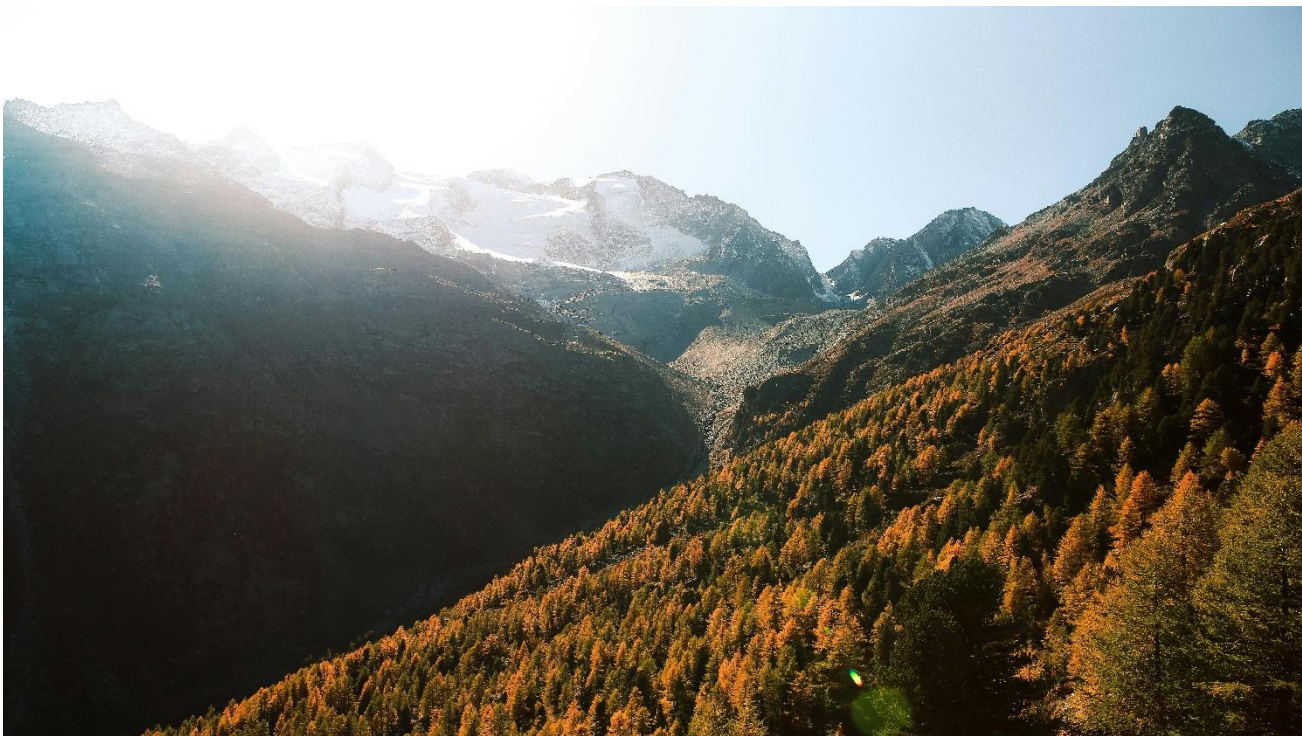


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CONTENTS

How strong is the US equity market really? 2

What impact will the US midterm elections have on the economy and stock market? 6

Will share prices fall if interest rates continue to rise? 10

How much capital does the AI industry need – and can it pay off? 16

HOW STRONG IS THE US EQUITY MARKET REALLY?

The US equity market is currently showing considerable momentum. The S&P 500, the leading US equity index, has reached new all-time highs in recent weeks. As of 9 October 2026, it has risen by around 14.1% since the start of the year. Investors who bought US equities a few years ago are now enjoying exceptionally strong capital gains. Since its low in October 2022, the S&P 500 has more than doubled in value.

At first glance, the US stock market therefore presents a picture of impressive strength. The US economy continues to grow, corporate earnings are rising, and enthusiasm for artificial intelligence appears undiminished. Many investors are convinced that the current rally will continue for a long time.

A closer look, however, reveals a more nuanced picture. The rise in the US equity market is being driven to a considerable extent by a remarkably small group of companies. Many other companies have performed significantly less well. The S&P 500 may therefore present a much more positive picture of the US equity market than the actual share price performance of most of its constituent companies would justify.

This raises a crucial question: How strong is the US equity market really, and how sustainable is a stock market rally that increasingly depends on a handful of large technology companies?

A few companies dominate the US equity market

The S&P 500 comprises around 500 of the most significant publicly listed US companies. It is therefore regarded as a representative benchmark for the US equity market. However, the individual companies are not equally weighted. Instead, their weights are determined by their float-adjusted market capitalisation. The higher this market value of a company, the greater the influence of its share price movements on the overall index.

In recent years, this weighting method has led to an exceptional degree of concentration. The dominance of the so-called “Magnificent Seven” is particularly striking. This group comprises Apple, Microsoft, Alphabet, Amazon, Nvidia, Meta Platforms and Tesla.

As of 9 October 2026, these seven companies accounted for around 35% of the S&P 500 index weight. Concentration was even more pronounced among the ten largest index positions, whose combined weight reached around 39%, according to State Street. A handful of stock market heavyweights therefore accounted for almost two-fifths of the entire index.

This development is exceptional by historical standards. Large companies have always influenced the S&P 500. However, such strong concentration in a few companies is rare and highlights how much the US stock market has changed in recent years.

It is particularly notable that these companies largely operate within the same economic environment. Technology, semiconductors, cloud computing, digital platforms and artificial intelligence are their common growth drivers. This creates an additional concentration of risk: Investors depend not only on a few companies, but also on a relatively small number of economic developments.

Investors buying an S&P 500 index fund today may assume that they are spreading their capital across 500 different companies. In formal terms, this is correct. In economic terms, however, they are investing a substantial share of their wealth in a small group of US technology companies.

The stock market rally rests on a narrow base

The high degree of market concentration would be less problematic if most US equities were performing as positively as the large technology stocks. Strong index performance alone, however, does not justify such a conclusion.

A substantial share of the capital gains of recent years has come from the largest technology companies. Nvidia in particular, as well as other companies benefiting from the development of artificial intelligence, has recorded exceptional share price gains. By contrast, many companies in traditional industries have performed significantly less well.

A healthy and sustainable rally is generally supported by a large number of companies across different sectors. If, by contrast, share prices rise mainly among a handful of companies, the overall market becomes steadily more dependent on their economic success.

This makes the equity market more vulnerable to disappointment. In some circumstances, just a few of the largest companies failing to meet their earnings forecasts or having to revise their growth outlook downwards could be enough to put the entire index under considerable pressure.

Artificial intelligence – investors' great hope

In our view, artificial intelligence is an important driving force behind the current stock market rally. Few other technological developments have generated such high expectations in recent decades.

This enthusiasm is understandable. Artificial intelligence is likely to fundamentally change the way many companies operate. Many administrative tasks can be automated, research and development processes are being accelerated, and new business models are emerging across numerous industries.

We are convinced that artificial intelligence will make a significant contribution to productivity growth over the long term. The economic importance of this technological revolution should certainly not be underestimated.

However, there is a fundamental difference between the economic potential of a new technology and the profitability of the investments made to develop it.

The large US technology companies are currently investing substantial sums in expanding their AI infrastructure. New data centres are being built, more powerful semiconductors developed, and substantial additional capacity created for the use of artificial intelligence. At the same time, demands on power supply, cooling and technical infrastructure are increasing.

It remains far from clear to what extent the substantial expenditure on artificial intelligence can be covered by additional revenue and profits in the future. Demand for AI applications is growing rapidly. At the same time, however, it remains uncertain what prices can be sustained for these services over the long term and how intense competition between the various providers will

become. This point deserves particular attention. A technology can fundamentally change the world without every company investing in it earning attractive returns.

Railways fundamentally changed the economy in the 19th century. Nevertheless, many railway companies lost their capital. The internet has transformed our society in lasting ways. Yet countless internet companies disappeared during the dot-com crisis, and their shareholders suffered substantial losses.

When expectations become too high

The large US technology companies do, however, differ from many companies of the dot-com era in one important respect. Apple, Microsoft, Alphabet, Amazon, Nvidia and Meta have established business models, high revenues and, in some cases, exceptionally high profits. Their market positions are strong, and many of these companies have considerable financial resources. It would therefore be wrong to simply equate today's situation with the internet bubble of 2000.

The real risk is not that these companies are economically weak. Rather, it is that some of their share prices already anticipate exceptionally high future earnings.

When a company trades at a very high valuation, continuing to be successful is not enough. It must be at least as successful as investors already expect – or even exceed those expectations.

This creates a substantial risk. If AI investments prove less profitable than hoped, this could trigger a fundamental reassessment of valuations. The same applies if the expansion of data centres proceeds more slowly, demand for AI services falls short of expectations, or prices for these services decline as competition intensifies.

A situation in which the large technology companies had to reduce their investment would be particularly problematic. This would not only impair their own growth prospects, but also weigh on the revenues of numerous suppliers. An initially limited disappointment could therefore develop into a broader correction affecting large parts of the technology sector and ultimately the entire US equity market.

History calls for caution – 1972 and 2000

A look at stock market history shows that strong concentration in a handful of supposedly invulnerable companies is by no means new.

In the early 1970s, the so-called "Nifty Fifty" were the great favourites of US investors. This group included well-known companies such as IBM, Kodak, Xerox, Polaroid, Coca-Cola, Burroughs, Sperry, Control Data and McDonald's. These companies were considered particularly strong growers and economically sound. Many investors were convinced that their shares could be bought regardless of valuation, since their profits would continue to rise over the long term anyway.

This enthusiasm peaked in 1972. The shares traded at exceptionally high price-to-earnings ratios. When the economic environment deteriorated, inflation and interest rates rose, and the oil crisis added to the pressures, the euphoria collapsed. Between the start of 1973 and autumn 1974, the S&P 500 lost almost 50% of its value. Many Nifty Fifty stocks suffered even greater losses. Some

of the companies mentioned later disappeared from stock market listings following bankruptcies or corporate combinations, with Burroughs and Sperry, for example, merging to form Unisys in 1986.

A similar development occurred during the dot-com bubble around the turn of the millennium. At the time, investors were convinced that the internet would create an entirely new economic order. Over the long term, this assessment was indeed correct. The internet has fundamentally changed our economy and society. Nevertheless, many internet companies' valuations were vastly inflated. When investors realised that numerous companies would never meet their ambitious earnings forecasts, share prices fell sharply. Between March 2000 and October 2002, the S&P 500 lost around 49% of its value. The technology-heavy Nasdaq Composite fell by around 78%.

Rising interest rates pose an additional risk

Alongside the high degree of market concentration and the partly ambitious valuations, we see another risk for the US equity market: the direction of interest rates.

In recent years, many investors have relied on inflation gradually declining and the US central bank cutting interest rates on a sustained basis. Lower interest rates would reduce companies' financing costs while also justifying higher equity valuations.

We view these expectations more sceptically. Economic developments, large government deficits and the enormous capital requirements for expanding AI infrastructure can intensify competition for capital; the CBO projected the US budget deficit for 2026 at 5.8% of gross domestic product. This can put upward pressure on long-term interest rates. Companies with weaker balance sheets in particular may face higher financing costs and more restricted access to debt financing.

We therefore believe that US long-term interest rates could rise further. A marked economic slowdown or a recession could curb this upward trend, although declining inflation and changes in interest rate expectations also play a role.

Rising interest rates weigh on equities in several ways. First, they increase companies' financing costs. Second, they make fixed-income investments more attractive relative to equities. Third, they reduce the present value of future corporate earnings.

The last point is particularly relevant for highly valued technology companies. A substantial share of their current stock market valuation is based on profits expected many years from now. The higher the interest rate used to discount these future profits, the lower their present value.

Rising interest rates can therefore lead to substantial valuation corrections, particularly among growth companies.

WHAT IMPACT WILL THE US MIDTERM ELECTIONS HAVE ON THE ECONOMY AND STOCK MARKET?

The United States will hold its midterm elections on 3 November 2026. These congressional elections take place halfway through the US president's four-year term. All 435 seats in the House of Representatives and around one-third of the 100 Senate seats are up for election. Governors and other political officeholders will also be elected in numerous states.

Although these elections do not decide the presidency, their impact on US politics and the economy can be considerable. Congress plays a crucial role in legislation, tax policy and government spending.

President Donald Trump therefore faces important political turning points. If his Republican Party loses its majority in one or even both chambers of Congress, this would significantly restrict his room for political manoeuvre during the remaining two years of his term.

US equity markets have performed exceptionally well in recent months despite numerous economic and geopolitical uncertainties. As of 9 October 2026, the S&P 500 was close to its all-time high. Many investors are therefore asking whether the forthcoming elections could jeopardise the stock market rally or possibly even provide further positive momentum.

In our view, it makes sense to distinguish between the financial markets' short-term reactions and the elections' longer-term economic effects.

The president's party usually loses seats in the midterms

US electoral history shows a remarkable pattern. In midterm elections, the incumbent president's party almost always loses seats in the House of Representatives.

From 1934 to 2022, this was the case in around 87% of all midterm elections. According to an analysis by Capital Group, the president's party lost approximately 27 seats in the House of Representatives and three seats in the Senate on average across these 23 elections.

The reasons are understandable. During presidential elections, a candidate can often mobilise a broad electorate with far-reaching political promises. Two years later, however, it becomes clear that many of these promises have only partly been fulfilled. Disappointed voters use the midterm elections to express their dissatisfaction.

Polls from early October 2026, including those by the Pew Research Center, suggest that the Democrats have a good chance of regaining a majority in the House of Representatives. The Senate outcome also remains uncertain; national polls for the House elections do not, however, directly indicate what the Senate majority will be.

We therefore consider it likely that Donald Trump will no longer have a Republican majority in both chambers of Congress after the elections.

What happens if the Democrats win?

If the Democrats win a majority in the House of Representatives, this would significantly restrict Donald Trump's room for political manoeuvre.

Major tax reforms, new spending programmes and numerous other economic policy initiatives require the approval of both chambers of Congress. A Democratic majority could therefore block important parts of the Republican legislative agenda.

The situation would be even more difficult for Trump if the Democrats also won a majority in the Senate.

US politics could therefore enter a phase commonly referred to as "gridlock": The president and Congress block each other, making it difficult to implement major legislative initiatives.

At first glance, such political gridlock appears to offer little benefit to the economy. In practice, however, it can also have positive effects.

Many companies value stable and predictable operating conditions. If major political changes become unlikely, they can plan their investments over a longer horizon. Investors also have a clearer understanding of the tax and regulatory conditions they can expect.

For this reason, financial market participants often argue that political gridlock in Washington could even benefit the stock market.

Political gridlock could limit government deficits

One particularly important aspect, in our view, is the state of US public finances.

The United States has run exceptionally high budget deficits for years. At the same time, public debt has risen to a level that is causing growing concern.

These large deficits must be financed by issuing additional government bonds. This increases the supply of bonds and can contribute to a further rise in long-term interest rates.

If the Democrats control at least one chamber of Congress, they could prevent further tax cuts and new spending programmes proposed by the Trump administration. This could limit further increases in the government deficit.

However, the positive effects of such a development should not be overstated. A substantial share of US government spending is mandated by law. Moreover, the Democrats would be unlikely to support every proposal to reduce government spending.

This would, in principle, be positive for capital markets. Lower net borrowing could reduce pressure on long-term interest rates and thereby benefit both companies and equity markets.

Donald Trump will remain influential without a congressional majority

It would, however, be wrong to assume that Donald Trump would become largely unable to act politically following a possible electoral defeat for his party.

The US president has considerable powers, particularly in foreign policy, the implementation of existing laws and various areas of trade policy.

Trump could therefore continue to pursue an active tariff policy even with a Democratic-controlled Congress, insofar as applicable laws and court rulings grant him the relevant powers.

He could also influence his immigration policy and numerous regulatory decisions through the executive branch.

This point is particularly significant for the international economy. US import tariffs and trade tensions with China and Europe have a substantial impact on global trade.

A Democratic majority in Congress would therefore by no means automatically lead to a more liberal trade policy or a reduction in existing tariffs.

Nor would geopolitical risks disappear following a Democratic election victory. The president retains substantial influence over US foreign and security policy.

We therefore expect the underlying direction of US economic and foreign policy to change less significantly after the midterm elections than some investors may hope.

How do equity markets respond to midterm elections?

Stock market history shows that US equity markets often experience increased volatility in the months leading up to midterm elections. Investors are uncertain about which party will win a majority and what economic policy changes could follow.

After the elections, however, sentiment often improves.

An analysis by Capital Group of the midterm elections from 1950 to 2022 shows that the S&P 500 rose by around 15.1% on average in the twelve months from each election day, excluding dividend reinvestment. Returns were also frequently positive over shorter periods after the elections; historical averages are not, however, a forecast for the forthcoming elections.

We therefore do not necessarily expect a negative stock market reaction to the forthcoming elections, even if the Republicans lose their majority in the House of Representatives. Financial markets could respond positively to a Democratic victory if investors believe that it would limit additional government spending and make economic policy conditions more predictable.

A comprehensive Republican victory, by contrast, could raise expectations of further tax cuts and greater deregulation. This would be positive for certain companies, but could also intensify concerns about large government deficits and rising interest rates.

Our assessment: The elections are not the greatest risk

We expect the Democrats to make substantial gains in the midterm elections and potentially regain a majority in the House of Representatives. Such a development would restrict Donald Trump's room for political manoeuvre. At the same time, however, it could make US economic policy more predictable.

This would not necessarily be negative for equity markets. Investors could welcome limits on additional government spending and a lower likelihood of far-reaching new legislation. We therefore do not expect the midterm elections alone to trigger a major stock market slump.

Rather, we see the real risks in high equity valuations, strong concentration in a few technology companies and the substantial rise in long-term interest rates.

We continue to believe that long-term interest rates could rise further and that a marked economic slowdown or a recession could curb their increase, although these would not be the only possible causes of a reversal in interest rates.

What matters for the stock market is not who wins the election, but the economic consequences of the winner's policies and the country's overall economic development.

WILL SHARE PRICES FALL IF INTEREST RATES CONTINUE TO RISE?

Developments in international financial markets currently raise questions. While long-term interest rates have risen substantially in recent months, US equity markets have reached new highs. As of 9 October 2026, the S&P 500, the leading US equity index, was close to its all-time high. At the same time, the yield on ten-year US government bonds was around 5.24%, a level already seen in June 2007. A similar development is evident in Europe, where government bond yields have also risen significantly.

At first glance, this development appears to contradict financial markets' past experience. Rising interest rates generally weigh on share prices. Companies face higher financing costs, consumers are burdened by more expensive credit, and fixed-income investments become more attractive relative to equities. Nevertheless, investors currently seem convinced that US equity markets can continue their upward trend.

Many analysts justify this optimism by pointing to the substantial productivity gains expected from artificial intelligence and the exceptionally high profits of the large US technology companies. They argue that economic conditions have fundamentally changed, meaning that the historical relationships between interest rates and share prices no longer apply to the same extent.

Such arguments are by no means new. During periods of stock market euphoria, investors have repeatedly expressed the conviction that established economic principles no longer apply. The familiar phrase "This time is different" is therefore among the most dangerous statements made in financial markets.

We doubt that current developments really represent an exception to past experience. In our view, numerous reasons suggest that the sharp rise in interest rates will sooner or later also have an effect on equity markets.

Interest rates are significantly higher again

The development of long-term interest rates in 2026 is remarkable. Only a few years ago, investors were accustomed to safe government bonds offering low yields. In some cases, investors even had to accept negative interest rates to invest their capital in top-quality government bonds.

This environment has fundamentally changed. As of 9 October 2026, the yield on ten-year US government bonds stood at around 5.24%. In the United Kingdom, it was approximately 5.45%, in France around 4.86%, and even in Germany, which had particularly low interest rates for many years, around 3.49%.

Long-term interest rates in major industrialised countries have therefore returned to levels well above those of the prolonged low-rate period. Comparable yields on ten-year US government bonds were seen, for example, in June 2007, when the FRED time series recorded a daily value of 5.26%.

Why are interest rates rising so sharply?

There are several reasons for the current rise in interest rates.

Inflation is a key factor. Although inflation rates have partly declined from the peaks of previous years, substantial risks remain. High energy prices, geopolitical tensions, trade barriers and rising production costs can intensify inflationary pressure again.

Investors committing their capital for ten or twenty years therefore demand greater compensation for the risk that inflation will reduce the purchasing power of their future interest payments.

Added to this are the enormous government deficits in many industrialised countries, which are financed by issuing new bonds. The more government bonds are issued, the more capital investors have to provide. If demand does not grow to the same extent, governments have to offer higher interest rates.

In our view, another factor is becoming increasingly important: the substantial capital requirements of artificial intelligence, which can put additional upward pressure on long-term interest rates.

The AI revolution requires substantial amounts of capital

The large US technology companies are currently investing hundreds of billions of dollars in artificial intelligence. New data centres are being built, more powerful semiconductors developed, and vast additional computing capacity created. These investments are by no means confined to technology companies themselves. The expansion of artificial intelligence requires additional power plants, electricity grids, cooling systems, fibre-optic connections and numerous other infrastructure assets. This creates a wave of investment on a scale comparable to earlier industrial revolutions.

This development has two distinct effects. On the one hand, the investment stimulates economic growth. Companies receive new orders, jobs are created, and numerous industries benefit from rising demand. On the other hand, these investments require substantial financial resources. The large technology companies can finance a considerable share of their investment from ongoing operating cash flows. In addition, however, they are increasingly using debt financing, corporate bonds and private financing solutions. This intensifies competition for capital that is also needed to finance large government deficits.

Borrowing by technology companies is therefore becoming more important, but is not a new phenomenon: Amazon, for example, issued convertible notes worth around USD 1.25 billion as early as 1999. Today, extensive investment programmes can increase financing requirements and thus the demands placed on bond and credit markets. The key considerations are the scale, terms and sustainability of the debt.

Bonds are becoming an attractive alternative again

During the prolonged period of very low interest rates, institutional investors faced a substantial problem. Government bonds generated barely any income. Pension funds, insurers and other investors with a long-term focus therefore increasingly had to turn to equities, property and alternative investments to meet their return targets.

This environment has now fundamentally changed. As of 9 October 2026, the nominal yield to maturity on ten-year US government bonds was around 5.24% in US dollars, on UK government

bonds 5.45% in sterling, and on French government bonds 4.86% in euros, in each case before costs and taxes. High-quality corporate bonds offer even higher yields in some cases.

A pension fund that can finance its long-term obligations with a return of, for example, 4 to 5% therefore no longer necessarily has to take substantial equity risks to meet its investment objectives, although foreign-currency investments require consideration of exchange rate risks, hedging costs and the currency of its obligations.

The higher the yields on safe bonds rise, the more attractive these investments become relative to equities. This creates increasing competition for investors' capital, with attractive bonds now available as an alternative.

Higher interest rates weigh on companies and consumers

Rising interest rates do not only affect institutional investors' investment decisions. They also weigh on the real economy.

Companies that need to finance new investment or refinance existing loans face higher financing costs. Projects that were still profitable at an interest rate of 3% can become economically unattractive with financing costs of 6 or 7%. Capital-intensive sectors such as property, infrastructure, industry and energy supply are particularly affected. Small and medium-sized companies can also suffer from higher interest rates, especially if they rely heavily on debt financing.

Consumers also face a greater burden. Higher mortgage rates make home ownership more expensive. Consumer loans become more costly, and financing larger purchases becomes more difficult. This can lead households to reduce their spending and companies to postpone investment.

Governments are also coming under increasing pressure

Rising interest rates are particularly problematic for highly indebted countries. The United States, France, the United Kingdom and numerous other industrialised countries run substantial government deficits. When existing debt has to be refinanced with new bonds carrying higher interest rates, public budgets face rising interest expenditure.

This creates a negative cycle. Higher interest expenditure increases the budget deficit unless it is offset by savings or additional tax revenue. A larger deficit in turn creates additional financing requirements, which can put further pressure on capital markets.

Sooner or later, governments have to respond to this development. They can reduce spending, raise taxes or try to generate additional revenue through stronger economic growth. None of these options is straightforward. Spending cuts can slow economic growth. Tax increases weigh on companies and consumers. Stronger economic growth cannot simply be brought about through political action.

Rising interest rates and share prices – what does history teach us?

A look at stock market history shows that rising interest rates have often caused substantial problems in equity markets.

In the early 1970s, US stock markets were characterised by considerable optimism. The so-called "Nifty Fifty", a group of particularly successful growth companies, traded at exceptionally high valuations. Many investors were convinced that these companies' outstanding growth prospects justified virtually any share price. When inflation and interest rates rose and the oil crisis weighed on the economic environment, the situation changed fundamentally. Between the start of 1973 and autumn 1974, the S&P 500 lost almost half of its value.

A similar development occurred around the turn of the millennium. Between 1999 and 2000, the US central bank raised its policy rate from 4.75% to 6.5%. At the same time, enthusiasm for internet and technology companies reached its peak. When investors' expectations were disappointed and economic activity weakened, the dot-com bubble burst. By autumn 2002, the Nasdaq had lost around 78% of its value.

A period of rising interest rates also paved the way for the financial crisis of 2007 to 2009. The US central bank had raised its policy rate from 1% to 5.25% between 2004 and 2006. Higher financing costs contributed to growing problems in the US property market. When property prices began to fall, the entire financial system came under pressure, and share prices were also affected.

"This time is different" – is everything supposed to be different this time?

Many analysts currently argue that the traditional relationships between interest rates and share prices have become less important.

Their main argument is artificial intelligence: They suggest that the new technologies could increase companies' productivity so significantly that the additional profits would more than offset the negative effects of higher interest rates. At the same time, they argue that the large US technology companies already generate such high profits that rising financing costs would barely affect them.

This argument is not entirely without foundation. Companies such as Microsoft, Alphabet, Apple and Nvidia do indeed have exceptionally strong market positions. Their profits are substantial, their balance sheets are in some cases very sound, and their opportunities to generate additional earnings through artificial intelligence are considerable. For many companies, however, this potential is less pronounced.

These analysts' reasoning recalls a familiar phenomenon in financial markets. In periods of great enthusiasm, investors have repeatedly expressed the conviction that a new technology or business model would overturn established economic principles. In the early 1970s, it was supposedly invulnerable growth companies. Around the turn of the millennium, it was the internet. Before the financial crisis of 2008, many market participants believed that modern financial instruments and better risk distribution had fundamentally improved the stability of the financial system. In all these cases, the arguments contained an element of truth. However, investors' long-term conclusions frequently proved exaggerated.

Artificial intelligence will undoubtedly change the economy, just as railways, computers and the internet did before it: It can enable substantial productivity gains and generate new profits. The crucial question, however, is not whether artificial intelligence will be economically successful. Rather, it is whether the additional profits will actually be high enough to justify today's equity valuations and substantial investment.

Higher profits can offset higher interest rates – but for how long?

To assess the current situation correctly, it is necessary to understand why rising interest rates normally lead to lower equity valuations. The economic value of a share ultimately derives from the future earnings a company can generate for its shareholders. These future earnings are discounted to their present value using an appropriate interest rate. The higher this interest rate, the lower the present value of future profits. Discounting a profit of CHF 1 million due in ten years at 3% produces a present value of CHF 0.744 million; at 6%, this amounts to only CHF 0.558 million.

Of course, rising corporate earnings can offset this negative effect. If earnings grow faster than valuation multiples decline, share prices can continue to rise even when interest rates increase.

This is precisely what investors are currently relying on. They expect productivity gains from artificial intelligence to generate earnings growth strong enough to more than offset the negative effects of higher interest rates. Whether these expectations will be met is, however, far from certain.

Above all, the question is how long the large technology companies' earnings can continue to rise at such high growth rates. The larger a company already is, the harder it becomes to increase its earnings by 20 or 30% year after year.

Competition in the AI sector is also increasing. New providers are entering the market, and existing companies are investing enormous sums to defend their market positions. This could mean that a substantial share of the expected productivity gains ultimately benefits customers rather than technology companies' shareholders.

Artificial intelligence can therefore be extraordinarily successful without the current share prices of every AI company being justified.

An additional risk: Rising interest rates can slow AI investment itself

One particularly relevant aspect of current developments is, in our view, underestimated by many investors.

As long as companies believe that their investments in data centres and AI infrastructure will pay off over the long term, they will continue their investment programmes. This generates additional orders for semiconductor manufacturers, energy companies and numerous other suppliers. If financing costs rise further, however, companies will have to review their investment calculations.

A data centre that promises an attractive return at financing costs of 4% may look significantly less appealing at an interest rate of 7%. This is particularly true if there is also uncertainty about future prices for computing services or the actual utilisation of the facilities. If the large technology companies reduce their investment programmes, this could have substantial implications for numerous other industries. Manufacturers of high-performance processors would receive fewer orders. The expansion of energy infrastructure could slow. Construction companies and technical suppliers would face weaker demand.

Today's wave of AI investment is therefore not only an important support for economic growth, but potentially also an additional source of future economic instability. For this very reason, we consider it dangerous to assume that artificial intelligence can permanently neutralise the negative effects of rising interest rates.

Equity markets underestimate the risks

Stock markets are currently showing considerable strength. At the same time, long-term interest rates have risen substantially. Safe bonds once again offer attractive yields, companies' financing costs are increasing, and high public debt is placing growing strain on government budgets.

Many analysts nevertheless remain highly optimistic because they have confidence in economic growth and rising corporate earnings. We consider it dangerous, however, to justify current equity valuations solely on the basis of such optimistic scenarios. Share prices already reflect exceptionally high expectations. If these are disappointed even in part, substantial share price corrections could follow.

A situation in which interest rates continue to rise while economic growth slows would be particularly critical. In this case, companies would face both higher financing costs and weaker demand. Such a combination could put pressure on both corporate earnings and valuation multiples.

HOW MUCH CAPITAL DOES THE AI INDUSTRY NEED – AND CAN IT PAY OFF?

Artificial intelligence is regarded as one of the most significant technological revolutions of our time. Few other developments have generated such high expectations in recent decades. The large US technology companies are investing substantial sums in new AI models, data centres, high-performance processors and the necessary infrastructure. At the same time, numerous AI-related stocks are reaching all-time highs because investors expect earnings increases attributed primarily to artificial intelligence and its applications.

Amid the current stock market euphoria, however, a crucial question is often overlooked: How much capital actually needs to be invested to achieve the promised productivity gains? An even more important question is: What profits must companies generate for these substantial investments to pay off for their shareholders?

The scale is impressive. According to McKinsey estimates, around USD 6.7 trillion may need to be invested worldwide by 2030 in expanding data centres and the associated infrastructure. Approximately USD 5.2 trillion of this relates to capacity for artificial intelligence.

The AI revolution requires far more than new software

Many investors primarily associate artificial intelligence with companies such as OpenAI, Microsoft, Alphabet and Meta. These companies develop AI models and offer their customers new applications. The economic requirements for operating these systems, however, extend much further.

Artificial intelligence requires enormous computing capacity. High-performance processors must be manufactured, data centres built and large amounts of additional electricity supplied. Semiconductor manufacturers have to expand their production capacity. Data centre operators need land, buildings, cooling systems and powerful networks. Energy companies have to build additional power plants and expand their electricity grids. Added to this is the expenditure of technology companies themselves, which develop new AI models, process large volumes of data and invest substantial sums in research and development.

This creates a wave of investment extending far beyond the technology sector and encompassing numerous traditional industries. It is particularly notable that these investments have to be made within a relatively short period. Companies falling behind in today's competition for the most powerful AI systems risk permanently losing their market positions.

This competitive pressure means that numerous companies are pursuing extensive investment programmes simultaneously – often without yet knowing precisely what future returns they will generate.

How large are the total capital requirements?

Estimates of future capital requirements vary substantially. This is mainly because no one can reliably predict how quickly demand for AI applications will grow or how technological advances will change the computing capacity required.

McKinsey expects global investment requirements of around USD 5.2 trillion for AI computing capacity, including the necessary technical infrastructure, over the period to 2030. This amount

covers servers and processors, data centres and the associated electricity infrastructure in particular.

In addition, semiconductor manufacturers have to expand their own production facilities. In its third-quarter 2026 forecast, the industry association SEMI expects investment of around USD 149 billion in 2026 in equipment for 300 mm semiconductor fabrication plants alone. This expenditure is expected to rise further through 2029, while a decline is forecast for 2030. The total requirement of USD 6.7 trillion estimated by McKinsey covers data centres for AI and traditional IT applications.

These figures are subject to considerable uncertainty. Nevertheless, they illustrate the exceptional scale of the current investment wave and its capital requirements.

Where will the required capital come from?

Financing these investments presents a major challenge. The leading technology companies do have substantial financial resources. Microsoft, Alphabet, Amazon and Meta generate high operating cash flows and can therefore finance a significant share of their investments themselves. Nevertheless, extensive investment programmes can restrict their remaining financial flexibility. According to a Reuters analysis from July 2026, the combined capital expenditure of Microsoft, Alphabet, Amazon, Meta and Oracle in 2027 will exceed their free cash flow; however, this is already net of capital expenditure, so the comparison alone does not imply a funding shortfall. The key considerations are operating cash flow, available liquidity and financing options, particularly for younger AI companies with high investment expenditure and start-up losses.

Other companies do not have comparable financial resources. Independent data centre operators, energy companies and smaller AI providers in particular depend on debt financing or additional equity.

At the same time, governments are claiming ever larger shares of the available capital. The United States, France and numerous other industrialised countries run large budget deficits and have to keep issuing additional government bonds.

Traditional industry also needs to continue investing. Production facilities have to be modernised, transport routes renewed and energy infrastructure expanded. The capital needs of the rest of the economy remain, even if the AI industry is growing particularly strongly.

Numerous borrowers are therefore competing for investors' financial resources.

In our view, there are strong reasons to believe that this additional demand for capital can put upward pressure on long-term interest rates. Higher interest rates, in turn, make financing new data centres, power plants and semiconductor factories more expensive. We therefore expect that the financing costs of the AI revolution could be higher than assumed in many current investment calculations.

What profits must companies in the AI sector generate?

The crucial question, however, is not simply whether the necessary investments can be financed. Even more important is whether companies can earn an adequate return on these investments over the long term.

For a simplified model calculation, let us assume global capital investment of USD 5.6 trillion in AI infrastructure and the associated industries; this amount is a model assumption, not an additional McKinsey forecast.

Let us further assume a target annual operating return before tax of 8 to 10% on this capital. Given the technological risks and the considerable uncertainty about future demand, this does not seem excessive.

Under these simplified assumptions, the entire AI value chain would have to generate additional annual operating profit before interest and taxes (EBIT) of around USD 448 to 560 billion after the investment phase is completed to achieve the assumed operating return before tax.

It must, however, be borne in mind that these investments do not have an unlimited economic life. High-performance processors and servers in particular may have to be replaced after just a few years because of rapid technological progress.

If the invested capital is to be fully recovered over ten years while earning a return of 8%, constant annual payments at year-end would require an annuity of around USD 835 billion. At a required return of 10%, this amount rises to approximately USD 911 billion. These amounts are not equivalent to EBIT. They represent the annual cash flows available for capital recovery and returns after operating expenses, taxes and replacement investment.

The scale illustrates the challenge: The new infrastructure would have to generate enormous additional cash flow over many years for investors to recover their capital while also earning an adequate return.

What would the AI infrastructure need to generate each year?

Ultimately, AI companies' customers must be willing to pay sufficiently high prices for the new services. At the same time, companies using AI applications must achieve sufficient productivity gains to justify this expenditure economically.

Competition among AI companies is also crucial. The more intense the competition, the more sharply prices fall and the more difficult it becomes for AI companies to charge high prices for their services.

The productivity gains from AI will not accrue entirely to AI companies

Many investors assume that the enormous productivity gains from artificial intelligence will automatically translate into equally high profits for AI companies.

This assumption is unlikely to be correct. History shows that technological revolutions often create far greater benefits for the economy as a whole than for the companies financing the necessary infrastructure. Railways enabled an enormous economic expansion in the 19th

century. Nevertheless, many railway companies lost their capital because too many routes were built and competition put pressure on prices.

A similar development occurred during the expansion of telecommunications networks and the internet around the turn of the millennium. The newly created infrastructure proved exceptionally valuable over the long term. However, many of the companies that had financed it were unable to earn an adequate return.

This pattern could repeat itself with artificial intelligence. If AI applications substantially reduce the costs of creating software, handling administrative tasks or developing new products, for example, the initial beneficiaries are the companies using these technologies.

It is by no means certain, however, that providers of AI systems will be able to capture the entire economic benefit through higher prices. Rather, price competition is likely to intensify as more companies offer comparable AI services.

Technological development creates an additional risk

Another aspect is, in our view, often underestimated: the pace of technological progress. With traditional infrastructure investments, investors can often expect a long economic life. A hydropower plant can operate for many decades. Electricity grids and railway infrastructure also have long lifespans. The situation is different for AI processors and data centres.

New generations of high-performance processors regularly offer significantly greater computing power and better energy efficiency. At the same time, AI models continue to evolve and may require substantially less computing capacity for certain tasks than their predecessors. This means that facilities built today could become technologically outdated after just a few years.

Our model calculation based on a ten-year amortisation period could therefore even be too optimistic for certain parts of the AI infrastructure.

The crucial question is not whether artificial intelligence will be successful. Rather, it is whether the companies investing trillions of dollars in this technology today will generate sufficient earnings from it.

The history of earlier technological revolutions gives reason for caution. New technologies have often created enormous economic value, while many investors who financed the development of the necessary infrastructure suffered substantial losses.

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