

### Visualising the US financial market through the SP500 index

The S&P 500 index, or simply called the "SP500", measures the performance of 505 large companies listed on stock exchanges in the United States. The S&P index was founded in 1957, 63 years ago. It has a total market capitalisation of 30 trillion USD and comprises familiar companies we have heard about, such as Apple, Amazon, Miscrosoft and more.

Over the past 60 years, the SP500 has been on a steady increase. But the market is not without its risks. The visualisation below shows the performance of the SP500 in the past 25 years, from 1995 to 2020, with monthly data. There are three major market downturns which have occured during these years. In chronological order, these events are: the Dot-com bubble, the Global Financial Crisis and the most recent Coronavirus Crash.



1996 1997 1998 1999 2000 2001 2002 2003 2004 2005 2006 2007 2008 2009 2010 2011 2012 2013 2014 2015 2016 2017 2018 2019 2020

Date (Year)

# 1,500 Jan Jan Jan 2000 2001 2002

### 1,500 1,000 Apr Jul Oct Jan Apr Jul Oct 2009



### The Dot-com bubble

### The **Dot-com bubble** which occured in the late 90s to early 2000s was caused by the excessive speculation of internet-related companies, where investors vastly overvalued them even when rarely any of them reported actual profit.

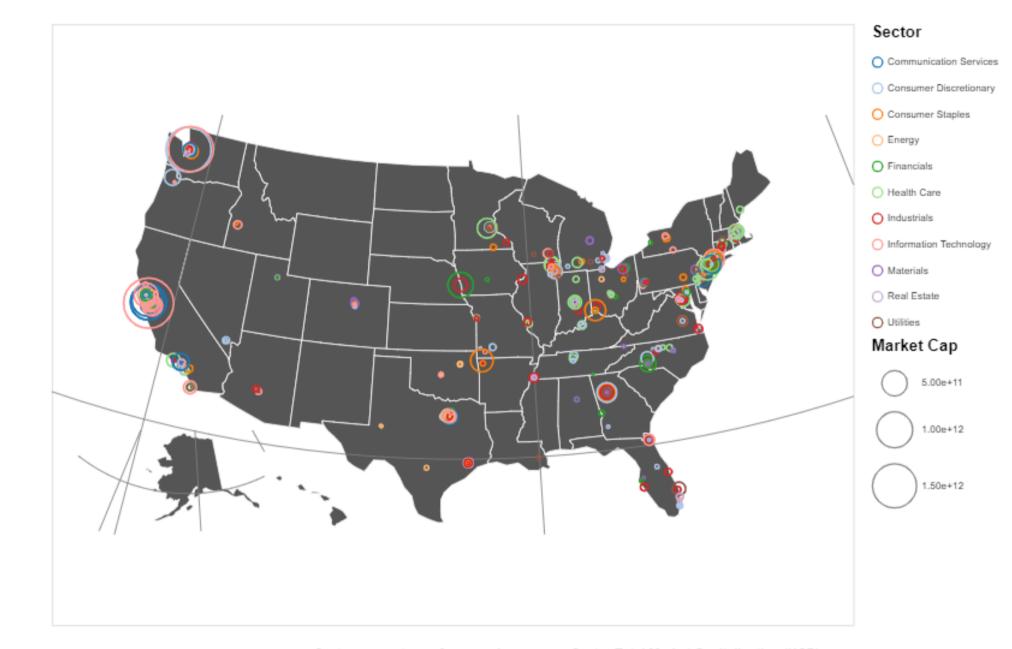
### The GFC

## The Global Financial Crisis (GFC) caused the crash of many global markets around 2008. It is said to have been caused by the excessive risk-taking behaviours of some investment banks. One of the most notable events was the bankruptcy of Lehman Brothers due to the collapse of the US housing bubble.

#### The Coronavirus Crash

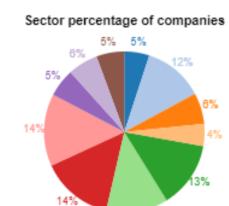
The **Coronavirus Crash** was one of the fastest, most devastating crashes since the Great Depression, occurring around Feburary 2020. However, this crash had a quick recovery which ended in April 2020.

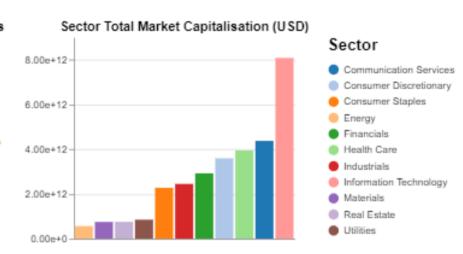
### A close look at the companies: who are where



### What about each sector?

The bar chart on the right shows the market capitalisation of all Information Technology companies exceeding 8 trillion USD; these make up the largest sector in the SP500. The pie chart on the left shows the company count in each sector of the SP500.





### Who really owns the market?

This figure below shows the **largest 10 companies** (Company name: symbol) in the SP500 by their market capitalisation, with the largest company being Apple. In the figure, each dollar bill . represents 100 billion USD.

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Apple: AAPL	Amazon: AMZN	Microsoft: MSFT	Google: GOOG	Facebook: FB Berksh	nire Hathaway: BRK.B	Visa: V	Walmart: WMT	Johnson & Johnson: JNJ
<u> </u>	<b>9</b>	<b>51</b>	<u>•</u>	<u>•</u>	<u> </u>	<u>•</u>	<b>91</b>	<u> </u>
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