

# What are some examples of negatively skewed distributions?

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## RECOMMENDED CITATION

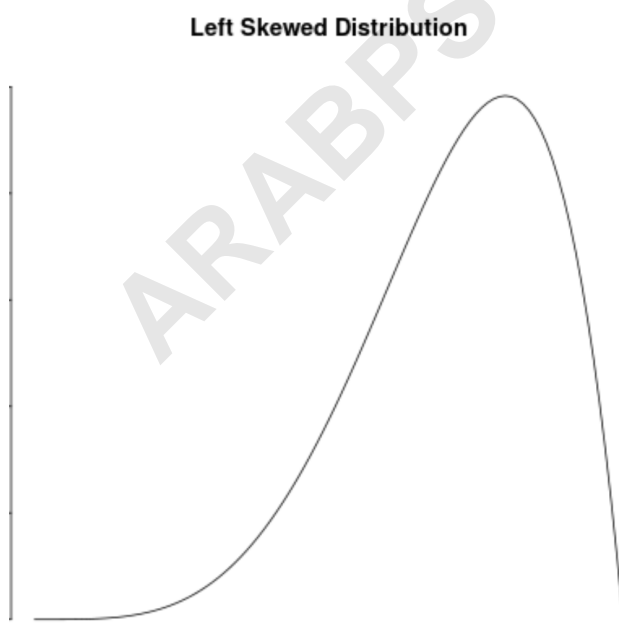
stats writer (2024). *What are some examples of negatively skewed distributions?*. PSYCHOLOGICAL SCALES. Retrieved from <https://scales.arabpsychology.com/?p=141359>

A negatively skewed distribution is a type of probability distribution in which the majority of the data points are concentrated towards the higher end of the range, with a long tail towards the lower end. This means that the mean of the distribution is less than the median, and the curve of the distribution is skewed towards the left. Some common examples of negatively skewed distributions include income distribution in a population, where a small percentage of individuals have extremely high incomes, causing the distribution to be skewed towards the lower end. Another example is the distribution of test scores, where a few students may score very low, resulting in a left-skewed curve. Other examples include stock market returns, where the majority of returns are positive, but a few extreme negative returns skew the distribution to the left, and reaction times in a study, where most participants have fast reaction times, but a few outliers with slow reaction times skew the distribution to the left.

## 5 Examples of Negatively Skewed Distributions

**Skewness is a way to describe the of a distribution.**

**A distribution is negatively skewed if it has a "tail" on the left side of the distribution:**



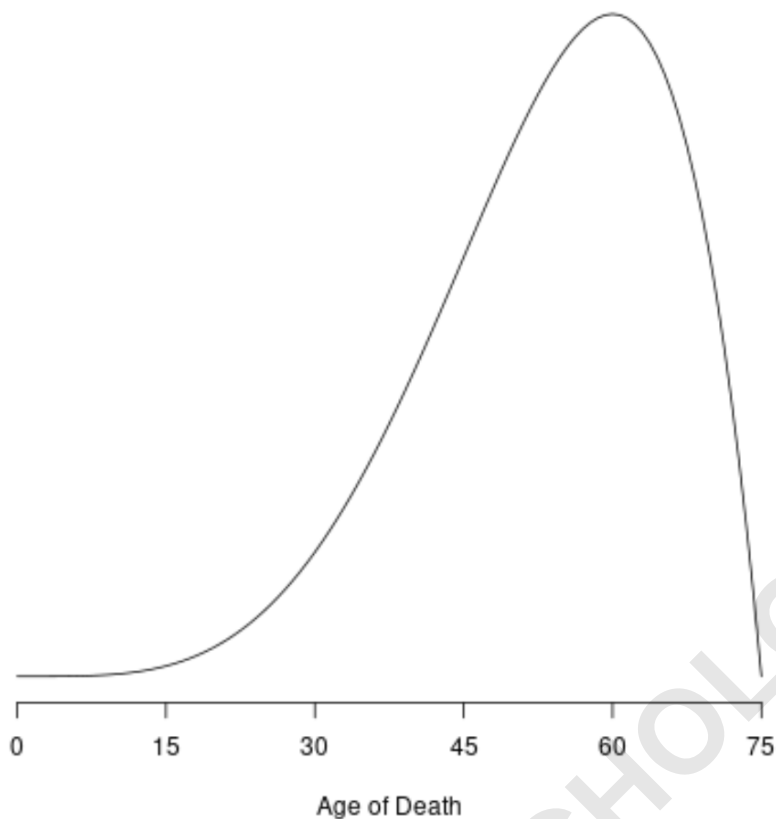
**Note: Sometimes negatively skewed distributions are also called "left skewed" distributions.**

**In this article we share 5 examples of negatively skewed distributions in the real world.**

**Example 1: Distribution of Age of Deaths**

**The distribution of the age of deaths in most populations is negatively skewed. Most people live to be between 70 and 80 years old, with fewer and fewer living less than this age.**

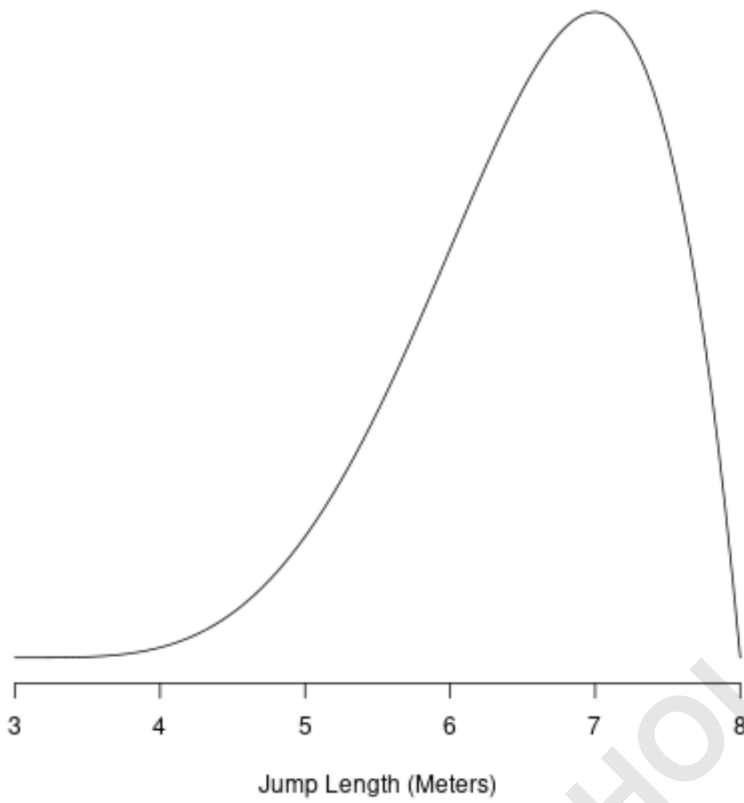
### Distribution of Age of Death



### Example 2: Distribution of Olympic Long Jumps

**In most years, the distribution of long jump lengths for competitors in the Olympics is negatively skewed because most competitors land a jump around 7.5-8 meters, with a few landing a jump of just 5-6 meters.**

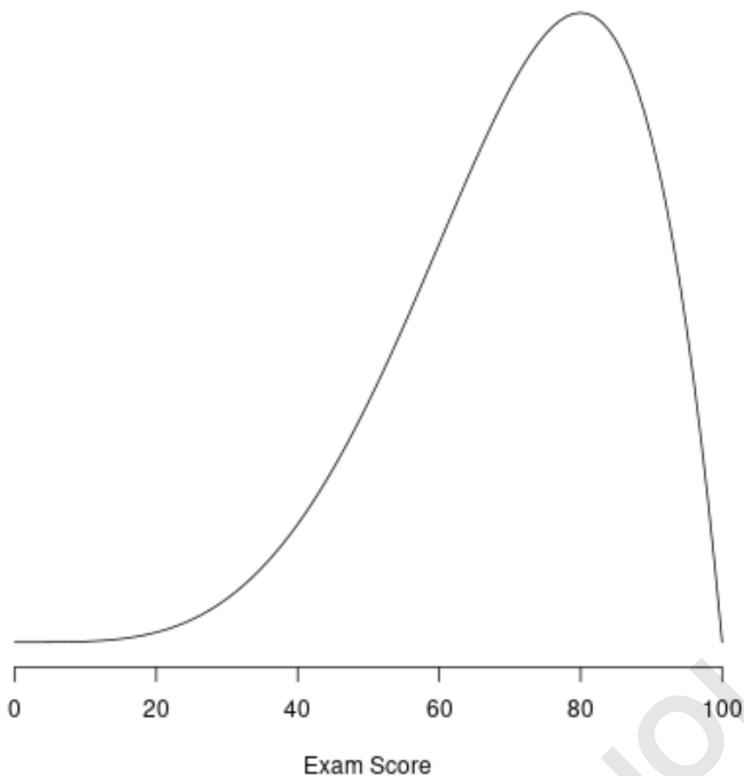
### Distribution of Long Jump Lengths



### Example 3: Distribution of Scores on Easy Exams

**The distribution of scores on easy exams or tests tend to be negatively skewed because most students score very high, while a few students score much lower than the average.**

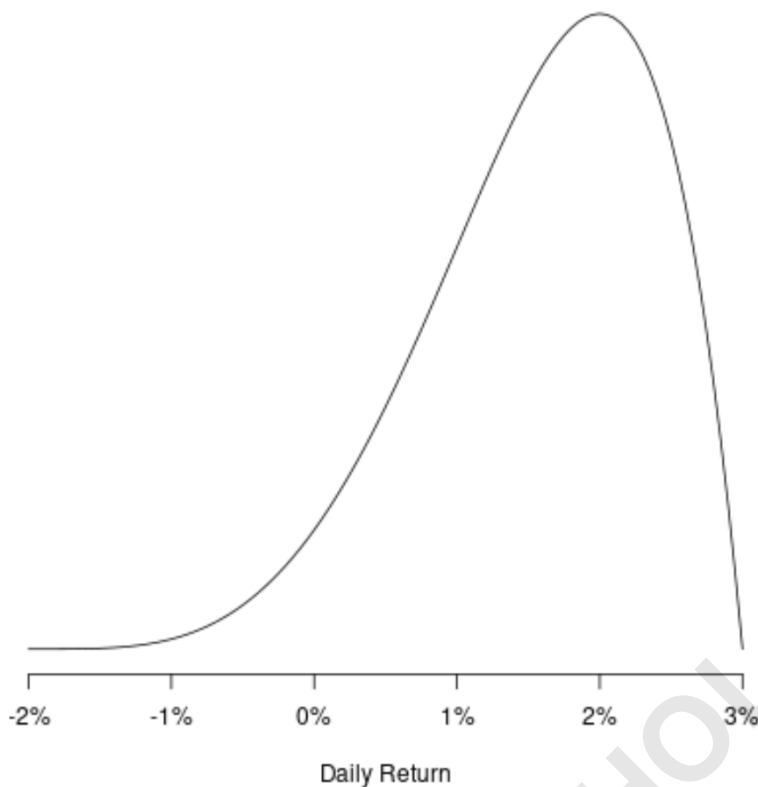
### Distribution of Exam Scores



### Example 4: Distribution of Daily Stock Market Returns

**The distribution of daily stock market returns is negatively skewed because the stock market delivers a slightly positive return on most days, but occasionally returns huge negative returns on a few days.**

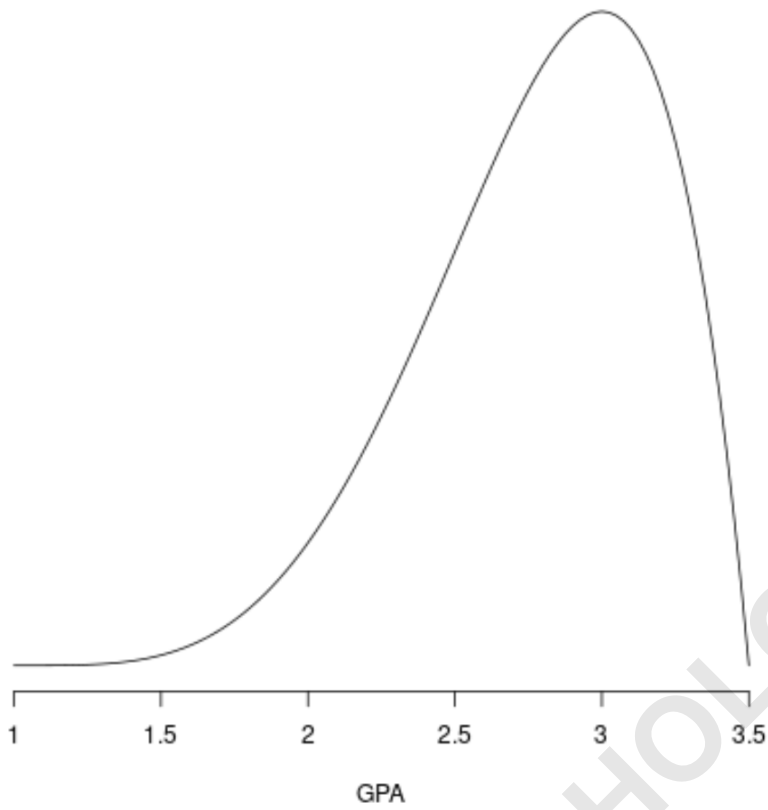
### Distribution of Daily Stock Market Returns



### Example 5: Distribution of GPA Values

**The distribution of GPA among college students is negatively skewed since most students have a GPA between 2 and 4 with a few having a GPA much lower.**

**Distribution of GPA's**



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