Problem of the Week #9

Giving Away Half



The candy store begins each day with a filled gumball machine. Each day the owner gives away free gumballs to the first five customers.

The first customer receives half of the total number of starting gumballs. The second customer receives half of the remaining gumballs. The third customer receives half of the remaining gumballs. The pattern continues like this for the first 5 customers. The fifth customer always ends up receiving 5 gumballs and there are always 5 gumballs left in the machine at the end of the day.

How many gumballs are in the gumball machine at the beginning of the day? Show your work using pictures, numbers or symbols.

Name:		Class:
	First and last name, please	Due: 1/26/2023 (Thursday)