6.1: Introduction to Time Series

Dr. Bean - Stat 5100
Suppose you are trying to predict monthly revenue using historical revenue data. You fit an $AR(2)$ model which you try to use to predict revenue in the same month in the following year. What, if any, issues might you encounter with this prediction?
Describe, in your own words, the difference between a time dependent <i>trend</i> and time-dependent <i>autocorrelation</i> . Can you have both at the same time?
Using the table on page 5 of the 6.1 notes, which model type would you recommend based on the output provided in Figure 1?
Using the table on page 5 of the 6.1 notes, which model type would you recommend based on the output provided in Figure 2?

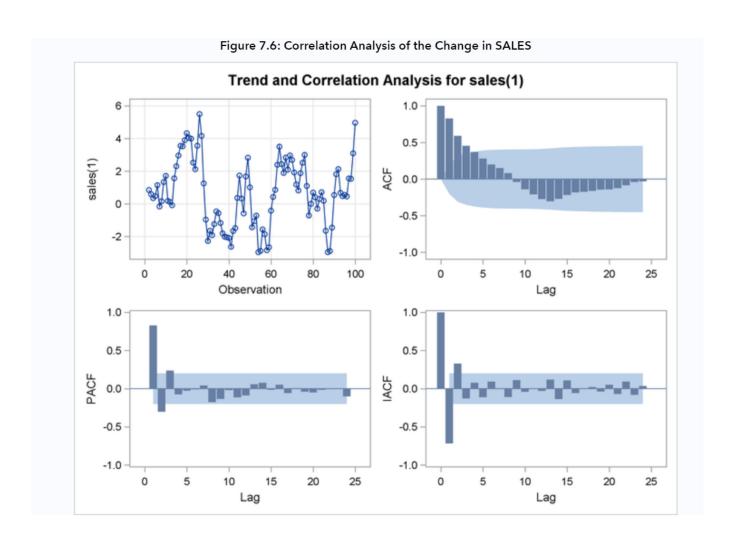


Figure 1: Sample ARMA model output.

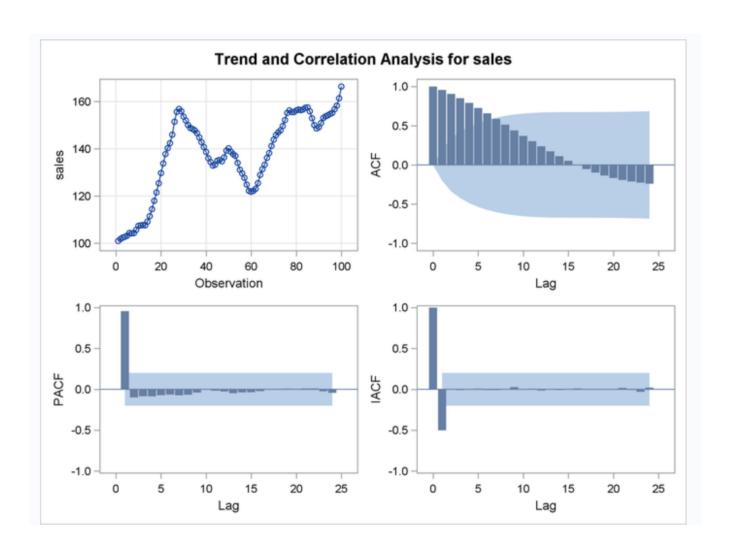


Figure 2: Sample ARMA model output.