TREASURY AND FEDERAL RESERVE FOREIGN EXCHANGE OPERATIONS

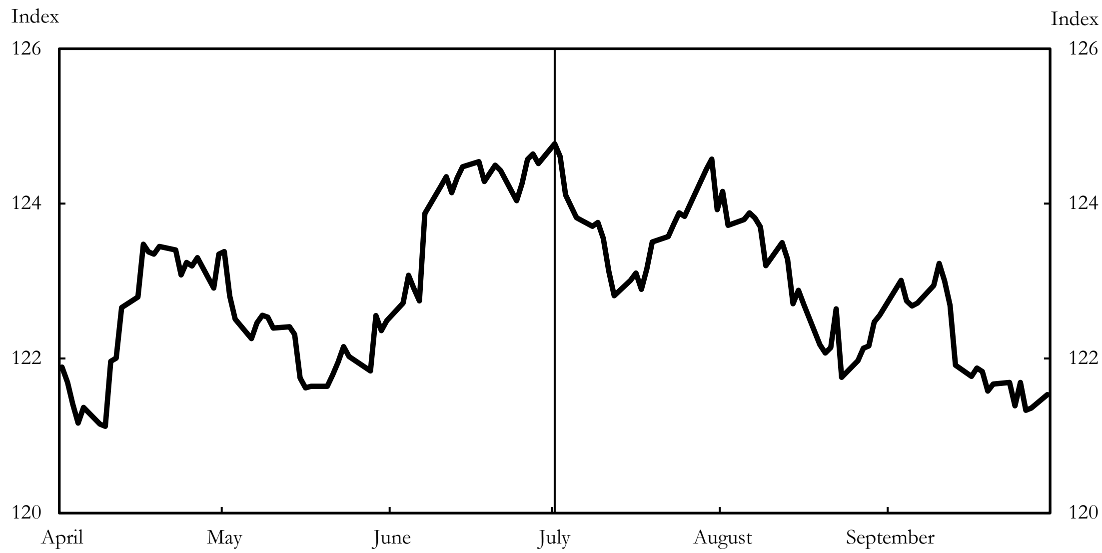
July - September 2024

During the third quarter of 2024, the U.S. dollar, as measured by the Federal Reserve Board's broad trade-weighted dollar index, depreciated 2.4 percent on net. Advanced economy currencies accounted for most of the broad dollar move as the dollar was mixed against major emerging market currencies. The dollar was primarily driven by a notable downward repricing of the Federal Reserve's path of policy and a decline in Treasury yields amid U.S. economic data that was seen as suggestive of a softening in labor market conditions amid continued disinflation. In addition, a sharp unwind of crowded foreign exchange positions and associated volatility in global markets in early August contributed to dollar depreciation. On net over the quarter, the dollar depreciated against most major currencies, including by 10.7 percent against the Japanese yen, while appreciating 7.5 percent against the Mexican peso. The Federal Reserve and U.S. Treasury did not intervene in foreign exchange markets during the quarter.

This report, presented by Roberto Perli, Federal Reserve Bank of New York System Open Market Account Manager, describes the foreign exchange operations of the U.S. Department of the Treasury and the Federal Reserve System for the period from July through September 2024. Rosie Levy was primarily responsible for preparation of the report.

Chart 1

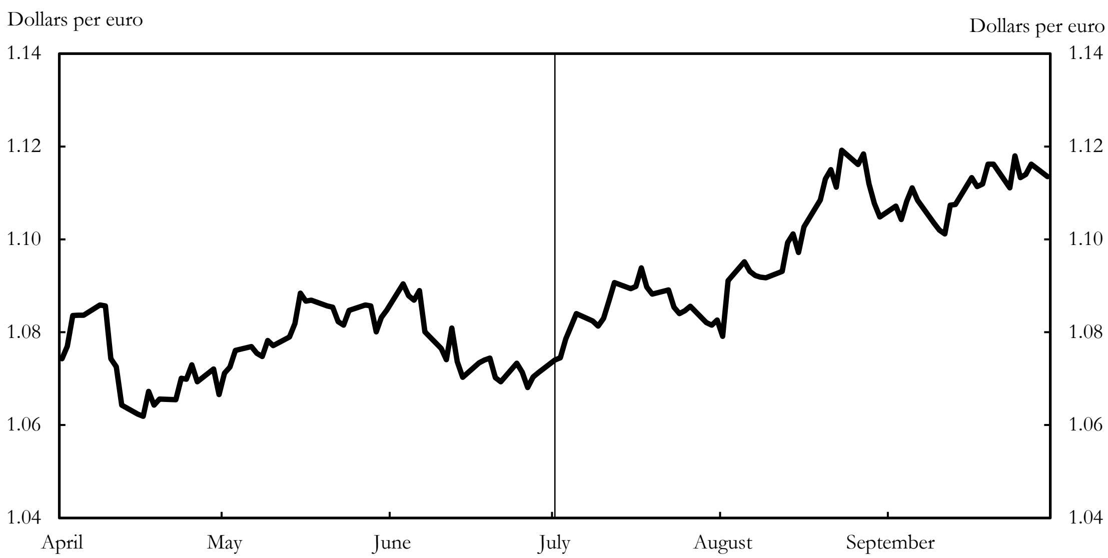
BROAD TRADE-WEIGHTED U.S. DOLLAR INDEX



Sources: Board of Governors of the Federal Reserve System; Bloomberg L.P.

Chart 2

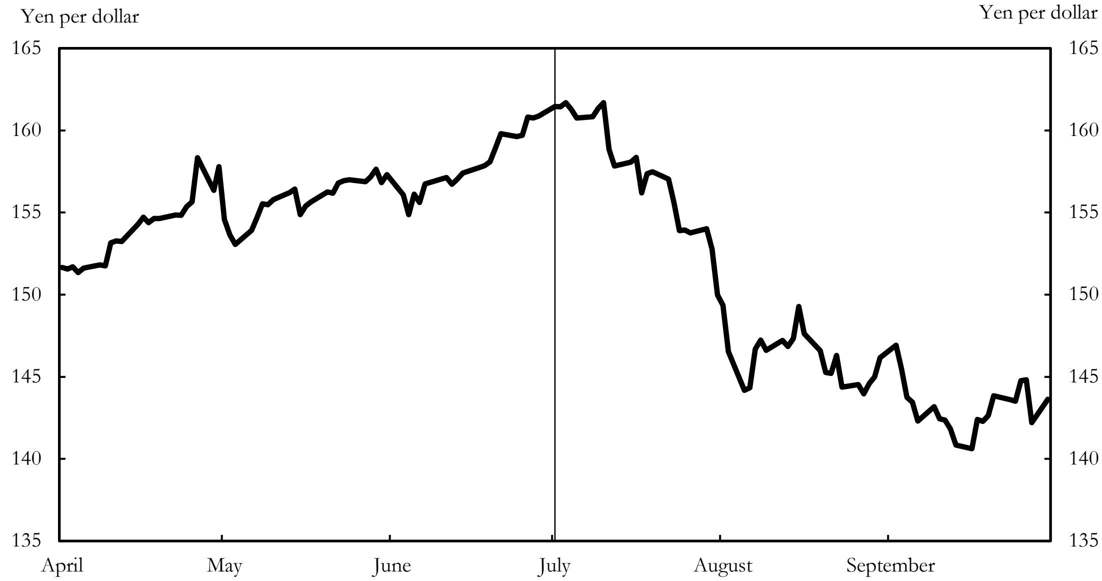
EURO–U.S. DOLLAR EXCHANGE RATE



Source: Bloomberg L.P.

Chart 3

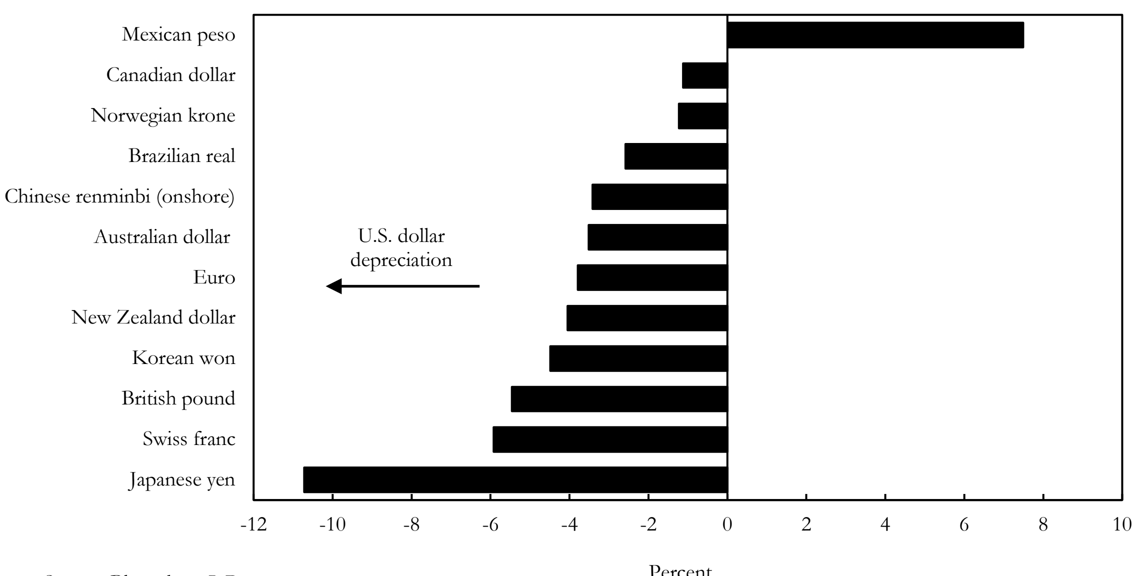
U.S. DOLLAR−YEN EXCHANGE RATE



Source: Bloomberg L.P.

Chart 4

U.S. DOLLAR PERFORMANCE AGAINST ADVANCED AND EMERGING MARKET CURRENCIES DURING THE THIRD QUARTER



Source: Bloomberg L.P.

U.S. DOLLAR DEPRECIATES ON PERCEIVED SIGNS OF LABOR MARKET WEAKENING AND CARRY TRADE UNWINDS

During the third quarter of 2024, the U.S. dollar, as measured by the Federal Reserve Board's broad trade-weighted dollar index, depreciated 2.4 percent on net. Advanced economy currencies accounted for the majority of the move as the dollar was mixed against major emerging market currencies. The dollar was primarily driven by a notable downward repricing of the Federal Reserve's path of policy and a decline in Treasury yields amid U.S. economic data that was seen as suggestive of a softening in labor market conditions. Market participants also noted that dollar depreciation was partially driven by a broad unwinding of carry trades following volatility in foreign exchange and broader financial markets in August, which resulted in notable appreciation of popular funding currencies against the dollar, particularly the Japanese yen.[1]

U.S. economic data prints during the quarter were broadly interpreted as indicating that labor market conditions were softening more rapidly than previously expected while inflation continued to decelerate. Labor market data were in particular focus, following comments from Federal Open Market Committee (FOMC) members that were viewed as indicating a shift in risks away from higher inflation scenarios and toward softer labor market scenarios. After a modest downward surprise in June, nonfarm payrolls data for July printed notably below expectations and the unemployment rate rose by more than expected, driving a discrete decline in Treasury yields and broad dollar depreciation in early August. Market participants interpreted these data as signaling a notable weakening in labor market conditions and reinforcing growing concerns of a U.S. recession. These concerns receded somewhat in subsequent weeks, following economic data that were viewed as indicative of a more gradual softening in labor market conditions and contributed to modest increases in the broad trade-weighted dollar index.

Against this backdrop, the dollar continued to depreciate modestly amid an increase in Federal Reserve rate cut expectations and notable declines in Treasury yields. At its September policy meeting, the FOMC cut the federal funds target range by 50 basis points, the first rate cut since March 2020. Although a rate cut was widely expected, expectations had been divided between a cut of either 25 or 50 basis points. However, the net impact on the dollar was modest, as market participants instead focused on the Summary of Economic Projections (SEP), broadly viewing the indication in the SEP of slightly less than expected easing in future years as consistent with a resilient growth outlook. On net over the quarter, implied yields from federal funds futures for December 2024 declined by 65 basis points and nominal two-year Treasury yields fell by 111 basis points.

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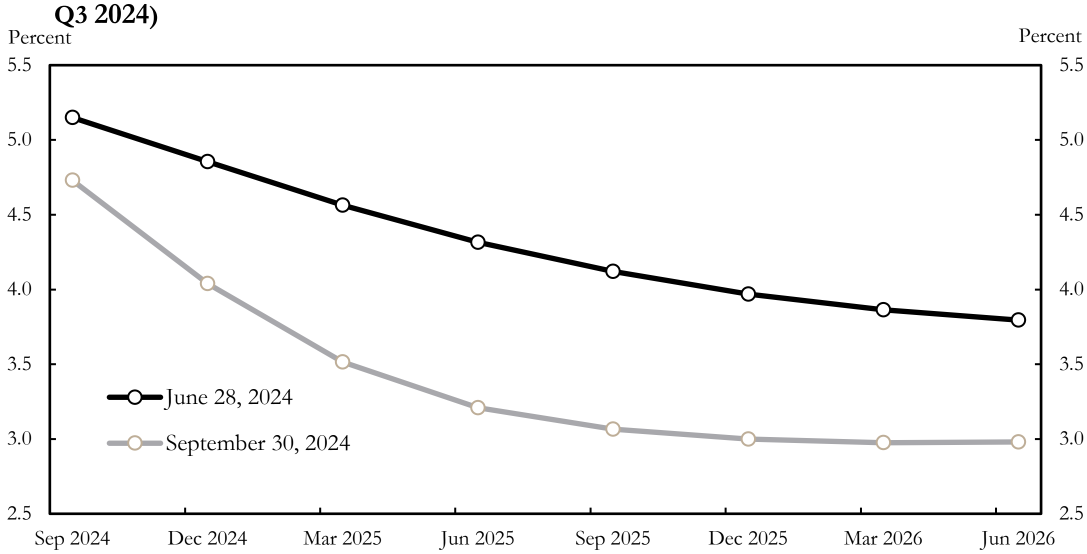
[1] While market participants can use the term "carry trade" to describe a broad range of trades, the typical foreign exchange carry trade is a speculative yield-seeking strategy that involves borrowing in lower-yielding currencies (known as funding currencies) to invest in higher-yielding (target) currencies. Carry trades are reliant on foreign exchange volatility remaining subdued and can be exited quickly if volatility and associated risk rises.

Following the below-expectations nonfarm payrolls data in early August, investors began to unwind crowded positions amid a sharp increase in volatility across global markets, including foreign exchange carry trades. The dollar depreciated notably against popular funding currencies, including the Japanese yen and Swiss franc, while appreciating against target currencies such as the Mexican peso.

Chart 5

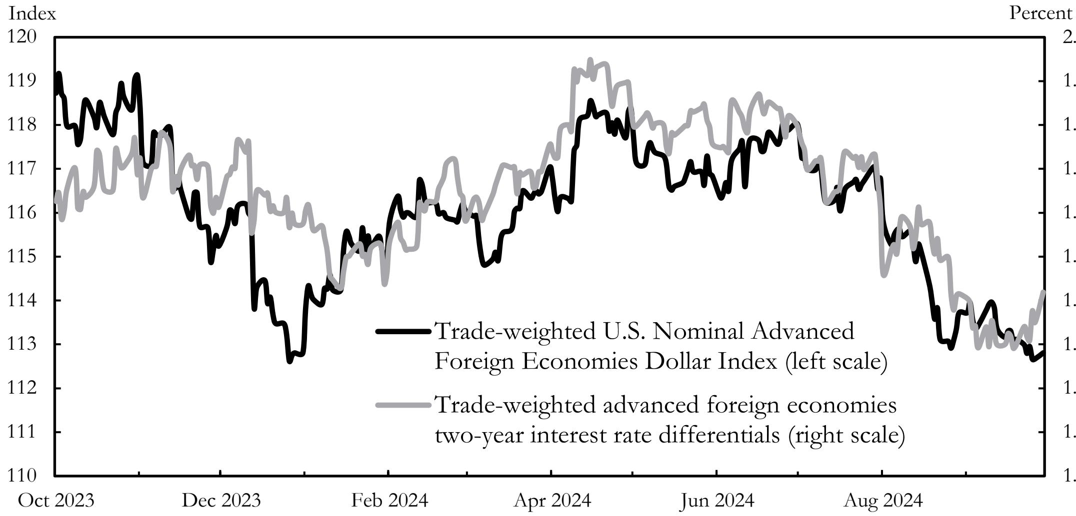
SOFR FUTURES-IMPLIED PATH OF FOMC POLICY (Q2 2024 VERSUS Q3 2024)



Source: Bloomberg L.P.

Chart 6

U.S TRADE-WEIGHTED ADVANCED FOREIGN ECONOMIES DOLLAR INDEX AND TWO-YEAR INTEREST RATE DIFFERENTIALS



Sources: Bloomberg L.P.; New York Fed staff calculations.

U.S. DOLLAR DEPRECIATES AGAINST JAPANESE YEN AMID ELEVATED VOLATILITY AND UNWIND OF YEN-FUNDED CARRY TRADES

In the third quarter, the dollar depreciated 10.7 percent against the Japanese yen amid growing rate increase expectations for the Bank of Japan (BOJ) and below-expectations U.S. labor market data that drove a decline in the market-implied path of Federal Reserve policy and intensified U.S. recessionary concerns. Both drivers contributed to a notable narrowing of interest rate differentials and increases in volatility across global equity and foreign exchange markets, culminating in a sharp unwind of short yen positioning against the dollar in August.

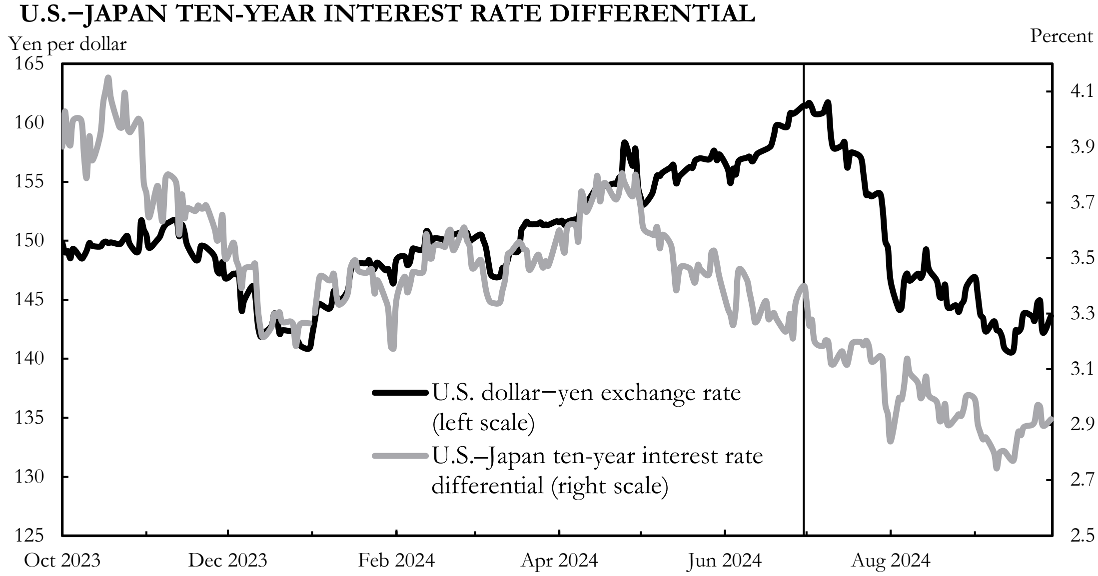
On July 30, the BOJ raised its policy rate by 15 basis points to around 0.25 percent and announced it would gradually reduce its monthly Japanese government bond purchases from about 6 trillion yen to about 3 trillion yen by March 2026. Market participants viewed the decision and associated communications as less accommodative than anticipated, and market pricing for the BOJ's path of policy moved modestly upward. Meanwhile, on July 31, the Federal Reserve left the federal funds target range unchanged at 5.25 to 5.50 percent, while remarks during the Chair's press conference were viewed as solidifying expectations for a rate cut at the September FOMC meeting. Following both central bank meetings, U.S.–Japan interest rate differentials narrowed, and the dollar depreciated around 2 percent against the yen on net.

The yen appreciated further following the weaker-than-expected U.S. Employment Situation Report on August 2, which prompted some concerns of a U.S. recession, driving a sharp decline in equities and a spike in volatility across global asset classes alongside further narrowing in rate differentials. Amid a deterioration in risk sentiment and significantly elevated volatility, market participants reported a broad unwinding of crowded positions, including long Japanese equities, long U.S. technology equities, and short Japanese yen positions against the dollar. Speculative yen carry trades, involving the selling of yen to fund the purchase of dollars and other currencies, had been a popular strategy amid persistently wide rate differentials, subdued implied volatility, and ongoing yen depreciation through the first half of 2024.

The yen had been the most popular funding currency for foreign exchange carry trades and thus it experienced the most significant appreciation against the dollar in August, while other funding currencies, including the Swiss franc, appreciated more modestly. Consistent with reports of the yen's use as a funding currency, Commodity Futures Trading Commission (CFTC) data showed historically elevated short yen speculative positioning against the dollar through July followed by a sharp reversal in early August. At the end of September, CFTC data indicated that speculative yen positioning was modestly long against the dollar. Implied volatility on the dollar–yen pair rose notably in the first week of August before stabilizing in the following weeks, although at higher levels in comparison to the first half of 2024.

Chart 7

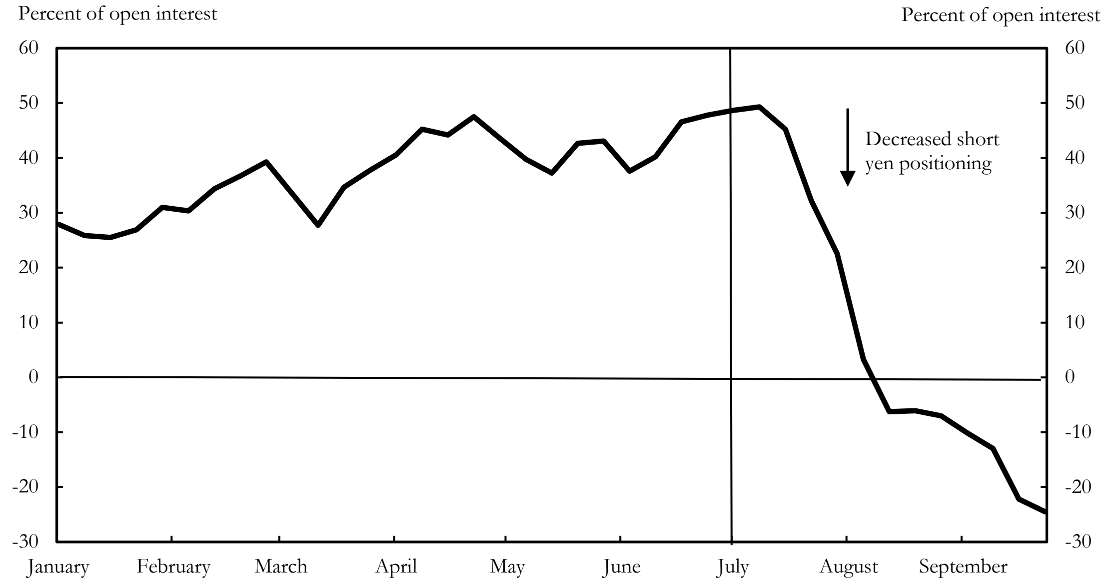
U.S. DOLLAR−YEN EXCHANGE RATE AND U.S.−JAPAN TEN-YEAR INTEREST RATE DIFFERENTIAL



Source: Bloomberg L.P.

Chart 8

U.S. DOLLAR NET LONG POSITIONING AGAINST JAPANESE YEN



Sources: Commodity Futures Trading Commission; Bloomberg L.P.

EURO APPRECIATES AMID NARROWING INTEREST RATE DIFFERENTIALS AND BROAD DOLLAR DEPRECIATION

The dollar depreciated 3.8 percent against the euro, despite euro area economic data that suggested a weaker economic outlook and downward revisions to growth expectations over the quarter. Market participants cited narrowing U.S.–euro area interest rate differentials and broader dollar depreciation as the primary drivers, in addition to the receding of perceived political risks following the French parliamentary elections early in the quarter.

Against this backdrop, the European Central Bank (ECB) reduced its policy rate by 25 basis points at its September meeting, as was widely expected by market participants. Contacts were attentive to accompanying macroeconomic projections that showed slight downward revisions to growth and small upward revisions to core inflation in 2024 and 2025. Communications from ECB policymakers early in the quarter were viewed as reinforcing a data-dependent approach, while comments later in the quarter were interpreted as raising the likelihood of a subsequent policy rate cut in October and a faster pace of cuts thereafter. On net, U.S.–euro area two-year rate differentials narrowed by around 35 basis points, driven primarily by larger declines in Treasury yields.

U.S. DOLLAR APPRECIATES AGAINST MEXICAN PESO, DEPRECIATES AGAINST CHINESE RENMINBI AMID CARRY TRADE UNWINDS, POLITICAL UNCERTAINTY, AND STIMULUS EFFORTS

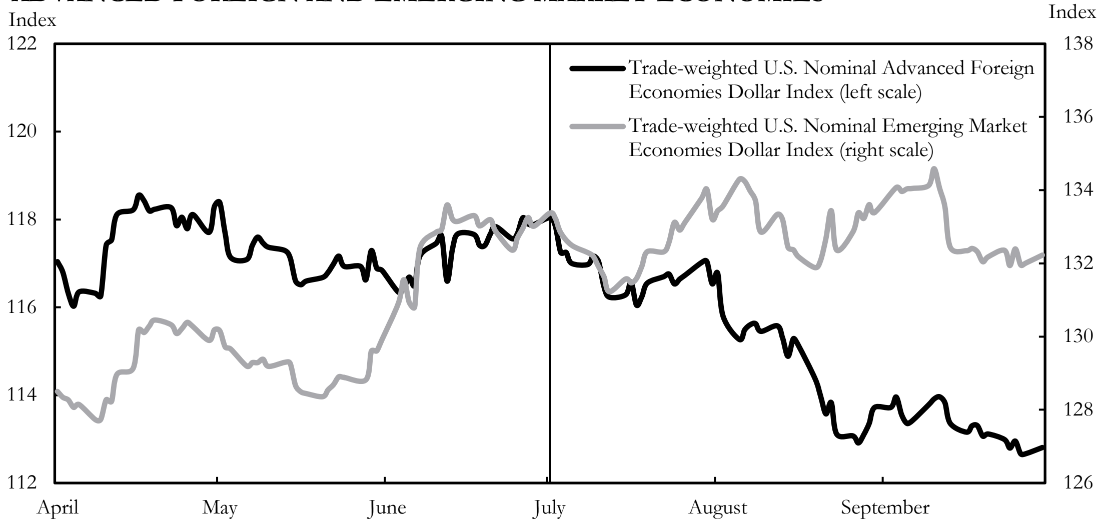
The dollar depreciated 0.6 percent against emerging market currencies during the third quarter, as measured by the Federal Reserve's trade-weighted Emerging Market Economies Dollar Index. Dollar performance was mixed across emerging market currencies, driven by the unwinding of crowded foreign exchange carry trades, broad dollar depreciation, and local idiosyncratic developments in Mexico and China.

The dollar appreciated 7.5 percent against the Mexican peso amid the unwind of foreign exchange carry trades and elevated uncertainty among market participants about the investment environment in Mexico, continuing the trend of peso depreciation that began in the prior quarter. Market participants continued to highlight concerns around political developments following the stronger-than-expected national election result for Mexico's ruling party in the prior quarter and, in particular, the potential implications of its proposed judicial reforms for the investment environment. Prior to the third quarter, the peso was a popular target currency for carry trades amid comparatively high domestic interest rates in Mexico and generally subdued implied volatility. As these positions were unwound amid elevated volatility in early August, the peso depreciated notably against the dollar. Implied volatility in the dollar–peso pair rose notably in August before retracing to end the quarter slightly higher on net. The dollar depreciated 2.6 percent against the Brazilian real and 4.4 percent against the Chilean peso, which contacts partially attributed to optimism around the growth outlook in China and associated impacts on industrial commodities.

The dollar depreciated 3.4 percent against the Chinese renminbi, driven by the unwind of renminbi-funded carry trades and the announcement of a range of monetary and regulatory easing measures by officials in September. Market participants suggested that renminbi appreciation following the stimulus announcements was primarily driven by positive growth sentiment and associated equity market increases, offsetting depreciation pressures associated with policy rate cuts. The dollar also depreciated against the currencies of other Asian economies, including 12.6 percent against the Malaysian ringgit and 12.3 percent against the Thai baht, primarily driven by broad dollar depreciation and idiosyncratic local developments.

Chart 9

U.S. TRADE-WEIGHTED DOLLAR PERFORMANCE VERSUS ADVANCED FOREIGN AND EMERGING MARKET ECONOMIES

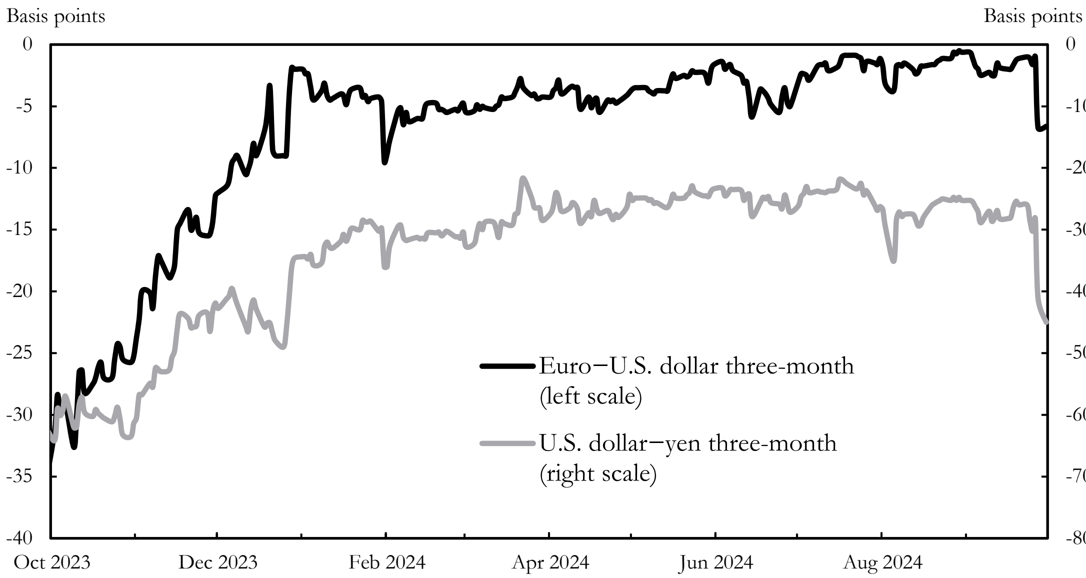


Sources: Board of Governors of the Federal Reserve System; Bloomberg L.P.

OFFSHORE U.S. DOLLAR FUNDING CONDITIONS REMAIN STABLE

Global offshore dollar funding conditions in the foreign exchange swap market were generally stable over the quarter. Short-tenor swap basis spreads widened temporarily amid elevated cross-market volatility in early August before retracing in the following days. Three-month spreads temporarily widened again at the end of the quarter due to year-end effects, but the widening was of a lesser magnitude than was observed over the same period in the prior year.

Chart 10
FOREIGN EXCHANGE THREE-MONTH SWAP-IMPLIED BASIS SPREADS



Source: Bloomberg L.P.

U.S. DOLLAR LIQUIDITY SWAP ARRANGEMENTS WITH FOREIGN CENTRAL BANKS

Aggregate swaps outstanding of the U.S. dollar liquidity swap arrangements with foreign central banks held steady at $0.2 billion at the end of the third quarter of 2024. All outstanding central bank liquidity swaps at the end of September were with the ECB, while the BOJ, Bank of England, Swiss National Bank, and Bank of Canada had no U.S. dollar swaps outstanding.

TREASURY AND FEDERAL RESERVE FOREIGN EXCHANGE HOLDINGS

The Federal Reserve and U.S. Treasury did not undertake any foreign exchange intervention operations during the quarter. As of September 30, the value of the Federal Reserve System Open Market Account (SOMA) foreign-currency-denominated assets totaled $18.9 billion, comprised of euro- and yen-denominated holdings. The value of the U.S. Treasury's Exchange Stabilization (ESF) foreign-currency-denominated assets totaled $18.9 billion, comprised of euro and yen holdings.

Foreign Exchange Reserve Holdings

The Federal Reserve and U.S. Treasury invest their foreign currency reserves, which are held in the SOMA and the ESF, in a variety of instruments that yield market rates of return in their respective currencies and have a high degree of liquidity and credit quality. The Authorization for Foreign

Currency Operations defines the permitted investments for the SOMA foreign currency portfolio. The Open Market Trading Desk of the Federal Reserve Bank of New York (the Desk) utilizes an investment framework for the management of the foreign currency assets. The framework involves a routine affirmation of objectives and constraints from policymakers. The Desk then utilizes an investment approach designed to meet those objectives to maximize return subject to maintaining sufficient liquidity and a high degree of safety.[2]

In terms of investment eligibility, the Federal Reserve and U.S. Treasury's foreign exchange reserves can be invested in German, French, Dutch, and Japanese government obligations; purchases of obligations of European sovereign issuers eligible to be held outright under agreements for repurchase of such securities; and in instruments at official institutions, such as the Bank for International Settlements and foreign central banks. To the greatest extent practicable, the investments are split evenly between the SOMA and the ESF.

As of September 30, 2024, the U.S. dollar value of euro-denominated deposits and government securities held by the SOMA and the ESF increased to $24.8 billion from $23.6 billion on June 30, 2024, and the U.S. dollar value of yen-denominated deposits and government securities increased to $13.1 billion from $11.6 billion on June 30, 2024. These changes were largely driven by foreign exchange translation effects.

[2] Consistent with the current Authorization for Foreign Currency Operations, the Desk conducts small-value exercises for the foreign currency reserves as a matter of prudent advance planning. No inference about policy should be drawn from these exercises.

Table 1

FOREIGN CURRENCY HOLDINGS OF U.S. MONETARY AUTHORITIES
BASED ON CURRENT EXCHANGE RATES

Millions of U.S. Dollars

		Changes in Balances by Source				
	Carrying Value, June 30, 2024[a]	Net Purchases and Sales[b]	Investment Earnings[c]	Realized Gains / Losses on Sales[d]	Unrealized Gains/Losses on Foreign Currency Revaluation[e]	Carrying Value, September 30, 2024[a]
Federal Reserve System Open Market Account (SOMA)						
Euro	11,821	0	85	(0)	480	12,386
Japanese yen	5,809	0	2	0	715	6,525
Total	17,630	0	87	(0)	1,195	18,911

		Changes in Balances by Source				
	Carrying Value, June 30, 2024[a]	Net Purchases and Sales[b]	Investment Earnings[c]	Realized Gains / Losses on Sales[d]	Unrealized Gains/Losses on Foreign Currency Revaluation[e]	Carrying Value, September 30, 2024[a]
U.S. Treasury Exchange Stabilization Fund (ESF)						
Euro	11,803	0	85	(0)	479	12,367
Japanese yen	5,809	0	2	0	715	6,525
Total	17,612	0	86	(0)	1,194	18,892

Note: Figures may not sum to totals because of rounding.

[a]Carrying value of the reserve asset position includes interest accrued on foreign currency, which is based on "day of" accrual method.

[b]Net purchases and sales include foreign currency purchases related to official activity, repayments, and warehousing.

[c]Investment earnings include accrued interest and amortization on outright holdings.

[d]Gains and losses on sales are calculated using average cost.

[e]Reserve asset balances are revalued daily at the noon buying rates.

Table 2

BREAKDOWN OF FOREIGN RESERVE ASSETS HELD

Carrying Value in Millions of U.S. Dollars, as of September 30, 2024

	U.S. Treasury Exchange Stabilization Fund (ESF)[a]	Federal Reserve System Open Market Account (SOMA)[a]
Euro-denominated assets	**12,366.7**	**12,386.2**
Cash held on deposit at official institutions	7,046.1	7,065.5
Marketable securities held under repurchase agreements[b]	2,117.8	2,117.8
Marketable securities held outright	3,202.9	3,202.9
German government securities	367.5	367.5
French government securities	1,763.9	1,763.9
Dutch government securities	1,071.6	1,071.6
Yen-denominated assets	**6,525.3**	**6,525.3**
Cash held on deposit at official institutions	6,523.2	6,523.2
Marketable securities held outright	2.1	2.1

Note: Figures may not sum to totals because of rounding.

[a]As of September 30, the SOMA and the ESF euro portfolios had Macaulay durations of 7.21 and 7.22 months, respectively; both the SOMA and ESF yen portfolios had Macaulay durations of 0.00 months.

[b]Debt obligations of the European sovereign issuers eligible to be held outright in the foreign currency reserves are eligible collateral for reverse repo transactions.

Table 3

RECIPROCAL CURRENCY ARRANGEMENTS

Millions of U.S. Dollars

Institution	Amount of Facility	Outstanding as of September 30, 2024
	Federal Reserve System Open Market Account (SOMA)	
Reciprocal currency arrangement		
Bank of Canada	2,000	0
Banco de México	3,000	0
Standing dollar liquidity swap arrangement		
European Central Bank	Unlimited	157
Swiss National Bank	Unlimited	0
Bank of Japan	Unlimited	0
Bank of Canada	Unlimited	0
Bank of England	Unlimited	0
		157
Standing foreign currency liquidity swap arrangement		
European Central Bank	Unlimited	0
Swiss National Bank	Unlimited	0
Bank of Japan	Unlimited	0
Bank of Canada	Unlimited	0
Bank of England	Unlimited	0
		0
	U.S. Treasury Exchange Stabilization Fund (ESF)	
Banco de México	9,000	0
	9,000	0