



Citi Global Wealth Investments

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CIO Strategy Bulletin

The Fear and Loathing of Inflation: Portfolio Impacts and Opportunities

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Summary

- In many respects, the American economy is in great shape; That's not what most Americans think. 74% say it is a good time to find a quality job, but 68% think the economy is getting worse. Their economic schizophrenia can be attributed to one issue: Inflation.
- For a consumer, inflation is a tangible, visceral problem. Robert J. Shiller's suggested that inflation causes people to lose confidence in their ability to "keep up" and to lose faith in their policymaker's ability to help them.
- Ironically, the good decisions made by governments during the pandemic are the very reason for the economic health of most Americans and, in part, are the cause of this temporary burst of severe inflation.
- In the past, large spikes in inflation have ended economic expansions. Looking ahead, we see very-solid gains in overall US employment, even as the balance sheets of households are improving. We believe incomes will stay ahead of temporary price shocks. In short, we continue to believe the recovery in US business and employment will outlast and outrun the inflation spike.
- Recent inflationary concerns and bond price responses have negatively impacted a variety of secular growth industries such as Fintech, Greentech, Medtech and Cyber-security. We don't believe these long-term growth opportunities will be significantly derailed by the levels of inflation we expect in the future. In particular, investments in Fintech are timely and anti-inflationary. Just how radical is the ongoing shift to Fintech? The total market cap of the largest US payments-focused fintech companies has now exceeded the entire Russell 2000 bank index.

The Inflation Paradox

In many respects, the American economy is in great shape. That's not what most Americans think.

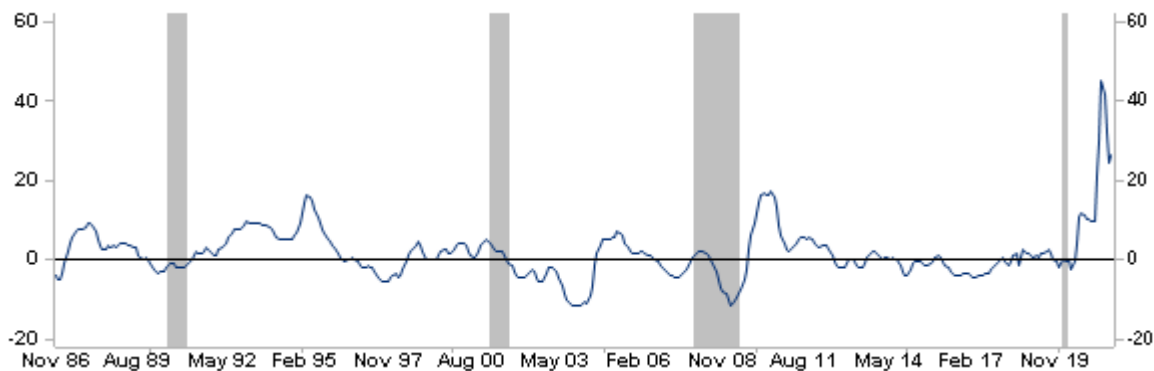
With households adding \$3.8 trillion in bank deposits since the end of 2019, unemployment falling to 4.6%, and average wages increasing by 4.2%, data suggest the job and wealth prospects of Americans are stronger than they have been for more than a decade. According to a recent Gallop poll, 74% say it is a good time to find a quality job.

At the same time, three-quarters of Americans rate current economic conditions as fair (42%) or poor (33%), with 68% saying the economy is getting worse (Gallop survey, 10/21). These awful survey numbers were last seen in 2010 when the average American had poor balance sheets and faced a still weak labor market.

The cause of this negative self-perception can be attributed to one issue: Inflation.

From an economist's standpoint, higher prices and higher wages often go hand in hand. But for a consumer, inflation is something that is happening to them. Inflation is a tangible, visceral problem. Rising prices, shortages of essentials and negative pandemic medical news are everyday issues. There are no easy fixes for any of them. And there is a randomness to the impact of inflation. If you need a used car today, inflation is a huge deal (**Figure 1**), even if your paycheck is up 10% or more.

Figure 1: US Consumer Price Index: Used Cars and Trucks Y/Y%



Source: Haver Analytics as of November 12, 2021. Note: Shaded regions denote recessions.

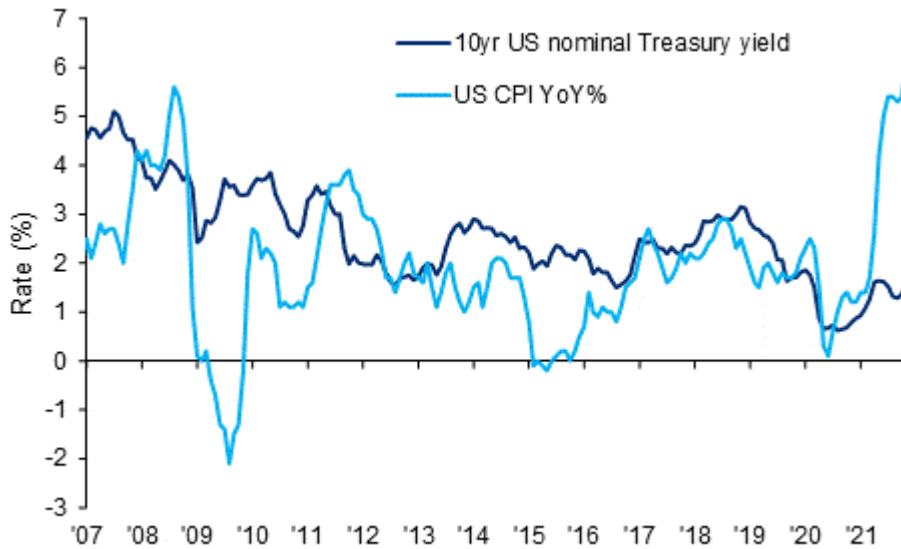
Robert J. Shiller, the 2013 Nobel Laureate, wrote in 1997 that inflation conjures “arbitrary injustice, arbitrary redistributions and social bitterness.” His research suggested that inflation causes people to lose confidence in their ability to “keep up” and to lose faith in their policymaker’s ability to help them.

How ironic is this? The good decisions made by governments during the pandemic are the very reason for the economic health of most Americans and, in part, are the cause of this temporary burst of severe inflation.

A Bit of Inflation History

Many people have said that the current rate of inflation is greater than we have seen in recent memory. Well, they may have short memories. Right before the Global Financial Crisis, we saw similarly high levels of inflation. The oil-led inflation surge of 2008 came just as housing-finance was collapsing, plunging what was a six-year-long economic expansion into crisis (**Figure 2**). That is certainly not the current situation as consumer and bank balance sheets are both healthy (please see our [CIO Bulletin of September 26](#)).

Figure 2: US Consumer Price Index and 10-Year US Treasury Yield (%)



Source: Haver Analytics through November 12, 2021. Past performance is no guarantee of future results. Real results may vary.

Typically surging inflation has arisen after excessive booms in the macro economy. In 1991, the jump in inflation associated with the first Persian Gulf War came after an eight-year expansion. Similarly, the OPEC embargo of late 1973 ended a record nine-year expansion. The recessions of 1980 and 1982 – periods of high inflation – were deliberately ended by double-digit interest rates delivered by the Fed. These periods are distinct from our current situation, too.

This Unprecedented Moment

The extent of the fiscal stimulus and central bank money printing in response to the pandemic was unprecedented (**Figure 3**). But the pandemic itself was a life-altering event that impacted everyone's sense of security. The aftershocks are reverberating still. Among them are global shortages as the world's consumers bid for scarce goods (**Figure 4**), fostering a sense of insecurity: expectations of future shortages can increase demand due to fears of paying more in the future. This is happening even as businesses are competing harder for labor, raising wages to attract workers back to unfilled positions, especially in service businesses. Both are clearly inflationary.

Figure 3: US Federal Government Spending (\$M): Covid Response Dwarfed the Global Financial Crisis

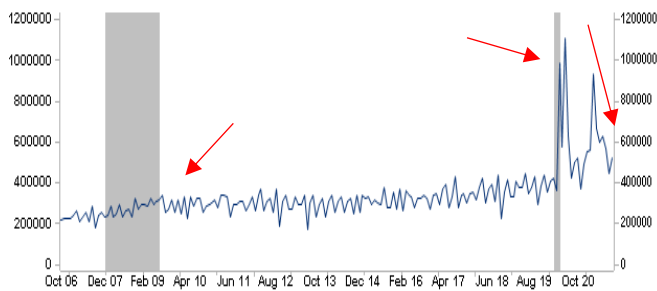
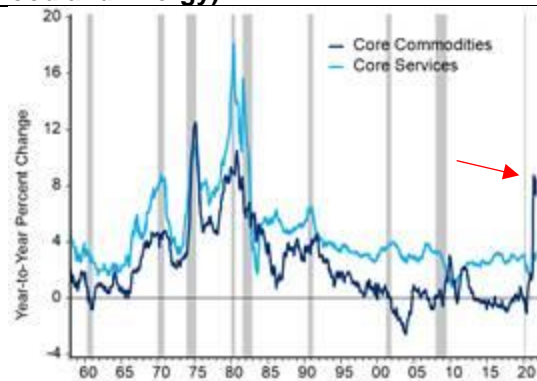


Figure 4: US Inflation: Goods vs Services (Ex-Food and Energy)



Source: Haver Analytics and FactSet as of November 10, 2021. Note shaded region denote recessions.

The Risk and Realities of Current Inflation

In the past, large spikes in inflation have ended economic expansions. The present 6.2% year/year gain in US inflation – which has sharply led DM and most of the Emerging World – is therefore a threat to this recovery (**Figure 5**). The risk is that the high inflation rate of the past year has altered consumer inflation expectations in a way that makes stability harder to achieve. For example, inflation affects the value of wages directly. The value of per-capita US real wages in the US are 1.2% *below* last year's levels. If that keeps up for a lengthy period, a recession could ensue.

In our opinion, a broader view of the US economy argues against the idea that the current bout of inflation will end this young expansion. For one, the fiscal spending binge is already moderating, as major pandemic payments were made in the US in 2020 and early 2021 (**Figure 6**). Similar steps around the Developed World resulted in a surge in household spending at a dramatically above-trend pace, but these are also “one off” events (**Figure 7**). At the same time, central banks are beginning to slow money creation.

We also see very-solid gains in overall US employment (please see our last [CIO Bulletin - November 7, 2021](#)) even as the balance sheets of households are improving. With US employment still four million people short of its early-2020 level and a record 10 million job openings on offer, we believe incomes and stay ahead of temporary price shocks (**Figure 8**). In short, we continue to believe the recovery in US business and employment will outlast and outrun this inflationary spike.

Figure 5: US Consumer Price Index Y/Y% and Periods of Recession



Figure 6: US Disposable Personal Income (Compensation + Government Transfer Payments Less Tax payments)



Source: Haver Analytics and FactSet as of November 10, 2021. Note: Shaded regions denote recessions.

Figure 7: Savings Rates Have Been Normalizing after the Covid Disruption/Stimulus Suggesting Waning Consumer Pressures

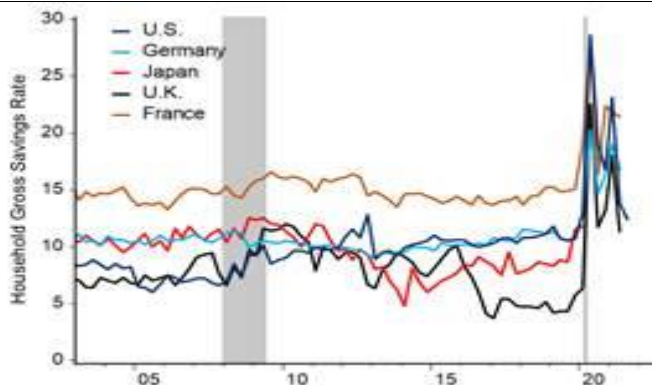
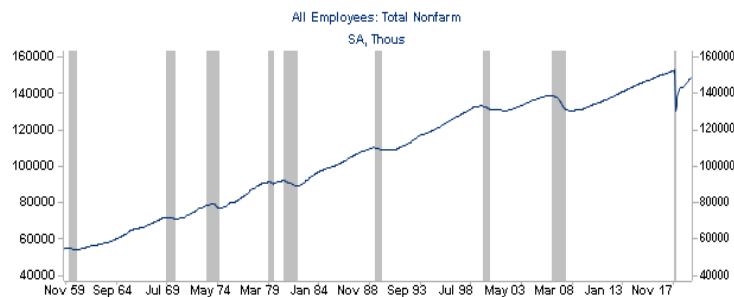


Figure 8: US Employment and Periods of Recession



Source: Haver Analytics and FactSet as of November 10, 2021. Note: Shaded regions denote recessions.

Positioning for Near Term vs. Long Term Inflation

We expect to see upward price pressures for the balance of 2021, though the rate of inflation will likely decline from recent levels. We have invested with this view in mind. Not only did we overweight Treasury Inflation Protected Securities coming into 2021, but we also doubled our overweight in March. However, negative real yields and weakening fuel for future inflation are gradually beginning to diminish the appeal of inflation-linked bonds. Here is one

reasons why: Crude oil futures priced for the end of 2022 are 15% below current quotes. This is typical after a surge in energy costs, when production responds to a profit opportunity. Even if oil merely stabilizes, energy costs will reduce US consumer price inflation by a full percentage point next year.

Though we think short term inflationary pressures will abate, we also believe elements of long-term inflation are gradually accelerating. In October, core services prices rose 3.2% from a year ago, the highest reading since 2008 (again, see **Figure 3**). This should be a warning to bond holders, as long-term US interest rates are 2 full percentage points lower than they were a decade ago. We expect inflation in the coming 10 years likely to be 0.7% higher than the interest on the 10-year as of 12/19 (**Figure 2**, again).

Inflation and Growth Equities

Our expectation for bond yields to reflect higher, long term inflation raises questions about the return prospects for growth-oriented investments. Short-term jumps in interest rates can lead to underperformance of secular growth sectors like clean energy (please see our last [CIO Bulletin - November 7, 2021](#)) and fintech. Nonetheless, we still believe these long-run themes will outperform due to their strong fundamentals and technological innovation. The likely winners and losers are detailed in **Figure 9**.

Figure 9: Groups and Styles Share Price Performance, Correlation to Movements in the US Yield Curve

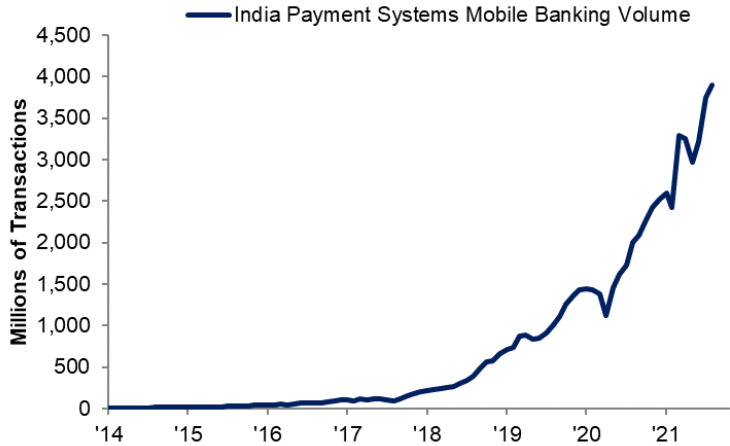
Index	Q1 '21 Performance	Implied YC Sensitivity (% of EPS after 2023)	Correlation to 3m10y	Rank	
Banks	15%	70%	0.39	1	↑ Outperform when yield curve steepens
Energy	18%	71%	0.00	2	
Diversified Financials	9%	81%	0.37	3	
Autos	5%	78%	0.16	4	
Capital Goods	9%	84%	0.15	5	
Insurance	7%	73%	0.23	6	
Materials	6%	75%	0.08	7	
Real Estate	6%	82%	-0.33	8	
Russell Value	11%	81%	0.21	9	
Global High Dividend	6%	71%	-0.10	10	
Semis	11%	86%	0.09	11	
Telecommunication Services	4%	75%	-0.07	12	
Consumer Durables & Apparel	2%	86%	0.02	13	
Div. Growers	9%	83%	0.04	14	
Media & Entertainment	7%	88%	0.02	15	
Transportation	7%	84%	0.09	16	
Consumer Services	5%	91%	-0.10	17	
Food Beverage & Tobacco	0%	83%	-0.29	18	
Health Care Equip & Svcs	2%	87%	-0.07	19	
Com & Prof Services	2%	89%	-0.28	20	
Food & Staples Retailing	0%	86%	-0.01	21	
Pharma Biotech & Life Sc	0%	83%	-0.12	22	
Utilities	1%	82%	-0.36	23	
HH & Personal Prod	-2%	88%	-0.20	24	
Tech Hardware & Equipment	-2%	85%	0.04	25	
Retailing	1%	89%	-0.03	26	
→ Fintech	3%	89%	-0.15	27	
Software & Services	0%	91%	-0.17	28	
Russell Growth	1%	90%	-0.09	29	
→ Clean energy	-14%	88%	-0.07	30	

Source: FactSet as of September 29, 2021. Note: Semis are Semiconductors. Indices are unmanaged. An investor cannot invest directly in an index. They are shown for illustrative purposes only and do not represent the performance of any specific investment. Index returns do not include any expenses, fees or sales charges, which would lower performance. Past performance is no guarantee of future results. Real results may vary.

Unstoppable Fintech

One area that mitigates inflation across the economy is Fintech. Fintech improves the delivery of financial services and broadens financial inclusion. Across many parts of Asia and Africa, payments are dominantly digital (**Figure 10**). The improvement in the customer experience remains the key driver of accelerating Fintech adoption. Digital payments are more convenient, faster, safer and more hygienic. Business no longer needs to worry about having cash on hand. In countries that lack the Western world's regulatory and governmental barriers, entire new financial ecosystems have been built with such speed and success that the term 'bank' has limited meaning.

Figure 10: India Mobile Banking Transaction Volumes



Source: Bloomberg as of November 12, 2021.

In prior decades, the West's strict regulation and capital requirements made it difficult to disrupt traditional financial services. Governments and regulators are now broadly supportive of wider Fintech adoption. From their point of view, an electronic trail makes it easier to manage tax collection and limits corruption. For businesses, accounting and inventory management is also made easier.

The Rise of Fintech Platforms

Initially, fintech companies focused on new activities such as peer-to-peer lending or point of sale transaction. Disruptors begin to eat into industry growth by targeting unfilled needs, while coexisting with the incumbents. But once they have achieved scale and established a reputation, digital innovators start competing head-to-head for the incumbent's core business revenues.

Fintech's takeover of retailing is a case in point. Using transactional data and their analytic capabilities, Fintech companies now offer loans to merchants, cross-sell inventory management and payroll services, provide digital wallets, and integrate "buy now, pay later" payment options for consumers.

Just how radical is the shift to Fintech? Try this: the total market cap of the largest US payments-focused fintech companies has now exceeded the entire Russell 2000 banks index (**Figure 11**).

Figure 11: Leading US Payment Companies Market Cap vs Large Cap and Small Cap US Banks

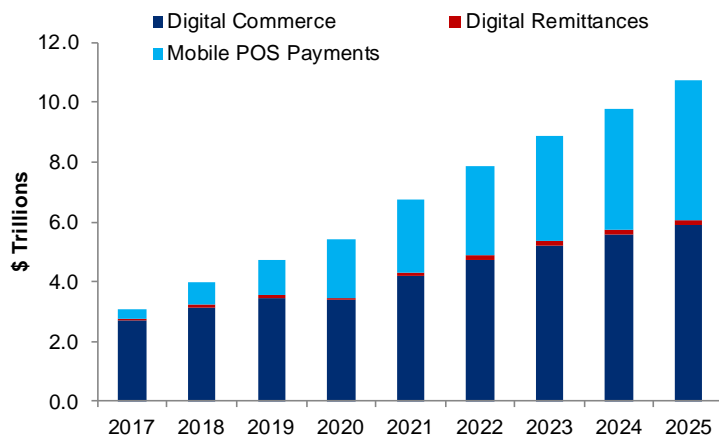


Source: Bloomberg as of November 12, 2021. Note: US Payments Fintech Companies include Paypal, Square, Fidelity National, Fiserv, Global Payments, and Fleetcor. Indices are unmanaged. An investor cannot invest directly in an index. They are shown for illustrative purposes only and do not represent the performance of any specific investment.

Preferring Payment Providers in Portfolios

Payments continues to be our preferred sub-sector for long-term exposure to Fintech. The economy moves on payments and the data each transaction provides is also highly valuable (**Figure 12**). The opportunity to further digitize business-to-business payments is just one example, as cash and checks still represent over 50% of American B2B payment flow. Ultimately, Fintech companies may become the infrastructure for banks and asset managers to modernize their aging IT infrastructures.

Figure 12: Expected growth in digital commerce and mobile payments



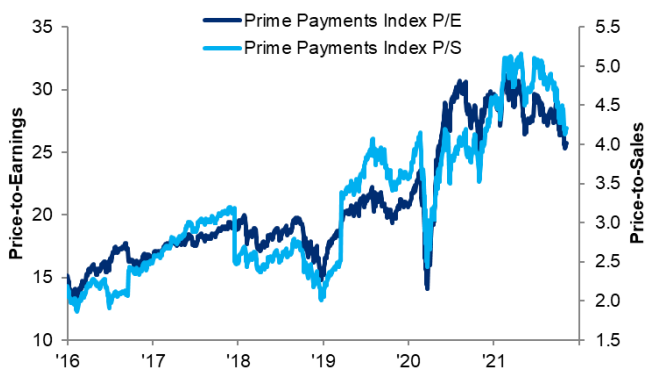
Source: Bloomberg as of November 12, 2021. Indices are unmanaged. An investor cannot invest directly in an index. They are shown for illustrative purposes only and do not represent the performance of any specific investment.

When to Buy Fintech...

Performance within the Fintech space has been mixed in recent months. Some segments like “buy-now pay later”, peer-to-peer lending and blockchain systems have rallied relentlessly. But in the more mainstream fintech spaces, like payments, equities are 10-30% since the beginning of September. A confluence of factors, from a Department of Justice investigation into Visa’s relationships with payment firms, a moderation in growth after the pandemic and idiosyncratic concerns about the long-term strategy of one of the largest payment players all contributed to the recent selloff.

Valuations in the payments space trade well above pre-pandemic multiples (**Figure 13**). However, we believe investors should calibrate their assessment of valuations to the level of growth being delivered by a given company. We see the larger platform companies as most able to leverage their massive user bases to cross-sell other higher-margin products, while also seeking bolt-on acquisitions of smaller players in adjacent industries like mobile investing, lending, and e-commerce.

Figure 13: Payments valuations since 2016

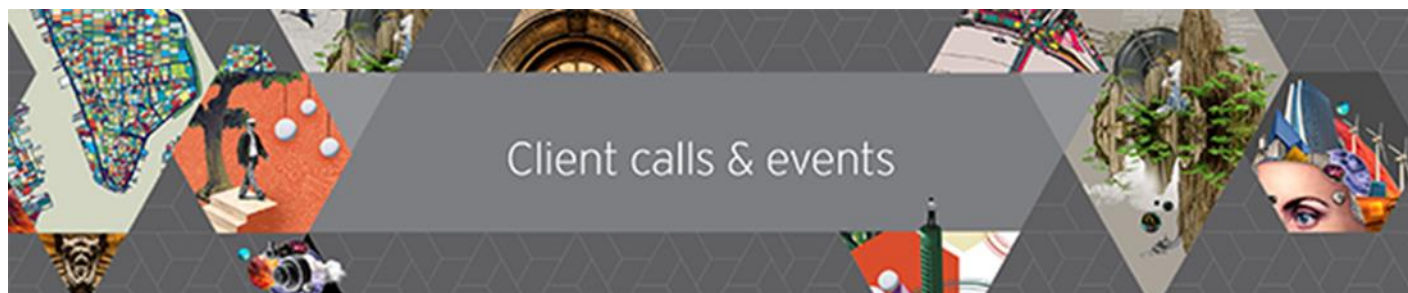


Source: FactSet as of November 12, 2021. Indices are unmanaged. An investor cannot invest directly in an index. They are shown for illustrative purposes only and do not represent the performance of any specific investment. Past Performance Disclosure: Past performance is no guarantee of future results. Real results may vary.

Conclusion

Inflation has been with us as long as there has been money. Outright deflation has been rare, and governments know much better how to inflate (weakening the value of money) than to manage long-term structural challenges. The degree to which inflation rises and falls is a major factor for consumers and impacts their behavior and confidence levels significantly. Our expectation is that the last decade's inflation rate - just below 2% and the lowest since the 1930s – marked a secular low point. We expect somewhat higher levels of inflation in the decade to come. That said, the present burst of inflation is largely due to the extraordinary measures taken by governments to ensure the safety of individuals and businesses during the pandemic.

Recent inflationary concerns and bond price responses have negatively impacted a variety of secular growth industries such as Fintech, Greentech, Medtech and Cyber-security. We don't believe these long-term growth opportunities will be significantly derailed by the levels of inflation we expect in the future.



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