Japan

Forex Market View

Will yen weaken or strengthen following inversion of Treasury yield curve?

- Concerns over economic slowdown are behind decline in US long-term rates
- The yen has weakened against the dollar following previous yield curve inversions
- Will it be different this time and the USD/JPY decline?

USD/JPY forecast range (latest: noon New York time)

28 Mar- 26 Apr: Y108.0-112.0/\$ (Y110.37/\$ as of 27 Mar)

Forex Market View DSFE223

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Daiwa Securities Co. Ltd.



Concerns over economic slowdown are behind decline in US long-term rates

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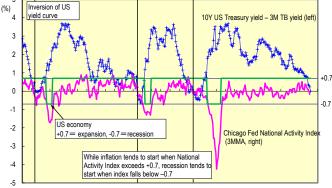
The 10-year Treasury yield falling below the 3-month TB yield for the first time in 12 years, dating back to 2007, can probably be attributed to low inflation globally and the decline in long-term rates brought by the accommodative monetary environment, but concern over a US economic slowdown is probably also a factor. The US economy peaked in August 1990, 15 months after the US yield curve inverted in May 1989, and again in April 2001, nine months after the yield curve inverted in July 2000. During the previous economic expansion (which had a temporary inversion of the yield curve in Jan-Feb 2006), the economy peaked in January 2008, 18 months after the yield curve inverted in July 2006. Although we acknowledge the possibility of the US entering a recession, it is unclear whether it will actually do so. It does appear, however, that the market has begun pricing in the possibility of an economic contraction in the US in response to recent signs of an economic slowdown both in the US and globally.

US economic growth has dropped below its long-term trend

One common element across past episodes is that the yield curve inverted once US economic growth dropped below its long-term trend. The three-month moving average of the Chicago Fed National Activity Index (CFNAI) during the month prior and the month of yield inversion was -0.18 and -0.32 in 1989, +0.07 and -0.31 in 2000, and -0.05 and -0.18 in 2006, hence in every instance the index either turn negative or move deeper into negative territory. This time around also, the index was 0.00 two months prior (January 2019) and -0.18 the previous month (February). Looking instead at the US ISM manufacturing index (revised) the month before and month of inversion, it was 52.2 and 49.3 in 1989, 51.4 and 52.5 in 2000, and 52.0 and 53.0 in 2006, whereas it is a bit higher this time around, 56.6 in January and 54.2 in February. This is far from the 42.9 level equivalent to zero real GDP growth and not even close to conditions conducive to negative growth.

ISM Manufacturing Index

Chart: Difference Between US Short-term and Long-term Rates, National Activity Index, and US Economic Cycle



88 89 90 91 92 93 94 95 96 97 98 99 00 01 02 03 04 05 06 07 08 09 10 11 12 13 14 15 16 17 18 19 Source: Thomson Reuters; compiled by Daiwa Securities.

68 (%) 10Y US Treasury vield – 3M TB v 63 3 58 2 53 48 0 43 -1 US ISM manufacturing index 38 Inversion of US (right) yield curve 33 88 89 90 91 92 93 94 95 96 97 98 99 00 01 02 03 04 05 06 07 08 09 10 11 12 13 14 15 16 17 18 19

Chart: Difference Between US Short-term and Long-term Rates and

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The US economy is therefore neither rapidly decelerating nor on the verge of entering a recession, although growth is dropping below its long-term trend. This leaves open the possibility of the Treasury yield curve remaining inverted or becoming more deeply inverted.

The yen has weakened against the dollar following previous yield curve inversions

In past episodes, the yen has weakened against the dollar following inversion of the yield curve. The USD/JPY rose by 27 during the 12-month period from the beginning of May 1989 until end-April 1990, rose by 29 during the 19-month period from July 2000 until end-January 2002, and rose by 10 during the 12-month period from July 2006 until end-June 2007. What explains this weakening of the yen against the dollar following yield curve inversion? We propose the following as possible reasons.

Yen weakening on Japan's capital flight and bubble collapse

The yen has weakened

against the dollar following previous yield

curve inversions

In 1989, the exodus of capital from Japan brought by outward investment in securities and foreign direct investment weakened the yen, while a temporary improvement in US economic indicators strengthened the dollar. In 1990, there was a sharp drop in Japanese stocks amid a rise in Japan's long-term rate, while long-term rates and share prices in the US remained firm. Meanwhile, the collapse of Japan's economic bubble caused investors to shy away from holding yen assets. The worsening of Japan's fundamentals relative to those of other countries provoked yen selling and pushed the USD/JPY higher.

Yen depreciation on concerns over Japan's economy deteriorating combined with risk-off dollar appreciation From 2000 until 2002, the collapse of the IT bubble in the US caused share prices and long-term rates to decline in both the US and Japan. In 2001, Japan and the US entered a recession and the Fed cut rates. The yen weakened further against the dollar despite the Japan/US rate spread narrowing in a risk-off environment. At the time, the yen's value was vulnerable to changes in Japan's fundamentals, and concerns over Japan's economy weakening led to declines in Japanese stocks, interest rates, and the yen. Additionally, as the world's reserve currency the dollar tended to be bought when markets went risk-off, and other factors supporting dollar buying included the dollar having remained on a strengthening trend since 1995, when then US Treasury Secretary Robert Rubin said that a strong dollar was good for the US, and the euro having weakened before it began circulating in 2002.

Risk-on yen depreciation amid global economic growth

From 2006 until 2007, strong global economic growth, including in the BRICs and other emerging markets, created conditions conducive to rising share prices. With US economic indicators only worsening slightly, the Fed stopped its rate hikes, and the decline in US long-term rates that followed accelerated the upward trend in US stocks. This expanded the yen carry trade, where the yen's low interest rate made it an attractive funding currency. There was an increase in not only cross-yen rates but also the USD/JPY.

S&P 500 Index

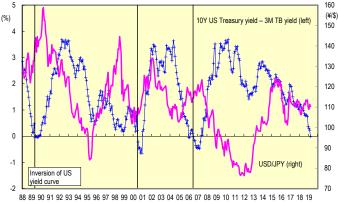
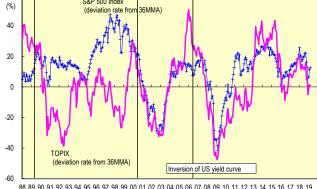


Chart: Difference Between US Short-term and Long-term Rates and Chart: Stock Prices in US and Japan (deviation rate from 3YMA) USD/JPY

60



Source: Thomson Reuters; compiled by Daiwa Securities.

88 89 90 91 92 93 94 95 96 97 98 99 00 01 02 03 04 05 06 07 08 09 10 11 12 13 14 15 16 17 18 19 Source: Thomson Reuters; compiled by Daiwa Securities.



Reasons why the USD/JPY is unlikely to rise as it has in the past

Will it be different this time and the USD/JPY decline?

The question is whether the USD/JPY will again rise following inversion of the Treasury curve. We think the yen is unlikely to weaken against the dollar as it has in the past for the following reasons.

- Japan's financial account capital outflows brought by outward investment in securities • and FDI is not increasing relative to its current account capital inflows, which are driven primarily by Japan's income account.
- There is unlikely to be a sustained improvement in US economic indicators that causes the dollar to appreciate.
- There is unlikely to be a relative weakening of Japan's fundamentals that causes the • yen to depreciate.
- Japan's long-term rates have remained low for an extended period with little volatility, • making it less likely that the yen's value will be affected by Japan's fundamentals.
- The yen is unlikely to weaken even if Japan's interest rates decline, whereas it is likely to strengthen if overseas interest rates decline and narrow the spread with Japan rates.
- . Although the dollar tends to be bought during risk-off moves, the yen tends to be bought even more.
- The Trump administration's protectionist trade stance creates opportunities for it to put • a brake on dollar strength and Fed rate hikes, making sustained dollar buying less likely.
- There are no factors triggering a shift into dollars (dollar appreciation) like the weakening of the euro when it began circulating.
- Because economic growth in emerging markets has been weak, even a decline in • long-term rates sparked by a halt to Fed rate hikes is unlikely to push share prices higher and trigger risk-on yen depreciation.
- If US economic data worsens, it is likely to amplify concerns over a global economic slowdown and trigger risk-off yen appreciation.

Will it be different this time and the USD/JPY decline?

Japan

If there are any risk-on catalysts, it should pause the decline in US long-term rates, push share prices higher, and lead to an increase in the USD/JPY. With economic indicators both globally and in the US in a worsening trend, however, US long-term rates are in a declining trend, making inverted yields more likely. Risk-on yen depreciation is temporary, while risk-off yen appreciation is more likely. Unlike before, after inversion of the Treasury yield curve we think the USD/JPY is likely to decline.

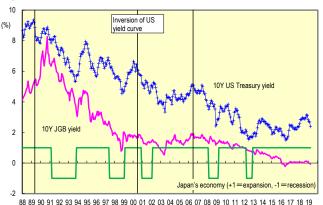
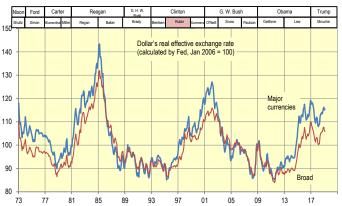


Chart: Dollar's Real Effective Exchange Rate and List of US Chart: Japan's Economic Cycle and Long-term Rates in US and **President and Treasury Secretary**



Source: Thomson Reuters: compiled by Daiwa Securities.

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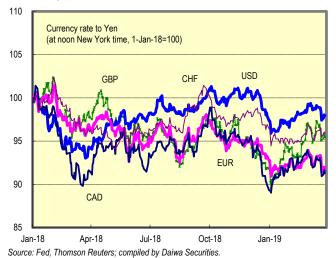


Chart: Major Currencies/JPY FX Index

Chart: EM Currencies/JPY FX Index

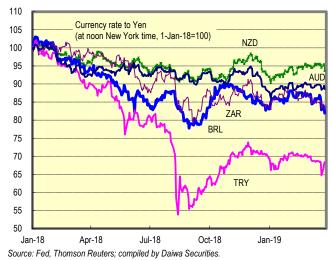


Chart: Currency Exchange Rate Forecasts

	Actual		Forecast				
	28 Sep	31 Dec	Jan-Mar	Apr-Jun	Jul-Sep	Oct-Dec	Jan-Mar
	2018	2018	2019	2019	2019	2019	2020
USD-JPY	113.7	110.3	110.0	110.0	107.0	105.0	105.0
			104-113	104-113	104-112	101-110	101-110
EUR-JPY	131.9	126.3	124.0	125.5	121.0	118.0	118.0
			118-128	118-130	117-129	115-127	115-127
AUD-JPY	82.1	77.7	77.0	78.0	75.0	72.5	72.5
			73-81	73-82	72-81	70-79	70-79
CAD-JPY	88.0	81.0	81.5	82.0	79.5	77.5	77.5
			78-86	77-86	76-85	74-83	74-83
NZD-JPY	75.2	74.0	74.0	75.0	72.0	69.5	69.5
			70-78	69-78	69-78	66-75	66-75
TRY-JPY	18.8	20.9	20.0	21.0	19.5	18.5	18.5
			17-22	17-22	17-22	16-21	16-21
ZAR-JPY	8.0	7.7	7.6	7.9	7.4	7.0	7.0
			7.2-8.3	7.0-8.3	7.0-8.3	6.7-8.0	6.7-8.0
BRL-JPY	28.1	28.5	28.5	30.0	27.5	26.5	26.5
			26-31	26-31	26-31	25-30	25-30
KRW-JPY	10.2	9.9	9.7	9.8	9.4	9.2	9.2
(100 KRW)			9.2-10.0	9.1-10.1	9.1-10.1	8.8-9.8	8.8-9.8
CNY-JPY	16.5	16.1	16.3	16.5	15.8	15.3	15.3
			15.2-16.8	15.5-17.0	15.5-17.0	15.0-16.5	15.0-16.5

Source: BIS, Fed, Thomson Reuters; compiled by Daiwa Securities. Notes: 1) Actual shows market rates at noon NY time. 2) Forecast upper row; as of quarter end, lower row; range during quarter.



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Credit Rating Agencies

[Standard & Poor's]

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[Moody's]

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[Fitch]

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• In addition to the purchase price of a financial instrument, our company will collect a trading commission* for each transaction as agreed beforehand with you. Since commissions may be included in the purchase price or may not be charged for certain transactions, we recommend that you confirm the commission for each transaction. In some cases, our company also may charge a maximum of \$ 2 million (including tax) per year as a standing proxy fee for our deposit of your securities, if you are a non-resident.

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• There is a risk that you will incur losses on your transactions due to changes in the market price of financial instruments based on fluctuations in interest rates, exchange rates, stock prices, real estate prices, commodity prices, and others. In addition, depending on the content of the transaction, the loss could exceed the amount of the collateral or margin requirements.

• There may be a difference between bid price etc. and ask price etc. of OTC derivatives handled by our company.

• Before engaging in any trading, please thoroughly confirm accounting and tax treatments regarding your trading in financial instruments with such experts as certified public accountants.

* The amount of the trading commission cannot be stated here in advance because it will be determined between our company and you based on current market conditions and the content of each transaction etc.

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