The AI Paradox: A Growth Engine with Rising Vulnerabilities

Marc-Antoine Collard
Chief Economist – Director of macroeconomic research

Economic growth has moderated, but fears of a synchronized global downturn have repeatedly failed to materialize despite successive shocks, from tariffs to the conflict in the Middle East. This resilience has been supported largely by investment spending related to artificial intelligence (AI), even as financial vulnerabilities have increased.

It's the AI, stupid

The world is currently experiencing one of the largest technology-driven investment cycles in history. AI sits at the centre of this transformation, and its significance extends far beyond technological innovation. Its deployment requires enormous investment in computing capacity, data centres, communication networks, energy infrastructure and software development. As a result, AI has become a powerful catalyst for capital expenditure across a wide range of industries.

The largest hyperscalers[1] are expected to spend around two trillion US dollars between 2025 and 2027[2]. These commitments are increasingly outpacing earnings and free cash flow, prompting some firms to raise debt financing. This raises the risk of capital being allocated to projects whose returns remain highly uncertain, leaving companies vulnerable to disappointments in AI-related payoffs. Should expectations fall short, funding conditions could tighten abruptly, turning today's investment boom into a protracted downturn with broader implications for financial markets and economic activity.

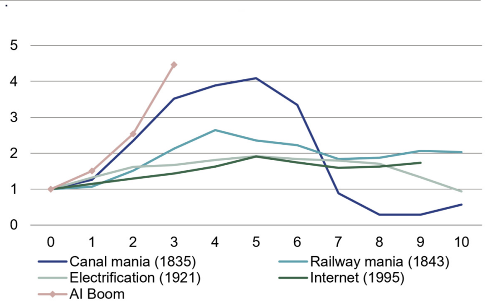
At the same time, the AI boom is running into supply-side constraints. The rapid build-out of AI infrastructure has exposed growing bottlenecks in electricity generation, advanced semiconductors and grid equipment. Looking ahead, these shortages may further encourage over-investment, as firms attempt to secure future capacity through long-term contracts that increase their exposure to any eventual shortfall in demand.

The key question is whether these investments can translate rapidly into meaningful productivity gains. Not only does the magnitude of such gains remain highly uncertain, but economic history also suggests that transformative technologies often require years of complementary investment and organisational change before their benefits are fully realised.

Indeed, previous investment booms have shared a common characteristic: a genuine technological breakthrough that attracted more capital than commercial returns could ultimately justify. Most episodes eventually ended in an investment reversal, generating economy-wide turbulence. The scale and speed of the current AI investment cycle, combined with expectations of substantial productivity gains, bear clear similarities to these historical precedents and highlight meaningful downside risks.

World – Investment relative to pre-boom levels

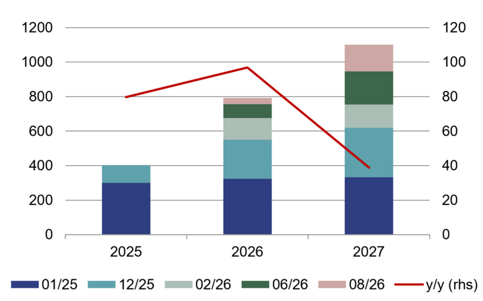
cumulative multiple, years after the boom



Sources : BIS, Rothschild & Co Asset Management 31/08/2026.

US – Capex oulook (hyperscalers)

in bn $, in %



Sources : Bloomberg, Rothschild & Co Asset Management 31/08/2026.

Trade war's financial ramifications

Alongside the AI investment boom, the global economy is becoming increasingly fragmented. The era of ever-deeper globalisation appears to be giving way to a more complex landscape shaped by strategic competition, supply-chain reconfiguration and rising economic nationalism.

This does not imply the end of globalisation. Rather, companies are increasingly seeking to reduce strategic dependencies and strengthen the resilience of their production networks. While these adjustments may lower exposure to disruptions, they also risk raising costs and eroding some of the efficiency gains that characterised previous decades.

The evolving trade environment also raises broader questions about economic leadership. For decades, the US has benefited not only from the size of its economy and its technological leadership, but also from a vast network of economic, financial and political alliances. These relationships have supported global trade, attracted foreign capital and reinforced the central role of the US within the international economic system.

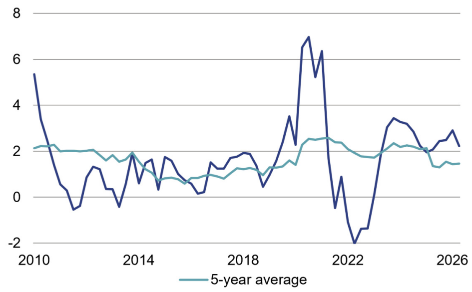
Recent tensions with some of America's closest trading partners illustrate the risks associated with weakening these relationships. In the short term, tariffs may offer limited benefits to certain industries or modestly support fiscal revenues. However, the longer-term consequences could prove far more significant. Persistent disputes with allies may encourage supply-chain diversification away from the US, weaken confidence and reduce foreign partners' willingness to align with American economic priorities.

The financial implications may ultimately be more important than the direct effects on trade. The privileged position of the US rests in large part on the role of the dollar as the world's dominant reserve currency. This status confers substantial advantages, including lower borrowing costs, a deep and liquid Treasury market, privileged access to global savings and significant influence over international financial conditions. Yet reserve-currency status ultimately depends on confidence, institutional stability and the attractiveness of the broader economic ecosystem.

No realistic alternative to the dollar currently exists. Nevertheless, repeated tensions with allies and trading partners are gradually encouraging greater diversification in trade settlement systems, reserve portfolios and cross-border investment flows. These shifts are likely to be slow, but even a modest reduction in global demand for dollar-denominated assets could carry significant consequences over time. Higher financing costs, weaker capital inflows and a reduced capacity to finance large fiscal deficits at low interest rates would constitute meaningful headwinds for the US economy. The greatest risk therefore lies not in the immediate impact of individual tariffs, but in the gradual erosion of the economic relationships that have long underpinned American financial dominance.

US – Productivity

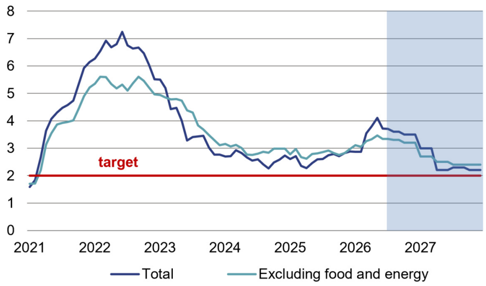
in %, y/y



Sources : Macrobond, Rothschild & Co Asset Management 31/08/2026.

US – PCE Inflation

in %



Sources : Macrobond, Rothschild & Co Asset Management 31/08/2026.

Higher interest rates amid persistent inflation

Meanwhile, the inflation outlook remains challenging, especially as most central banks have yet to achieve their targets after more than five years. Services inflation remains elevated across many economies, while food price inflation could stay high in the coming quarters as geopolitical and climate-related pressures continue to constrain agricultural supply. The conflict involving Iran has pushed up energy prices and disrupted fertilizer markets, increasing production costs across the agricultural sector. Higher fertilizer prices are likely to weigh on crop yields while raising food production costs worldwide.

At the same time, climate change is increasingly affecting agricultural output. The extreme heatwaves, droughts, and weather-related disruptions experienced this summer across several key producing regions have damaged harvests and reduced food supplies. Together, these factors are likely to sustain upward pressure on food prices and slow the decline in headline inflation. In addition, the enormous investment requirements associated with the AI boom, combined with persistent supply-side constraints, are also contributing to inflationary pressures.

Long-term interest rates have risen to their highest levels in more than fifteen years, partly reflecting this more challenging inflation outlook. At the same time, widening fiscal deficits are increasing government borrowing needs, while the AI boom is adding further upward pressure as massive financing requirements boost demand for long-term capital.

Overall, the AI boom presents two sides of the same coin. On the one hand, it has the potential to deliver substantial productivity gains, supporting stronger long-term growth and higher living standards. On the other hand, it is fuelling inflationary pressures and pushing long-term interest rates higher, thereby increasing financial vulnerabilities, particularly if expectations regarding future productivity gains and capital spending ultimately prove overly optimistic.

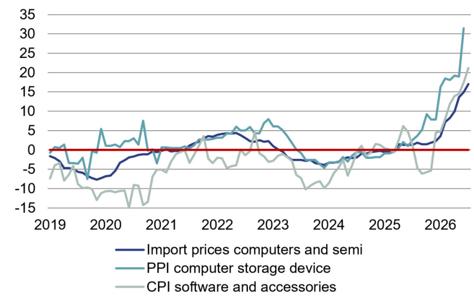
World – Fertilizer prices

in USD per ton, Bloomberg Index

Sources : Bloomberg, Rothschild & Co Asset Management 31/08/2026.

US – Inflation from AI capex

in %, y/y



Sources : Macrobond, Rothschild & Co Asset Management 31/08/2026.

Performance of the indices and interest rate levels

	Price as of 31/08/2026	1 month % change	2026 % change
Equity markets			
CAC 40	8 335	-2.1%	2.3%
Euro Stoxx 50	6 420	1.0%	10.9%
S&P 500	7 686	2.6%	12.3%
Nikkei 225	66 312	3.0%	31.7%
Currencies			
EUR/USD	1.16	0.8%	-1.1%
EUR/JPY	185.59	-2.3%	0.9%

Interest rates	Price as of 31/08/2026	1 month bp(1)	2025 bp(1)
3 month			
Eurozone	2.50%	9	39
United States	3.83%	7	20
10 years			
Eurozone	3.32%	12	47
United States	4.75%	2	58

(1) Basis point.
Source: Bloomberg. data as of 28/02/2025. Performances in local currency.
Past performance is not a reliable indicator of future performance and is not constant over time. Index's performance is calculated on the basis of net dividend reinvested

Check this document on our website

[1] A company that operates large-scale IT infrastructure and data centers.
[2] Source: Bloomberg, September 2026.

Warning

Published by Rothschild & Co Asset Management, a portfolio management company with a capital of €1,818,181.89, 29, avenue de Messine – 75008 Paris. AMF approval N° GP 17000014, RCS Paris 824 540 173.

About the Asset Management's division of Rothschild & Co

As the specialised asset management division of the Rothschild & Co group, we offer personalised asset management services to a broad client base of institutional investors, financial intermediaries and distributors. Our development is focused on a range of open-ended funds leveraging our long-term expertise in active management with conviction as well as in delegated management. Based in Paris and operating in 9 European countries, we manage more than 47billion euros and employ nearly 200 people[1].
More information at: www.am.eu.rothschildandco.com

(1) Source: Rothschild & Co Asset Management, 31/12/2025.

France

29, Avenue de Messine
75008 Paris
+33 1 40 74 40 74

Belgium – Netherlands – Luxembourg

Rue de la Régence 52
1000 Bruxelles
+32 2 627 77 30

Switzerland

Rothschild & Co Bank AG
Rue de la Corraterie 6
1204 Genève
+41 22 818 59 00

Italy

Passaggio Centrale 3
20 123 Milano
+39 02 7244 31

Germany - Austria

Börsenstraße 2 - 4
Frankfurt am Main 60313
+49 69 299 8840

Spain

Paseo de la Castellana 40 bis
28046 Madrid
+39 02 7244 31

Visit our internet site

Follow us on LinkedIn