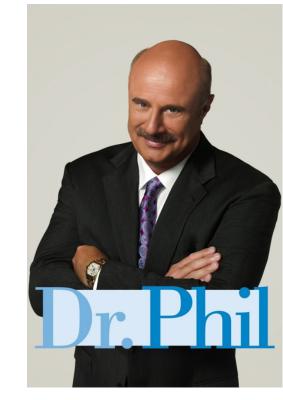
Warmup

- Pretend you are a secret agent and are captured by the evil *Dr. Phil.*
- Dr. Phil likes to play the following game with his prisoners: he picks random numbers from 1 to 100 over and over again. But he always makes sure that every number he picks is bigger than the previous number. Eventually, Dr. Phil picks 100, and that's when the secret agent will meet his or her end.



- Write a program to simulate this. (Hint: Use the sliding window technique to remember the random number generated from the time before. Use this number to generate the next one.) At the end of the simulation (when you generate 100), stop the loop and print the total number of numbers generated. Run this a few times. What is the longest amount of time you can stay alive?
- Hint to get started: write a program to generate random numbers between 1 and 100. Print each one out as they are generated. Stop when you generate 100. Then add in the sliding window technique.