# Population Parameter vs. Sample Statistic

**Example:** Determine whether each number describes a population parameter or a sample statistic.

1. College freshmen have an average SAT math score of 514.

1. In a random check of several hundred retail stores, the Food and Drug Administration found that 34% of the stores were not storing fish at the proper temperature.

**You Try:** Determine whether each number describes a population parameter or a sample statistic.

1. American median income is $40k

1. In the United States, a survey of a few thousand adults found that their median income is 60k

**You Try:** Determine whether each number describes a population parameter or a sample statistic.

1. In the United States, 40% adults with hearing loss have difficulty remembering conversations.

1. In the United States, a survey of a few thousand adults with hearing loss found that 43% have difficulty remembering conversations.

**You Try:** Determine whether each number describes a population parameter or a sample statistic.

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# Inferential Statistics

**Example:** A study of 300 Wall Street analysts found that the percentage who incorrectly forecasted high-tech earnings in a recent year was 44%.

1. Identify the population and the sample

1. What conclusions might be drawn from the study using inferential statistics

**You Try:** A study of 1000 U.S. adults found that when they have a question about their medication, three out of four adults will consult their physician or pharmacist and only 8% visit a medicationspecific website.

1. Identify the population and the sample

1. What conclusions might be drawn from the study using inferential statistics

**You Try:** A study of 300 recent college graduates found that the median starting salary in their first job was $52,000.

1. Identify the population and the sample

1. What conclusions might be drawn from the study using inferential statistics

**You Try:** A study of 300 mutual funds found that the maximum annual return achieved in a recent year was 28%.

1. Identify the population and the sample

1. What conclusions might be drawn from the study using inferential statistics