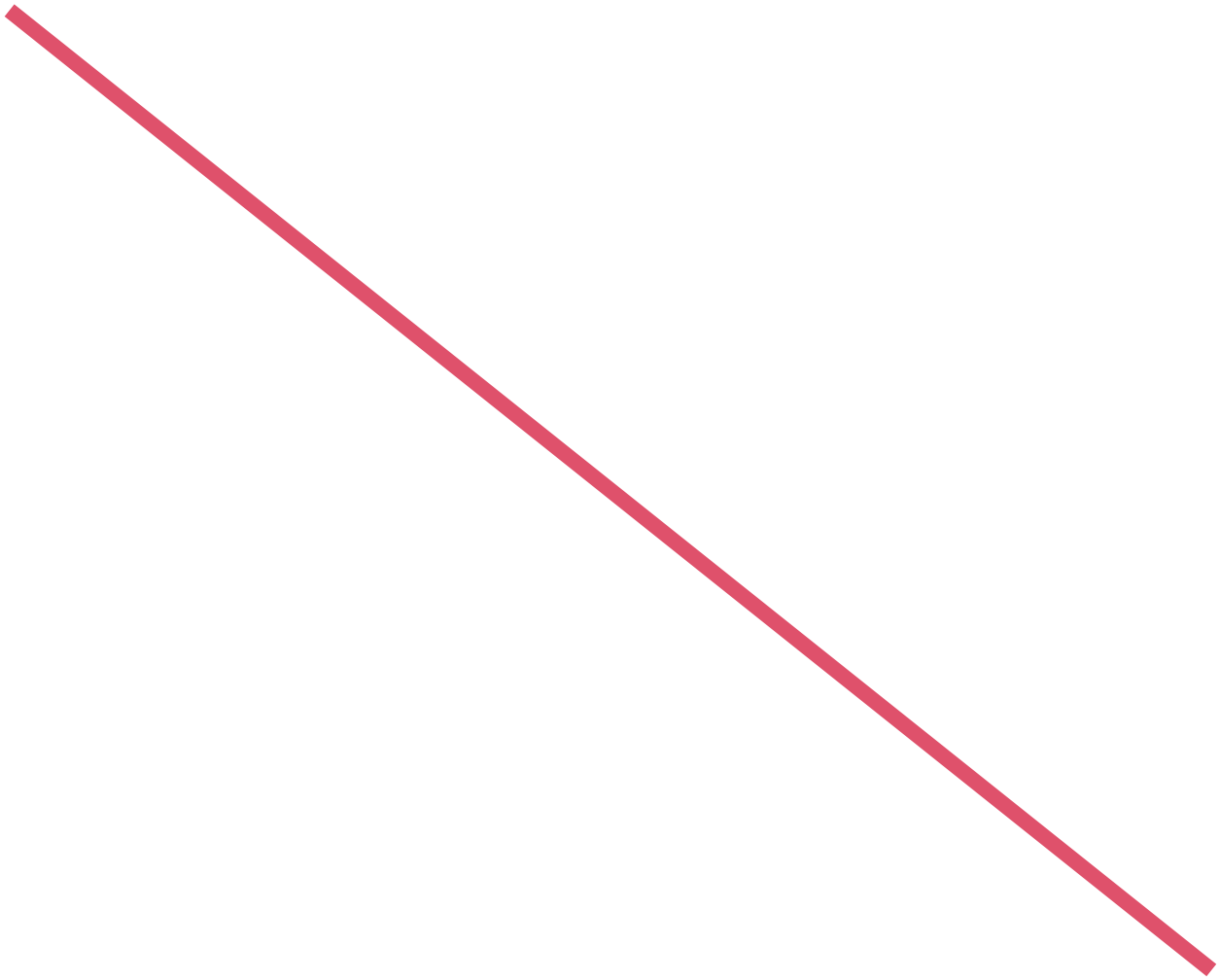
Our variables

- y_i: **caterpillar growth** - response variable

- x_i: **quantity of tannin in the caterpillar diet** - predictor variable,

y: growth

x: tannin



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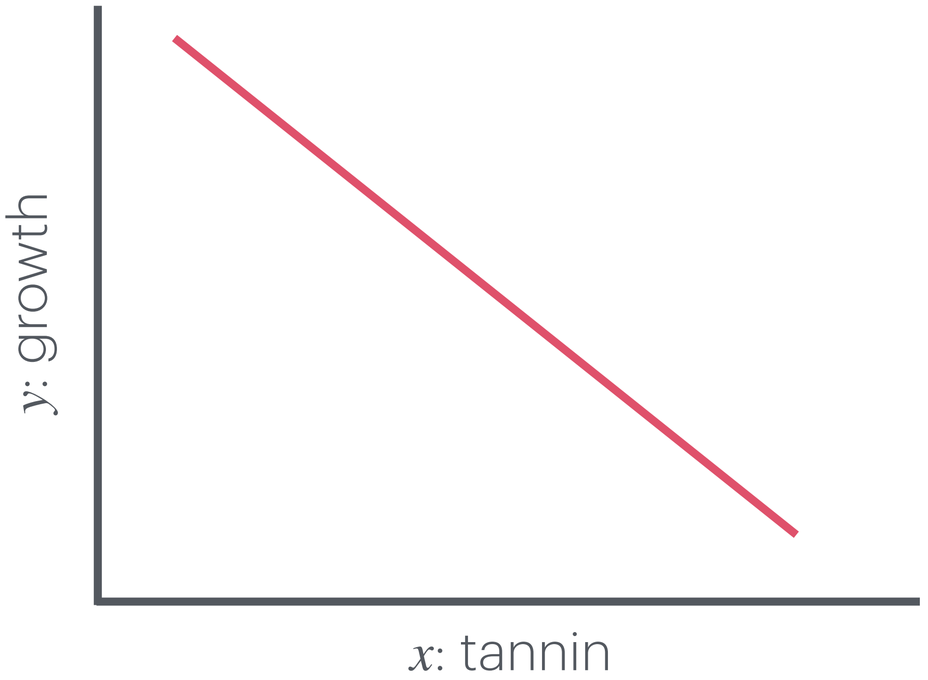
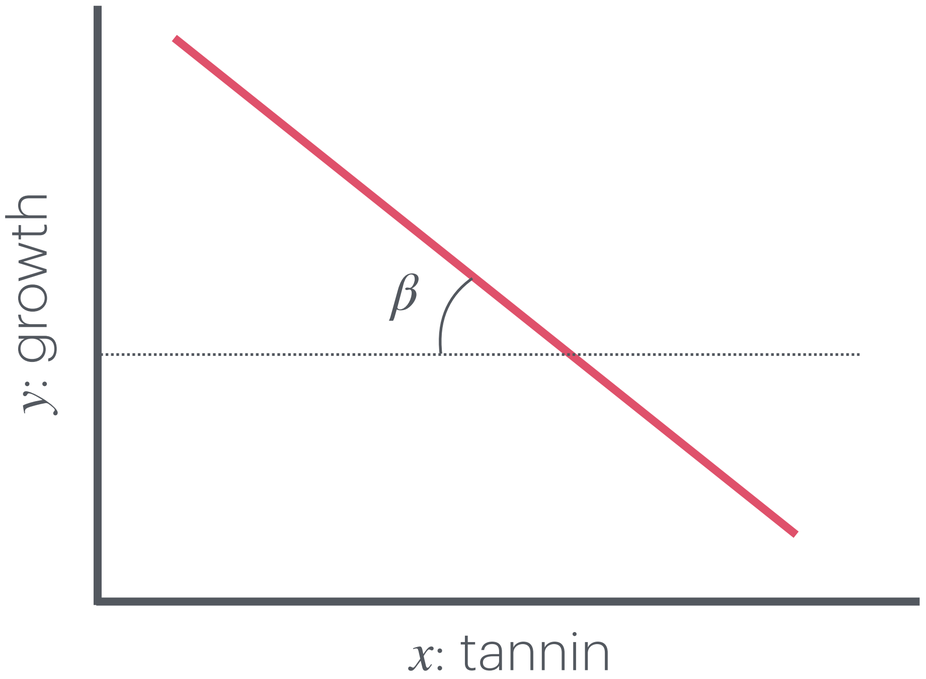


Lets ask a question

Do leaf chemical compounds reduce the growth of caterpillars?

- Our model

$$y_i \sim N(\mu_i, \sigma)$$
$$\mu_i = \alpha + \beta x_i$$
$$\alpha \sim N(0,1)$$
$$\beta \sim N(0,1)$$
$$\sigma \sim Exp(1)$$

The relation between growth and tannins is given by the slope parameter β