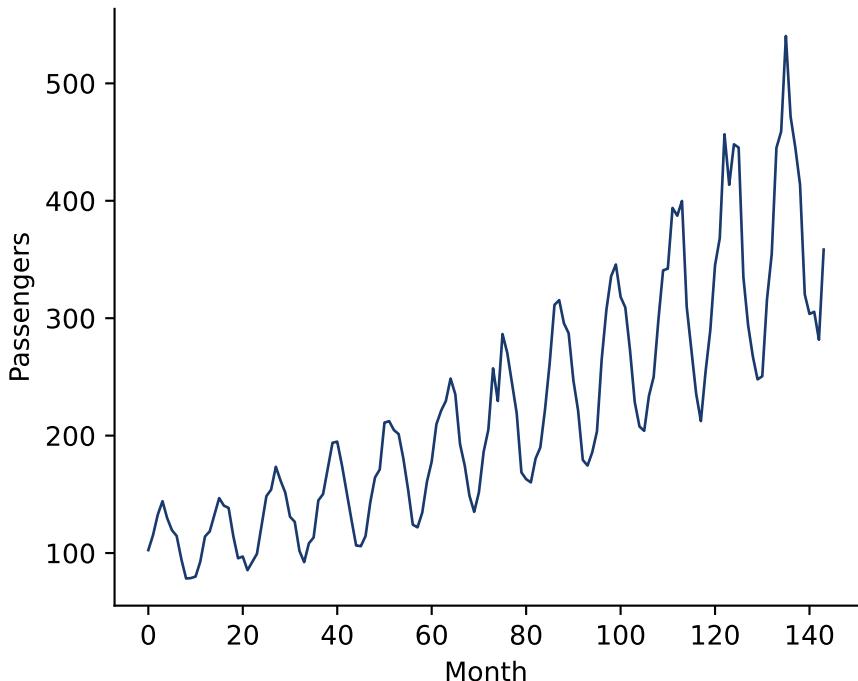
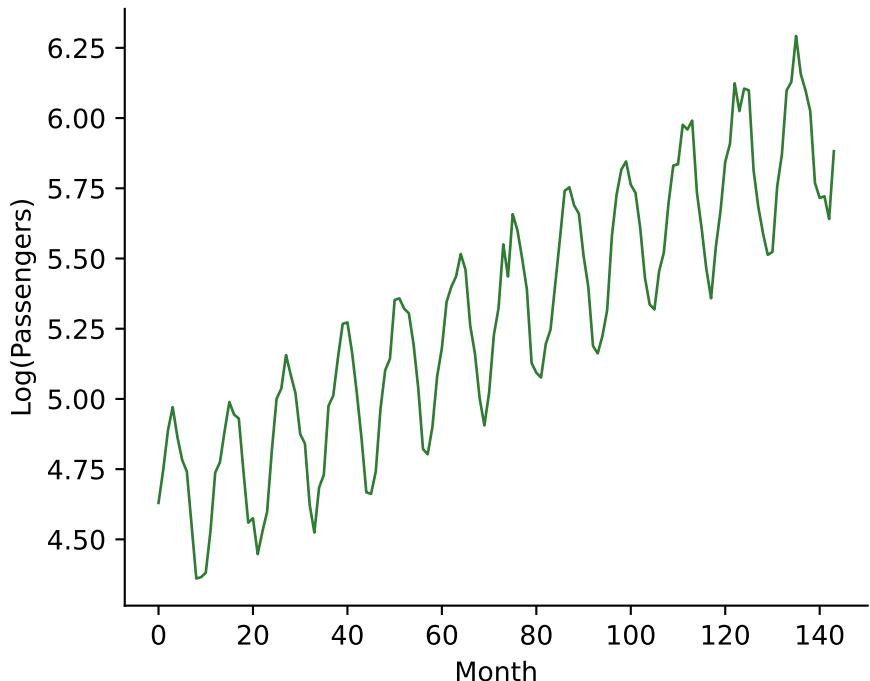
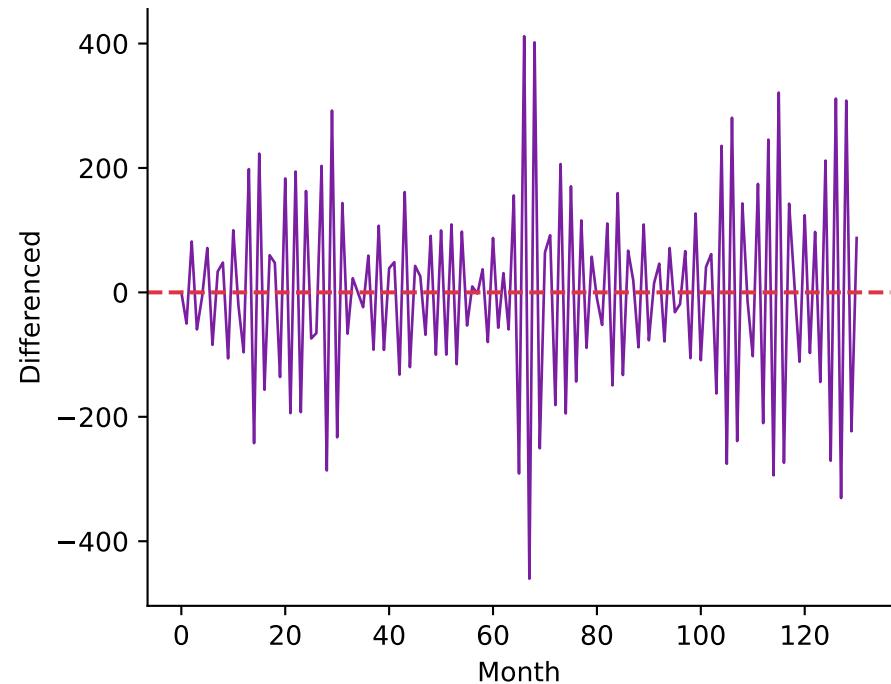


Original: Airline Passengers**Log Transform: $\log(Y_t)$** 

$(1 - L)(1 - L^{12})\log Y_t$: **Stationary!**



The Airline Model

SARIMA($0, 1, 1$) $\times (0, 1, 1)_{12}$

$$(1 - L)(1 - L^{12})Y_t = (1 + \theta L)(1 + \Theta L^{12})\varepsilon_t$$

Only 2 parameters: θ and Θ

Why famous?

- Fits many seasonal economic series remarkably well
- Extremely parsimonious (just 2 parameters)
- Box & Jenkins (1970) airline passenger data