Lesson 22. More ProModel Review

Problem. Thirty trucks carrying bits and pieces of a C-5A cargo plane leave Atlanta at the same time for the Port of Savannah. From past experience, it is known that it takes 6 ± 2 hours for a truck to make the trip. In addition, it is known that about 40% of the truck drivers stop for coffee, which takes an additional 15 ± 5 minutes.

Model this system using ProModel so that for each truck driver, there is a 40% chance of stopping for coffee. Estimate when the last truck will reach Savannah, using 50 runs of your simulation. Give a 90% confidence interval for your estimate.

Some hints:

- Interpret "$x \pm y$" as "uniformly distributed on the interval $[x - y, x + y]$".

- This problem can be modeled with just 1 location (although you can use more if you like).

- Be careful with your time units: note that some data are given in hours, and others in minutes. Use the logic builder to get the correct keywords for hours and minutes.

- Use a global variable to keep track of the time the last truck reaches Savannah.