#Regresión lineal #10/03/2025

geyser <- read.csv("erupciones.csv", header =T) View (geyser)

plot (geyser$waiting ~ geyser$eruptions, pch = 19, xlab = "Tiempo de espera (min)", ylab = "Duración (min)")

cor (geyser$waiting, geyser$eruptions) cor.test (geyser$waiting, geyser$eruptions)

g.lm <- lm (geyser$waiting ~ geyser$eruptions) g.lm summary (g.lm)

#Gráficar línea de tendencia central plot (geyser$waiting ~ geyser$eruptions, pch = 19, xlab = "Tiempo de espera (min)", ylab = "Duración (min)")

#Corrección de la relación g.lm <- lm (geyser$eruptions ~ geyser$waiting) g.lm

summary (g.lm) plot (geyser$waiting, geyser$eruptions, pch = 19, xlab = "Tiempo de espera (min)", ylab = "Duración (min)")

abline (g.lm, col = "red")

-1.87 + 0.07*60 g.lm$coefficients[1]+g.lm$coefficients[2]*60 geyser$yprima <- g.lm$fitted.values geyser$residuales <- g.lm$residuals

sum(geyser$residuales)

geyser$res2 <- geyser$residuales^2 sum(geyser$res2)/270

mod.lm <- anova(g.lm) mod.lm