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MoneyWeek

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From the editor...

One of the most intriguing statistics in economic history is that in 1914 Argentina was richer than Germany. Its GDP per head was 92% of the average of 16 developed economies. In 2014, its income per capita was 43% of those same 16 economies. Why? "There is a lot of ruin in a nation," said Adam Smith. But not an unlimited amount. Economies can shrug off a great deal of poor governance, but Argentina breached the limit. Dictatorships, a poor education system and statist, populist policymaking were fertile ground for hyperinflation in the 1990s and recent debt crises.

Two beer groups control 90% of the US market

©Getty Images

"When people feel the system isn't working, they may be inclined to give socialism a go"

What about the developed world?

Before we smugly dismiss Argentina as an irredeemable mess, however, we should ask what Adam Smith might make of the club of rich countries these days. I don't think he'd be very impressed. Capitalism is struggling because it has been undermined by poor governance. Take the US. An ill-advised revamp of competition law in the 1980s led to four decades of megamergers.

The result, says economist Jonathan Tepper, is no competition. The US has only four major airlines, three principal cereal-makers, and two beer groups (controlling 90% of the market). Duopolies and oligopolies raise the cost of goods and keep salaries low, as the big brands have scant competition for labour. The rise of regulation has been key, too. Big firms can cope with the cost of compliance, small ones can't. Enterprise suffers as fewer small firms thrive; income and wealth inequality increase.

Or take central banks, which have also exacerbated wealth inequality in the past 25 years by blowing up asset bubbles, often with printed money, every time markets have slid. So house prices are now too high, prompting governments to stoke demand yet further with schemes such as Help to Buy. Keeping interest rates low or below zero encouraged speculation and prolonged the lives of unviable companies, or "zombies". These absorb capital that would be better spent on new projects (resources are inefficiently allocated) and dent overall productivity. In normal times, they would be swept away to make way for new blood: the process of "creative destruction".

Rise of the zombies

Andrzej Rzonca, a former member of Poland's Monetary Policy Council, notes in the Financial Times that around 10% of US firms are zombies. In Europe, "ultra-low interest rates – through zombification and resulting misallocation – lowered productivity, slowing GDP growth by up to 3% in the years following the financial crash". The upshot? "The saving grace of capitalism, its often cruel efficiency, is steadily being lost," says Bloomberg columnist John Authers. As more and more people come to feel the system isn't working for them, they may be more inclined to give the cruel inefficiency of socialism a go. Then there would be even more ruin in the nation.

Speaking of Adam Smith, Merryn's Edinburgh Fringe show takes place at Panmure House, where he once lived. It runs from 25 to 28 August. Guests include MoneyWeek favourites Russell Napier, Hugh Hendry, James Ferguson and Edward Chancellor. Book your tickets at tickets.edfringe.com/whats-on/butcher-the-brewer-the-baker-and-merryn-somerset-webb.

Andrew Van Sickle
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Lawsuit of the week

©Alamy

Frederick Barclay, the former owner of the Ritz Hotel in London, has avoided jail after a judge gave him three more months to pay a £100m divorce settlement owed to his ex-wife, Hiroko, says The Guardian. Barclay (pictured) was once estimated to share a £7bn fortune with his twin David, who died in 2021, but says that he is unable to access the money because it is held in trust for his daughter, Amanda, and nephews. He was found in contempt of court in July for not paying £245,000 in legal fees and maintenance. That amount has now been paid through a loan from his daughter, who "has made it clear that she will not pay any more", Barclay's lawyer told the court. Hiroko Barclay's lawyer called for her ex-husband to be given a five-week suspended sentence, but the judge adjourned sentencing. "I want to hear of real progress of the big fish in all this, namely the payment of the £100m lump sum," he said, calling Barclay's failure to pay "a matter of shame".

Cover illustration: Howard McWilliam. Photos: Alamy; Getty Images; GMC

Good week for:

Lawyer **Tungnath Chaturvedi** has won a 22-year legal battle with Indian Railways after being overcharged Rs20 (£0.21) when he bought two tickets in 1999, says BBC News. Chaturvedi was unable to claim a refund at the time, but after more than two decades and over 100 hearings, a court ruled in his favour, ordering the railways to pay a Rs15,000 (£154) fine, and the outstanding amount plus 12% interest.

©Getty Images

Chef **Nusret Gökçe** (pictured) – also known as Salt Bae – has seen his Nusr-Et steakhouse in London make £7m in sales and £2.24m profit in its first four months, says the Evening Standard. Gökçe – who became a social-media sensation for his flamboyant way of sprinkling salt – has made headlines for high prices, included £700 steaks in gold leaf. He has already left London for Saudi Arabia to open his 28th restaurant.

Bad week for:

Domino's Pizza has left the Italian market after failing to compete with local restaurants, says Bloomberg. The chain entered the home of pizza in 2015 with plans to open 880 stores through a local franchise holder, ePizza, offering a nationwide delivery service and US-style toppings, such as pineapple. However, ePizza has now closed its 29 branches and filed for bankruptcy. The venture had €10.6m in debt at the end of 2020.

A Brazilian woman has been arrested for allegedly using fake psychics to defraud her mother out of R$724m (£116.3m) in art, money and jewellery, says Reuters. Police say that **Sabine Coll Boghici** got accomplices to tell her mother, Genevieve, the widow of an art collector, that her paintings were cursed. Among the 16 paintings stolen was *Sol Poente* by Tarsila do Amaral, valued at R$300m, which was found under a bed in an Ipanema flat.

A turning point in economic history

Alex Rankine
Markets editor

"Peace is the natural effect of trade," wrote Montesquieu in 1748. Alas, his faith is proving misplaced, says Guillaume de Calignon in Les Echos. The globalisation of the past few decades has not spread world peace, and global trade seems to be fracturing into "regional blocks".

US House speaker Nancy Pelosi's visit to Taiwan sent regional bond and stockmarkets on a rollercoaster ride, says Nathaniel Taplin in The Wall Street Journal. Yet even that turbulence "doesn't reflect the real import of the event".

The military drills launched by Beijing in response "look like a trial run for a real blockade" of the island. The persistent threat of cross-strait escalation will "raise the cost of doing business with Taiwan" and shake faith in the security of regional manufacturing supply chains, not least for semiconductors (see below).

US House speaker Nancy Pelosi's visit to Taiwan roiled regional bond and stockmarkets

©Alamy

We now "stand on the edge of one of those great turning points in economic history", says Jeremy Warner in The Daily Telegraph. Trade problems during Covid-19 showed that the West has "traded our economic resilience for… cheap prices". Western firms are not pulling out of China altogether, but they are spreading their bets. CEOs are using a "China-plus-one" strategy that involves shifting some production elsewhere while staying engaged with the world's second-biggest economy.

Decoupling is hard to do. "Chinese companies cannot yet afford" to be cut off from foreign technology, says Leo Lewis in the Financial Times. Deep Sino-US business ties and investments can't be unwound overnight. Take electric-vehicle batteries, an industry dominated by China that US politicians hope to "reshore". Goldman Sachs points out that doing so will take "between four and seven years". Decoupling is certainly happening, "but not as fast as you think".

Trading with friends

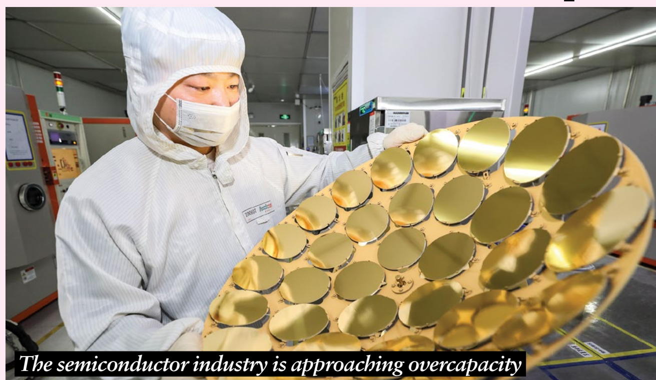
The death of globalisation has been exaggerated, says Andrés Velasco for Project Syndicate. While trade as a share of global GDP has fallen from 61% in 2008 to 52% in 2020, that is "still very high by historical standards". Talk that the Biden administration might ease some Trump-era trade tariffs shows that fears of a global spiral into protectionism and quotas were misplaced – voters don't like higher prices. While supply chains are being re-shaped, that is not the end of globalisation. "Apple recently decided to move some of its assembly operations from China to Vietnam, not to Arkansas or Alabama." Instead of reshoring, US officials talk of "friendshoring" – making sure key supply chains are in friendly nations.

Corporate logisticians are already prioritising resilience, says The Economist. Witness "the vast build-up in precautionary inventories", up from 6% to 9% of world GDP since 2016 at the world's 3,000 biggest firms. Hopefully the "reasonable pursuit" of more supply-chain security will not "morph into rampant protectionism, jobs schemes and hundreds of billions of dollars of industrial subsidies" that will only worsen inflation. "Governments and firms must remember that resilience comes from diversification, not concentration at home."

Semiconductors head for "supersize bust"

"Chipmakers are the coalface of the modern economy," says Cormac Mullen on Bloomberg. Demand for semiconductors is a good "leading indicator" for stockmarkets and the economy. The industry is heading for a slump, say Debby Wu, Jeran Wittenstein and Ian King, also on Bloomberg. The global shortage of chips that started during the pandemic is not over yet – average wait times were 27 weeks in June, up from less than 15 weeks pre-pandemic – but the cycle has clearly started to turn.

The PHLX Semiconductor index, which tracks the industry's leading lights, gained 43% in 2021, but has fallen 24% since the start of this year. "Disastrous" second-quarter results from Intel and a revenue warning from graphics-card specialist Nvidia show a market that is "rapidly weakening", says Dan Gallagher in The Wall Street Journal. Demand for PCs and smartphones has dropped this year: many consumers bought new gadgets during lockdown and don't feel the need to upgrade. But more worrying is a warning from memory-chip business Micron that demand from big names in the cloud-computing and car industries is also starting to weaken.



The semiconductor industry is approaching overcapacity

©Getty Images

Huge state subsidies in the US, Europe and Asia are likely to push the chip industry into long-term overcapacity, says The Economist. Last year's shortages have convinced leaders that chipmaking is too important to be done overseas in unfriendly countries.

Not that the industry needed government help to overbuild: Intel, Samsung and Taiwanese giant TSMC jointly "invested $92bn…last year". Some 58 new "fabs" – as semiconductor plants are called – "are scheduled to open between 2022 and 2024", raising global capacity by about 40%. When that supply comes online, the chipmakers could be heading for "a supersize bust".

China's engine is sputtering

Crude-oil prices fell by 5% on Monday on the news that Chinese retail sales rose by 2.7% year on year in July, much worse than the expected 5% and down from 3.1% in June. Industrial production rose by just 3.8%. Youth unemployment hit a record 19.9%.

"The world's economic engine is sputtering," says Matt Phillips on Axios. The central bank has cut interest rates by "a tiny one-tenth of a percentage point". That won't do much. In past downturns measures of credit have surged as Beijing sought to stimulate the economy. Yet this time "there's little indication that the government is decisively trying to prop growth up".

Retail sales fell 2.4% in July, underlining "just how weak... domestic demand really is", says Craig Botham of Pantheon Macroeconomics. The "half-hearted" efforts at monetary stimulus won't work: even cheap credit won't encourage manufacturers or property firms to invest when underlying demand is lacking.

For years China has been "the world's spender of last resort", propping up demand – notably for commodities – when other economies flounder, says John Authers on Bloomberg. Yet imports have "tailed off" in dollar terms. That may help bring global inflation down more quickly by cooling commodity prices. But "a serious Chinese slowdown would make a global recession much harder to avoid". Bullish investors should take note of this "Shanghai surprise".

US inflation is still a threat

Has US inflation finally peaked? Annual inflation fell to 8.5% in July, down from 9.1% the previous month. The fall was driven by a 7.7% month-on-month slump in US petrol prices in July. The data prompted traders to conclude that the Fed might not have to hike interest rates as aggressively as feared. Strong employment data – the economy added half a million jobs in July – has also encouraged bets that the economy may dodge a recession. The S&P 500 index has gained 11% in a month.

©Getty Images

Petrol prices slumped by 7.7% in July

Even if the US has passed the peak, it will be some time before inflation comes back down to earth. As Campbell Harvey of Research Affiliates points out, there has been so much inflation in recent months that even if prices now remain flat for the rest of the year – an unlikely scenario – then headline annual inflation will still be at more than 6% in December.

Structural, not transitory

And structural forces (such as de-globalisation, see page 4) are pushing prices higher. The data "gives as much reason for consternation as for celebration", says The Economist. Annual core inflation – a measure that strips out volatile food and energy prices – is running at 5.9%, the same as the previous month.

The strong labour market is fuelling pay growth, with wages up by an annual 5.2% over the past three months. That suggests price rises are becoming embedded in the economy, heralding "structural" rather than "transitory" inflation. While the headline numbers were good, "inflation remains both broad-based and far above the Fed's target", says James Mackintosh in The Wall Street Journal. Investors' optimism is misplaced – "there's no sign the Federal Reserve will change its mind and agree with investors that rates should come down again next year".

Equity traders are also failing to price in the effects of the coming slowdown on corporate earnings, which they blithely expect to continue rising this year and next. Bond markets seem to be expecting "one sharp round of tightening – comprised of a rise in short-term interest rates to just above 3%" that will "be enough to bring inflation down to 2.5% with stable growth and no dent in earnings", says Bob Prince of Bridgewater Associates.

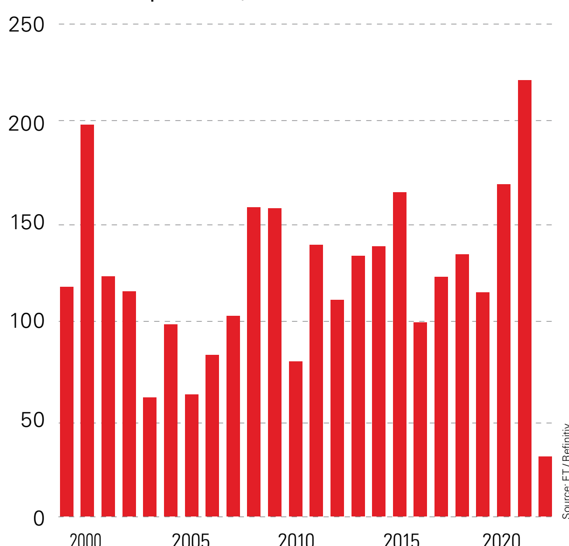
That looks optimistic, says John Mauldin in his Thoughts from the Frontline newsletter. "Bond investors seem to have a great deal of faith that the Fed... will make inflation recede sharply and soon." Markets usually know better than individuals, but there has been so much central bank intervention in the bond market that arguably "it is no longer a market in any meaningful sense". Central bankers are likely to lose their nerve when recession bites, slashing rates too early even while inflation is not back under control. The result? "Extended stagflation is our most likely destination."

Viewpoint

"It has been a long time since 'greedy banker bonus' stories dominated the front pages in the aftermath of the financial crisis... self-restraint in the face of public disgust... meant that the most egregious awards were scaled back... but [now] there are growing signs that wages in the City... are creeping back up. This time it is... skilled younger talent in chronically short supply rather than the swashbuckling Masters of the Universe of yore... The most high-profile example is the jaw-dropping inflation in young City solicitors' salaries, rising to as much as £185,000... Bloomberg reports that BNP Paribas had increased base pay for junior bankers to retain talent... It is vital that London holds on to the talent it needs to [remain] a... powerhouse. But it would not be good for its reputation [amid] cost-of-living pain if... 'retain and recruit' pay increments spill over into excess once again."

Jonathan Prynn, Evening Standard

■ A drought in the New York stockmarket



"After two extraordinarily busy years," New York capital-markets lawyers have time on their hands, says Nicholas Megaw in the Financial Times. Fundraising for US initial public offerings (IPOs) is down 95% so far this year, compared with the same period last year. Total equity issuance – which also includes other types of equity fundraising – is also struggling, as the chart shows. Previous dry spells, such as the early 2000s and the 2007/2008 crisis, coincided with corporate collapses and restructurings. Yet for now balance sheets are solid: firms loaded up on cheap credit during Covid-19. Falling markets and a shaky economy have dented optimism. Uncertainty over US interest rates means activity looks unlikely to pick up before 2023.

New headache for Haleon

GSK's former consumer-products arm, spun off last month, has made a dismal debut on the stockmarket. Simon Wilson reports

GSK's listing of its consumer-products arm Haleon is rapidly "turning into a textbook case of how not to do a spin-off", says Aimee Donnellan on Breakingviews. The hived-off company, in which Pfizer also owned a stake, floated last month. But last week Haleon's shares plunged owing to imminent litigation in Illinois over the once-popular heartburn drug Zantac.

Branded consumer goods struggle when inflation rises

GSK – formerly GlaxoSmithKline – stopped selling Zantac in 2019 when US regulators found that a potentially carcinogenic compound was created during the manufacturing process. Haleon, which owns brands such as Sensodyne toothpaste and Panadol painkillers, has never sold Zantac. However, it could have legacy "indemnification obligations" to GSK and Pfizer – a fact that has spooked investors already looking at a pretty "thin" case for holding Haleon.

Branded consumer goods face a tough time as inflation soars and customers seek out value. And it hardly helps that GSK loaded up Haleon with £10bn of debt, four times expected 2022 Ebitda – nor that GSK and Pfizer want to dump their remaining combined 45% holding in the stock.

During the pandemic we have become used to reading about the "speed and brilliance of innovation in life sciences", says Alex Brummer in the Daily Mail. The anxiety about Haleon and Zantac is a salutary reminder that new pharmaceutical products often have a "long tail of litigation risk". Nor was it just Haleon stock that fell, says Lex in the Financial Times. GSK and Sanofi, which marketed Zantac for a time in the US, slipped too. Morgan Stanley estimates that GSK could account for 30%-60% of any liability, and puts the potential legal hit at anything from $10.5bn-$45bn. Shares in all three firms have stabilised after assurances about the robustness of their legal positions. Yet investors are right to be "wary". Bayer's ongoing legal wranglings over Roundup, the glyphosate weedkiller acquired during the "disastrous" takeover of Monsanto, show how easy it is "to draw a line under compensation claims prematurely".

The wrong decision

Last December, GSK turned down a £50bn bid for Haleon from Unilever. That "road not taken" is looking very attractive, says Chris Hughes on Bloomberg Opinion. Even applying a "thumping" 50% bid premium to Haleon's current market value, you get to only £46bn once adding back the net debt. Moreover, "private equity was sniffing around last year, too". GSK's chairman Jon Symonds and its boss Emma Walmsley get "paid the big bucks" – £703,000 and £8.2m last year, respectively – to get these decisions right, says Alistair Osborne in The Times. Instead, GSK has waved goodbye to about £30bn of value, and could now face a "legal dust-up" with its former subsidiary over liability for Zantac claims. "Investors may need to take the entire medicine cabinet to survive this."

Disney must build on its success

"The pandemic TV-streaming party" ended long ago, says Ben Marlow in The Daily Telegraph. But for Netflix, the "hangover may only just be kicking in". Its rival, Disney, the home of Mickey Mouse, *Star Wars* and Marvel, now has 221 million paying customers across its Disney Plus, Hulu and ESPN+ brands, edging out Netflix with 220 million.

Disney's streaming is still loss-making, to the tune of $2.5bn this year. But the vast Disney empire (theme parks, holidays, cruise ships) can absorb such losses "while it continues the quest to gain meaningful market share and scale – a luxury that a debt-burdened, standalone Netflix does not have". Can Disney do still better? Third Point, the hedge fund run by billionaire Dan Loeb, thinks so, says Lex in the Financial Times. Two years ago, Loeb urged Disney to axe its dividend and invest aggressively in streaming content. "The House of Mouse did just that" and the strategy is working. Third Point sold its position earlier this year, but now it's back, with a $1bn stake and new advice: cost-cutting, spinning off ESPN and a board shake-up. Third Point's ideas are "in tune with the zeitgeist"; growth in the sector has slowed post-Covid-19. Still, selling ESPN, the live-sports cash cow, seems risky.

Meanwhile, in India, a key growth market, Disney's Hotstar joint venture has just lost streaming rights to Indian cricket, says Dan Gallagher in The Wall Street Journal. That's a blow that may curb overall growth in subscriptions. For Disney's success to continue, "Marvel's heroes will need to work overtime". (See also page 13.)

A stand-off over Mongolian copper

Rio Tinto and its fellow shareholders in Turquoise Hill Resources are "squaring up to each other" over Mongolian copper, says Karen Kwok on Breakingviews. The $96bn mining group owns 51% of the Canadian-listed Turquoise, which in turn owns a two-thirds stake in Oyu Tolgoi, a Mongolian mine that will soon be one of the world's biggest.

Rio Tinto wants to get the Turquoise minority shareholders "out of its hair", so it can "simplify the tangled ownership structure" and improve cash flow from the project. But so far the minorities aren't playing ball. True, they are "within their rights to say no to the $2.7bn on offer, but doing so looks riskier for them than Rio". Yes, analysts at Berenberg point out that recent deals were struck at higher multiples of reserves than that implied by Rio's C$34-a-share offer. But the offer was still a 32% premium to the Canadian company's share price in March price, and since then copper prices have fallen by a third. The minorities – which include Pentwater Capital Management and Kopernik Global Investors – should get the deal done.

The big problem for Rio is that everyone knows it can afford to pay more, says Alistair Osborne in The Times. This is, after all, the company that in February "treated its investors" to a $16.8bn full-year dividend. Yes, the copper price is down since March, but in the long run it remains a vital "net-zero mineral, key to electric cars and battery power" – and Rio is eager for more market clout. The minority shareholders, not least hedge fund Pentwater with 9.4%, "know they can only sell once. And Rio will have $8.9bn of free cash flow this year" on Berenberg's estimates. Rio's boss Jakob Stausholm (pictured) might insist he's made a generous offer, and that financial discipline is his watchword. The truth is he "can afford quite a few coppers more".

©Alamy; Getty Images

MoneyWeek's comprehensive guide to this week's share tips

Three to buy

British American Tobacco
Interactive Investor
A £957m impairment from exiting Russia has hit market sentiment towards BAT, but investors are overlooking plenty of good news. While global tobacco sales are stagnating, the group's vaping operations are enjoying vigorous sales growth, leaving BAT well-positioned for the future. A strong dollar is also helpful for a business that derives 76% of its profits from the US. The stock looks a solid pick for the "current tough times", especially given the 6.5% dividend yield. *3,230p*

Learning Technologies
Shares
This online staff-training business has fallen victim to the tech sell-off, despite being "highly profitable and cash-generative". The firm works with corporate and public clients to help them burnish their skills, giving it a front-row seat in a market set to be worth $400bn by 2026. More than two-thirds of revenue last year came from the US, the top digital-learning market. With operating margins approaching 20%, analysts think the shares could be poised to rerate over the next year. *131p*

Spirent Communications
The Mail on Sunday
Spirent works with the likes of Apple, BT and Vodafone to test new telecommunications technology. The complexity of the 5G mobile network roll-out means there will be healthy demand for its services: the global number of 5G connections is expected to climb from 500 million in 2021 to 1.3 billion by the end of this year. The group also specialises in "location awareness", a cutting-edge area that is needed for driverless cars and military drones. Spirent boasts a "strong balance sheet" and the shares yield around 2%. *276p*

Three to sell

Deliveroo
Motley Fool
This online food-deliverer is suffering a post-Covid-19 "hangover", with the shares tumbling more than 50% since the start of the year. But the fall is still no buying opportunity. The cost-of-living crisis is pushing up staff costs and will prompt customers to "cut back on takeaways". The group's "inability to turn a profit" is also notable. Business boomed in 2021, but it still posted pre-tax losses of almost £300m. As inflation is only likely to worsen in the second half of 2022, this is one to avoid. *95p*

IWG
The Times
This office operator, which owns the Regus and Spaces brands, had barely recovered from the pandemic before being hit by the latest economic storm. The group recorded an operating loss of £36m in the first half of the year as rising staffing and heating costs, along with Asian lockdowns, weighed on performance. Now talk of "an impending recession" could see companies opt to "take less space and cut back on optional extras such as catering". Poor results have rattled investors and mean earnings downgrades from analysts are likely. Avoid. *172p*

Petrofac
Investors' Chronicle
Soaring global demand for energy has not helped Petrofac. Sales fell by an annual 40% at the engineering and construction division in the six months to 30 June due to a "weaker oil and gas-project pipeline". Management thinks the industry is due a "multi-year upcycle" of rising investment. Yet the firm is unlikely to return to profit until next year, and will "remain far behind its 2016-2019 profit levels". The dividend is still suspended. Sell. *117p*

...and the rest

Shares
This year's sell-off offers an entry point into small-cap British companies. **The Montanaro UK Smaller Companies Investment Trust** offers a "ready-made portfolio of high-quality small fry". Judicious stock selection is more important at this end of the market owing to the presence of many illiquid or loss-making firms. The trust has a "long track record of outperforming peers" and offers a yield of 5.1% *(116p)*.

The Daily Telegraph
IBM is no longer a technology "dinosaur" thanks to its bets on quantum computing and the cloud. It is a leading filer of corporate patents. On 14 times forecast earnings and yielding 5%, the shares are not priced for the group's enhanced growth prospects. Buy *($129)*. Rising interest rates will put pressure on property prices, but a structural shortage of housing means builder **Barratt Developments** enjoys auspicious long-term prospects. On six times forecast earnings the market is being unduly gloomy – buy (487p).

Investors' Chronicle
Buy-to-let mortgage specialist **Paragon Bank** is "well-capitalised" and has a "history of high returns". The market may be rocky, but undervalued shares, dividends and buybacks could "herald double-digit total shareholder returns" for patient investors *(554p)*.

The Times
Tumbling markets are complicating asset manager **Abrdn's** efforts to restructure its cost base. Six years of net outflows suggest that its problems go "beyond the recent market downturn". On 20 times forward earnings the shares are unduly pricy. Avoid *(162p)*.

A German view

French insurance giant AXA incurred costs of around €300m related to the war in Ukraine in the first half of 2022,largely because it had to pay claims for hundreds of planes trapped in Russia. Spring storms in France didn't help either. Yet the bottom line increased by 3% to €4.1bn, showing that the core property-casualty business is in good shape, says WirtschaftsWoche. AXA could eclipse last year's annual profit of €7.3bn. Higher interest rates are increasing its return on investments, while the life-insurance business is being extended and the asset-management arm could benefit from a potential market recovery later this year. The shares yield an impressive 6.3%.

IPO watch

The emirate of Dubai is to raise $1bn through the sale of shares in its road-toll collection system next month, says Bloomberg. Dubai's eight toll points are operated with an automated system run by state-owned company Salik. It collects four dirhams (90p) from a prepaid account each time a vehicle passes through the points. Sales at the firm rose by 22% to 1.69bn dirhams (£382m) in 2021. The initial public offering (IPO) is part of a plan to privatise ten companies to bolster local capital markets. The region was "a bright spot" for IPOs in the first half of 2022, but Dubai's last two, property firm Tecom Group and supermarket operator Union Coop, slumped when they started trading.

©Alamy; Deliveroo; Getty Images

How to deal with the energy crisis

Some combination of price cap and targeted help seems to be the way forward. Emily Hohler reports

Britain faces a "winter of discontent", says Jon Yeomans in The Sunday Times. As energy bills surge, some will be forced to choose between food and heating, while others could refuse to pay, possibly "amid mass civil disobedience". The energy price cap, and therefore the average combined gas and electricity bill, is predicted to rise from £1,971 to £3,582 at the start of October, then to £4,266 by January.

On Monday, Labour leader Keir Starmer described the situation as a "national emergency" and unveiled his party's £29bn plan to freeze the cap at £1,971 for six months, says Adam Forrest in The Independent. The scheme would be paid for by backdating the windfall tax on energy firms from May to January, scrapping the £400 rebate already announced, and "through lower interest payments on government debt due to lower inflation".

Starmer's plan would prove hugely expensive

©Getty Images

Labour's plan would be hugely expensive (if extended to a year, it would cost as much as the Covid-19 furlough scheme) and it wouldn't discriminate between those who can afford higher bills and those who can't, says The Times. The notion that it would lower inflation and therefore debt interest payments only holds good for the duration of the scheme and there is no guarantee that wholesale energy prices will return to pre-crisis levels within six to 12 months. It also distorts the market, reducing incentives to expand supply or reduce consumption. Backdating the windfall tax creates uncertainty for business and acts as a disincentive to invest.

Speed is of the essence

What other ideas are on the table? Boris Johnson has said the government will avoid making any major policy or fiscal decisions until Liz Truss or Rishi Sunak is appointed prime minister on 6 September. This inertia is causing mounting concern, with personal finance campaigner Martin Lewis calling on the "zombie" government to act. So far, Truss has focused on tax cuts and, although she has not ruled out assistance with bills, the "only specific help" she has offered is a suspension of green levies, which would save households about £150 a year, says Peter Walker in The Guardian. Sunak says he will stick with the measures he announced while still in government and also cut VAT on energy bills and devote a similar sum (around £5bn) to targeted help for poorer households.

"Some combination of price cap and targeting support" seems to make most sense, says Jeremy Warner in The Daily Telegraph. A price cap of £3,582 rather than £1,971, with targeted support for poorer households, would be "easily affordable" in the short-term and "against a backdrop of strongly rising tax receipts might be just about feasible for an extended period of elevated wholesale gas prices". But speed is of the essence. The first "rule of crisis management is to get ahead of events". Starmer's price cap doesn't "sit easily" with Truss's "small state aspirations", but a plan proposed by Scottish Power's Keith Anderson may appeal. Under this scheme, the cost of freezing energy bills at £1,971 for two years would be met by a bank-financed credit facility. Households would repay the debt, which would be guaranteed by the government, over ten to 15 years, or the cost would be added to general taxation. If all 22 million households on default tariffs were covered, banks would have to lend around £50bn; covering the most vulnerable would cost more than £20bn, notes The Times.

The issue cannot be ducked, says Renaud Foucart in The Conversation. The British power model, which forces consumers to reduce consumption and encourages investment in production, is "generally ideal", but "efficiency is not everything" and "a rich country that cannot warm its homes has failed its citizens".

A lucrative asset

©Alamy

British universities are a "con trick"

Record numbers of British teenagers have been rejected by elite universities "in favour of lucrative overseas students" and now "face a scramble" for less prestigious places, say Sian Griffiths and Anna Lombardi in The Times. Four in ten UK applicants have been turned down by Oxbridge, the highest ever rejection rate.

Experts say elite universities are focusing on foreign students who pay an average of £24,000 a year, £15,000 more than domestic applicants. As a result, 25% of undergraduates attending Russell Group universities are now from overseas. At the LSE, 70% of students are now recruited from abroad.

Meanwhile, Clare Marchant, CEO of UCAS, the body that oversees university applications, has proudly stated that "disadvantaged pupils have been 'put first'", says Allison Pearson in The Telegraph. That's a "genius move" – "if the masterplan is to hasten this country's slide to the bottom of the international league table".

Quite, says Sherelle Jacobs in the same paper. In an ideal world, universities would have remained "intellectually elitist" while attracting poorer students with scholarships. Instead, they have degenerated into a "con trick" whereby student "consumers" are burdened with debt in exchange for degrees of "questionable quality".

Bright middle-class children are "no longer in a fair fight", much as our "prolier-than-thou authorities like to call this new bias 'fairness'", says Pearson. Damned by their well-off parents, they face rejection from universities who "see no hypocrisy in admitting thousands of wealthy youngsters from overseas".

No wonder increasing numbers of pupils are caught cheating or being diagnosed with conditions such as ADHD to get 25% extra time in exams, says Lee Elliot Major in The Times. In this "dog-eat-dog era", the temptation to "bend rules will reach new heights".

Europe's rivers dry up

That will have huge economic ramifications. Matthew Partridge reports

The Rhine is on the brink of being closed to traffic

In what could be a "major blow for the German economy", the river Rhine "is on the brink of being closed to shipping traffic", says Louis Ashworth in The Telegraph. Due to the recent heatwave, water levels on the river – "used by an estimated 6,900 vessels with a transport capacity of ten million tonnes – have plunged towards extreme lows". Experts warn that levels at some key choke points could soon fall below 40cm, which would force authorities to issue an alert that would mean that many vessels could no longer pass through.

Exacerbating the energy crisis

Some experts believe that "the immediate issues can be overcome", as "a lot of the traffic will just transfer to road or rail", says Jill Treanor in The Sunday Times. Others disagree. German chemicals maker BASF, for example, has already started to move its products by road, but has also warned that it cannot rule out cuts to production in the coming weeks. There's also a worry that the drought might complicate German plans to use coal to help deal with the energy crisis, both because it would stop the stuff being shipped on barges to power plants and because the water from the Rhine is also needed for cooling purposes.

Indeed, German power plants are already finding it difficult to transport coal across the Rhine, with the number of landings down by three-quarters. An additional problem is that there are far fewer ships available, say Georgi Kantchev and Yusuf Khan in The Wall Street Journal. Demand for suitable ships is rising thanks to coal's resurgence and the fact that many European ships are currently in the Black Sea region to haul Ukrainian grain. With German coal plants importing nearly two-thirds of their coal via the river, the situation could become critical. Current coal reserves are "only sufficient for about one week of full-load operation".

The Germans aren't the only ones with problems as an arid summer sets heat records across Europe, evaporating the continent's rivers, says Bloomberg. The Danube, for example, which runs 1,800 miles through central Europe to the Black Sea, is gummed up too, hampering trade in grains and other products. It's not just trade that is endangered either – France's power crisis has worsened because the Rhone and Garonne are too warm to cool nuclear reactors; Italy's Po is too low to water rice fields.

Germany looks especially vulnerable

Germany is particularly vulnerable as this latest blow comes on top of "soaring inflation, persistent supply-chain problems and weaker global demand", which are "weighing heavily on its industrial sector", say Guy Chazan and Joe Miller in the Financial Times. Germany also hasn't been able to benefit from the "tourism-fuelled boom" that has enabled France, Spain and Italy to post above-average growth. It shouldn't expect too much from its shoppers either as consumer confidence is "fragile" – retail sales fell by 8.8% in June compared with the same time last year. With a technical recession a strong possibility, the "eurozone's powerhouse has become its weak link".

India's massive transformation will continue

Modi: stoking divisions

On the 75th anniversary of his country's independence this week, India's prime minister Narendra Modi pledged to break the vicious cycle of poverty and to transform his country into a developed nation within the next 25 years, says The Times. Change is needed. Although India has seen "massive transformation" since independence, it still has a way to go if it is to reach parity with the rich world. It is forecast to grow by more than 7% this year, the fastest rate among major economies, but GDP per capita is just $2,277, putting India in 144th place out of 194 countries ranked by the World Bank.

The scale of the challenge is shown by the fact that India has been overtaken by China over the last 30 years – the latter's GDP is now five times bigger than India's, says Ruchir Sharma in the Financial Times. Still, India has managed to grow its GDP tenfold to $3.2trn since 1990 and, although the age of "miracle growth" may be over, a rate of 5% a year should be "do-able". Modi's reforms have created a "more efficient welfare state" and a "digitising economy", and India already had a "strong entrepreneurial culture". India may yet pass the UK, Germany and Japan to become the third-largest economy by 2032.

Modi deserves credit for speeding up India's rejection of post-independence socialist policies, says Salil Tripathi in Foreign Policy. More worrying is that he has also shifted away from its "liberal, secular ethos" towards chauvinism. If the political divide between the poorly educated, Hindi-speaking north of the country and the more educated, prosperous south continues to grow, there "will be trouble ahead".

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Betting on politics

The FBI's raid on Donald Trump's Mar-A-Largo mansion and the ensuing political fallout has only shifted the markets slightly against the former president making a successful return to the White House. With £1.36m matched on Betfair, and £997,000 on Smarkets, Trump (pictured) is at 4.7 (21.3%), only just behind Ron DeSantis at 4.5 (22.2%). The incumbent Joe Biden is way out at 7.4 (13.5%) on Smarkets and 7.6 (13.2%) on Betfair. When it comes to winning the Republican nomination, Trump remains the favourite at 2.36 (42.4%).

It's a bit too early for firm recommendations, but I sense that Trump's support is gradually starting to recede. The various revelations from the 6 January inquiry damaged him with the public, and many Republicans are now starting to distance themselves from him. With Trump's social-media network failing to gain traction, and even Fox News giving more coverage to DeSantis, Trump may find himself without the platform that enabled his rise to the top in 2016.

For now, I'd focus on the UK. With £11,378 matched, Smarkets has 2.38 (42%) on the next Conservative poll lead being in September. While Labour is ahead in most polls, Opinium and Redfield & Wilton put the lead as small as 3% and 5% respectively. Since new prime ministers nearly always tend to get at least a small boost, it's likely that at least one poll will put either Liz Truss or Rishi Sunak ahead when they enter Downing Street next month, so you should take the bet.

Cambridge

Darktrace wooed: Cisco, Palo Alto Networks and CrowdStrike are among the tech giants expected to join US private equity firm Thoma Bravo in a £3.5bn race to buy British cybersecurity company Darktrace, says Russell Hotten in The Times. The shares leapt by a quarter on Tuesday to 515p, following a "tumultuous" ride since going public in April last year, when it was listed at 250p a share.

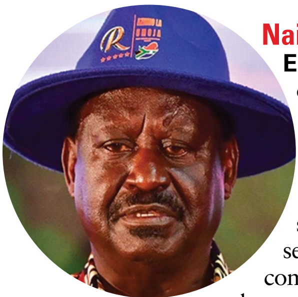
Darktrace uses artificial intelligence (AI) to detect vulnerabilities within computer systems to prevent cyberattacks as opposed to building "walls" around networks. It was founded in 2013 with backing from British tech entrepreneur Mike Lynch (pictured), who is currently fighting extradition to the US over fraud charges, which he denies. While no longer a director at Darktrace, he retains a 12% in the company. A takeover could remove the reputational issues that have weighed on the share price. Darktrace's recent £2.8bn market value was 38 times its expected earnings before interest, taxes, depreciation and

amortisation (Ebitda) in 2022, compared with 88 times for its US rival CrowdStrike, which is forecast to deliver similar Ebitda growth of around 18%, says Aimee Donnellan on Breakingviews. "Taking the business private could help close that gap." If Darktrace can deliver the average annual 30% revenue growth forecast over the next five years, it could be sold for over £11bn, equivalent to a "juicy" 32% internal rate of return. Thoma Bravo has until 12 September to make an offer or walk away.

Bentonville

Walmart signals optimism: Retail giant Walmart is tackling its inventory glut with flash sales on luxury products. After all, "America loves a bargain", says Lex in the Financial Times. The Arkansas-based chain reported revenue growth of 8.4% to $153bn in the second quarter from a year earlier, just weeks after spooking the market with a "massive" profit warning. It had warned adjusted operating profit would fall by up to 13% for the full year, but it has since revised that down by two percentage points. That's still not great, but there are grounds for "cautious optimism".

Shoppers under pressure from rising consumer prices tend to trade down to cheaper outlets. Walmart is therefore considered a bellwether for consumer demand in the US. "Many consumers are spending more, but buying less," says Sarah Nassauer in The Wall Street Journal. These shifting buying patterns, away from high-end items such as lawn mowers to renovation materials such as paint (as consumers try to make do and mend to save on replacement costs), are driving relatively strong sales despite inflationary pressures as consumers adapt. However, should inflation persist at current levels, Walmart is preparing to pare down its buying volume in order to avoid a repeat of the glut in goods from earlier this year.



Nairobi

Election dispute: Kenyan opposition leader Raila Odinga (pictured) has contested the results of the presidential election, saying the country now "faces a long legal crisis", says Reuters. Four of the seven members of the electoral commission had already disowned the announcement by their chairman Wafula Chebukati, who declared deputy president William Ruto the winner on Monday with 50.5% of the vote against rival Odinga's 48.8%. Odinga, 77, who, in an "extraordinary" turn of events, ended up being backed by his long-time rival, the outgoing president Uhuru Kenyatta after the latter fell out with Ruto, has stood for election five times and contested the result twice before, says the BBC's Evelyne Musambi. Ruto, 55, a former street-chicken hawker and now one of Kenya's richest businessmen, coined the phrase "hustler nation" to promote his "bottom-up approach" to the economy to help the poor, says Andres Schipani in the Financial Times. If he takes office, he will be steering an economy battered by the pandemic, rising food and fuel prices and the worst drought in four decades, along with soaring public debt. Moreover, 40% of 18 to 34-year-olds are unemployed with another 800,000 young people joining the workforce each year, notes Musambi. Delivering on his promise will not be easy.

The way we live now... "Robots to aisle four"

Many of us have just about got used to the automated checkout in supermarkets. But Japan is taking hi-tech shopping to the next level, says Lisa Fickenscher in the New York Post. Enter the TX Scara – a convenience-store robot from Japanese start-up Telexistence. Cylindrical in appearance, with cameras for eyes and a Roomba-like pedestal to roll about on, the machine is operated automatically using artificial intelligence (AI) to allow convenience-store owners to stack up to 1,000 items a day without human interference. "Say goodbye to the stock boy."

Japan is experiencing an ongoing labour shortage owing to an ageing population, which Telexistence hopes to address by using the robots to replace workers and help cut costs for small consumer-orientated businesses. While this all sounds encouraging, the robot's design is admittedly a bit intimidating. A somewhat faceless machine with a high-powered grabber arm lunging towards the drinks aisle – it might send shoppers bolting from the supermarkets.

The TX Scara: helpful, but intimidating

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UK

Recession coming: The consumer price index (CPI) rose to 10.1% year on year in July from 9.4% the previous month – the fastest rise in 40 years. Food prices were the main driver, climbing by an annual 12.7%, further adding to the cost of living. Inflation-adjusted wages are falling at the fastest rate in two decades. The Bank of England will be under pressure to raise rates by half a percentage point next month to 2.25%, says Ruth Gregory of Capital Economics. And while US inflation may have peaked (see page 5), expect UK inflation to continue rising to at least 12.5% in October, and for the Bank to raise rates to 3% towards the end of the year, when the economy will be in recession. That is unlikely to start this summer, says Fidelity's Tom Stevenson. But the 0.1% quarter-on-quarter contraction in GDP for the April-to-July period "is a harbinger of what's to come". The Bank expects the longest, if not the deepest recession, since 2008. But it will "feel worse because… the combination of negative growth and rising prices means a return of the stagflation that scarred the 1970s".

Food prices are rising by an annual 12.7%

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Singapore

Losses at Sea: New York-listed Singaporean tech group Sea posted net losses of $931m for the June quarter, double the previous quarter's total, thanks to rising costs and an uncertain global outlook, say Olivia Poh and Yoolim Lee in Bloomberg. Sea was once Southeast Asia's most valuable company, but the shares have fallen 80% since peaking in October. Sea cut its annual e-commerce revenue outlook in May by $400m to $8.5bn, amid an ongoing struggle to boost profitability.

Its top-line growth has plateaued to its slowest rate in five years after a pandemic-era boom, despite second-quarter sales increasing by 29% to $2.9bn, from a year earlier. The trend has largely been driven by a slowdown at Shopee, the firm's e-commerce unit, whose revenue fell $200m to $1.7bn over the same time period. Now Sea plans "rapidly" to prioritise profitability, cutting back on its growth projects. "The company's shift in priorities underscores the change in tide for tech companies that saw rapid growth during the Covid-19 pandemic," says Tsubasa Suruga on Nikkei Asia. As shareholders' scrutiny increases, Sea has had to refocus on its core business instead of funding rapid expansion fuelled by investors' excitement.

Dhahran

A gusher at Aramco: The world's biggest energy company, Saudi Aramco, posted a record $48.4bn profit for the second quarter, a year-on-year increase of 90%, says BBC News. Like its peers, Aramco has benefited from the West's pledge to end its dependence on Russian oil, following Russia's invasion of Ukraine. Unlike others, however, shareholders "didn't get any bonus", says Rochelle Toplensky in The Wall Street Journal. The cash went on dividends (which weren't increased), paying off debt and capital expenditure, including diversification into natural gas, wind, solar and blue hydrogen. CEO Amin Nasser (pictured) has talked bullishly about growing demand for oil, but his actions don't match his rhetoric. Investment remained at the lower end of its range and there are no signs that Aramco is planning to accelerate plans to expand its maximum sustainable oil capacity. Last year the firm sold a stake in its gas network, and this February the Saudi government transferred a 4% stake to its sovereign investment fund, which is "tasked with diversifying Saudi Arabia's economy". Rumours persist that it might sell more of its 94% stake.

Melbourne

BHP digs up profits: BHP, the world's biggest miner, almost tripled its annual profit to $30.9bn for the fiscal year to the end of June, up from $11.3bn in the same period last year. That includes a $7.1bn one-off gain from the merger of its petroleum business with Woodside Energy. Net debt fell by almost $4bn to $333m. It's been a transformational year for BHP, says Neil Hume in the Financial Times. The company also unified its share structure in Australia and is embarking on a huge potash project in Canada. BHP declared a final dividend of $8.9bn, taking the total payout for the year to $16.5bn, the highest disbursement in its 137-year history. Boss Mike Henry seized on the recent fall in commodity prices to make a $5.8bn cash offer for Australian rival OZ Minerals that was last week rejected. Investors hoping BHP's results would give it the "extra firepower" to scoop up OZ's copper and nickel assets – the "future-facing commodities" Henry sees as key to BHP's future – may be disappointed, says Antony Currie on Breakingviews. The price of iron ore, BHP's biggest business, is falling, while BHP's impressive performance was largely due to better cost discipline and company restructuring. Henry insists OZ would be a "nice to have, not a must-have". Increasing his offer too much risks undermining that assertion.

Fixing Britain's leaky pipes

A drought has been officially declared across much of the country, despite the fact that climate change is bringing more rain than ever. What's going wrong? Simon Wilson reports

What's happened?

Following five months of below-average rainfall and the hottest summer for almost 50 years, a drought was officially declared across most of southern and eastern England last week, with Yorkshire now added to the list, too – and the West Midlands set to follow. From next Wednesday a hosepipe ban will be imposed on 15 million customers in London and parts of southern England, as Thames Water became the sixth company to announce restrictions in response to the drought. It takes the number of people subject to "temporary use" bans to 23 million. Meanwhile, the Environment Agency warned that the UK could face severe water shortages in the next 25 years without action to curb leakages, reduce water use and increase storage capacity.

England has not built a large new reservoir since 1981

©Getty Images

What about pollution?

As the dry spell broke with heavy rain in some places this week, swimmers were urged to avoid dozens of popular beaches, mainly along the south coast, after sewage overwhelmed the sewage systems and effluent was released straight into the sea. Last month an Environment Agency report attacked the "shocking" performance of water companies in preventing such discharges, with the head of the agency calling for jail terms for the worst offenders. "Company directors let this occur and it is simply unacceptable," says Emma Howard Boyd, chair of the agency. "Over the years the public have seen water company executives and investors rewarded handsomely while the environment pays the price. The water companies are behaving like this for a simple reason: because they can."

Isn't Britain getting drier?

No. Climate change means Britain is getting warmer, but one irony of the current water shortage is that it is also getting much wetter. The Royal Meteorological Society's recent State of the Climate Report revealed that summer rainfall over the years 2012-2021 was up 15% on the period 1961-1990 and winter rainfall up 26%. "There is plenty of water to capture if we had the means to do so," says Ross Clark in The Spectator. The trouble is that we haven't built a large reservoir in England since 1981, and none at all in the UK since 1991. Meanwhile, plans for a "national water grid" – capable of piping water from the wetter north and west of Britain to the drier south and east – have similarly come to nothing. And the dry weather has made chronic leakages worse by shrinking the ground and further damaging pipes.

Is privatisation to blame?

Hosepipe bans have concentrated minds on the privatised monopolies' decades-long failure to fix the leakage crisis. The Thatcher government sold off the water companies with no borrowings (and a £1.5bn "dowry") in the belief that private-sector efficiency and access to capital would improve service. "Instead they have mostly been bought by asset-hugging infrastructure funds that have geared them up and milked them for dividends," says Oliver Shah in The Times. Since privatisation, the companies' borrowings have risen to £56bn (far outstripping equity) and they've paid out £72bn in dividends while bills rose 40% and a fifth of water is lost to leaks.

Is nationalisation the answer?

No, says Robert Colville on CapX. Privatisation has hardly been a "panacea", but the water companies (like the energy companies or the privatised railways) have nevertheless invested more than the nationalised utilities that preceded them, and – it must be presumed – far more than if they were still competing for state funding alongside the NHS, schools, defence and the rest. Moreover, according to water-industry estimates (using figures from Ofwat), customers are five times less likely to suffer supply interruption and 100 times less likely to encounter low pressure than 30 years ago. And bills have not risen in real terms for the last two decades. What many commentators (and politicians of all parties) haven't grasped about the water industry is that it isn't really an industry, and isn't fully privatised, says Colville. Water companies are essentially contractors who "run the water network on behalf of the state, in a fashion agreed with the state, to targets laid down by the state". The state allows certain levels of leakage on cost-effectiveness grounds – and according to Ofwat's latest report, all 17 of the water companies covering England and Wales are at or close to their statutory targets. The water companies are then, says Colville, only doing what they've agreed with the government to do.

"More than £20bn of investment in new infrastructure is needed"

It's the regulators' fault then?

The UK's "toothless" regulators have been far too focused on short-term outcomes for consumers, and too afraid of scaring off investors, says Ben Marlow in The Telegraph. Ofwat has "talked a good game but largely failed to enforce genuine change". The Environment Agency has been timid in addressing pollution, and the Competition and Markets Authority, "cowed by an appeal from a group of rebel suppliers, ruled that a plan to curb industry profits had gone too far".

So what is to be done?

Alongside more stringent regulation, we need compulsory metering of water for households, to help curb demand, says John Armitt, chairman of the National Infrastructure Commission, in The Times. We need to continue to cut leakage. And we need to relieve pressure on waterways and groundwater in England by investing seriously in new reservoirs and transfer infrastructure. The National Infrastructure Commission calculates that more than £20bn of investment in new infrastructure alongside leak reduction is needed over the next 30 years. The alternative – doing nothing and hoping for the best – would probably cost twice as much, £40bn, spent on emergency maintenance and water supplies.

Disney reclaims its crown

The media giant was late to the streaming party. But sometimes the latecomers have the advantage

Matthew Lynn
City columnist

When Disney announced its plans for a streaming service to take on Netflix it was greeted with scepticism. In 2018 Netflix had already overtaken Disney as the largest media conglomerate in the US and there seemed little chance it could recoup all the ground it had lost. It had joined the party too late. That's not how it turned out. Last week, Disney Plus overtook its great rival. Helped by hits such as *Obi-wan Kenobi*, the latest in the Star Wars production line, the company has now racked up 221 million subscribers, edging ahead of Netflix with 220 million. With a market value of $225bn compared with $107bn for Netflix, Disney has reclaimed its crown.

With subscriptions growing, even as they fall for Netflix, and with plans for a cheaper advertising-supported package, it seems unlikely Netflix can regain the lead. Now hedge-fund manager Daniel Loeb has taken a big stake in Disney and is pushing for changes to make it even more valuable. The battle has been won by the established giant that came late into the market.

Second-mover advantage

Is that a surprise? Not really. In fact, there is a long history of "second movers" – that is, the second or third company into a market – overtaking the pioneer. In the 1920s, General Motors overtook Ford in the market for mass-produced, cheap cars. In the 1980s, Nintendo overtook Atari in the market for games consoles, and it was overtaken in turn by Sony and Microsoft. Apple's iPhone was just the latest in a crowded field of smartphones when it was launched in 2007, but went on to dominate the market. The list goes on. Lots of companies have come late into the market and done really well. And as much as venture capitalists go on about first-mover advantage, it does not always translate into a durable competitive edge.

The Force proved too strong for Netflix

©Disney +

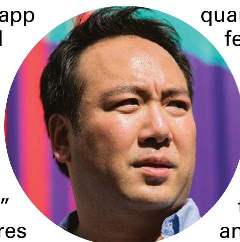
In fact, second movers have a few things on their side. They can learn from the pioneer's mistakes. For example, Disney was a lot more cautious about free trials than Netflix ever was and it has clamped down a lot harder on password sharing. If you want to watch one of the hit shows you will almost certainly have to pay for it. Second movers can refine and improve the product. Whereas Netflix had to create brands out of nothing – and did so brilliantly with global hits such as *Stranger Things* – Disney could roll out brands that people already knew, capitalising on the heritage of franchises such as *Star Wars* and Marvel. Finally, second movers can piggyback onto an existing market. When Netflix was launched, none of us had any clue why we would want to pay for television streamed over the internet. By the time Disney Plus was launched, we were all perfectly used to the idea. We just needed to be persuaded it had some stuff we wanted to watch. Add it all up, and perhaps it is not so surprising that it managed to overtake Netflix after all.

Who will move next?

The interesting question is, what other second movers might be about to make their move? Consider the cab market. Uber more or less created the concept of a smartphone-based taxi service and rolled it out around the world. But Estonia-based Bolt is making huge strides against it. Uber's value is already falling rapidly, with its share price off by more than 20% over the last 12 months. Privately held Bolt is already worth $11bn compared with $65bn for Uber, and it would not be a huge surprise to anyone if it overtook it some time in the next five years. Or look at electric vehicles. Tesla was the pioneer, but rivals are catching up. China's BYD has already outpaced it in terms of the numbers of vehicles sold, and is already pushing into markets such as Japan as a prelude to launching globally. Volvo's Polestar might do just as well, or one of the dozens of new EV companies. And of course it's a long shot, but Shopify could overtake Amazon. There is a huge gap between the two companies right now, but Shopify's online marketplaces may well prove more attractive for millions of small companies than Amazon's. Bigger companies have fallen.

City talk

● Takeaway delivery app Deliveroo "has turned into a right floperoo", says Alistair Osborne in The Times. The firm floated at 390p in March 2021, valuing it at a "Sainsbury's-topping" £7.59bn. Now the shares are worth 98p. Founder Will Shu (pictured) has "kept on pedalling as eagerly as ever" to grow the business and has had some success in expanding into supermarket deliveries and non-food products from WHSmith and Boots. Orders rose by 10% last half and revenue by 12%. Still, growth in gross transaction value slowed from 12% to 2% between the first and second quarters as consumers feel the pinch.



Marketing costs and overheads rose by 29% year-on-year to £369m, and earnings before interest, tax, depreciation and amortisation (Ebitda) losses widened by 163% to £67.9m. "When it comes to creating a profitable success story, Shu still has a fair bit to deliver."

● "After a series of sub-octane chief executives, insurer Aviva is looking much more fit for purpose under Amanda Blanc," says Alex Brummer in the Daily Mail. The insurer has seen increased operating profits, strong cash flows, and is rewarding investors with "a chunky dividend rise and a further share buyback". Blanc is now preparing for harder times, with lower-cover, lower-premium insurance policies, but is also eyeing expansion into the wealth market in competition with Schroders and Aberdeen. Aviva reckons that it can aim for six million customers with the right products and platforms. "Investors who marked the shares up more than 12% are starting to like the game plan."

● Exercise-bike maker Peloton wants to "reassert its position as a luxury brand", but CEO Barry McCarthy's blueprint is "spinning in confusing directions", says Andrea Felsted on Bloomberg. Peloton is hiking prices in the US – its flagship bike will go up by $500 to $2,495 and its treadmill by $800 to $3,495 – just as customers feel the squeeze from inflation and higher borrowing costs. But it's shedding roughly 800 delivery and customer-service staff to reduce costs, even though some customers are already complaining that service isn't up to scratch. And a plan to close many of its North American showrooms risks sending an "out of fashion" signal. "Achieving the delicate balance between stemming the cash burn and maintaining Peloton's luxury positioning looks like an uphill climb."

©Getty Images

The peril of playing it safe

Holding too much cash is painful in a high-inflation world, even if you expect the market to tread water

Cris Sholto Heaton
Investment columnist

Cash is hard to get right. If the market crashes, you wish you had more of it. If it goes up, you regret holding so much. Last month's rally was a fine example of this dilemma. US stocks rose by 9% – one of the all-time best months – yet just 28% of large-cap fund managers beat their benchmarks, according to Bank of America. Growth, value and core (ie, neither growth nor value) managers all underperformed, seemingly because they had too much squirrelled away in cash and deployed too little as the market rose.

The fundamental problem is that holding cash has been a losing game in the past few decades. Global stocks have risen strongly over time – even if individual markets such as UK large caps have sometimes trod water – so keeping money out of the market has been a drag on returns. Yes, a few bear markets presented great buying opportunities for those who had cash to deploy – but to take advantage of them, you needed to get two calls right. You must sell close(ish) to the top and buy close(ish) to the bottom. Few of us can consistently do so. I was fortunate enough to lighten up on stocks at the start of 2020 and start adding back in the summer, but that may have been more luck than judgement. I certainly didn't repeat the trick so well in the latest crash.

Staying invested

Thus the advice is to remain invested at all times. Private investors will want to hold some cash to cover expected or unexpected expenses and to have dry powder for opportunistic investments – but we've talking maybe 5%-10% of a portfolio at most (depending on portfolio size). But these rules of thumb have evolved in a 40-year uptrend.

Most investors got left behind in July's rally

In a side-to-side ranging market such as the 1970s where stocks get steadily cheaper, the potential gain from holding a lot more cash for longer and eventually picking up bargains is much higher. So in a true 1970s scenario, our assumptions about how long to hold cash might change.

However, for most of the 1970s, interest rates were high enough that cash could match inflation. Today, they are still near record lows. Inflation of 10% in the UK means cash loses 8%-9% per year in real terms. If stocks do a bit better than that – and as real assets, you would expect them to do so – they still look less awful. This suggests that rates need to go much higher than central banks are currently implying to wallop stocks 1970s-style by creating a mass flight into cash. That could happen, but I wouldn't bank on it yet. The most attractive compromise looks like stocks with steady dividends (not very high-yield ones with insecure payouts or zero-growth), which should at least keep throwing off cash that can be reinvested at lower valuations if the market ranges up and down for years. It won't protect you from short-term sell-offs – but it's easier than trying to time the market.

I wish I knew what a real interest rate was, but I'm too embarrassed to ask

A "real" interest rate is simply an interest rate that has been adjusted to take inflation into account. (A "nominal" interest rate is one that has not been adjusted for inflation.) Real rates matters because inflation reduces the value of any future stream of income.

Take a bank account into which you plan to place £1,000. If inflation is running at 1% then a 2% nominal interest rate looks respectable – your savings will have more purchasing power a year from now. However, if inflation is running at 3%, your savings will have less purchasing power when you withdraw them in a year's time, even though the £1,000 will have grown (in nominal terms) to £1,020. Of course, the advertised rate on savings account will be the nominal one, not the real one.

The formal definition of the real interest rate is given by the Fisher equation (named after economist Irving Fisher) and is calculated as $(1 + i) = (1 + r) \times (1 + \pi)$ where i is the nominal rate, r is the real rate and π is the inflation rate. However, for most purposes it's much easier to estimate the real rate by subtracting the inflation rate (either the current rate or the expected rate, depending on whether you are calculating what you have earned in real terms or what you expect to earn) from the nominal interest rate. So in the first example above, the real interest rate is 1% (you are earning a real return of 1% a year). In the second example it's minus 1% (you are losing money in real terms).

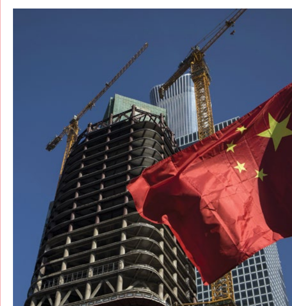
One way to get an idea of expectations for inflation is to compare yields on index-linked government bonds (whose payments increase in line with inflation) to normal government bonds. The difference between the yield on UK gilts and index-linked gilts of similar maturities (or between US Treasuries and Treasury inflation-protected securities (Tips)) gives the "break-even" rate – the level of inflation that means an ordinary bond will return the same as an index-linked one.

Guru watch

Hao Hong, former chief strategist, Bocom

Don't get excited about prospects for a rebound in Chinese stocks, says Hao Hong, the former chief strategist at investment bank Bocom, who left the firm in May after his Chinese social-media accounts were frozen following a string of bearish posts. Stockmarkets in mainland China and Hong Kong "will have much difficulty breaking out of their trading ranges", he told Bloomberg last week.

China's economy is unlikely to grow at even 2% per year over the next ten years, reckons Hong, as it



will be held back by a severe real-estate slump. Most economists forecast growth of 5% in 2023 and 2024, but that looks unlikely. "Nobody can see what the new growth engine is or where to invest in. Industries such as new energy or semiconductors could help lift growth, yet their contributions are just not enough to compensate for losses from the plunging property sector." And from the perspective of investors, these themes should be avoided. Greater economic and political control by Beijing, a larger role for state-owned enterprises and a weaker private sector will all mean a smaller role for stockmarkets. "Beijing isn't necessarily willing to share gains with private investors."

To make matters worse, many Chinese firms that trade on US exchanges are likely to be forced to delist as a result of a long-running dispute over audit rules. Thus a flood of companies shifting their listings to Hong Kong, Shanghai or Shenzhen will also weigh on those markets, says Hong. "The pool is simply not big enough to absorb them all."

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Lockdowns caused our debt crisis

Daniel Hannan
The Daily Telegraph

Our national debt stands at £2trn – 100% of GDP and up from under 30% in 2000 – and is increasing at an accelerating rate, says Daniel Hannan. Much as some would like to blame this on Brexit, the Tories, the war in Ukraine, or global inflation, the real reason is that we "unexpectedly dropped half a trillion pounds during the pandemic". Just as there is a "postponed reckoning" if, as an individual, you take two years off work and maintain your income by borrowing, the same happens with the nation's finances. The "most dangerous group" concealing the "vastness of our fiscal crisis" is the Tories themselves. With a PM who boasted about the generosity of furlough and the "massive fiscal firepower" of the Treasury, money was slathered about far beyond what was needed: Eat Out to Help Out, £3bn for extra adult-skills training, £6.9bn for urban transport outside London, and so on. No wonder people assume there must be plenty "to spare". The Tories need to convince voters that tough solutions are needed to fix the problem, even as other parties "offer windfall taxes, price controls, nationalisations and other juju solutions". Unless they succeed, they face "an ERM-style meltdown and a generation in opposition".

Will the rupee go global?

Ritesh Kumar Singh
Nikkei Asia

With India remaining an "anchor of stability amid the currency crisis" in South Asia and a "key" opinion-former on Russia, the Reserve Bank of India's decision to relax controls on the use of the rupee for international trade transactions is understandable, says Ritesh Kumar Singh. Greater use of the rupee would lower transaction costs and reduce exchange-rate risks. Currently less than 1% of India's trade is conducted on rupee terms versus around 86% in dollars; a dollar "overexposure" that is hitting India hard as the US tightens monetary policy. The country is paying more for imports, even as the rupee weakens as capital flows out to the West. New Delhi estimates that up to 16.4% of the country's trade will switch from dollars to rupees, but many foreign firms will be reluctant to accept the risk. Moreover, until the government stops intervening and allows the market fully to determine the rupee's value and "guide capital flows", it cannot be a "truly global currency". For now neighbours, including Sri Lanka and Nepal as well as Russia and Iran, benefit from trading in rupees. But if India is serious about making its currency attractive to those who "really have a choice", it will have to "increase trust". Greater use is merely a first step.

Britain's pensions time bomb

John Ralfe
The Times

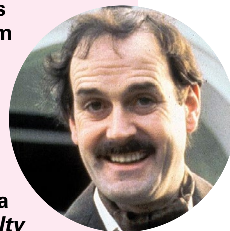
When it comes to our ballooning public-sector debt, the Office for Budget Responsibility (OBR), the Institute for Fiscal Studies (IFS) and the Treasury are ignoring "the elephant in the room", says John Ralfe: "public-sector pension liabilities for six million past and present public-sector staff". These liabilities, which are included as "forecast cash-flow payments" rather than debt – a "category error" since the government has in effect borrowed from public-sector workers – now stand at around £2.6trn, or 106% of GDP. These payments, unlike others such as state pensions, can't be reduced if they prove unaffordable. "Taxpayers are on the hook, come what may." Optimists point out that public-sector debt was very high after both world wars, but public-sector pension liabilities were "tiny" then and inflation helped erode the debt. Today, public-sector pensions have inflation increases "baked-in" with no annual cap. This issue goes to "the heart of UK fiscal policy". As it stands, all taxation, borrowing and spending decisions "are based on wildly over-optimistic information", yet the OBR and IFS remain silent. Rishi Sunak has called for "realism and truth" in public finances. He could start with this massive "off-balance-sheet debt".

China's costly chip failures

Tim Culpan
Bloomberg

As the US "embarks on a multi-billion-dollar, decade-long semiconductor development campaign", Beijing is reckoning with the relative failure of its own $100bn, 20-year effort, says Tim Culpan. Tsinghua Unigroup and the National Integrated Circuit Industry Investment Fund (known as the Big Fund) are under particular scrutiny. Beijing is smarting not so much at the loss of cash as the lack of progress. Semiconductor foundry SMIC, one of the Big Fund's holdings, has just managed to produce a rather standard chip, of the kind mass-produced by Samsung and TSMC for four years, with little evidence it can do so profitably or at scale. Tsinghua Unigroup's "big win" was backing Yangtze Memory Technologies – but if China wants "semiconductors that can conduct artificial intelligence or guide missiles", it will need to do better than memory chips. It goes to show that money can only do so much. China and the US need to learn the importance not only of developing technology, but also building trust among industry peers – as world-beaters TSMC and Samsung have done – so that they will freely collaborate. "If China's goal is to build up its prowess and cut itself off from the world, then it will fail at the first and surely succeed at the second."

Money talks



"Britain is suffering from a crisis of everything at the moment, it seems, but the situation evokes memories of a scene in *Fawlty Towers* where Basil is told 'just remember Mr Fawlty there's always someone worse off than you', to which he replies: 'Really? I'd love to meet them. I could do with a bloody laugh'."
Columnist Ben Marlow in The Telegraph

"However much money I earn doing it, I won't earn any self-respect. I spent a lifetime trying to get my self-respect back. Since getting clean, I've done gigs where someone's come over and told me I've changed their life. That's more lucrative than money."
DJ Fat Tony on turning down a well-paid gig in Saudi Arabia, quoted in The Sunday Times

"We are not going to target the people who put on Facebook how they can travel around our country on $10 a day eating two-minute noodles."
New Zealand's tourism minister Stuart Nash on plans to encourage wealthier visitors, quoted in The Guardian

"Yes, but with the character-building I've been through I know that money isn't everything. I'm very creative and understand how to bring people together. When trying to make money for myself it never goes to plan, but when I try to help people it usually generates money."
Rugby player Christian Wade on whether or not money makes him happy, quoted in The Telegraph

"Writing and making *I'm Too Sexy*. It cost us about £1,200 to record and release it. At the time, we didn't think it would be a hit… But we had nothing to lose and we thought it was funny. If you include royalties, I would say we have made more than £10m from that song."
Richard Fairbrass of Right Said Fred on their 1991 hit, in The Mail on Sunday

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Brace for global regime change

Climate change is stagflationary

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project-syndicate.org

The period from the mid-1980s to the present was characterised by low inflation in advanced economies and relatively stable and robust growth, says Nouriel Roubini. This "Great Moderation" is now over and we are undergoing a "radical regime shift". The old regime first started to "crack" in the 2008 global financial crisis and the 2020 Covid-19 recession. In both cases, inflation stayed low given demand shocks, and loose monetary, fiscal and credit policies prevented deflation. But now we are starting to see the return of sharply rising inflation, for several reasons.

The Great Stagflation

On the supply side, the backlash against globalisation led to policies to support workers and the left behind, limit immigration, and reshore industries and protect them from competition. At the same time, the return of geopolitical turmoil is disrupting supply chains. Worse may be yet to come – should Iran come close to getting a nuclear bomb, for example, the probable military response would trigger a "massive" oil shock. The West's ongoing decoupling from China will also be stagflationary.

Meanwhile, the US dollar has been "fully weaponised for strategic and national-security purposes", threatening its position as the global reserve currency. That is "throwing sand in the well-oiled machine" of the global financial system, increasing transaction costs.

Climate change, too, is stagflationary – droughts, heatwaves and other disasters are increasingly disrupting economic activity and threatening harvests. Demands for decarbonisation have led to underinvestment in fossil fuels before investment in renewables has reached the point where they can make up the difference – "today's energy-price spikes were thus inevitable".

On the demand side, loose and unconventional monetary, fiscal and credit policies have become the new normal, and surging private and public debt, along with the "huge unfunded liabilities of pay-as-you-go social-security and health systems", mean that both the private and public sectors face growing financial risks. This places central banks in a "debt trap": any attempt to return monetary policy to the old normal will cause debt-servicing burdens to spike, leading to insolvencies, cascading financial crises and fallout in the real economy.

Just as in the 1970s, we are thus heading for a "Great Stagflation". Both components of traditional asset portfolios – long-term bonds and US and global equities – will therefore suffer, "potentially incurring massive losses".

It's time for Tory socialism

spectator.co.uk

The Tory leadership contested has "descended into a low-tax auction", says Tim Stanley. That is "not a good thing". It implies that Tories think the state should shrink "just at the very moment when private enterprise is letting us down" (soaring energy bills) and "the state seems to be on its knees". They should instead "rediscover an older Tory tradition of state-building" – call it "Tory socialism". Liberals start by asking how we can grow the economy to make us rich and give us freedom. Tory socialists begin by asking what kind of society we want, and then choose the economic strategy to produce that aim. That may well mean free markets and tax cuts. But it might also mean protectionism if we want home-grown food, for example. And just as it took state power to deliver a laissez-faire electricity market by providing a national grid in the 1920s, for example, so we might look to the state to build new towns that are as beautiful as Bath, rewild land, create safe streets and provide cradle-to-grave care, and produce citizens who are kind and virtuous. We need an approach to politics that "puts the spiritual before the economic" and situates individuals within communities shaped by tradition and custom. "Use the state and market to such ends and Conservatives will be unbeatable."

Make a mint from royalties

thehustle.co

Joseph Lawrence, a doctor and drug developer who fought in the American Civil War, created a formula for cleaning and disinfecting wounds in the late 1860s, says Michael Waters. It didn't catch on, so when a local pharmacist asked to buy the formula, Lawrence licensed it out. The original contract stated that, for every gross (144 bottles) of Listerine sold, the pharmacist would pay Lawrence's "heirs, executors or assigns" $20. That contract lives on, and it makes a mint for those who own a stake.

Listerine is now owned by Johnson & Johnson, which is still obliged – despite legal attempts to shrug it off – to pay royalties to those who own a share of the Listerine royalty trust. The Baird Foundation, for example, a non-profit, has a 0.5% share, which earns it about $120,000 a year. Most sales of stakes in the trust have taken place as private auctions between organisations and "wealthy individuals in the know", but today they are increasingly coming out in the open. In 2020, the Royalty Exchange site opened stakes to public bidding. This past May, in another auction, an anonymous bidder won the rights to a share for $1.795m.

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The internet is disappearing

whynow.co.uk

Go looking for older articles on the internet – perhaps those linked to in Wikipedia, for example – and often you'll find they have disappeared, says Simon Brew. Websites, like other publications, come and go. But sizeable redesigns and restructures also lead to the loss of material. Despite some valiant attempts at rescue, there is often no archive or trace left behind.

Much of what disappears is thin content, of little value, perhaps. But as archivists and historians will tell you, "it's what's in the margins or tucked away in small pieces that otherwise seem irrelevant that lead to gold". On the internet, however, it's the algorithms that decide what's worth keeping and what isn't – or, to get to the heart of the matter, what can and can't be monetised.

By the time you notice that the work you care about has disappeared, the "mighty corporate that hit the delete button will have moved on to its next pressing profit-maximising decision… Even as the world wide web grows, it's narrowing. And its own active history is being removed, with not an eyebrow being batted".

The dawn of the smart factory

Exciting new technologies and trends are coming together to change the face of manufacturing. Matthew Partridge looks at the companies that will drive the fourth industrial revolution

We've all heard in school about the first industrial revolution and how the steam age transformed the world. The mass adoption of electricity that began in the late 19th century ushered in the beginnings of mass production, while after World War II, automation, robotics and computers further transformed the way things were made. Now, another wave of big change is sweeping industry. Whether you call it the "fourth industrial revolution", "industry 4.0" or "smart manufacturing", this evolution is set to power a new era of growth.

The best way to sum up the fourth industrial revolution is as "the coming of age of technologies developed during the last two decades", says Mark Yeeles, who heads the industrial automation business at Schneider Electric. While many of these technologies may have been around in some form for several years, their development has now reached the point where they are so cost-efficient that they are starting to move from the research laboratory to the factory floor. In short, it is the "coming together of people, culture and technology to solve sophisticated challenges".

Industry is being changed by a "wave of new technologies" that are "showing great promise in industrial applications", adds Peter Lingen from the robotics team at investment manager Pictet. However, what makes them truly revolutionary is the fact that they don't just have great potential on their own, but they can also be used together "to improve the way that we produce things". Digitalisation, automation and other trends are finally making the idea of a "smart factory" – long a dream of many engineers and industrial scientists – a reality, he says.

That's why companies are not simply talking about smart manufacturing, but are also starting to spend increasingly large sums on the technologies behind it, says Joel Tortolero, chief executive of Wikifactory, an online platform for linking designers, engineers and manufacturers. Broadly defined, the market is already worth hundreds of billions, with one estimate putting current spending at roughly $280bn per year worldwide, he says. This is set to increase in the next few years – demand "is growing by around 20%-25% each year" and projections suggest it could reach $455bn by 2025 and $600bn by the end of the decade.

"The market could be worth $600bn per year by the end of the decade"

Digitalisation

The first pillar of the smart-manufacturing revolution is the use of digital technology. One part of this is the increase in use of online platforms, such as Wikifactory, to design and manufacture goods. At the most basic level these platforms "allow companies to keep track of their designs as they evolve, rather than have changes buried in an avalanche of emails and separate documents", says Tortolero. This in turn makes it easier for companies to collaborate with suppliers and customers to make changes quickly based on feedback, "cutting down on wastage and carbon emissions". Over the past two years, Wikifactory has grown from 79,000 to 136,000 users, with 9,000 physical products currently being developed.

Manufacturing platforms are important, but they aren't the only aspect of digitalisation that is changing the way that we make things. Another key aspect is the collection of much larger amounts of data on every aspect of production. When it comes to smart manufacturing, "the data is just as important as the machines that do the actual production", says Michael Colarossi, who oversees products and innovation in retail branding and information solutions for Avery Dennison, a labelling and packaging specialist.

Advances in data collection – especially around sensor technology and intelligent labels (labels that come with tracking devices or other technology embedded within them) – mean that "hundreds, if not thousands of variables" can now be collected at relatively low cost. This data collection doesn't have to stop once the product leaves the factory. For example, intelligent labels could be used by a fashion company to tell them when demand for a particular garment is rising, leading them to increase production. He thinks that such labels will become an important part of supply-chain management for all types of manufacturers.

Artificial intelligence

Collecting the data is only half the challenge. The next is to use it to produce tangible gains in performance and efficiency. The good news is that this has never been easier, as artificial intelligence (AI) "is improving, in both the speed and the quality of the tasks it can perform", says Colarossi. For example, AI is helping firms "get much better at using historical data to predict the future success of products".

"Artificial intelligence can definitely help firms understand the market, including forecasting demand," agrees Phani Bhushan Sistu, who leads the "internet of things" solutions at IT group Hitachi Vantara. It can also be used to help firms get the most from their equipment, including seeing how their machines can best be optimised over their life cycle and when they are most likely to break down, helping firms avoid delays and production bottlenecks. This is especially true in an age when robots and other devices in factories are expected to communicate with each other.

AI is also been increasingly used in quality assurance, notes Sistu. Until recently, product checks were traditionally carried out by humans at the last stage of the production process, just before goods were ready to ship. However, many factories now use AI-based imaging systems. Not only can they find defects in products more efficiently and quickly than their human counterparts, but they can do so at a much earlier stage. This allows the problem to be tackled at the point where it emerges, rather than having to disassemble the whole production line.

Using AI to analyse data is certainly a big advance, but even this may not prove to be the limit of how it can be used to improve manufacturing as the ability of machines to act autonomously develops. Some machines in factories are so sophisticated that they can not only flag up problems using critical data, but also

©Getty Images

Emerging technologies will mean even greater automation

"make quick decisions about how to deal with them", for instance by adjusting the way in which they operate, without the need for further human intervention, says Yeeles. Computers are even playing an increasing role in research and development – traditionally seen as the one job that was too intelligent for them. While human beings will still come up with the initial ideas and make the final decisions, computing advances mean that much of the trial and error that occurs in the middle of the process is increasingly being automated. Computers are proving particularly good at tweaking designs and then simulating them to make sure they are optimised. This both improves performance and speeds up the design process.

Additive manufacturing

The past few years have also seen major advances in additive manufacturing – the name for processes that make products by adding layers of material, such as 3D-printing. Because you don't have to build a new mould every time you change a design, additive manufacturing "gives you a lot more freedom and flexibility in how you design a component", says Nigel Robinson of the Digital Manufacturing Centre in Silverstone, a venture set up by engineering consultancy KW Special Projects. Indeed, "certain advanced design techniques, such as honeycombing and lattice structures, are only possible using additive manufacturing".

Still, additive manufacturing isn't without its flaws. For one thing, there are limits on the type of materials that can be manufactured in this way. Traditional techniques have also been much more cost-efficient when it came to producing large numbers of components. As a result, firms would typically just use 3D-printing for producing prototypes. But this is changing, as recent advances mean that the "range of material choices have vastly improved", while the costs have come down, which is why it is increasingly being used to make the final product in industries such as aerospace, as well as in parts of the medical and oil and gas industries.

A case in point is the car industry. Initially, additive manufacturing was only economic for Formula One teams that "were willing to pay any price for the relatively small gains in performance that come from small quantities of customised components", says Robinson. As the cost of the process has come down, it is moving down the value chain, and is increasingly used by firms making ultra-expensive hypercars, who typically produce runs of around 100-300 cars, as well as some makers of sports cars. He thinks that within a decade components produced by additive manufacturing will routinely appear in family cars.

Distributed manufacturing

The past few years have also seen the rise of distributed manufacturing. Until recently, manufacturers offshored their production to emerging markets, taking advantage of low wages, before shipping them to consumers around the world. However, this model has proved vulnerable to various "systematic

Continued on page 20

"Advances such as 3D-printing give more freedom and flexibility in designing a component"

Continued from page 19

shocks", says Bart Van der Schueren, chief technology officer at 3D-printing specialist Materialise. These include China's harsh zero-Covid policy, which has shut down factories and led to global shortages of key components, the temporary blockage of the Suez Canal by a container ship and Russia's invasion of Ukraine. Growing recognition of the carbon emissions from transport is also disrupting global manufacturing.

What's more, decades of rising wages in emerging markets mean those markets no longer have a large cost advantage over the developed world, especially in industries that are more capital intensive, adds Lingen. Thus "entire supply chains are likely to become increasingly regional in the coming years" as companies move production closer to consumers. We should also see more investment in advanced automation.

Of course, the idea of moving from one centralised large factory to several smaller factories that are geographically separated comes with its own risks. Above all, companies "want to ensure that all their components have the same quality, irrespective of where they are produced", says Van der Schueren. But he's confident that companies can harness additive manufacturing to help them meet the challenge of making smaller individual batches of high-quality components. Indeed, distributed manufacturing could end up being a positive strategy in its own right rather than just a response to problems with global supply chains, if companies combine big data and artificial intelligence with the flexibility of additive manufacturing to "produce localised products that are tailored to the needs of customers in a specific area".

Bringing it all together

Hypercar manufacturer Czinger epitomises the fourth industrial revolution. It uses what it describes as its own three-part digitalised "divergent adaptive production systems" (DAPS) to build and manufacture its vehicles. Czinger's designers come up with a list of criteria, such as performance, ease of manufacturing and cost

Czinger aims to change how cars are made

control, that each of the car's components need to meet. They then run it through an AI-driven system that uses machine learning automatically to generate, and then simulate, various component designs "until it has generated a design that perfectly matches the input constraints", says Kevin Czinger, the founder and chief executive. These super-optimised components are made using additive manufacturing, then put together using a universal assembler that can put together any set of 3D-printed components "in a fully automated, fixture-less way". All of this is done at Czinger's headquarters in Los Angeles, close to where most of the customers for its $2m 21C car live.

Czinger argues that his company's use of smart manufacturing has allowed it to benefit from "low production capital requirements and a fast product cycle". In the next few decades, "we will have full digitisation of manufacturing processes, regionalisation or localisation (on a global basis) of the design and manufacture of most products, and the global democratisation of access to the tools of product design and creation", he says. In the box below, we look at some of the stocks that could benefit from this.

"Rising wages mean emerging markets no longer have a cost advantage"

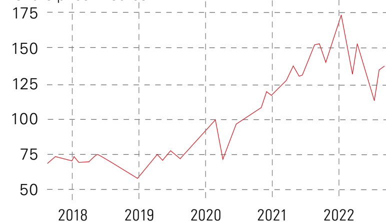
Five smart-manufacturing stocks

PTC (Nasdaq: PTC) provides a range of software and services for manufacturing companies focused on the internet of things and collaborative software, as well as advanced data analytics, automation and augmented reality. Revenue has grown by roughly 10% a year since 2016, while profits have mushroomed more than 60-fold since 2017, with a double-digit return on capital employed (ROCE). At the current share price of $125, it trades on 24 times forecast 2023 earnings.

Schneider Electric (Paris: SU) specialises in energy management and industrial automation, and its products should play a key role in smart factories. The group operates in 200 locations around the world and collaborates with a wide range of companies, including Cisco and Microsoft. Schneider's profits grew by 70% between 2016 and 2021 and are set to keep rising, and it manages a ROCE of around 10%. At €136, it trades at 17.4 times 2023 earnings. The dividend has grown at more than 7% per year over the past five years and the trailing yield is 2.2%.

Industrial and engineering firm **Siemens (Frankfurt: SIE)** is also closely involved in the development of smart manufacturing. The company is a "powerhouse" when it comes to automation technology, says Peter Lingen of Pictet. Its digital business platform Siemens Xcelerator is also regarded as one of the leading products in this area. While its products and services related to the fourth industrial revolution still only account for roughly 15% of revenue, they are growing by about 10% a year, which means that this part of the business will become much more important in the future. Siemens trades at 13 times 2023 earnings with a dividend of 3.6%, based on a share price of €112.

Rockwell Automation (NYSE: ROK) specialises in many goods and services that are used in industrial automation. Its products range from those that collect data to visualisation software and even systems that can automate entire processes. Sales growth has been solid and the backlog of orders is rising. The company is also very profitable, with operating margins averaging 17% over five years and a ROCE averaging 22%. Earnings per share doubled between 2015 and 2021. A share price of $260 puts it on 23.5 times 2023 earnings and a yield of 1.7%. The dividend has grown by 8% per year over the past five years.



Proto Labs (New York: PRLB), founded in 1999 by entrepreneur Larry Lukis, is one of the world's leading producers of custom prototypes and low-volume production parts. It operates in eight countries in North America, Europe and Asia. After originally focusing on injection moulding, it started to embrace 3D-printing in 2014, and now provides five different types of additive processes. Last year it acquired 3D Hubs, a digital-manufacturing platform that incorporates machine learning. Proto Labs serves a large number of companies in the medical, aerospace, automotive, consumer electronics and industrial equipment sectors. It has grown sales by roughly 10% per year over the past five years. A share price of $46 puts it on 23.6 times 2023 earnings.

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Put your trust in private-equity trusts

One fund's poor performance has dented confidence in the whole sector. This is wholly unjustified, says Max King

The collective wisdom of investors, as evidenced by share prices, is right much more often than the expert pundits. But it is far from infallible, especially when it comes to listed private-equity investment trusts. The 2008-2009 financial crisis left most of the sector overcommitted to additional investments without the financial resources to pay for them. Share prices crashed, leaving trusts with the uncomfortable choice between raising new equity at rock-bottom prices or selling investments at distressed prices.

Only **Hg Capital Trust (LSE: HGT)** had been sufficiently prudent to have avoided the dilemma, resulting in outstanding subsequent performance. Candover Investments was the worst affected and could only struggle on while its portfolio was liquidated. **Pantheon International (LSE: PIN)** and **3i Group (LSE: III)** fell inbetween these two extremes. The latter succumbed to pressure from its investors and brokers and launched a deeply discounted rights issue. This was widely praised, but it soon transpired that it didn't need the money.

Pantheon refused to follow suit, insisting it could ride out the storm. The stock fell below 20p, but by the end of 2021 had multiplied 18-fold, well ahead of 3i's performance. Investors had been too pessimistic. History has repeated itself this year, with share prices falling even though trusts have reported significant progress. It looks as though investors simply do not believe what trusts are telling them.

The share price of 3i, for example, had fallen 30% by the middle of June, but five weeks later it reported a total investment return of 6.6% for the first quarter. The largest investment, non-food discount-retailer Action, had continued to perform strongly and over 90% of the top-20 companies in the portfolio had reported higher earnings. Furthermore, despite economic conditions deteriorating, 3i remained confident. Yet as JPMorgan Cazenove's analyst Chris Brown noted, 3i's shares were trading at a 13% discount to net asset value (NAV) compared with a long-term average of a 17% premium.

Pantheon's share price had fallen 30% by mid-July despite a total investment return of 11.5% in the first half. This prompted Investec's analyst Alan Brierley to exclaim "Distress? What distress? The discount is at a level (45%) we would typically associate with a portfolio and/or balance sheet in distress. However, this distress has been conspicuous by its absence. The NAV has proved highly resilient, reaching new all-time highs, and materially outperforming public markets".

Oakley Capital's (LSE: OCI) share price had been more resilient, falling just 13% by late June. In late July it announced investment returns of 17% in the first half, including 11% in the second quarter. As elsewhere, asset disposals at a significant premium to book value gave credibility to valuations, yet on 30 June the shares were still trading at a 40% discount

©Alamy

Discount retailer Action has performed well for 3i Group

"Nearly all listed funds' returns should prove exceptional as the market recovers"

to NAV. Even HgCapital Trust, despite its exceptional record, saw its share price fall to a 32% discount.

Chris Brown seeks to put these anomalies into context by looking at the 16 calendar quarters since 2000 in which the All-Share index fell by more than 5%. He finds that the correlation of NAVs to the market is low, owing to irregular valuations, but share prices are more volatile than markets. The average discount widened on average by 10.5% in those quarters while being unchanged in the long term. This meant that discounts narrowed sharply and the funds outperformed when markets were rising.

The culprit is Chrysalis Investments

The unprecedented disparity between share prices and asset values suggests that the fiasco surrounding Chrysalis Investments (LSE: CHRY) may be key to the pervasive pessimism among investors in the sector. Issued at £1 in late 2018, the group's share price reached 270p in late 2021, but is now barely above the issue price. Chrysalis had a very different business model from the prevalent one of private equity.

Rather than seeking controlling stakes in companies that it could influence, Chrysalis acquired modest, passive stakes in firms intending a stockmarket flotation, seemingly without careful due diligence and strategic thinking.

It rushed into a series of technology-related concept stocks with doubtful prospects and high valuations, such as The Hut Group and Klarna. The share price of the former has fallen 90% in the last year, while the latter, still unlisted, has had to raise additional funds at an 80% discount to the implied valuation of just four months earlier. Unsurprisingly, investors are sceptical about the rest of the portfolio and their disillusion has contaminated the whole listed private-equity sector.

Still, Chris Brown's analysis suggests that nearly all listed funds' returns should be exceptional as the overall market recovers. This recovery appears to have started, with strong returns in July, including more than 10% for HarbourVest, 3i and HGT.

Funds in distress, however, should be avoided, despite tempting discounts. Buying or holding onto Candover in 2009 would have been a mistake, as would holding Patient Capital after it moved to Schroders. These precedents suggest that Chrysalis should still be avoided, despite its trading at an apparent 40% discount to NAV. In this respect, if not for the sector as a whole, the market is probably right.

Latin America: the key to net-zero

The continent's base metals are crucial to stabilising global greenhouse-gas emissions, says James McKeigue

The US recession is bad news for investors. But at least it lets them retell an old joke. Dr Copper's diagnosis was accurate once again: the price of "the only metal with a PhD in Economics" dropped before the current economic downturn.

Yet while copper is an excellent predictor of GDP movements owing to its widespread use, it is rubbish at spotting energy transitions. Over the next 30 years governments, investors and companies will spend trillions electrifying the global economy. The goal is to fight climate change by replacing carbon-emitting fossil fuels with renewable energy. The "great electrification" will require huge amounts of copper for the generation, transmission and consumption of this clean power.

A severe supply squeeze

There is just one problem. The world can't produce enough copper quickly or cheaply enough to fulfil these ambitions. The largest copper mine in the world is La Escondida in Chile. Mining analysts Wood Mackenzie estimate that five more Escondidas would need to come online over the next eight years to prevent a copper shortfall. Those huge deposits haven't been found yet, never mind built.

Meanwhile, analysts at financial-data provider S&P Global estimate that annual demand for copper will double between now and 2035 to reach 50 million tonnes per year. In the 15 years from 2035 to 2050 we will need more copper than we have used in the last 4,000 years. The demand is being driven by the energy transition. Renewable-energy generation is far more copper-intensive than traditional power plants. S&P estimates that solar and wind use between two and five times more copper for each megawatt of electricity produced than coal or gas-fired plants.

As the world uses more electricity, it needs more electric infrastructure – from substations to car-charging points – which means more copper. Finally, the consumption of all this green electricity requires yet more copper. For example, electric vehicles (EVs) contain around three times more copper than a traditional internal combustion engine.

Yet nobody seems to have got the memo. Politicians talk about climate change, but are less keen to allow the miners to dig up the metals needed to combat it. It "is harder than ever to build a copper mine", says Tristan Pascall, CEO of First Quantum Minerals, the world's sixth-largest copper producer. It "takes 16 years from discovering a deposit to building a mine... two decades ago it took between six and ten years".

Ironically the same environmental consciousness that is pushing electrification also turns public opinion against mining. It's easy to bash politicians, but most investors also misunderstand the biggest investment story of the 21st century. The market focuses on technological solutions, such as batteries and electric vehicles, but the real bottleneck is metals supply.

"Mining companies trade on a 15.4% free cash-flow [FCF] yield," says Michael Scherb, CEO and founder of Appian Capital Advisory, a mining private-equity firm. "Compare that with a prominent EV manufacturer that trades on a 0.5% FCF yield or renewable energy companies that also have a 0.5% FCF yield... The mining sector is making the most money from the energy transition, but mining still isn't attracting sufficient capital."

"In the 15 years between 2035 and 2050 we will need more copper than we have used in the last 4,000 years"

Ecuador's rugged terrain is rich in unexplored copper reserves

The lack of capital and political support means the world won't produce enough copper. But other factors are also at play. Falling copper grades at older operations mean miners have to dig more ore to get the same amount of copper. That also means more energy has to be used, pushing up carbon emissions at mines, undermining the rationale for producing the metals in the first place. Solutions are being developed, such as electric mining vehicles, but they will add to costs.

The top producers

So, the world needs more copper, ideally new high-grade deposits with a low environmental footprint. Step forward, Latin America. Chile and Peru are already the world's number-one and-two copper producers. Controlling almost 40% of world supply, these two nations have a similar market share to 13-nation oil-cartel Opec when it comes to oil. Their massive reserves, first and third in the world, means they will play a central role in the energy transition. Mexico, with the world's fifth-largest copper reserves, also deserves a mention. When it comes to new discoveries, underexplored Ecuador and Argentina stand out. Mining accounts for less than 2% of GDP in these countries, compared with 15% in Chile, yet they are likely to contain similar copper reserves.

The region isn't just rich in copper. The lithium triangle of Chile, Bolivia and Peru contains more than 50% of the world's reserves of the metal, which is vital for the batteries needed to store all of this new electric

©Alamy

power. Brazil has the world's third-largest supply of nickel, another key battery metal. But the shift to an electric-powered economy will benefit more than just the specific "green-tech" metals.

Other metals will be used to build the new infrastructure to support the electric economy. One is iron ore, of which Brazil has the world's second-largest reserves and Peru the seventh. Another is zinc, which prevents corrosion of steel and iron. Peru and Mexico jointly have the fourth-biggest reserves of zinc, while Bolivia has the ninth. Tin is another important metal in an electrified world as it is used in every circuit board in existence. Again, Latin America dominates the rankings, with Brazil boasting the fourth-largest reserves, Bolivia the fifth and Peru the seventh.

It also bodes well for Latin America that its vast hydroelectric power plants give it the world's greenest electricity grid. More than 60% of the region's electricity comes from renewable energy. That means miners can connect to a green grid, reduce their emissions profile and produce low-carbon metals. That bolsters their environmental and social governance (ESG) credentials, allowing them to attract cheaper financing. It also gives the end product a market advantage, as many environmentally conscious industrial customers don't want to use "dirty" copper. This will become even more significant when carbon taxes are introduced.

The challenge in Latin America is not the geology – it's politics. I am not referring to the left-wing governments that have assumed power in recent years, although many want to increase taxes on miners. The bigger problem is local politics. Independence from Spain created massive, sparsely populated weak states:

"A mere 45 million Argentines inhabit an area just 15% smaller than India, which has 1.4 billion people"

45 million Argentines inhabit a territory just 15% smaller than India, which contains 1.4 billion people.

All politics is local

What's more, the cash-strapped governments lacked the wherewithal to build the infrastructure needed to connect remote areas with the urban centres. Many of these states were also home to dozens of indigenous cultures that were either ignored or oppressed by the creole elites who seized power from the Spanish. Over the last 30 years governments have tried to rectify these historical injustices with transport infrastructure, decentralised constitutions and indigenous rights.

The upshot is that local communities in the remote areas where mining projects are developed often oppose new mines. In Peru projects worth a total of $60bn have been stalled by community protests. Sometimes the protests are genuine. Often, they are manipulated by local politicians or crime bosses who don't want the scrutiny, or competition for manpower, that a mine would bring. Being anti-mining is a vote-winner.

Bizarre as it seems, the key to humanity's battle against climate change lies in local politics in the Andes. It's also the key factor in determining if projects succeed or fail. Some zones are no-go areas. For example, Guatemala shut down the world's third-largest silver mine. Sometimes the problem is the miner. Firms are under financial pressure to start mines operating as fast as possible, but those that don't invest enough time and money in getting locals on board will face protests later.

Building community consensus in Latin America is a headache, but recent geopolitical tensions in Ukraine and Taiwan demonstrate the region's strengths. Latin America is more peaceful than Eastern Europe and more democratic than Africa or Asia. Moreover, it should benefit as the US reacts to China's dominance in critical minerals and secures its own supply chains.

One interesting way to play the coming metals boom is through **Anglo Pacific Group** (**LSE: APF**). It invests in royalties (which provide a share of a mine's revenue) and streams (the right to buy some or all of the metals produced in a mine). Over the last eight years the company has switched from financing coal mines to finding funds for "future-facing" metals. So it has a big presence in Latin America, including a deal with a copper operation in Chile.

Southern Copper (**NYSE: SCCO**) is the fourth-biggest copper miner in the world and has the largest copper reserves, with mines in Mexico and Peru that also produce zinc. **Antofagasta** (**LSE: ANTO**) is a Chile-based, London-listed copper miner. According to the influential annual rankings published by the Fraser Institute, Chile is the best mining jurisdiction in Latin America. Moreover, the centre and north of the country, where Antofagasta owns its five mines, are generally free from community protests.

If you are inclined to take on more risk, consider **SolGold** (**LSE: SOLG**). It is developing Cascabel, one of the most exciting discoveries in Ecuador. When built it will be the world's top underground silver mine, third-largest underground gold mine and sixth-largest underground copper mine. Argentina has also made some mammoth recent discoveries. **Filo Mining** (**Toronto: FIL**) is developing a copper, gold and silver deposit that would churn out 67,000 tonnes of copper per year for 14 years.

Mining developments are highly risky, although Filo is backed by the Lundin family, a Swedish-Canadian mining dynasty that has a good record of building mines in Latin America. In Brazil, **Horizonte Minerals** (**Aim: HZM**) has secured $630m to build a nickel mine. The shares will get a boost if Horizonte builds it on time and within budget, while it also has another promising project planned after that.

Turning up the heat

The energy-price cap will almost double in the autumn. What does this mean for your money, and how can you alleviate the squeeze?

Ruth Jackson-Kirby
Money columnist

The latest energy-price forecasts suggest that the bill for the average household will top £4,200 next year, wreaking havoc with family budgets. So what can you do about it?

Soaring oil and gas prices are to blame for rocketing bills. Later this month Ofgem, the energy regulator, will announce what the energy-price cap will be from October. The cap dictates the maximum amount per kilowatt hour (kWh) energy firms can charge customers on a basic default tariff, also known as a standard variable tariff. It currently works out at £1,971 per year for the average household.

It is forecast to rise substantially in October. Analysts at Cornwall Insight believe it will go up by 82%, taking the average annual energy bill to £3,582. It will then rise again in January by a forecast 19% before peaking at £4,266 in April 2023. That will be almost £3,000 more than the figure seen in March of this year.

Last month the government announced that households will get a £400 energy-bill discount this winter. The money will start being paid in October and will be spread over six months. So you'll get a £66 discount on your October and November energy bills, then £67 a month from December to March.

You don't need to do anything to get the discount: it will be automatically applied to your bills. Anyone who uses a pre-payment meter will receive a discount voucher each month.

Look at fixed-price deals

While the £400 discount will help, it is nowhere near enough to cover the full impact of soaring energy prices. So, what can you do to help yourself?

One option is to take a careful look at the fixed-price deals energy firms are offering. There are none on the market that beat the current price cap, but there are some that are lower than the predicted price caps coming in the next few months.

To work out if a fix is a good deal you need to do some sums, calculating different months at different price caps. Luckily, Martin Lewis of MoneySavingExpert has done the number crunching for us.

"If you're offered a year's fix at no more than 95% above your current price-capped tariff, or 100% more if you very strongly value budgeting certainty, it's worth considering."

You may struggle to get that on the open market as energy firms are reserving their best offers for existing customers only at present. So, check what your energy provider can offer. Keep your bills down by changing the temperature settings on your boiler. Most of us stick with the default settings, but these are set too high, according to Octopus Energy.

"This doesn't make your home warmer, but it can add massively to your bills." The company recommends setting your flow temperature at 50 degrees centigrade for heating and 55 degrees for hot water.

Finally, pay no attention to the Don't Pay UK campaign, which suggests that you stop paying your energy bills. Failure to pay could result in your energy provider installing a pre-payment meter, while it could also affect your credit rating.

Changing your boiler's temperature settings can reduce costs

©Getty Images

Insuring gifts can help you avoid IHT

HMRC is doing increasingly well from inheritance tax (IHT). In the 2021-2022 tax year, receipts from the unpopular death duty hit a record £6.1bn, up 14% on the previous year, as house prices kept climbing and allowances remained frozen.

One little-known way to avoid IHT is with an insurance policy. Under IHT rules you can pass on an estate worth up to £325,000 before tax falls due at 40%. You also get a separate allowance if you are passing the family home on to direct descendants.

On top of that you can give away up to £3,000 each year free from IHT. Anything else you give away is subject to a sliding scale of inheritance tax if you die within seven years of the gift. But you can buy gift-insurance policies – also known as "gift *inter vivos*" plans. These policies will pay out a lump sum to cover any IHT bill that might arise if the person who gave away the money dies within seven years.

"The insurance does not prevent IHT being due, but it effectively compensates for the value lost by having an IHT liability," Rachel de Souza of accountants RSM UK told The Daily Telegraph's Charlotte Gifford.

So, if a healthy 70-year-old gave away a £2.5m gift and died within three years, your estate would owe £1m in inheritance tax (assuming your IHT allowance had already been used up). You could buy gift insurance for £6,310 a year, says Gifford, and it would cover that IHT bill.

If you do take out gift insurance – LV and Aegon are the only insurers offering it at present – make sure it is placed into trust. This ensures that any payouts are not added to the estate, which could actually increase the IHT bill.

Pocket money... where there's a will

- If you have £25,000 or less left on your mortgage, you may want to consider a personal loan rather than a mortgage. Usually a secured debt, such as a mortgage, is cheaper than an unsecured one – such as a loan – because they are less risky: the lender can always sell the asset to recoup their money if you default on your repayments. "But a rapid rise in mortgage rates... has flipped this on its head," says George Nixon in The Sunday Times.

  Someone owing £25,000 and repaying over five years could get a mortgage rate of 3.09% from First Direct. Monthly repayments would be £450. A personal loan from RateSetter or Finnable would come with a 2.8% rate, costing you £447 a month for five years and saving you £203.

- "Children's piggy banks are paying a high price for the cost of living crisis," reports Julia Kollewe in The Guardian.

  Research by Halifax has found that a third of parents have cut back on pocket money this year. The average amount that under-16s are receiving each week has dropped by 23% to £4.99 – the lowest since 2001.

- Attempts to block probate have risen to record levels in England and Wales, "following a surge in the value of bequeathed property and the use of less reliable do-it-yourself wills during the pandemic", says Mary McDougall in the Financial Times. Blocking probate means you stop the validation of a will and the process confirming who has the right to manage the deceased's estate. Challenges to the distribution of inherited estates jumped by 37% between 2021 and 2019.

  "People are becoming more litigious when it comes to wills," Fiona Smith of law firm Forsters told the FT. "Those who might have accepted being left out of a will ten years ago may now be more likely to challenge it."

  If you made an emergency DIY will during lockdown, "you should consider reviewing it now, with the benefit of legal advice, to avoid costly disputes in the family", says Kay Ingram, a chartered financial planner.

Save with salary-sacrifice

These schemes can be a valuable perk when you are building up a pension

David Prosser
Business columnist

Are you missing out on a valuable pensions tax perk that could save you hundreds of pounds? Research from Mercer, a consultant, suggests that a fifth of employees are failing to sign up for salary-sacrifice arrangements, even though these could be a more tax-efficient way to save for retirement.

In a traditional occupational-pension scheme, you make contributions to your savings out of your pay, claiming income-tax relief at your highest marginal rate of tax – up to 45% for the highest earners.

Salary-sacrifice schemes offer exactly the same tax relief, but require you to forego the proportion of your salary you would have paid into the pension scheme; instead, your employer then covers the cost of your contribution.

Exactly the same amount of cash ends up in your pension scheme either way, but the latter arrangement has one big advantage. There will be no national insurance contributions to pay on the salary you've sacrificed – that's a saving of up to 13.25% on this cash. Your employer also makes a saving, since it doesn't have to pay employers' national insurance on this money. Normally, its contribution is 15.05% of salary.

These are valuable perks. Mercer says someone earning £40,000 a year and paying 6% of pay into their pension scheme would save £318 in national-insurance contributions annually in a salary-sacrifice set-up. Their employer would save an additional £361 each year.

Not all employers currently offer salary-sacrifice arrangements, but given the tax advantages to them of doing so, take-up is increasing. The schemes don't have to be used only for pensions. Other non-cash benefits, such as childcare vouchers, can also be offered in this way.

These schemes can apply to childcare vouchers too

©Getty Images

There are some potential disadvantages for employees to consider. By joining a salary-sacrifice scheme, you are lowering your salary. You're not losing out financially because the reduction is only what you would have paid into your pension scheme, but the lower figure is the one that will be used for other important calculations.

> *"A lower salary may reduce the mortgage you can secure"*

Two key downsides

One example is your life insurance. Many employers offer death-in-service benefits to the value of a multiple of your salary, so a lower salary means you'll qualify for less cover. Your entitlement to certain state benefits, such as statutory maternity pay, could be reduced for the same reason.

Similarly, if you plan to apply for a mortgage in the near future, remember that banks and building societies will decide how much they are prepared to lend you partly on the basis of your earnings. So a reduced salary could decrease the size of the mortgage you can secure.

These considerations aside, however, salary-sacrifice schemes offer a good deal for the majority of employees given the national-insurance saving. If you have the option of joining such an arrangement, think hard before saying no – and if your employer doesn't currently offer salary-sacrifice, it's worth pointing out the tax advantages to them of putting one in place.

A new type of retirement fund

The Pensions Regulator has begun accepting applications from employers who want to set up a new type of occupational-pension fund. Collective defined contribution (CDC) schemes went live on 1 August, with pensions minister Guy Opperman predicting that the new arrangements could transform employer pension provision.

CDCs are intended to offer some of the advantages of defined-benefit schemes without forcing employers to fund a guaranteed level of pension benefit for each member in retirement.

Your pension from a CDC will depend on how successfully the scheme invests your money, but unlike in traditional defined-contribution plans, your money is pooled with that of other scheme members rather than held in an individual pot. The pool is then invested with the aim of delivering a targeted level of retirement income.

The idea is to give savers more confidence in the outcomes of their pension saving without requiring employers to take additional financial risk. Experts think savers will be more likely to contribute to CDCs because they provide more guidance about what the pension might be worth.

Several large employers, including the Royal Mail, are considering setting up CDCs. Critics say it will be important that savers understand clearly that the targets are not guaranteed.

News round-up... pensions for children

● Seven in ten divorcing couples took no account of pension savings when agreeing a financial settlement, new research from consumers' group Which reveals. The UK's legal system has allowed courts to split pensions since 2000, with thousands of "pension-sharing" orders granted since then. However, most couples do not pursue such orders. They focus instead on more tangible assets, such as the family home. Overlooking pensions could see spouses financially disadvantaged later in life, Which warns, with women particularly vulnerable.

● The Environment Agency is facing criticism after it emerged that its pension fund has substantial investments in many of the UK's largest water companies – despite the watchdog's public criticism of the sector's performance. The row highlights confusion in the occupational-pensions sector over the extent to which schemes can take issues beyond financial returns into account when making investments. Many pension-scheme trustees believe their ability to make such decisions is restricted – and do not limit third-party investment managers' mandates – but regulation does allow wider considerations as part of the investment process.

● Could a pension be the perfect back-to-school present for your children? Many families are taking advantage of rules allowing them to set up pensions for children, who get their own pension allowance of £3,600 a year and access to the same tax reliefs as adults. Only parents and legal guardians can start the schemes, but anyone can contribute to them once they are up and running. Children can't access their money until they reach retirement age. Advocates of the schemes say they provide tax-efficient foundations for a long-term savings habit.

Strong tailwinds bode well for Chinese stocks

A professional investor tells us where he'd put his money. This week: Dale Nicholls of the Fidelity China Special Situations Trust picks three favourites

Rising inflation and economies on the brink of recession are dominating headlines across most global markets. But it is crucial to maintain a long-term perspective during volatile times. I remain focused on companies with strong long-term prospects trading at reasonable valuations. Good risk-reward opportunities often emerge during periods of volatility.

The US and European countries have begun tightening monetary policy to counter inflation, but China has maintained an easing stance, which history shows often supports markets. This monetary policy, combined with structural tailwinds such as growing self-sufficiency, increasing disposable incomes and rising domestic consumption, provides investment opportunities in the Chinese market.

Thriving in adversity

Shandong Sinocera (Shanghai: 300285) is a leading player in fine ceramic materials in China. It is actively taking market share from global competitors in all product segments despite ongoing supply-chain disruptions and the trend towards deglobalisation owing to rising geopolitical tension and the impact of the pandemic.

Domestic substitution is a trend we see across many markets in China. The company's competitive advantages include a strong technology platform, a lean cost structure and better support services for customers. The group is expected to grow sales and earnings by an annual 30% in the next five years.

Painting the property sector

The property sector in China has been under particular pressure since late 2021. While the stabilisation process is bumpy and slow, the related paint industry is an attractive yet often overlooked business with pricing power that is helping it deliver a high return on invested capital (ROIC), a key gauge of profitability, as well as solid cash flows.

SKShu Paint (Shanghai: 603737) is gaining market share through the consolidation of what remains a very fragmented market. Demand for repainting is picking up, meaning China's architectural paint requirements will expand significantly, even if demand for new-build residential property remains weak.

The company fosters a culture focused on the customer and dedicates itself to making environmentally friendly products accredited by global institutions such as Greenguard. We think the earnings outlook for the second half of 2022 remains positive and that most of the market turbulence is behind us.

A severely undervalued lender

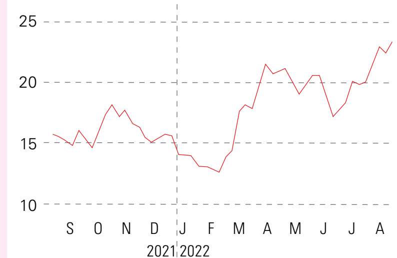
In the hope of revitalising GDP growth, the Chinese leadership has pledged to increase its support for the economy, especially small firms hit by pandemic lockdowns. That means **Lufax (NYSE: LU)**, a severely undervalued leader in the online lending sector, could present an opportunity as the regulatory landscape becomes clearer.

"It is crucial to maintain a long-term perspective during volatile times"

The company differentiates itself by targeting small-business owners underserved by banks. Lufax's core strengths lie in its strong offline capability, sophisticated risk-management system and robust wealth-management platform. The management has proactively mitigated regulatory risks, and both dividends and stock buybacks show confidence in its business and cash flows.

If only you'd invested in...

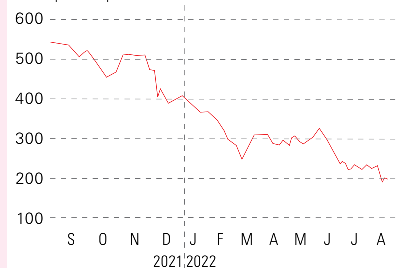
Encavis (Frankfurt: ECV)
Share price in euros



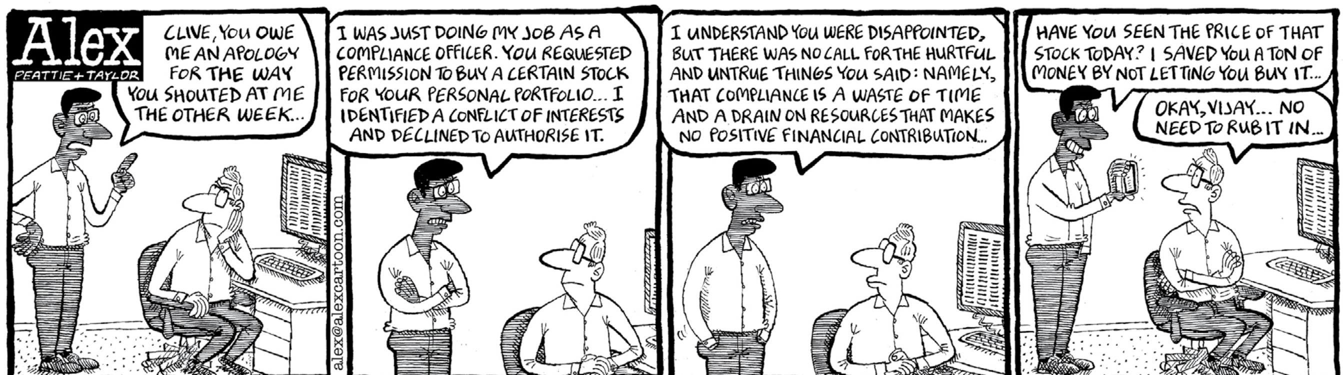
Germany's **Encavis (Frankfurt: ECV)**, a producer of electricity from renewables, is having a good year. The wind and solar park operator has just raised its sales forecast for 2022 to €420m compared with €333m last year; operating income is expected to hit €185m, a rise of 24%. The group has expanded production capacity and is profiting from higher electricity prices. The EU's target of raising renewable energy's share of final consumption from 22% to 40% by 2030 bodes well for the longer term. The stock, which trades in the mid-cap segment of the German market, has gained 52% in a year.

Be glad you didn't buy...

Synthomer (LSE: SYNT)
Share price in pence



Polymer-maker **Synthomer (LSE: SYNT)** has seen its share price tumble following the acute phase of the pandemic, says The Times. Pre-tax profit halved to £116m in the first half of 2022, compared with £345m in the same six months the year before. The firm produces nitrile butadiene rubber, a key component in the disposable rubber gloves used in hospitals around the world, demand for which has slowed in the past few months. The firm's share price has fallen to its lowest level since March 2020 and has slipped by 62% over the last 12 months.



Retail king's quest for redemption

Ron Johnson's spell at JCPenney, following his triumph at Apple, was a disaster. Now, his latest attempt to rescue his reputation has just crashed into bankruptcy. Jane Lewis reports

Apple Store inventor Ron Johnson is given to Zen-like aphorisms that slightly miss the mark – instructing employees, for instance, to "ruthlessly eliminate hurry". It adds to a sense of mixed messages. Beneath his trademark Midwestern calm, a colleague once observed, is "a boiling cauldron" that has powered a career of extremes. Fêted as a revolutionary retail genius at Apple, Johnson bombed from hero to zero during a disastrous 18-month run at JCPenney, which, a decade on, still makes the lists of great management cock-ups. Ever since, says the New York Observer, he's "been on a quest for redemption".

©Getty Images

"Johnson's great comeback vehicle has evaporated in the Spac bust"

Revolutionising shopping

To his credit, Johnson shrugged off his humiliating firing, almost immediately securing Wall Street backing for a new venture that tapped his famed ability to put the "humanness" into tech support. Enjoy Technology, which launched in 2015 when the "Uberisation" of everything was in full swing, was billed as "the next big thing in disruptive retail", says Retail Dive. Strip out the jargon and the essential offer was "a mobile store" – featuring a fleet of vans crammed with gadgets and empathetic geeks, bent on maximising that crucial "last-mile" opportunity to upsell. "What we're trying to do," said Johnson, "is to deliver unimagined customer service. It's better than a store, it's the same price as online, and it's faster than even Amazon Prime." In early 2020 Forbes declared that "this start-up may be his crowning achievement".

Still, having set out to disrupt retail, Enjoy got disrupted itself. Nine months after scrambling onto the "blank-cheque" initial public offering bandwagon via a merger with Marquee Raine Acquisition, valued at $1.1bn, it has filed for bankruptcy, says the Financial Times. Johnson's great comeback vehicle has evaporated into just another statistic of the Spac bust.

Now 62, Johnson started out humbly – after gaining a BA from Stanford and an MBA from Harvard – by taking a trainee position with Mervyn's, a "middle-scale" Californian department-store chain, before moving back to Minnesota to join Target. It was here he made his mark as a moderniser, says Retail Dive: signing a series of design partnerships that turned Target into "Tar-zhay", an aspirational, middlebrow mega-retailer, using "a playbook" that H&M, Uniqlo and many others have since copied. From there it was a short step to being headhunted by Apple in 2000.

If Ron Johnson made Target "hip", he made Apple stores "the envy of retail", says Forbes – eventually boasting "far higher sales per square foot than even luxury retailers such as Tiffany and Saks". Johnson's gamble was to put a computer shop among these swans in the guise of stylish, but approachable, temples of Apple technology. His new "Genius Bar" format upended accepted perceptions of dire technical support. Decades after this "hyper-successful" retail gambit, Johnson was still name-dropping his "famed mentor" Steve Jobs, says the FT. Arguably he had every right to, says Fast Company. "The resurgence of Apple in the early 2000s is at least partially due" to the way Johnson "revolutionised the computer shopping experience".

The Jobs' playbook

When the established but dowdy department chain JCPenney secured Johnson's services in 2011, it seemed all its Christmases had come at once. Yet in record time, he inflicted wounds from which it is still recovering, says the New York Observer. In keeping with Jobs' "disdain for focus groups", Johnson dispensed with customer surveys – spending big on a new regime that swept away favourite brands and an old-fashioned, but popular, coupon system, says Fast Company. Sales plunged, as did the shares – prompting Johnson's early eviction.

Hopes that Enjoy Technology would mark a return to form have, at least temporarily, been dashed. Now in Chapter 11, the firm's future is up in the air. "I have learned from many, but the most powerful lessons I learned came from working… with Steve Jobs," Johnson said last year. "He taught me that when you deliver the highest quality you can imagine, you will have a great business forever." Not always.

Will Serena Williams ace venture capitalism too?

"My whole life, up to now, has been tennis," writes Serena Williams, the tennis ace, announcing her retirement at the age of 40 in Vogue. Williams (pictured), often described as one of the greatest athletes of all time, and winner of 23 Grand Slam singles titles, wants to have a second child, and feels she is no longer able to combine top-level sport with "the physical labour" of growing the family.

She is not, she insists, retiring – "I have never liked the word *retirement*" – but rather "transitioning" to spending more time with her family and working for Serena Ventures, a venture-capital (VC) firm she set up when she heard that less than 2% of all VC money went to women. "Someone who looks like me needs to start writing the big cheques," she said, and to date her company has invested in 16 "unicorns" – firms valued at more than $1bn – and raised $111m in outside funding. The all-female business recently took on its first man – "a diversity hire!", jokes Williams.

Williams is also a minority owner in the Miami Dolphins and, along with her husband, Reddit co-founder Alexis Ohanian, a founding co-owner of a new women's football team in Los Angeles, says the Financial Times. Williams has over her career endorsed sports and other blue-chip brands, topping up her $95m in prize money to a total net worth estimated at $260m by Forbes, placing her at 90 in its list of the top self-made women in the US.

If there's one thing Williams excels at, it's "beating things", says Jacqueline Maley in the Sydney Morning Herald. She has beaten records, her opponents, and racist and sexist stereotypes. But there's no beating the biological clock. Serena has had "the great realisation" – that there is a season for everything under heaven. Now is the time, she says, for focusing "on being a mom and my spiritual goals".

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A sanctuary on Santorini

Andronis Concept provides the ideal setting for rest and relaxation, says Nicole García Mérida

The village of Oia offers stunning views

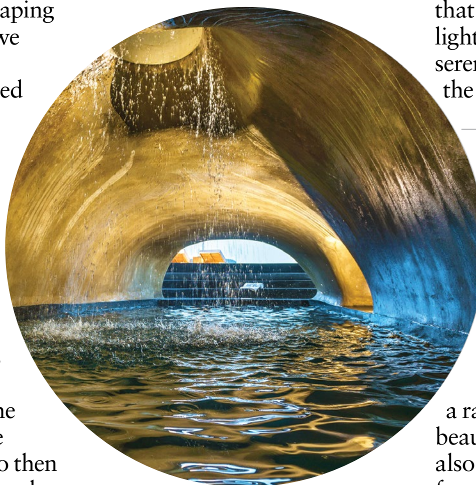
©Getty Images

Some 3,000 years ago the Greek island of Thera, now known as Santorini, was host to the Minoan eruption, which has been described as one of the largest ever to be experienced by mankind. More powerful than the eruption of Pompeii, it took out half of the island, reshaping it into the crescent moon we know today.

What remains has turned into one of the Aegean's top tourist destinations, and with good reason. Most of the hotels on the island are built over the volcanic crater, affording sweeping views of a glittering ocean. According to Greek mythology, the island was created serendipitously when Euphemus, son of the god Poseidon, dreamed he made love to a nymph who then became pregnant. Concerned about the reaction of his father, Euphemus threw a chunk of earth into the Aegean to create somewhere the nymph could safely and secretly give birth. The island is named after his son, Theras.

A romantic getaway

Nestled in between the remains of the eruption and this mythological tale sits Andronis Concept, a wellness resort located in Imerovigli. The village is at the highest point of the island and has been dubbed the balcony to the Aegean. It's also thought of as Thera's most romantic location, and it's less a party destination than Oia and Fira, making it the ideal place for a romantic getaway – and there's nowhere better to delight in what the island has to offer than at Andronis.



Most of the resort's suites come with their own infinity pool, meaning you won't have to elbow anyone out of the way to get a front row, panoramic view of the beautiful sunsets that drench the island in golden light. It offered the privacy and serenity I was yearning for and the staff were always attentive.

> *The Kallos Spa offers a range of therapeutic and beauty treatments*

The Kallos Spa offers a range of therapeutic and beauty treatments and there is also a gym. But the highlight for me was the restaurant, Throubi. The menu features fresh ingredients from the garden, the extensive wine list has something for everyone, and you can choose to dine on the outdoor terrace or inside the tastefully decorated eatery.

There's refreshing seabass ceviche, spicy yellowtail sashimi with jalapeño, and Santorini's signature *fava*, a yellow pea purée, followed by flaky cod with beetroot and potato cream or fresh lobster with homemade ravioli, tender wagyu surloin and juicy lamb fillet with smoked broth, and for dessert you can order the sumptuous sour cherry tart with pistachio, or the indulgent chocolate mousse with orange, saffron and pecans. It's a delightful taste of Thera without having to leave the oasis of the resort.

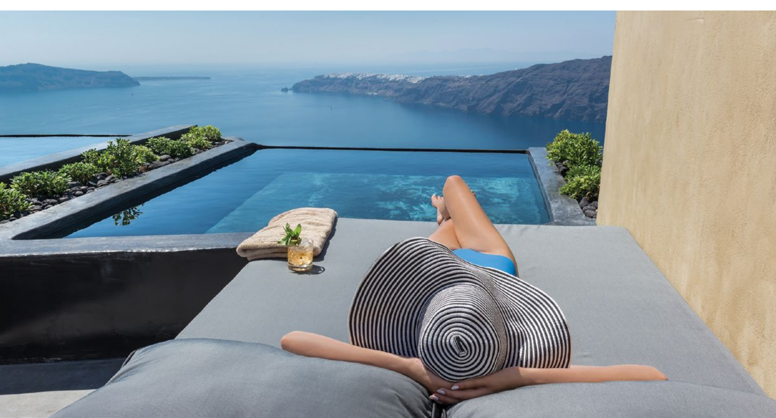
Lunch by the sea

If you do want to venture out, the coastal path, accessible from most rooms, takes you to the village of Oia, past bougainvillea and dozens of boutique shops to the balconies overlooking the horizon, decorated with the bright azure domes so typical of the Aegean islands. The brave should head down the 300 or so steps to Amoudi Bay. Grab lunch at one of the seaside restaurants, where the ocean breeze will cool you down before the walk back up (you can also hire a donkey if you find yourself stopping every five minutes, as we did).

History buffs will want to take a trip to the southern tip of the island, to visit Akrotiri. The settlement was nearly perfectly preserved in volcanic ash and you can still spot fine frescoes on the walls as well as objects from a thousand lifetimes ago.

Andronis Concept provides a taste of the Aegean, offering excellent service and infinite relaxation on an island bustling with history, culture, nightlife and a thriving food scene that will leave you wanting more.

Nicole was a guest of Andronis Concept. From around £350 a night, andronis.com



This week: properties with orchards – from a B-listed house in Perthshire, Scotland, with an orchard with

▲ **West Mains of Huntingtower, Perth, Perthshire, Scotland.** This B-listed house has an apple and plum orchard and a kitchen garden with pear trees. It has a large breakfast kitchen with an Aga and a conservatory. 6 beds, 4 baths, 2 receps, 1-bed cottage, stone barn, tennis court, paddock, woodland. £1.5m+ Strutt & Parker 01738-783350.

▶ **Thorn Hanger, The Common, Marlborough, Wiltshire.** An upgraded, 1890s property with a bespoke kitchen with an Aga, and a spiral wine cellar with room for 1,200 bottles. The gardens include an orchard with two greenhouses. 5 beds, 3 baths, 3 receps, kitchen, study, workshop, 0.6 acres. £2.75m Hamptons 01672-620175.

▶ **Coombe Farm, West Monkton, Taunton, Somerset.** A 16th-century former farmhouse with a south-facing walled garden, a kitchen garden, a pond and a large, established orchard. The house has beamed ceilings, open fireplaces, a newly fitted kitchen with an Aga and reception rooms with French doors leading onto a terrace. 4 beds, 2 baths, 2 receps, study, stone barns and workshop, 12.75 acres. £1.65m Savills 01823-785441.

n apple and plum trees, to a 17th-century cottage in Devon with damson, crab-apple and pear trees

◀ **Hunstanworth, County Durham.** A Grade II-listed former vicarage with views over the Derwent Valley. The gardens include a walled orchard with a summerhouse, wildlife ponds, an owlery and the original pig-sty with a stone feeder built into a wall. The house has a large reception hall with a stone fireplace and a wood-burning stove, and a triple-aspect garden room. 5 beds, 2 baths, 3 receps, kitchen, coach house with stable, woodland. 2.86 acres. £1.2m+ Finest Properties 01434-622234.

▶ **The Moat House, Dorsington, Stratford-Upon-Avon, Warwickshire.** A Grade II-listed property with medieval origins, updated to include an award-winning glass room that juts out over the moat. It has large gardens and an orchard producing a variety of heritage cider apples. 4 beds, 2 baths, 3 receps, 2.18 acres. £2.2m Savills 01451-832832.

▲ **Coldwell Farm, Tickbridge Lane, Leominster, Herefordshire.** A Grade II-listed farmhouse on a smallholding set in over 11 acres of grounds that include formal gardens with a medieval orchard planted with damson and cider-apple trees. The house has exposed beams and a living room with an inglenook fireplace and a wood-burning stove. 4 beds, 1 bath, 3 receps, 2-bed cottage, 3 barns. £1.1m+ Jackson Property 01568-610600.

◀ **The Orchard Cottage, Sanford Crediton, Devon.** A Grade II-listed, late 17th-century cottage in a rural location with well-stocked gardens that include a kitchen garden with a polytunnel and an orchard with damson, crab apple, pear and apple trees. The cottage has exposed timbers, a large inglenook fireplace and a farmhouse kitchen with an Aga. 4 beds, 2 baths, recep, study, garage, workshop, stores. £675,000 Strutt & Parker 01392-215631.

▶ **Manor House Farm, Upton Cheyney, Bristol, Gloucestershire.** A Grade II-listed, 18th-century former farmhouse with a range of outbuildings and formal gardens with a lavender-lined walkway leading to an orchard. It has open fireplaces with wood-burning stoves, stone-mullioned windows with shutters and a kitchen with a beamed ceiling, flagstone floors and an Aga. 5 beds, 2 baths, 2 receps, workshop, barn, stone outbuilding, 7.5 acres. £2.95m Hamptons 01225-220216.

GMC's gentle giant

The iconic Hummer shows a softer side while retaining its power. Jasper Spires reports

"I'll be back." It turns out Arnold Schwarzenegger's most famous line now applies to one of his favourite cars. "Hummer has returned for the electric age, meaning it now literally hums," says Jake Groves for Car magazine. The car, a byword for ostentatious power and macho motoring, is "still as excessive as ever" as an electric vehicle (EV). "Huge? Yes. Powerful? Very. Completely beyond almost everyone's requirements for an EV? Absolutely." It is a technical achievement, and an unrestrained exercise in extremes. "Only the USA would take something with such good intentions as a battery-electric car and turn it into a mutated off-roading monster." But that's what makes the venerable hulk so loveable.

"Predictably, the Hummer offers ridiculous levels of performance," says James Attwood in AutoCar. Despite weighing over 4,000kg, it can bound ahead at a staggering 106mph, and claw itself from 0-60mph in three seconds flat. It shows "scant regard for the laws of physics [and] … it's not until you go to brake and turn into a corner that you're reminded you're driving a four-tonne pick-up." (An SUV version is set to follow.) That kind of power is perfect for going off-road too. It's a machine with "incredible capability", clambering over rock-strewn hills and traversing huge bumps with ease, while being powered by its electric drivetrain in an elegantly named "Watts to Freedom mode (or WTF for short)".

The electric Hummer also boasts remarkable handling. Challenges such as parking "don't require as much practice as you think", says Jordan Golson on Inverse. It is packed full of clever tech to make driving it deceptively easy, taking a "gigantic buffalo" of a vehicle and making it "as agile as a jungle cat". This is a surprisingly nimble giant.

Looks-wise, "the exterior is what you'd get if a Hummer and a moon buggy made a glorious electric baby". Impossible to ignore, the "pick-up is a thumb in the eye of every environmentalist who tried to destroy Hummer back in the late 2000s". This exuberantly maximalist style continues inside, with the interior "taking plenty of inspiration from the original Hummer, and mixes boxy militaristic design with a dash of premium charm", says James Attwood on Move Electric. "There's a big chunky dash and centre console that almost envelops the driver, and a pleasing range of physical controls that feel suitably sturdy and rugged."

> *"It's what you'd get if a Hummer and a moon buggy made a glorious electric baby"*

The electric Hummer isn't yet available to buy in Britain, although there are whispers it will form part of a line-up when GMC returns to the British market. If it does, it could be a niche success. *$110,295, gmc.com*

Wine of the week: a delicate must-have for rosé fans

2021 Quinta da Fonte Souto, Rosé, Serra de São Mamede, Alentejo, Portugal

£21.50, noblegreenwines.co.uk

Matthew Jukes
Wine columnist

I find it somewhat frustrating that many of the most noteworthy new wines that make it to our shores each year have so few retail listings, and I imagine it must annoy my readers, too, but hey ho. Every wine I have written up on this page over the last 16 years can be ordered to your door, so I hope you feel driven to track this week's thriller down, too. After shunning a Provençal rosé last week in favour of a superior white from the same property, this week I have found you an elite rosé from a red wine specialist!

Made from aragonez (or tempranillo in Spanish), this tiptoe light, 13% alcohol thriller comes from the high-altitude environs of Portalegre in Portugal's stunning Alentejo region. Owned by port barons the Symingtons, this amazing property dipped its toe in the rosé pond last year, making a micro-production of the 2020 for its faithful clientele and it sold out in seconds (I know because I drank a couple of bottles myself). This year's 2021 release is a far superior wine and it establishes this picturesque estate, in just a couple of vintages, as a must-have Portuguese rosé producer. It is by far and away the finest Portupink I have tasted this year and in global terms it is uniquely delicate, perfumed and refined. I imagine that rosé fans the world over will do anything to get their hands on a bottle of this spectacular 2021 vintage.

Matthew Jukes is a winner of the International Wine & Spirit Competition's Communicator of the Year (MatthewJukes.com).

Bridge by Andrew Robson

Solving the jigsaw puzzle

Yorkshire jigsaw-puzzle maker Simon Stocken found a nice line to land this week's slam.

Dealer South　　　East-West vulnerable

West	North / South	East
	♠ 9653 ♥ A1092 ♦ 3 ♣ KJ74	
♠ Q8 ♥ 53 ♦ J10954 ♣ 9532	N / W E / S	♠ J42 ♥ J764 ♦ Q876 ♣ Q8
	♠ AK107 ♥ KQ8 ♦ AK2 ♣ A106	

The bidding

South	West	North	East
2♣*	pass	2♦**	pass
2NT***	pass	3♣§	pass
3♠	pass	5♠§§	pass
6♠	pass	pass	pass

* 23+ points.
** Negative or, as here, waiting.
*** 23-24 balanced.
§ Stayman – a request for four-card majors.
§§ "How good are your Trumps for the Spade slam?"

Mr. Stocken, South, received the Knave of Diamonds lead. Winning the King, he had four Trumps with East to worry about (he could do little if West held Queen-Knave-small-small, and also his third Club). He found a fine play that enhanced the chances of resolving both issues.

Declarer cashed the Ace of Spades, followed with the Ace of Diamonds (throwing a club) and a third diamond, ruffing in dummy (in order to eliminate the suit). He then led and passed the nine of Spades (key play).

Declarer would avoid a second Trump loser if East held four Spades (although East might have made his life more awkward in such a scenario by covering with an honour). The more likely gain occurred in actuality.

West won his Queen of Spades, but found himself endplayed. A Diamond would enable declarer to ruff with dummy's last Trump and discard a Club from hand; while a Club or Heart would give declarer a third or fourth trick (respectively) in the suit led. Twelve tricks and slam made.

For Andrew's four daily BridgeCasts, go to andrewrobsonbridgecast.com

Sudoku 1117

		6		1		9		
8				7				4
			8					3
	6		9				4	
		5	6	8	1	7		
	9				3		5	
5					2			
4				3				7
		9		4		2		

To complete MoneyWeek's Sudoku, fill in the squares in the grid so that every row and column and each of the nine 3x3 squares contain all the digits from one to nine. The answer to last week's puzzle is below.

9	7	3	1	5	8	4	6	2
4	1	5	2	7	6	3	8	9
6	8	2	9	3	4	1	5	7
7	2	9	4	8	5	6	3	1
8	4	6	3	1	7	2	9	5
5	3	1	6	2	9	8	7	4
3	5	8	7	4	1	9	2	6
2	9	4	5	6	3	7	1	8
1	6	7	8	9	2	5	4	3

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Tim Moorey's Quick Crossword No. 1117

A bottle of Taylor's Late Bottled Vintage will be given to the sender of the first correct solution opened on 29 Aug 2022. By post: send to MoneyWeek's Quick Crossword No.1117, 121-141 Westbourne Terrace, Paddington, London W2 6JR. By email: scan or photograph completed solution and coupon and email to: crossword@moneyweek.com with MoneyWeek Crossword No.1117in the subject field.

1		2		3		4	■	5		6		7
	■		■		■		■		■		■	
8					■	9						
	■		■		■		■		■		■	
■	10											■
11	■		■		■		■		■	■	■	12
13						■	14			15		
	■	■	■		■	16	■		■		■	
■	17	18										■
19	■		■		■		■		■		■	20
21							■	22				
	■		■		■		■		■		■	
23					■	24						

Across clues are mildly cryptic while down clues are straight

ACROSS

1 Waterbird in place at sea (7)
5 Ravel trio to include a brief new opening (5)
8 Put clock back and forward (5)
9 Mum has blemish needing a cosmetic (7)
10 Finally going to hospital for treatment – from me? (11)
13 Doesn't fancy Brahms and Liszt (6)
14 Spot Rees-Mogg perhaps in grand residence (6)
17 What top chefs cooked from meat recipes (11)
21 No finer mobile hot spot (7)
22 First-class team out of the way (5)
23 Saucy Latin American dance? (5)
24 Wine brought back from Iran is terrible (7)

DOWN

1 Soldier carried by air (4)
2 Rheumatic pain (7)
3 Part of a town from which pupils are selected? (9, 4)
4 Agile (6)
5 Trivial (13)
6 Passenger vehicles (5)
7 Fine (4)
11 Query (3)
12 Churchyard tree (3)
15 Italian opera composer (7)
16 Mail (6)
18 Extremely bad (5)
19 Knights (4)
20 Type of cheese from Greece (4)

Name ....

Address ....

....

email ....

Solutions to 1115

Across 1 Prince of Wales *anagram* **8** Stets *stetson less on* **9** Tiepolo *tie + Polo* **10** Ada *hidden* **11** Idolaters *anagram* **13** Apeman *name Pa reversed* **14** Campus *P inside Camus* **17** Elopement *op inside element* **19** Ant *cant less c* **21** Brassie *brass + ie* **23** Enemy *anagram* **24** Clint Eastwood *anagram*
Down 1 Pasta **2** Iterate **3** Castigate **4** Option **5** Woe **6** Loose **7** Spouses **12** Apartment **13** Acerbic **15** Placebo **16** Geneva **18** Okapi **20** Toyed **22** Sot

The winner of MoneyWeek Quick Crossword No.1115 is: James Lalor of Bournemouth

Tim Moorey is author of How To Crack Cryptic Crosswords, published by HarperCollins, and runs crossword workshops (timmoorey.com)

Taylor's is one of the oldest of the founding port houses, family run and entirely dedicated to the production of the highest quality ports. Late Bottled Vintage is matured in wood for four to six years. The ageing process produces a high-quality, immediately drinkable wine with a long, elegant finish; ruby red in colour, with a hint of morello cherries on the nose, and cassis, plums and blackberry to taste. Try it with goat's cheese or a chocolate fondant.

The slide into poverty has begun

In the long run, productivity is almost everything. And it's in steep decline

Bill Bonner
Columnist

US labour productivity has suffered the biggest crash ever recorded and labour costs have soared by the most since 1982, reports Breitbart. The productivity of the business sector has fallen by 2.5 % compared with a year ago and unit labour costs jumped 10.8% in the second quarter.

From the year we were born until now, productivity could be counted on to increase. And productivity, more than any other single measure, tracks our wealth. There are only ever 24 hours in a day. We are wealthy inasmuch as we are able to use those minutes to produce goods and services. The more output, the richer we are. But now, time goes by and we have less and less to show for it. How did that happen? Did masons forget how to mix their mortar? Did machinists forget how to bend their steel? Did accountants forget how to add and subtract?

More likely is that the feds' countless acts of petty insult and grand larceny have laid working families low. They are burdened with too many laws, regulations, taxes and jackass rules to work around. And they have the feds misleading them with phoney price signals and stimulus cheques. But of all the crackpot schemes, lowering interest rates to discourage savers was probably the most harmful.

Chinese troops march into the US following the Treaty of Shanghai in 2038

©Getty Images

Savings allow us to invest in new factories, new machines, and new output. It is savings that make us more productive and richer. As savings went down, so did serious capital investment. Instead of spending years building real, profit-making businesses, entrepreneurs created overnight "start-ups" that they could quickly unload on leveraged speculators. Less money was spent on new plant and equipment and more on share buybacks, mergers and acquisitions, and other payouts to the rich. Why bother with real business investment when you can borrow below the rate of consumer-price inflation and jack up your stock price?

"Thirty generations on, how will we be judged? We shudder to think"

The result was predictable. Now it is here. And we wonder… 30 generations on, how will we be judged? We shudder to think. Imagine the Wikipedia entry for the history of our time, written in the year 3000: "By 2022, wasteful spending, along with foolish policies from the central bank, brought growth to a halt; the slide into poverty had begun. Corruption, chaos, civil unrest, inflation, poverty, recession, and war – that was the history of the period from 2022 to 2036. Finally, an attack by state-of-the-art Chinese drones, from forward bases in Brazil, in 2037, devastated America's military installations and led the US to beg for peace. In the Treaty of Shanghai the following year, the US was occupied by Chinese troops. It agreed to disarm what was left of its military and disband its two war-seeking political parties. In this manner was the peace and prosperity of the world restored".

The bottom line

$1m The value of burritos to be given away to teachers in 2,000 US schools by fast-food chain Chipotle this August. Parents and pupils can nominate their favourite teachers and the winner will be drawn by lot and announced on social-media outlets.

€15,000 How much the town of Saint-Gervais is now charging climbers to ascend Mont Blanc. Tourists will need to pay the sum to cover the average cost of rescue – or burial – if they wish to hike up Europe's tallest mountain. More and more inexperienced and ill-equipped hikers have been getting into trouble on the mountain.

£700,000 The daily cost paid by the UK government to store unused personal protective equipment (PPE) in warehouses. A report from the National Auditing Office found that 14.2 billion items of PPE had been languishing in storage, worth a total of £8.6bn – the equivalent cost of putting 36,000 children into part-time nursery care, or buying two aircraft carriers equipped with nine Eurofighter Typhoons.

2p The cost of a nightly stay at Thailand's Harmonise Hotel in Chiang Mai province. Rates have been slashed in an effort to revitalise Thailand's post-pandemic tourism industry, with 45 establishments participating in the scheme across the region. Harmonise Hotel's offer includes free Wi-Fi, television, access to the on-site pool and 300 baht (£7) to spend on food.

©Getty Images

$31m The amount owed by actor Kevin Spacey (pictured) to the producers of Netflix drama *House of Cards*. He was fired over allegations of sexual harassment, and the producers MRC insisted on being compensated for millions in lost revenue. Spacey appealed, but the judge confirmed his inappropriate behaviour had amounted to a breach of contract.

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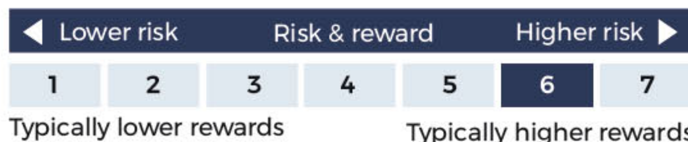

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