

Quarterly Report on Bank Trading and Derivatives Activities

Second Quarter 2020

Office of the Comptroller of the Currency
Washington, D.C.

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About This Report

The Office of the Comptroller of the Currency's (OCC) quarterly report on bank trading and derivatives activities is based on call report information provided by all insured U.S. commercial banks and savings associations; reports filed by U.S. financial holding companies; and other published data. A total of 1,733¹ insured U.S. commercial banks and savings associations reported trading and derivatives activities at the end of the second quarter of 2020. A small group of large financial institutions continues to dominate trading and derivatives activity in the U.S. commercial banking system. During the second quarter of 2020, four large commercial banks represented 86.7 percent of the total banking industry notional amounts and 77.1 percent of industry net current credit exposure (NCCE) (see tables 1 and 4 in the appendix).

The OCC and other supervisors have dedicated examiners at the largest banks to continuously evaluate the credit, market, operational, reputation, and compliance risks of bank trading and derivatives activities. In addition to the OCC's supervisory activities, the OCC works with other financial supervisors and major market participants to address infrastructure, clearing, and margining issues in over-the-counter (OTC) derivatives. OCC activities include development of objectives and milestones for stronger trade processing and improved market transparency across derivative categories, migration of certain highly liquid products to clearinghouses, and requirements for posting and collecting margin.

This is the 99th edition of the OCC's *Quarterly Report on Bank Trading and Derivatives Activities*. The first report was published in 1995. Please send any comments or feedback on the structure and content of this report to the OCC by email: QuarterlyDerivatives@occ.treas.gov.

Executive Summary

- Insured U.S. commercial banks and savings associations (collectively, banks) reported trading revenue of \$14.7 billion in the second quarter of 2020, \$8.0 billion more (119.3 percent) than in the previous quarter and \$6.6 billion more (81.5 percent) than a year earlier (see table 1).
- Credit exposure from derivatives decreased in the second quarter of 2020 compared with the first quarter of 2020. NCCE decreased \$83.4 billion, or 14.0 percent, to \$511 billion (see table 5).
- Derivative notional amounts decreased in the second quarter of 2020 by \$17.9 trillion, or 9.1 percent, to \$179.6 trillion (see table 10).
- Derivative contracts remained concentrated in interest rate products, which totaled \$132.0 trillion or 73.5 percent of total derivative notional amounts (see table 10).

¹ Institutions with total assets of less than \$5 billion have the option to file the FFIEC 051 call report. Due to the limited amount of derivatives data provided by FFIEC 051 call report filers, this report provides this information separately and distinctly in table 13 in the appendix.

Revenue

Insured U.S. Commercial Banks and Savings Associations' Trading Revenue

Insured U.S. commercial banks and savings associations reported \$14.7 billion in trading revenue in the second quarter of 2020, \$8.0 billion more (119.3 percent) than in the previous quarter and \$6.6 billion more (81.5 percent) than a year earlier (see table 1). The quarter-over-quarter increase in trading revenue was due to increases across all trading revenue products with the majority of the increase from equity derivatives. For a historical view of quarterly bank trading revenue by instrument, see graph 9a in the appendix.

Table 1: Quarterly Bank Trading Revenue, in Millions of Dollars

	2Q 2020	1Q 2020	Q/Q Change	Q/Q % Change	2Q 2019	Y/Y Change	Y/Y % Change
Interest rate and foreign exchange	\$8,483	\$7,116	\$1,367	19.2%	\$5,630	\$2,853	50.7%
Equity	\$4,148	-\$1,040	\$5,187	498.9%	\$2,464	\$1,684	68.4%
Commodity and other	\$905	\$646	\$259	40.1%	-\$43	\$949	2185.5%
Credit	\$1,130	-\$35	\$1,164	3374.8%	\$30	\$1,100	3677.6%
Total trading revenue	\$14,666	\$6,688	\$7,977	119.3%	\$8,081	\$6,585	81.5%

Source: Call reports, Schedule RI

Holding Company Trading Revenue

Consolidated bank holding company (BHC) trading performance provides a more complete picture of trading revenue in the banking system. As shown in table 2, consolidated holding company trading revenue of \$36.6 billion in the second quarter of 2020 was \$27.5 billion (304.9 percent) higher than in the previous quarter. The quarter-over-quarter increase in trading revenue was due to increases across all trading revenue products with the majority of the increase from equity derivatives. Year-over-year holding company trading revenue increased by \$18.2 billion (99.2 percent). For a historical view of quarterly holding company trading revenue by instrument, see graph 9b in the appendix.

Table 2: Quarterly Holding Company Trading Revenue, in Millions of Dollars

	2Q 2020	1Q 2020	Q/Q Change	Q/Q % Change	2Q 2019	Y/Y Change	Y/Y % Change
Interest rate and foreign exchange	\$14,166	\$11,660	\$2,506	21.5%	\$10,084	\$4,082	40.5%
Equity	\$13,602	-\$4,546	\$18,148	399.2%	\$6,083	\$7,519	123.6%
Commodity and other	\$2,486	\$1,664	\$822	49.4%	\$512	\$1,974	385.5%
Credit	\$6,331	\$257	\$6,074	2363.4%	\$1,684	\$4,647	276.0%
Total HC trading revenue	\$36,585	\$9,036	\$27,549	304.9%	\$18,364	\$18,221	99.2%

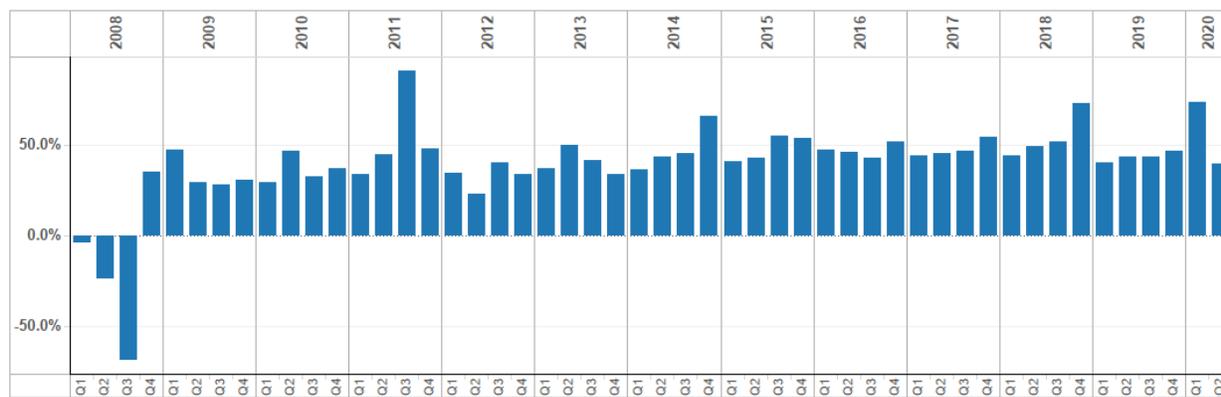
Source: Consolidated Financial Statements for Holding Companies—FR Y-9C, Schedule HI

Bank Trading Revenue as a Percentage of Consolidated Holding Company Trading Revenue

Before the financial crisis, trading revenue at banks typically ranged from 60 percent to 80 percent of consolidated BHC trading revenue. Since the financial crisis and the adoption of bank charters by the former investment banks, the percentage of bank trading revenue to consolidated BHC trading revenue has fallen and is now typically between 30 percent and 50 percent. This decline reflects the significant amount of trading activity by the former investment banks that, while included in BHC results, remains outside insured commercial banks. More generally, insured U.S. commercial banks and savings associations have more limited legal authorities than their holding companies, particularly in the trading of commodity and equity products.

In the second quarter of 2020, banks generated 40.1 percent of consolidated holding company trading revenue, a decrease from 74.0 percent in the previous quarter (see figure 1). The decrease in the percentage of trading revenue generated by banks resulted from the sharp increase in holding company trading revenue from equity derivatives.

Figure 1: Bank Trading Revenue as a Percentage of Consolidated Holding Company Trading Revenue



Source: Consolidated Financial Statements for Holding Companies—FR Y-9C (Schedule HI) and call report (Schedule RI)

Counterparty Credit Risk

Counterparty credit risk is a significant risk in bank derivative trading activities. The notional amount of a derivative contract is a reference amount that determines contractual payments, but it is generally not an amount at risk. The credit risk in a derivative contract is a function of a number of variables, such as whether counterparties exchange notional principal, the volatility of the underlying market factors (interest rate, currency, commodity, equity, or corporate reference entity), the maturity and liquidity of the contract, and the creditworthiness of the counterparty.

Credit risk in derivatives differs from credit risk in loans because of the more uncertain nature of the potential credit exposure. Because the credit exposure is a function of movements in market factors, banks do not know, and can only estimate, how much the value of the derivative contract might be at various points in the future.

The credit exposure is bilateral in most derivative transactions, such as swaps (which make up the bulk of bank derivative contracts). Each party to the contract may (and, if the contract has a long enough tenor, probably will) have a credit exposure to the other party at various times during the contract's life. With a funded traditional loan, the amount at risk is the amount advanced to the borrower. The credit risk is unilateral as the bank faces the credit exposure of the borrower.

Measuring credit exposure in derivative contracts involves identifying those contracts on which a bank would lose value if the counterparty to a contract defaulted. The total of all contracts with positive value (i.e., derivative receivables) to the bank is the gross positive fair value (GPFV) and represents an initial measurement of credit exposure. The total of all contracts with negative value (i.e., derivative payables) to the bank is the gross negative fair value (GNFV) and represents a measurement of the exposure the bank poses to its counterparties.

GPFV decreased by \$349.0 billion (11.8 percent) in the second quarter of 2020 to \$2.6 trillion, primarily driven by a \$246.0 billion (32.7 percent) decrease in receivables from foreign exchange (FX) contracts (see table 3). GNFV decreased \$328.0 billion (11.2 percent) to \$2.6 trillion during the quarter, primarily driven by a \$242.0 billion (31.6 percent) decrease in payables on foreign exchange contracts.

Table 3: Gross Positive Fair Values and Gross Negative Fair Values, in Billions of Dollars

	2Q 2020	1Q 2020	Q/Q Change	Q/Q % Change	2Q 2019	Y/Y Change	Y/Y % Change
Interest rate	\$1,880	\$1,863	\$18	1.0%	\$1,342	\$538	40.1%
Foreign exchange	\$506	\$752	-\$246	-32.7%	\$442	\$64	14.4%
Equity	\$144	\$196	-\$52	-26.6%	\$119	\$25	21.0%
Commodities	\$55	\$104	-\$49	-47.0%	\$36	\$19	51.2%
Credit	\$34	\$54	-\$20	-36.8%	\$46	-\$12	-26.1%
Gross positive fair value	\$2,619	\$2,968	-\$349	-11.8%	\$1,985	\$633	31.9%

	2Q 2020	1Q 2020	Q/Q Change	Q/Q % Change	2Q 2019	Y/Y Change	Y/Y % Change
Interest rate	\$1,820	\$1,814	\$6	0.3%	\$1,286	\$534	41.5%
Foreign exchange	\$525	\$768	-\$242	-31.6%	\$445	\$81	18.1%
Equity	\$145	\$186	-\$41	-22.1%	\$120	\$25	20.8%
Commodities	\$59	\$94	-\$35	-37.5%	\$39	\$20	52.6%
Credit	\$37	\$52	-\$15	-28.6%	\$49	-\$12	-25.2%
Gross negative fair value	\$2,586	\$2,914	-\$328	-11.2%	\$1,938	\$647	33.4%

Source: Call reports, Schedule RC-L

A legally enforceable netting agreement between a bank and a counterparty creates a single legal obligation for all transactions (called a “netting set”) under the agreement. Therefore, when banks have such agreements with their counterparties, contracts with negative values (an amount a bank would pay to its counterparty) can offset contracts with positive values (an amount owed by the counterparty to the bank), leaving an NCCE as shown in table 4.

Table 4: Netting Contract Examples

Bank A portfolio with Counterparty B	Number of contracts	Value of contracts	Credit measure/metric
Contracts with positive value to Bank A	6	\$500	Gross positive fair value
Contracts with negative value to Bank A	4	-\$350	Gross negative fair value
Total contracts	10	\$150	NCCE to Bank A from Counterparty B

Most, but not necessarily all, derivative transactions that a bank has with an individual counterparty are subject to a legally enforceable netting agreement. Some transactions may be subject to the laws of a jurisdiction that does not provide legal certainty of netting agreements, in which case banks must regard such transactions as separate from the netting set. Other transactions may involve nonstandard contractual documentation. Transactions that are not subject to the same legally enforceable netting agreement have distinct values that cannot be netted and for which the appropriate current credit measure is the gross exposure to the bank, if that amount is positive. While banks can net exposures within a netting set under the same netting agreement, they cannot net exposures across netting sets without a separate legally enforceable netting agreement. As a result, a bank's NCCE to a particular counterparty equals the sum of the GPFV of contracts less the dollar amount of netting benefits with that counterparty. A bank's NCCE across all counterparties equals the sum of its NCCE to each of its counterparties.

NCCE is the primary metric the OCC uses to evaluate credit risk in bank derivative activities. NCCE for insured U.S. commercial banks and savings associations decreased by \$83.4 billion (14.0 percent) to \$511.0 billion in the second quarter of 2020 (see table 5).² Legally enforceable netting agreements allowed banks to reduce GPFV exposures by 80.5 percent (\$2.1 trillion) in the second quarter of 2020.

Table 5: Net Current Credit Exposure, in Billions of Dollars

	2Q 2020	1Q 2020	Q/Q Change	Q/Q % Change
Gross positive fair value	\$2,619	\$2,968	-\$349	-11.8%
NCCE RC-R	\$511	\$594	-\$83.4	-14.0%
Netting benefit RC-R	\$2,108	\$2,374	-\$266	-11.2%
Netting benefit % RC-R	80.5%	80.0%		0.5%

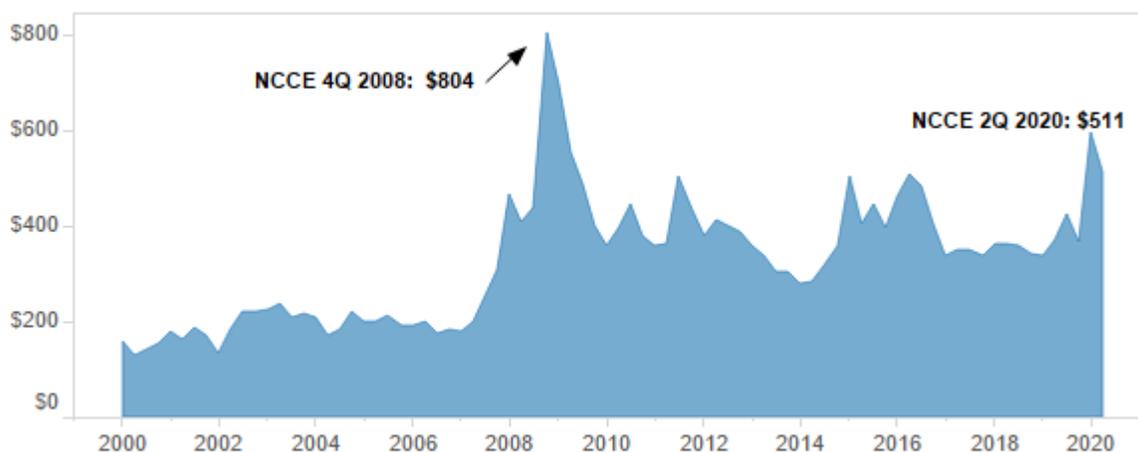
Source: Call reports, Schedules RC-L and RC-R

NCCE peaked at \$804.0 billion at the end of 2008, during the financial crisis, when interest rates had plunged, and credit spreads were very high (see figure 2). The decline in NCCE since 2008 has largely resulted from declines in the GPFV of interest rate and credit contracts. After a large increase last quarter as markets responded to the financial impact of the COVID-19 global pandemic, NCEE decreased this quarter as more normal market activity resumed late in the

² Banks report NCCE on two different schedules (RC-R and RC-L) of the call report, and the amounts reported are not the same because of differences in the scope of coverage. Neither measure comprehensively captures NCCE. RC-L includes exposure only from OTC derivative transactions; it excludes exchange-traded transactions. RC-R excludes transactions not subject to capital requirements. This report uses RC-R to measure NCCE.

quarter. The GPFV from interest rate contracts has fallen from \$5.1 trillion at the end of 2008 to \$1.9 trillion at the end of the second quarter of 2020 (see table 3). In addition, on June 30, 2020, exposure from credit contracts was \$34.0 billion, which is \$1.1 trillion lower (96.9 percent) than the \$1.1 trillion on December 31, 2008 (see table 3).

Figure 2: Net Current Credit Exposure, in Billions of Dollars



Source: Call reports, Schedule RC-R

The bulk of NCCE in the financial system is concentrated in banks and securities firms (40.7 percent) and in corporations and other counterparties (49.8 percent) (see table 6). The combined exposure to hedge funds and sovereign governments was small (9.6 percent in total).

Table 6: NCCE by Counterparty Type as a Percentage of Total NCCE

	Banks and securities firms	Hedge funds	Sovereign governments	Corp and all other counterparties
2Q 2020	40.7%	2.1%	7.5%	49.8%
1Q 2020	39.4%	3.5%	6.4%	50.7%
4Q 2019	44.2%	2.5%	9.2%	44.1%
4Q 2018	41.7%	5.0%	10.0%	43.2%
4Q 2017	41.7%	3.1%	7.9%	47.3%
4Q 2016	48.4%	2.0%	6.5%	43.0%

Source: Call reports, Schedule RC-L

A more risk-sensitive measure of credit exposure would consider the value of collateral held against counterparty exposures. Reporting banks held collateral valued at 96.3 percent of their total NCCE at the end of the second quarter of 2020, up from 92.6 percent in the first quarter of 2020 (see table 7). Collateral held against hedge fund exposures increased in the second quarter and remains high at 404.1 percent. Bank exposures to hedge funds are secured, because banks take initial margin on transactions with hedge funds, in addition to fully securing any current credit exposure. Collateral coverage of corporate and sovereign exposures is much less than coverage of financial institutions and hedge funds, although coverage of corporate exposures has

been increasing over the past several years because of increases in the volume of trades cleared at central counterparties.

Table 7: Ratio of Fair Value Collateral to Net Current Credit Exposure

	FV banks and securities firms	FV hedge funds	FV sovereign governments	FV corporate and all other counterparties	FV/NCCE %
2Q 2020	124.3%	404.1%	51.3%	67.1%	96.3%
1Q 2020	121.3%	230.8%	51.7%	65.8%	92.6%
4Q 2019	130.0%	485.9%	48.3%	91.8%	114.5%
4Q 2018	128.9%	308.0%	47.1%	91.8%	113.7%
4Q 2017	124.4%	495.5%	25.1%	89.8%	111.5%
4Q 2016	119.1%	491.5%	34.2%	67.0%	98.5%

Source: Call reports, Schedule RC-L

The majority of collateral held by banks against NCCE is very liquid with 63.1 percent held in cash (both U.S. dollar and non-dollar) and an additional 13.9 percent held in U.S. Treasuries and government agency securities (see table 8). Supervisors assess changes in the quality and liquidity of collateral held as a key early indicator of potential easing in credit terms. Examiners review the collateral management practices of derivative dealers as a regular part of their supervision activities.

Table 8: Composition of Collateral

	Cash U.S. \$	Cash other currencies	U.S. Treasury securities	U.S. gov. agency	Corp bonds	Equity securities	All other collateral
2Q 2020	39.3%	23.8%	11.6%	2.3%	2.1%	5.9%	14.9%
1Q 2020	44.6%	22.5%	10.7%	1.6%	1.9%	4.3%	14.4%
4Q 2019	34.4%	24.5%	11.6%	1.7%	2.3%	7.6%	17.7%
4Q 2018	37.2%	23.3%	10.8%	2.2%	2.1%	7.1%	17.2%
4Q 2017	37.6%	25.5%	10.3%	1.9%	2.5%	5.7%	16.5%
4Q 2016	40.1%	31.5%	8.1%	1.7%	1.6%	5.0%	12.0%

Source: Call reports, Schedule RC-L

Credit quality metrics for derivative exposures remained relatively stable in the second quarter of 2020, as banks reported net charge-offs of \$41.9 million, compared with \$82.7 million in the first quarter of 2020 (see graph 7 in the appendix). The number of banks reporting charge-offs increased from 14 to 15 banks. Net charge-offs in the second quarter of 2020 represented 0.008 percent of the NCCE from derivative contracts. For comparison purposes, commercial and industrial (C&I) loan net charge-offs increased \$1.4 billion, or 51.2 percent, to \$4.1 billion during the quarter and were 0.2 percent of total C&I loans. Charge-offs of derivative exposures typically are associated with problem commercial lending exposures, in which the borrower has an associated swap transaction.

Market Risk

Value-at-Risk

Banks primarily control market risk in trading operations by establishing limits against potential losses. Banks use value-at-risk (VaR) to quantify the maximum expected loss over a specified time period and at a certain confidence level under relevant market conditions. Banks subject to the market risk capital rule, 12 CFR 3, subpart F, are required to report their VaR-based measures quarterly on Form FFIEC 102. The VaR measurement is calculated on a daily basis using a one-tail, 99 percent confidence level, and a holding period equivalent to a 10-business-day movement in underlying risk factors, such as rates, spreads and prices. Tables 9a and 9b show the quarter-over-quarter change in VaR, as well as the VaR-based capital charge, for banks most active in trading and derivatives activity. As shown in table 9a, market risk in trading operations, as measured by VaR, is a small proportion of their risk-based capital. Graph 16 in the appendix illustrates the historical trend in VaR measurements for these institutions.

Table 9a: Value-at-Risk, in Millions of Dollars

	JPMorgan Chase Bank, NA	Citibank, NA	Bank of America, NA	Goldman Sachs Bank USA
2Q 2020 Average 60 Day VaR	\$399	\$125	\$54	\$355
1Q 2020 Average 60 Day VaR	\$254	\$109	\$53	\$176
Q/Q Change	\$145	\$16	\$1	\$179
2Q 2020 Total Risk-Based Capital	\$242,617	\$157,966	\$171,583	\$31,719

Source: Market Risk Regulatory Report for Institutions Subject to the Market Risk Capital Rule—FFIEC 102

Table 9b: Value-at-Risk Capital Requirement, in Millions of Dollars

	JPMorgan Chase Bank, NA	Citibank, NA	Bank of America, NA	Goldman Sachs Bank USA
2Q 2020 VaR Capital Requirement	\$1,197	\$374	\$161	\$1,065
1Q 2020 VaR Capital Requirement	\$762	\$327	\$158	\$529
Q/Q Change	\$435	\$47	\$3	\$536
2Q 2020 Total Risk-Based Capital	\$242,617	\$157,966	\$171,583	\$31,719

Source: Market Risk Regulatory Report for Institutions Subject to the Market Risk Capital Rule—FFIEC 102

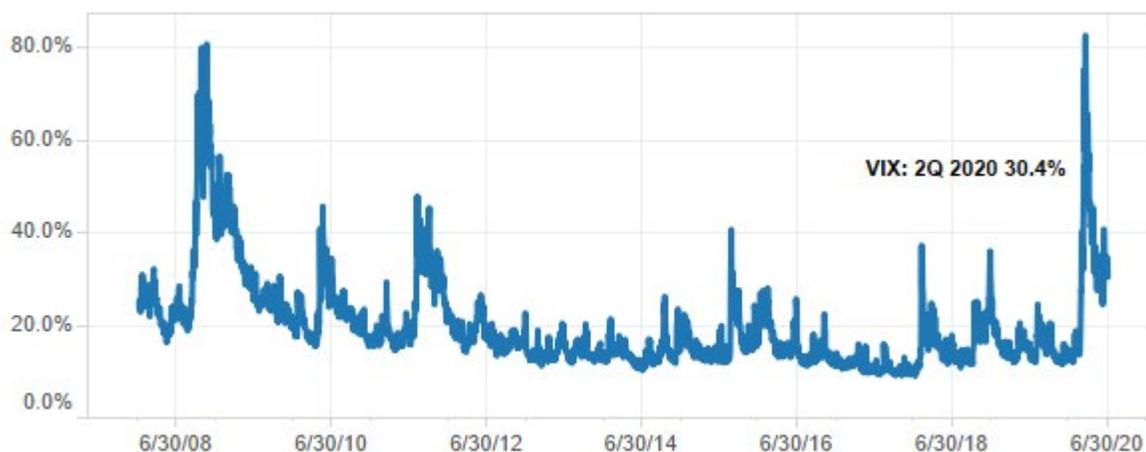
Volatility Index

Figure 3 shows the VIX, a volatility index,³ which measures the market's expectation of stock market volatility in the S&P 500 index over the next 30-day period. Higher volatility as represented by the VIX is associated with increased equity trading volume, which drives increased bank and holding company equity trading revenue. The chart illustrates that there has been an extended period of low volatility since the end of the 2008 financial crisis that continued

³ VIX is the trademarked ticker symbol for the Chicago Board Options Exchange SPX Volatility Index.

until late in the first quarter of 2020. In mid-March volatility spiked as financial markets reacted to fears over the potential impact of the COVID-19 global pandemic. The VIX exceeded its previous high from the 2008 financial crisis before settling back to a still somewhat elevated level of 30.4 percent at the end of the second quarter of 2020.

Figure 3: Volatility Index (VIX)

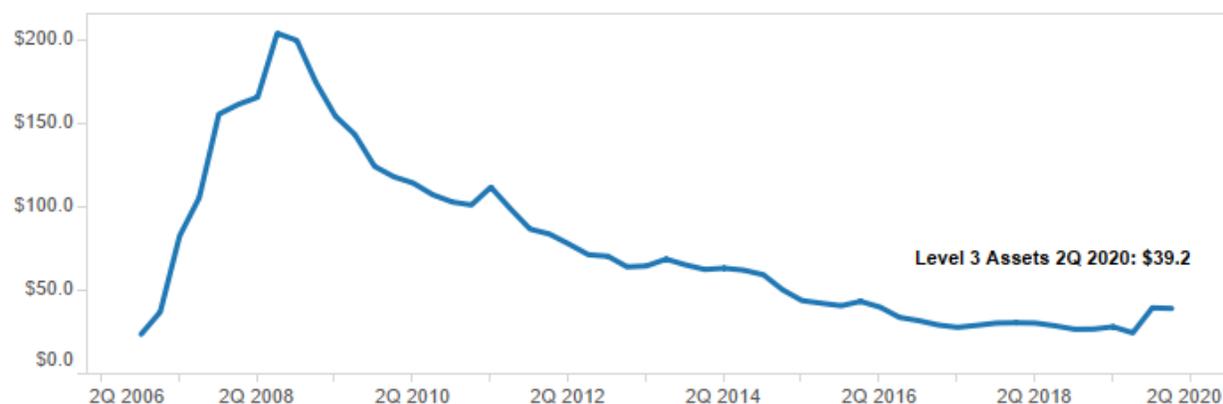


Source: Bloomberg

Level 3 Trading Assets

Another measure used to assess market risk is the volume of and changes in level 3 trading assets. Level 3 trading assets are assets whose fair value cannot be determined by using observable inputs, such as market prices. Since the peak of the financial crisis at the end of 2008, major dealers have reduced the volume of level 3 trading assets. Because banks cannot observe inputs into the models that determine the fair value of these illiquid exposures, banks use their own assumptions in determining their fair values. Level 3 trading assets peaked at \$204.1 billion at the end of 2008 (see figure 4). At the end of the second quarter of 2020, banks held \$39.2 billion of level 3 trading assets, down 0.8 percent from the previous quarter, and 46.2 percent higher than a year ago. Level 3 trading assets are \$164.9 billion (80.8 percent) lower than the peak level from 2008.

Figure 4: Level 3 Trading Assets, in Billions of Dollars



Source: Call reports, Schedule RC-Q

Notional Amounts of All Derivative Contracts

Changes in notional amounts are generally reasonable reflections of business activity and can provide insight into potential revenue and operational issues. The notional amount of derivative contracts, however, does not provide a useful measure of market or credit risk.

The total notional amount of derivative contracts held by banks in the second quarter decreased by \$17.9 trillion (9.1 percent) to \$179.6 trillion from the previous quarter (see table 10). The decrease in the notional amount of derivative contracts by underlying risk exposure was primarily driven by a decrease in interest rate contracts. Interest rate notional amounts continued to represent the majority of banks' derivative holdings at \$132.0 trillion, or 73.5 percent of total derivatives (see table 10).

The decrease in the total notional amount of derivative contracts by contract type was primarily driven by decreases in swaps and futures and forward contracts (see table 11). Swap contracts remained the leading derivatives contract type at 56.7 percent of all notional amounts.

The four banks with the most derivative activity hold 86.7 percent of all bank derivatives, while the largest 25 banks account for nearly 100 percent of all contracts (see tables 3 and 5 and graph 4 in the appendix for further information).

Table 10: Derivative Notional Amounts by Underlying Risk Exposure Quarter-Over-Quarter, in Billions of Dollars

	2Q 2020	1Q 2020	Q/Q Change	Q/Q % Change	2Q 2019	Y/Y Change	Y/Y % Change
Interest rate	\$132,044	\$146,027	-\$13,983	-9.6%	\$151,852	-\$19,807	-13.0%
Foreign exchange	\$39,191	\$42,181	-\$2,990	-7.1%	\$43,744	-\$4,552	-10.4%
Equity	\$3,574	\$3,662	-\$87	-2.4%	\$3,723	-\$148	-4.0%
Commodity	\$1,507	\$1,644	-\$137	-8.3%	\$1,482	\$25	1.7%
Credit derivatives	\$3,255	\$3,986	-\$732	-18.4%	\$4,074	-\$819	-20.1%
Total notional	\$179,571	\$197,501	-\$17,929	-9.1%	\$204,874	-\$25,302	-12.4%

Source: Call reports, Schedule RC-L

Table 11: Derivative Notional Amounts by Contract Type Quarter-Over-Quarter, in Billions of Dollars

	2Q 2020	1Q 2020	Q/Q Change	Q/Q % Change	2Q 2019	Y/Y Change	Y/Y % Change
Futures and forwards	\$41,018	\$46,804	-\$5,786	-12.4%	\$46,209	-\$5,191	-11.2%
Swaps	\$101,734	\$110,599	-\$8,865	-8.0%	\$110,905	-\$9,171	-8.3%
Options	\$33,564	\$36,111	-\$2,547	-7.1%	\$43,686	-\$10,121	-23.2%
Credit derivatives	\$3,255	\$3,986	-\$732	-18.4%	\$4,074	-\$819	-20.1%
Total notional	\$179,571	\$197,501	-\$17,929	-9.1%	\$204,874	-\$25,302	-12.4%

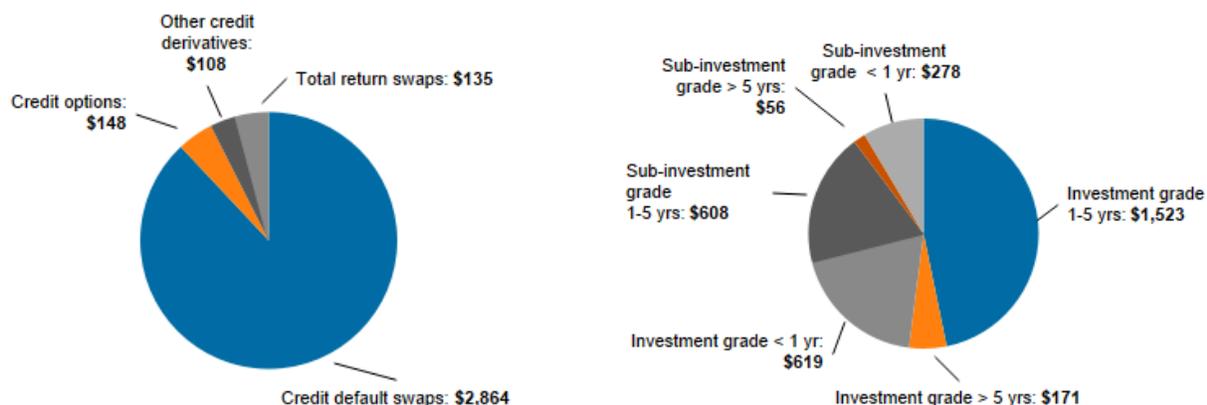
Source: Call reports, Schedule RC-L

Credit Derivatives

The notional amounts of credit derivatives decreased \$732.0 billion (18.4 percent), to \$3.3 trillion, in the second quarter of 2020 (see table 10). Contracts referencing investment-grade firms decreased \$579.0 billion and contracts referencing sub-investment-grade firms decreased \$153.0 billion in the second quarter (see graph 14 in the appendix). Credit derivatives outstanding remained well below the peak of \$16.4 trillion in the first quarter of 2008 (see graph 1 in the appendix). As shown in the chart on the left of figure 5, credit default swaps are the dominant product, at \$2.9 trillion (88.0 percent) of all credit derivative notional amounts.

Credit derivative contracts referencing investment-grade entities with maturities from one to five years represented the largest segment of the market at \$1.5 trillion or 46.8 percent of all credit derivative notional amounts. Contracts of all tenors that reference investment-grade entities are \$2.3 trillion or 71.1 percent of the market (see the chart on the right in figure 5).

Figure 5: 2Q 2020 Credit Derivative Composition, in Billions of Dollars



Source: Call reports, Schedule RC-L

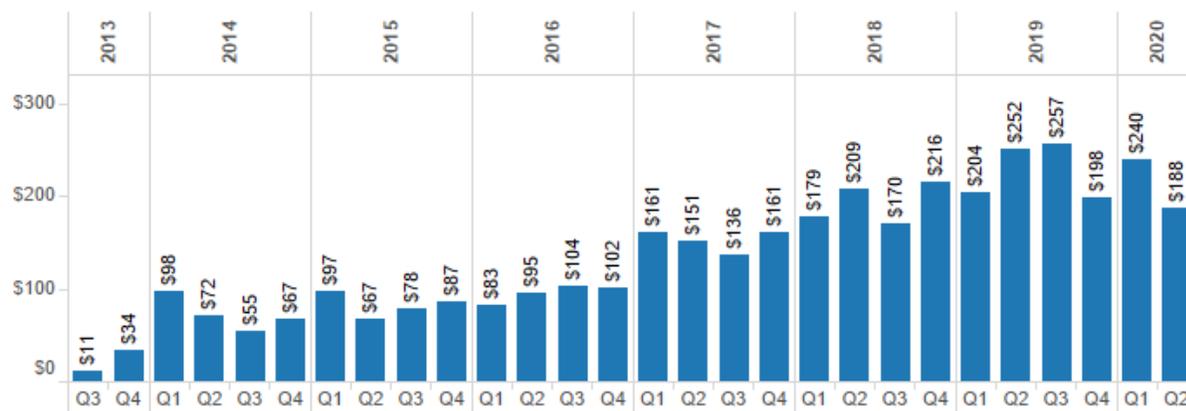
The notional amount for the 90 banks that net sold credit protection (i.e., assumed credit risk) was \$1.5 trillion, down \$376.8 billion (19.6 percent) from the first quarter of 2020 (see table 12 in the appendix). The notional amount for the 73 banks that net purchased credit protection (i.e., hedged credit risk) was \$1.7 trillion, \$355.1 billion lower (17.2 percent) than in the first quarter of 2020 (see table 12 in the appendix).

Compression Activity

Notional amounts of banks' derivative contracts have generally declined since 2011 because of trade compression efforts, leading to less need for risk management products. Trade compression continues to be a significant factor in reducing the amount of notional derivatives outstanding.

Trade compression aggregates a large number of swap contracts with similar factors, such as risk or cash flows, into fewer trades. Compression removes economic redundancy in a derivative book and reduces operational risk and capital costs for large banks. Trade compression activities decreased in the second quarter of 2020, as shown in figure 6.

Figure 6: Quarterly Compression Activity, in Trillions of Dollars



Source: LCH Clearent

Centrally Cleared Derivative Contracts

In the first quarter of 2015, banks began reporting their volumes of cleared and non-cleared derivative transactions, as well as risk weights for counterparties in each of these categories. In the second quarter of 2020, 40.3 percent of banks' derivative holdings were centrally cleared (see table 12). From a market factor perspective, 50.7 percent of interest rate derivative contracts' notional amounts outstanding were centrally cleared, while very little of the FX derivative market was centrally cleared. The bank-held credit derivative market remained largely uncleared, as 36.0 percent of credit derivative transactions were centrally cleared during the second quarter of 2020.

Centrally cleared derivative transactions were heavily concentrated at qualifying central counterparties, with 90.7 percent of notional amounts reflecting the 2 percent risk weight applicable to such counterparties.

Table 12: Centrally Cleared Derivative Contracts as a Percentage of Total Derivative Contracts

	Interest rate	Foreign exchange	Equity	Precious metals	Credit	Other	Total
2Q 2020	50.7%	1.9%	25.7%	2.0%	36.0%	12.0%	40.3%
1Q 2020	52.9%	2.0%	26.5%	2.1%	34.4%	11.8%	42.3%
4Q 2019	46.7%	1.7%	24.8%	2.8%	26.4%	11.5%	37.1%
3Q 2019	55.1%	1.5%	26.8%	6.5%	28.3%	15.2%	43.0%
2Q 2019	53.9%	1.4%	26.8%	10.2%	25.9%	15.4%	42.5%
1Q 2019	54.0%	1.3%	26.9%	10.0%	27.7%	16.0%	42.5%
4Q 2018	51.0%	1.2%	25.7%	8.0%	29.3%	17.5%	39.8%

Source: Call reports, Schedule RC-R

Glossary of Terms

Bilateral netting: A legally enforceable arrangement between a bank and a counterparty that creates a single legal obligation covering all included individual contracts. This arrangement means that a bank's receivables or payables, in the event of the default or insolvency of one of the parties, would be the net sum of all positive and negative fair values of contracts included in the bilateral netting arrangement.

Centrally cleared derivative contract: A standardized derivative contract that is transacted bilaterally but submitted for clearing to a central counterparty, with the central counterparty becoming the ultimate counterparty to both the buyer and the seller.

Credit derivative: A financial contract that allows a party to take on or reduce credit exposure (generally on a bond, loan, or index). The OCC's derivatives survey includes OTC credit derivatives, such as credit default swaps, total return swaps, and credit spread options.

Derivative: A financial contract in which the value is derived from the performance of underlying market factors, such as interest rates, currency exchange rates, and commodity, credit, and equity prices. Derivative transactions include a wide assortment of financial contracts, such as structured debt obligations and deposits, swaps, futures, options, caps, floors, collars, forwards, and various combinations thereof.

Gross negative fair value (GNFV): The sum total of the fair values of contracts when the bank owes money to its counterparties, without taking netting into account. This amount represents the maximum losses the bank's counterparties would incur if the bank defaulted and there was no netting of contracts, and the counterparties held no bank collateral. GNFVs associated with credit derivatives are included.

Gross positive fair value (GPFV): The sum total of the fair values of contracts when the bank is owed money by its counterparties, without taking netting into account. This amount represents the maximum losses a bank would incur if all its counterparties defaulted and there was no netting of contracts, and the bank held no counterparty collateral. GPFVs associated with credit derivatives are included.

Net current credit exposure (NCCE): For a portfolio of derivative contracts, NCCE is the GPFV of contracts less the dollar amount of netting benefits. On any individual contract, current credit exposure (CCE) is the fair value of the contract if positive, and zero when the fair value is negative or zero. NCCE is also the net amount owed to banks if all contracts were immediately liquidated.

Notional amount: The nominal or face amount that is used to calculate payments made on swaps and other risk management products. This amount generally does not change hands and is thus referred to as notional.

OTC derivative contracts: Privately negotiated derivative contracts that are transacted off of organized exchanges.

Potential future exposure (PFE): An estimate of what the CCE could be over time, based on a supervisory formula in the agencies' risk-based capital rules. PFE is generally determined by multiplying the notional amount of the contract by a credit conversion factor that is based on the underlying market factor (e.g., interest rates, commodity prices, or equity prices) and the contract's remaining maturity. The risk-based capital rules, however, permit banks to adjust the formulaic PFE measure by the net-to-gross ratio, which proxies the risk-reduction benefits attributable to a valid bilateral netting contract. PFE data in this report use the amounts on which banks hold risk-based capital.

Qualifying central counterparties (QCCP): QCCPs are defined in 12 CFR 3.2 as a CCP either that the Financial Stability Oversight Council has designated systemically important under title VIII of the Dodd–Frank Wall Street Reform and Consumer Protection Act or that meets a series of standards. See 12 CFR 3.2 for a full definition.

Total credit exposure (TCE): The sum total of NCCE and PFE.

Total risk-based capital: The sum of tier 1 plus tier 2 capital. Tier 1 capital generally consists of common shareholders' equity, perpetual preferred shareholders' equity with noncumulative dividends, retained earnings, and tier 1 capital of consolidated subsidiaries that is not owned by the bank (minority interest), less regulatory adjustments and deductions. Tier 2 capital generally consists of subordinated debt, intermediate-term preferred stock, cumulative and long-term preferred stock, tier 2 capital of consolidated subsidiaries that is not owned by the bank (minority interest), and a portion of a bank's allowance for loan and lease losses less regulatory adjustments and deductions.

Trade compression: A significant factor in reducing the amount of notional derivatives outstanding. Trade compression aggregates a large number of swap contracts with similar factors, such as risk or cash flows, into fewer trades. Compression removes economic redundancy in a derivative book and reduces operational risks and capital costs for large banks.

Volatility index (VIX): A measure of the market's expectation of stock market volatility of S&P 500 index options over the next 30-day period.

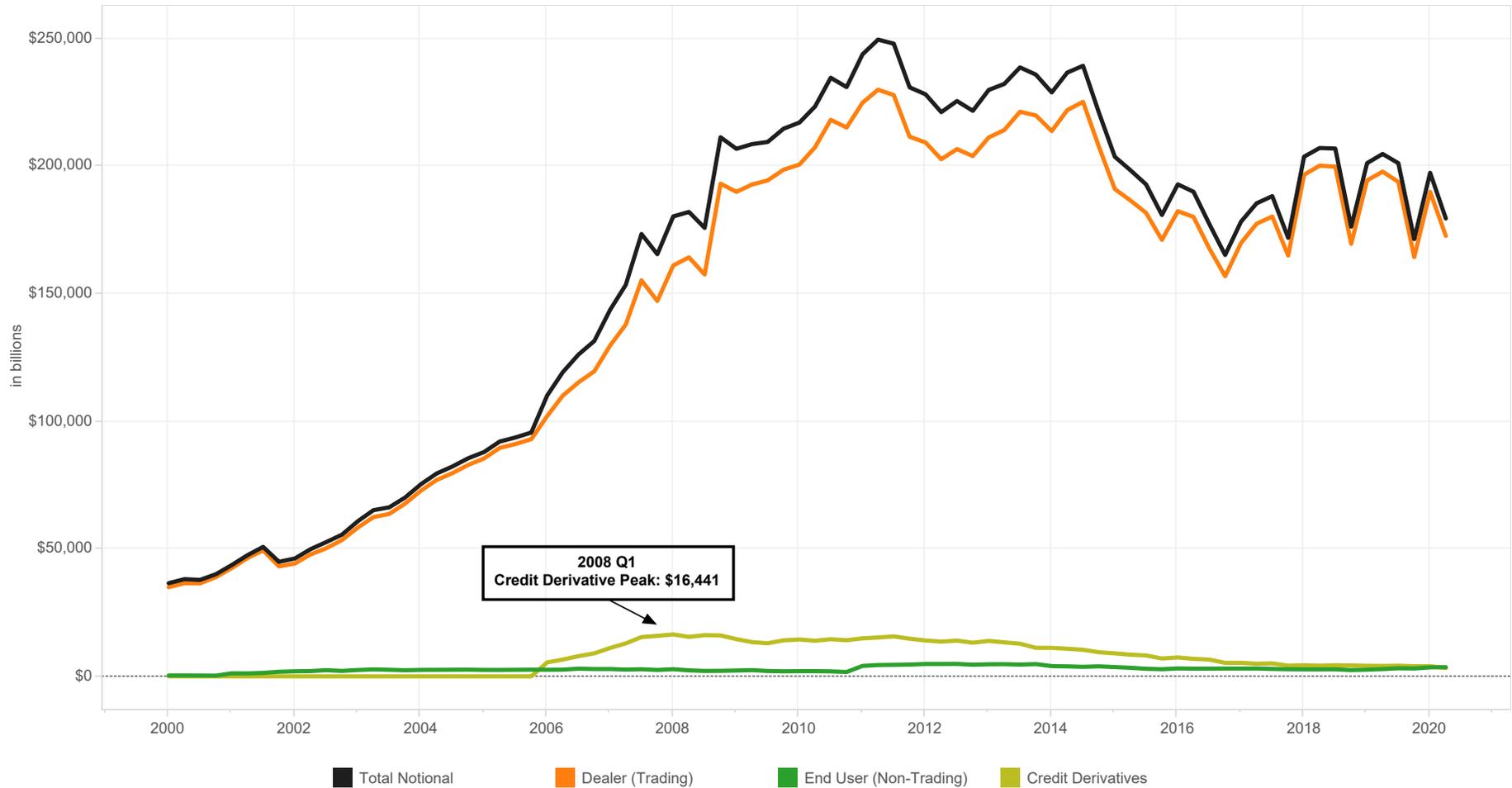
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Graph 1
Derivative Notional Amounts by Type
Insured U.S. Commercial Banks and Savings Associations

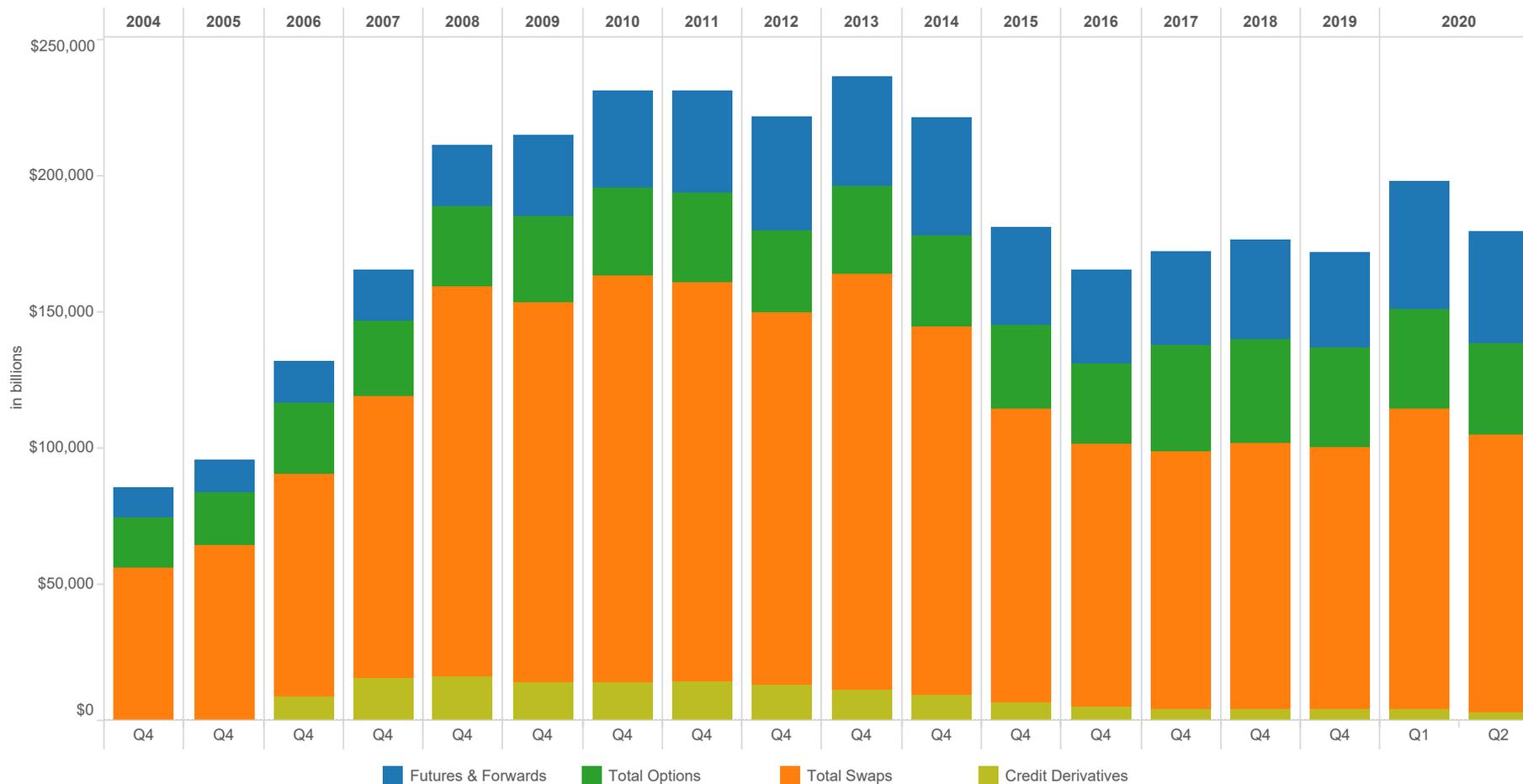


In billions of dollars

	2016				2017				2018				2019				2020	
	Q1	Q2	Q3	Q4	Q1	Q2												
Total Notional	\$192,952	\$190,057	\$177,466	\$165,252	\$178,335	\$185,522	\$188,351	\$171,973	\$203,795	\$207,202	\$206,995	\$176,353	\$201,282	\$204,874	\$201,256	\$171,462	\$197,501	\$179,571
Dealer (Trading)	182,437	180,186	167,873	156,901	169,971	177,519	180,344	165,002	196,712	200,286	199,891	169,636	194,518	197,950	193,912	164,441	189,995	172,723
End User (Non-Trading)	3,097	3,018	3,030	3,057	3,061	3,069	2,917	2,785	2,737	2,737	2,763	2,447	2,619	2,850	3,162	3,077	3,519	3,594
Credit Derivatives	7,418	6,853	6,562	5,293	5,304	4,935	5,090	4,186	4,345	4,179	4,342	4,270	4,145	4,074	4,183	3,945	3,986	3,255

Note: Numbers may not add up to total due to rounding. Total derivative notionals are now reported including credit derivatives, for which regulatory reporting does not differentiate between trading and non-trading.
 Source: Call reports

Graph 2
Derivative Contracts by Product*
Insured U.S. Commercial Banks and Savings Associations



In billions of dollars

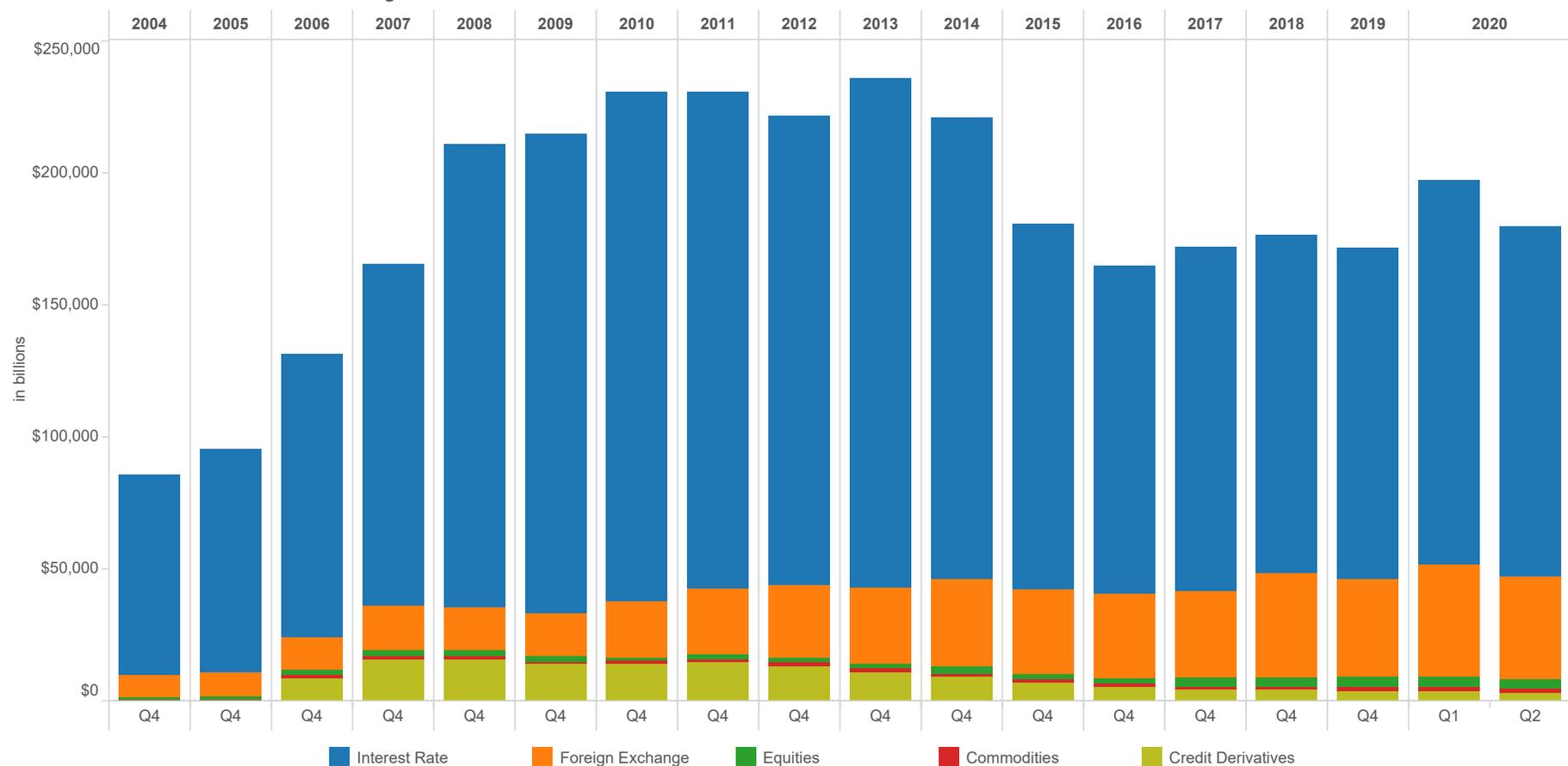
	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	
	Q4	Q1	Q2														
Futures & Forwards	\$12,057	\$14,882	\$18,867	\$22,529	\$29,652	\$35,539	\$37,469	\$41,621	\$40,027	\$43,380	\$35,691	\$34,201	\$34,162	\$36,144	\$34,787	\$46,804	\$41,018
Total Options	18,858	26,277	27,727	29,747	31,884	32,078	32,505	30,375	32,305	33,081	30,889	29,373	38,841	38,009	36,117	36,111	33,564
Total Swaps	64,712	81,340	103,102	143,111	139,138	149,331	146,266	136,608	152,469	135,169	107,392	96,384	94,784	97,930	96,614	110,599	101,734
Credit Derivatives	0	9,020	15,863	16,029	14,112	14,151	14,759	13,190	11,191	9,449	6,986	5,293	4,186	4,270	3,945	3,986	3,255
Total Notional	95,627	131,519	165,559	211,416	214,786	231,099	230,998	221,794	235,992	221,078	180,959	165,252	171,973	176,353	171,462	197,501	179,571

*Notional amount of total: futures, exchange-traded options, over the counter options, forwards and swaps.

Note: Numbers may not add up to total due to rounding.

Source: Call reports

Graph 3
Derivative Contracts by Type*
Insured U.S. Commercial Banks and Savings Associations

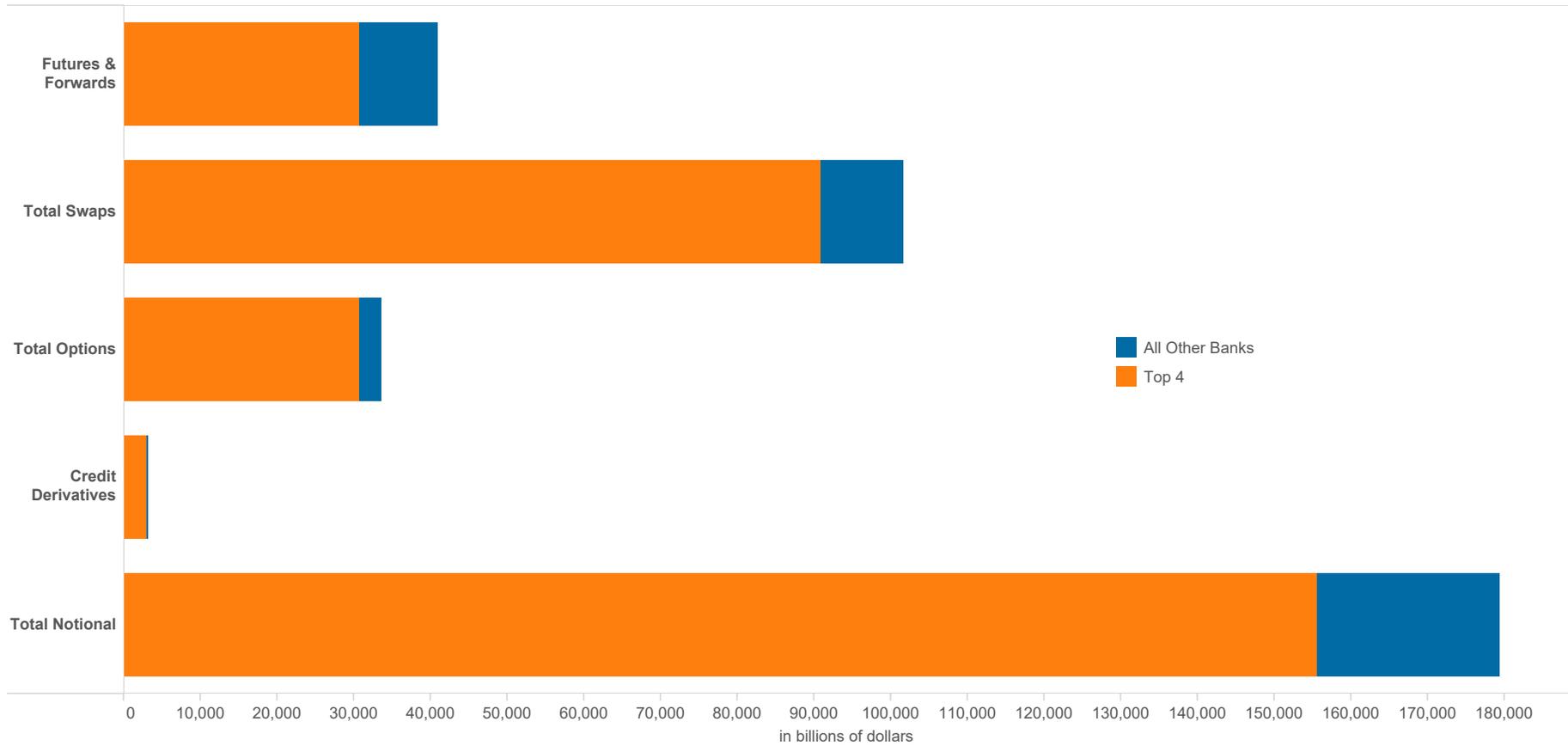


In billions of dollars

	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	
	Q4	Q1	Q2													
Interest Rate	\$107,435	\$129,491	\$175,895	\$181,454	\$193,399	\$187,866	\$177,650	\$193,084	\$174,687	\$138,369	\$124,488	\$130,417	\$128,174	\$125,056	\$146,027	\$132,044
Foreign Exchange	11,900	16,614	16,224	16,555	20,990	25,436	27,587	28,480	33,183	32,100	31,737	32,903	39,220	37,170	42,181	39,191
Equities	2,271	2,524	2,207	1,685	1,364	1,606	1,970	2,028	2,537	2,395	2,475	3,080	3,374	3,796	3,662	3,574
Commodities	893	1,067	1,061	979	1,195	1,330	1,397	1,209	1,222	1,108	1,257	1,388	1,315	1,495	1,644	1,507
Credit Derivatives	9,020	15,863	16,029	14,112	14,151	14,759	13,190	11,191	9,449	6,986	5,293	4,186	4,270	3,945	3,986	3,255
Total Notional	131,519	165,559	211,416	214,786	231,099	230,998	221,794	235,992	221,078	180,959	165,252	171,973	176,353	171,462	197,501	179,571

*Notional amount of total: futures, exchange traded options, over the counter options, forwards, and swaps.
 Note: As of 2006 Q2 equities and commodities types are shown as separate categories. They were previously shown as "Other Derivs."
 Numbers may not add up to total due to rounding.
 Source: Call reports

Graph 4
Four Banks Dominate in Derivatives*
Insured U.S. Commercial Banks and Savings Associations

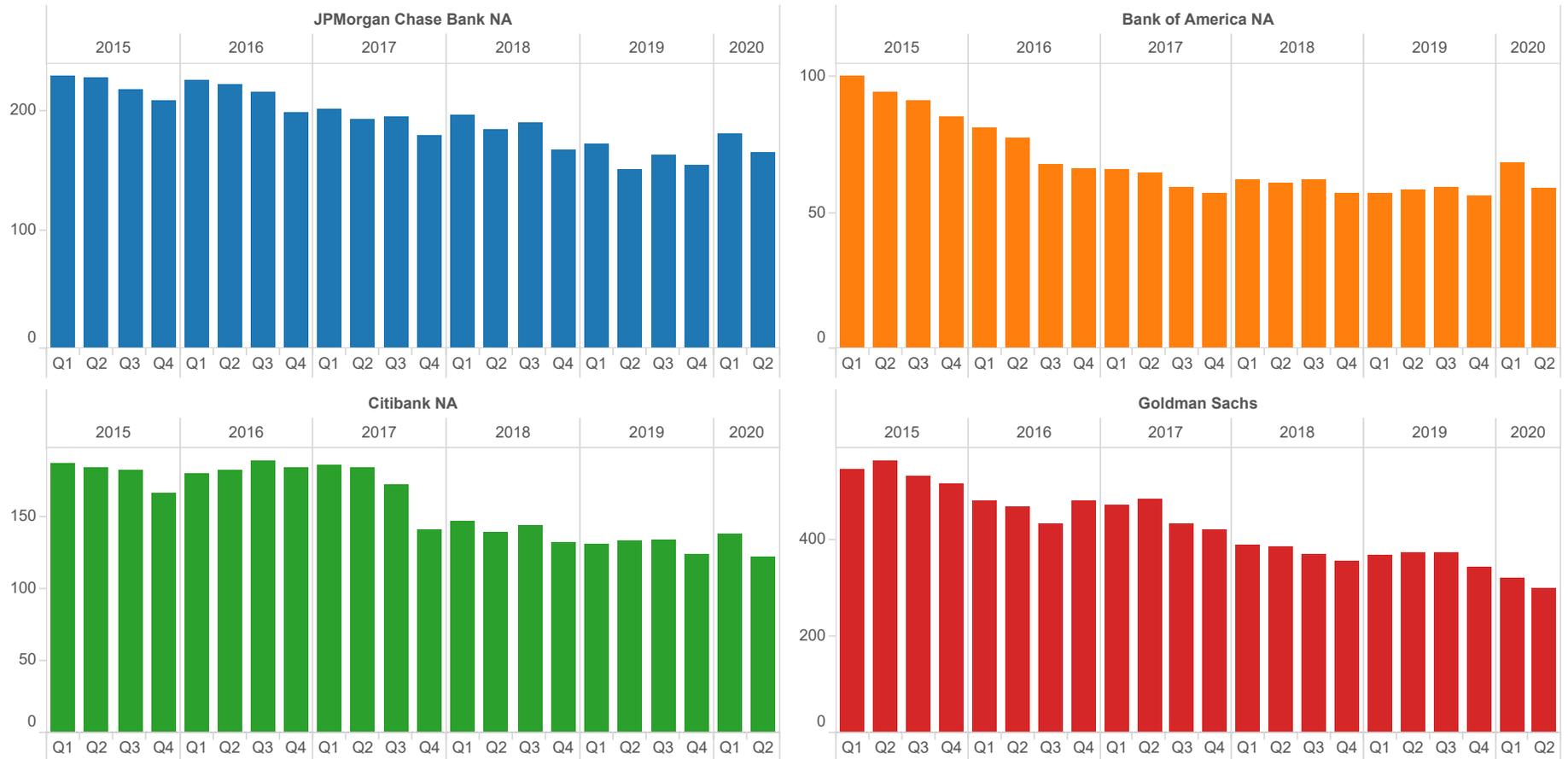


In billions of dollars

	Top 4	All Other Banks	Grand Total
Futures & Forwards	\$30,843	\$10,175	\$41,018
Total Swaps	90,976	10,758	101,734
Total Options	30,813	2,752	33,564
Credit Derivatives	2,987	268	3,255
Total Notional	155,618	23,953	179,571

*Notional amount of total: futures, exchange-traded options, over-the-counter options, forwards, and swaps.
 Source: Call reports

Graph 5
Credit Exposure to Risk-Based Capital (in Percentage)
Top 4 Insured U.S. Commercial Banks and Savings Associations by Derivative Holdings

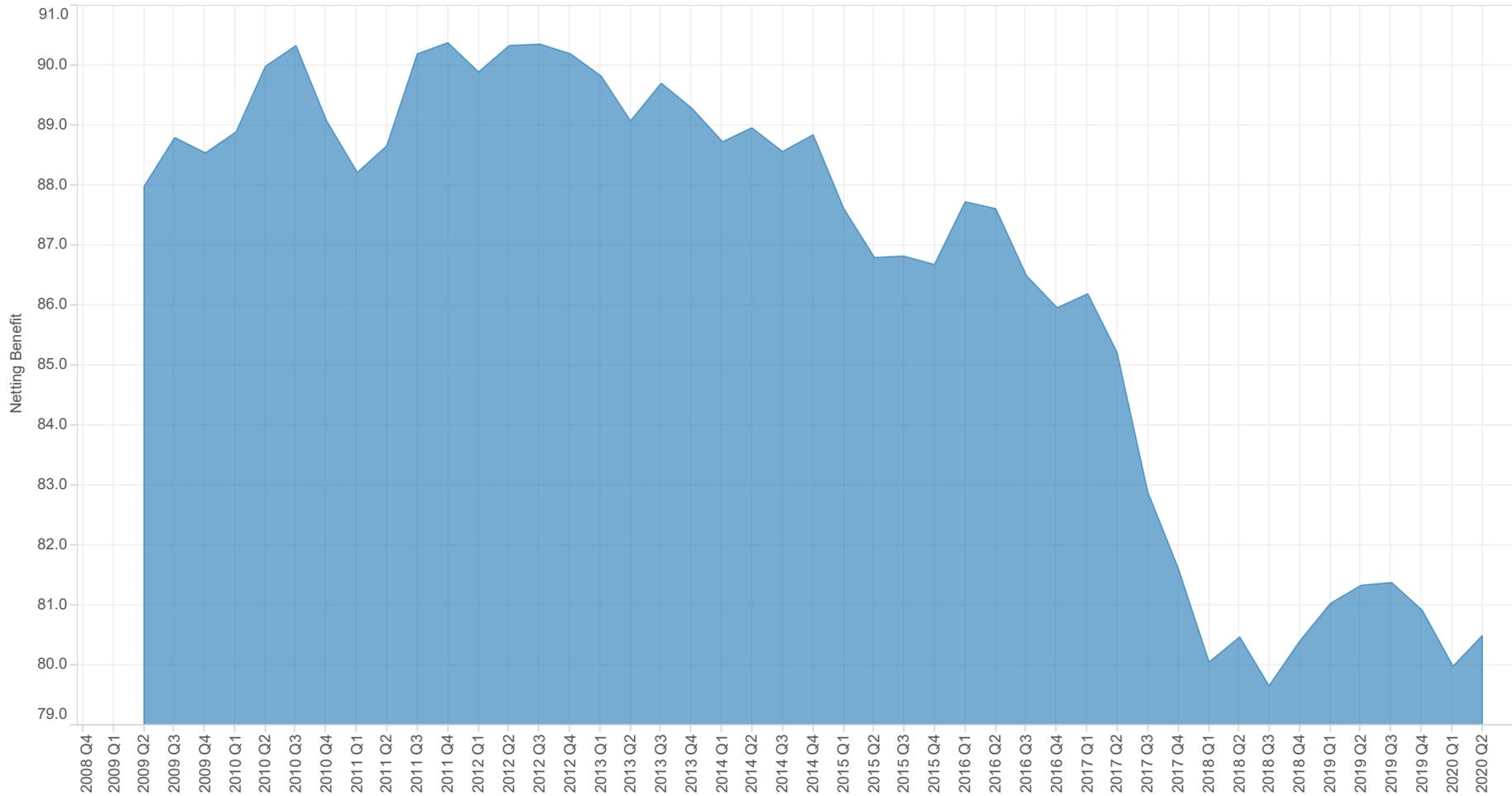


	2012				2013				2014				2015				2016				2017				2018				2019				2020	
	Q1	Q2	Q3	Q4	Q1	Q2																												
JPMorgan Chase Bank NA	250	246	247	229	219	216	205	183	183	189	181	177	229	228	219	209	225	221	216	199	201	193	195	179	197	184	190	167	173	150	163	153	181	165
Bank of America NA	149	141	139	132	129	125	121	117	109	107	107	93	100	95	91	85	81	77	68	66	66	64	59	57	62	61	62	57	58	58	59	56	68	59
Citibank NA	172	171	170	170	165	164	161	148	147	156	190	173	187	184	181	166	180	181	188	183	186	184	171	140	146	139	144	132	130	132	134	124	138	122
Goldman Sachs	751	738	727	705	703	693	719	741	689	620	539	516	547	563	530	516	482	467	433	481	472	484	433	420	389	384	371	354	366	372	372	344	319	299

TOTAL	Q1	Q2	Q3	Q4	Q1	Q2																												
TOTAL	284	282	281	271	261	258	262	262	248	240	224	211	238	242	232	223	226	222	217	220	220	218	205	191	195	187	188	173	178	169	176	164	173	159

Note: The methodology to calculate the credit risk exposure to capital ratio for the Top 4 category uses a weighted average of total current credit exposure.
Source: Call reports

Graph 6
Netting Benefit*: Amount of Gross Credit Exposure Eliminated Through Bilateral Netting (in Percentage)
Insured U.S. Commercial Banks and Savings Associations by Derivative Holdings

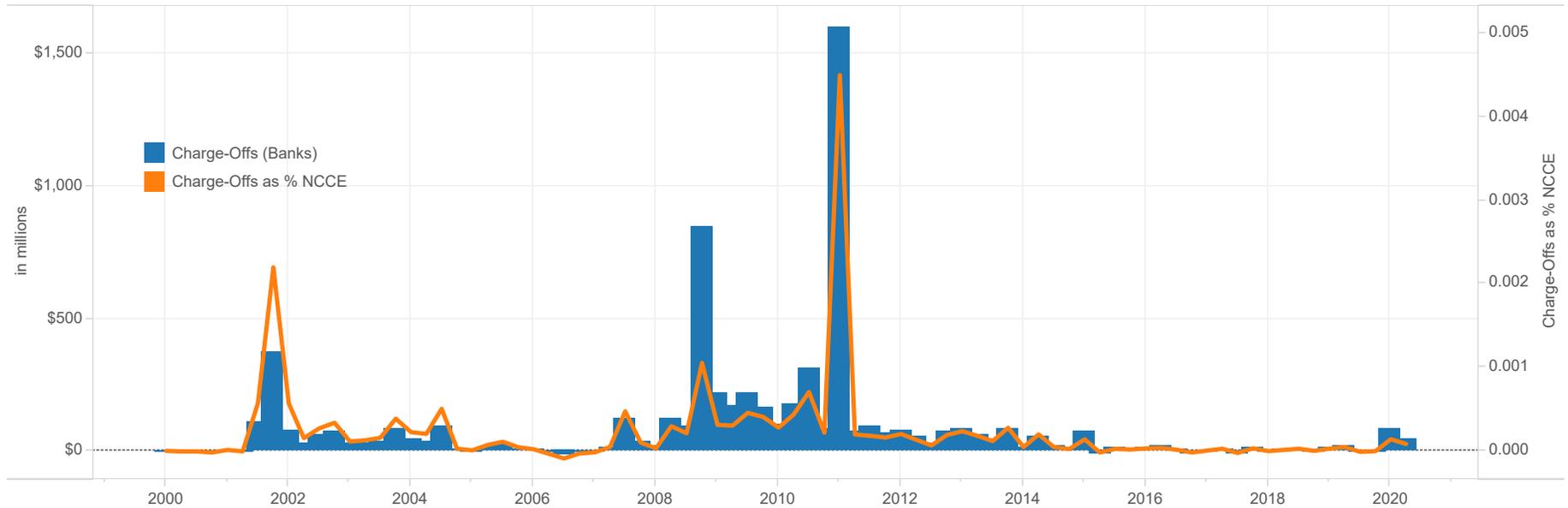


Netting Benefit

2012				2013				2014				2015				2016				2017				2018				2019				2020	
Q1	Q2	Q3	Q4	Q1	Q2																												
89.9	90.3	90.3	90.2	89.8	89.1	89.7	89.3	88.7	88.9	88.6	88.8	87.6	86.8	86.8	86.7	87.7	87.6	86.5	86.0	86.2	85.2	82.9	81.6	80.0	80.5	79.7	80.4	81.0	81.3	81.4	80.9	80.0	80.5

*The netting benefit is defined as: \$ amount of netting benefits/gross positive fair value.
 Source: Call reports, beginning the first quarter of 2015 RC-R; otherwise RC-L

Graph 7
Quarterly Charge-Offs/(Recoveries) From Derivatives - Bank
Insured U.S. Commercial Banks and Savings Associations with Derivatives



In millions of dollars

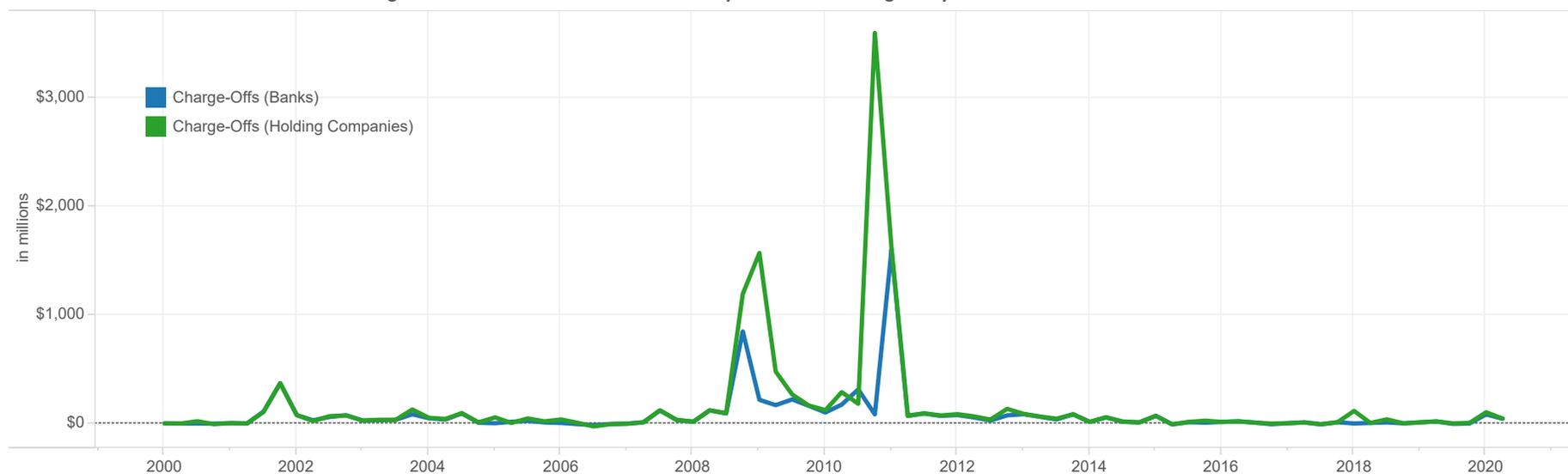
	2000				2001				2002				2003					
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4		
Charge-Offs (Banks)	0.0	-1.0	-1.0	-3.0	2.0	-1.0	107.3	370.0	75.8	28.2	59.0	73.7	25.3	29.9	32.3	83.7		
	2004				2005				2006				2007					
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4		
Charge-Offs (Banks)	46.7	34.9	92.2	5.4	1.3	14.2	23.0	8.3	3.6	-7.0	-16.0	-5.8	-3.1	9.1	119.5	30.7		
	2008				2009				2010				2011					
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4		
Charge-Offs (Banks)	15	120	92	847	217	168	221	162	100	173	313	83	1,601	72	91	69		
	2012				2013				2014				2015					
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4		
Charge-Offs (Banks)	76.35	54.34	26.12	73.44	84.28	60.72	35.77	83.45	12.78	55.90	14.53	7.91	69.31	-7.93	10.44	6.40		
	2016				2017				2018				2019				2020	
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2
Charge-Offs (Banks)	13.30	18.56	6.48	-7.84	1.22	8.71	-8.77	10.26	-1.14	3.97	8.80	0.06	9.11	17.23	-4.78	-1.45	82.70	41.88

Note: The figures are for each quarter alone, not year-to-date.
 NCCE: Pre 2009 Q2 (RC-R); 2009 Q2 - 2014 Q4 (RC-L); 2015 Q1 onward (RC-R)
 Source: Call reports

Graph 8

Quarterly Charge-Offs/(Recoveries) From Derivatives - Holding Company

Insured U.S. Commercial Banks and Savings Associations with Derivatives Compared with Holding Companies



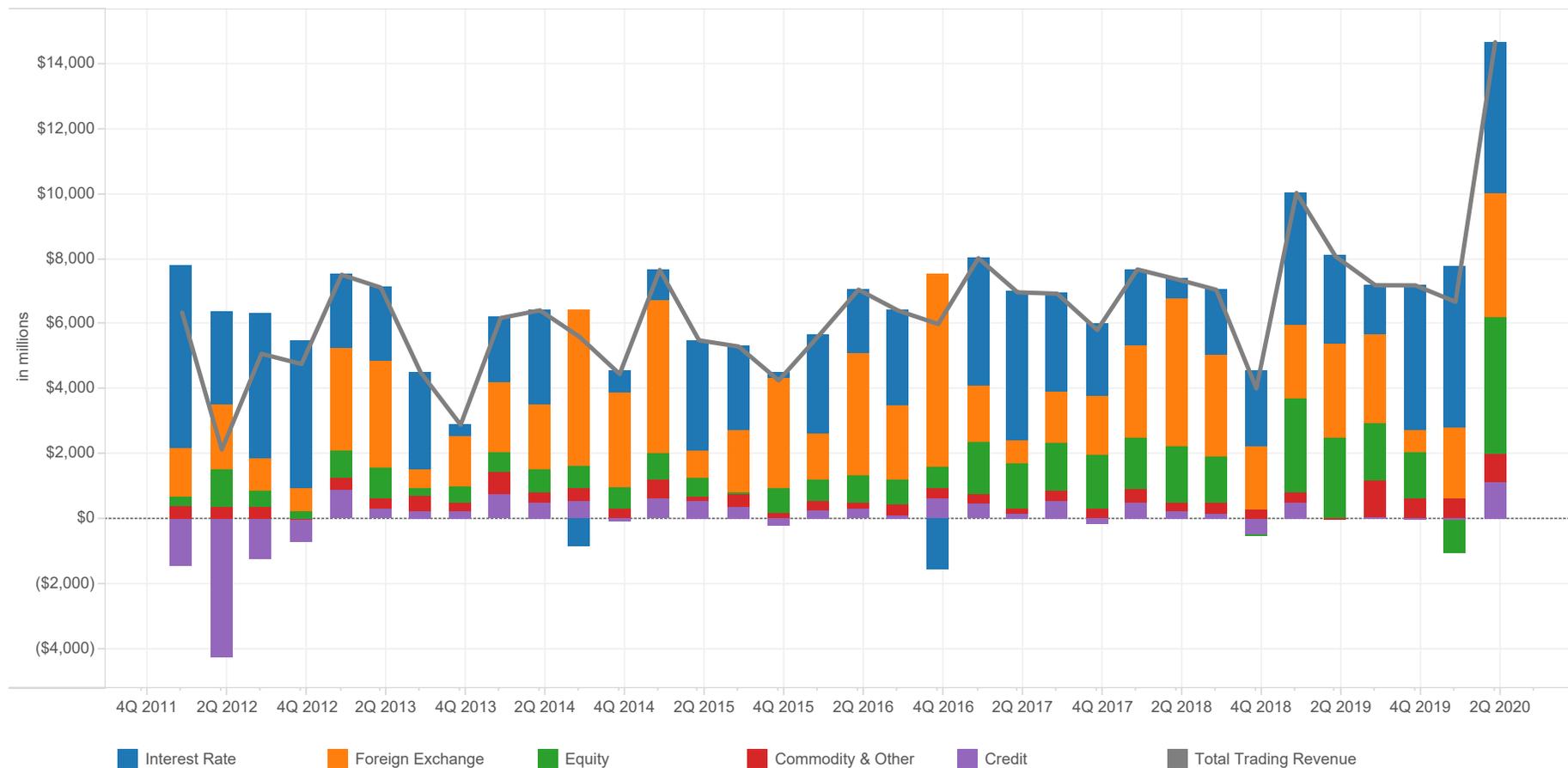
In millions of dollars

	2000				2001				2002				2003				2004					
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4		
Charge-Offs (Banks)	0.0	-1.0	-1.0	-3.0	2.0	-1.0	107.3	370.0	75.8	28.2	59.0	73.7	25.3	29.9	32.3	83.7	46.7	34.9	92.2	5.4		
Charge-Offs (Holding Companies)	0.1	-1.0	19.3	-7.0	2.0	-1.0	107.3	369.6	75.8	21.2	66.0	73.7	25.3	32.9	31.4	127.8	51.2	40.4	94.2	9.0		
	2005				2006				2007				2008				2009					
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4		
Charge-Offs (Banks)	1	14	23	8	4	-7	-16	-6	-3	9	119	31	15	120	92	847	217	168	221	162		
Charge-Offs (Holding Companies)	55	4	45	18	35	5	-28	-7	-3	10	119	32	15	120	93	1,192	1,570	477	266	164		
	2010				2011				2012				2013				2014					
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4		
Charge-Offs (Banks)	100	173	313	83	1,601	72	91	69	76	54	26	73	84	61	36	83	13	56	15	8		
Charge-Offs (Holding Companies)	122	288	181	3,598	1,617	68	92	73	85	64	35	133	87	63	43	83	14	56	17	9		
	2015				2016				2017				2018				2019				2020	
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2
Charge-Offs (Banks)	69.3	-7.9	10.4	6.4	13.3	18.6	6.5	-7.8	1.2	8.7	-8.8	10.3	-1.1	4.0	8.8	0.1	9.1	17.2	-4.8	-1.5	82.7	41.9
Charge-Offs (Holding Companies)	69.0	-10.2	12.9	24.5	12.8	18.0	7.5	-2.5	1.4	8.9	-8.3	9.6	114.5	3.5	36.6	0.1	9.5	17.9	-0.3	4.1	102.1	44.0

Note: The figures are for each quarter alone, not year-to-date.

Source: Call reports and Y-9

Graph 9a
Quarterly Trading Revenue (Cash and Derivative Positions)* - Bank
Insured U.S. Commercial Banks and Savings Associations

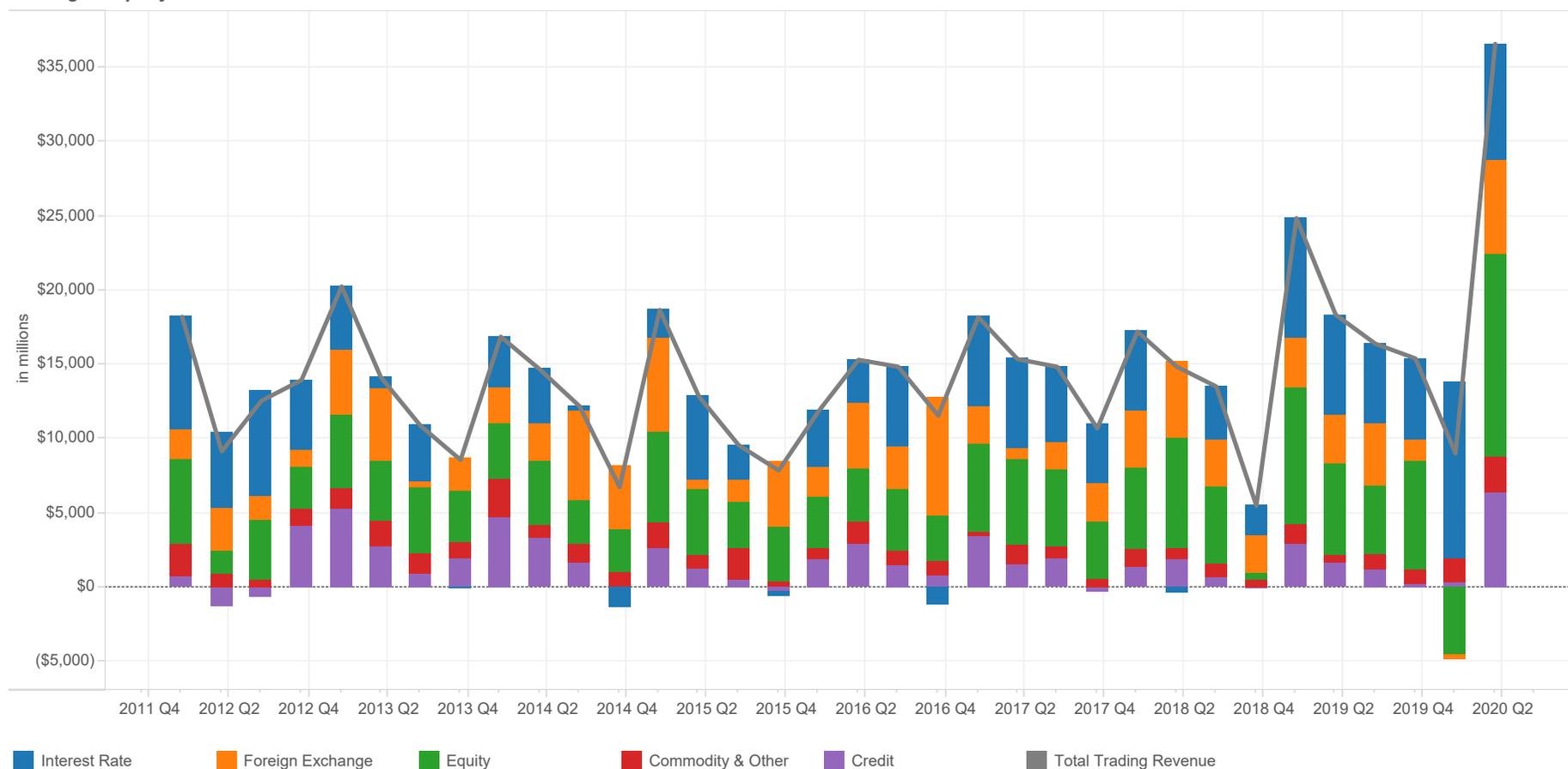


In millions of dollars

	2016				2017				2018				2019				2020	
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2
Interest Rate	\$3,023	\$1,973	\$2,920	(\$1,547)	\$3,917	\$4,586	\$3,011	\$2,220	\$2,317	\$587	\$1,998	\$2,305	\$4,078	\$2,730	\$1,523	\$4,471	\$4,950	\$4,643
Foreign Exchange	1,424	3,719	2,294	5,941	1,743	697	1,608	1,811	2,861	4,569	3,130	1,971	2,254	2,900	2,718	662	2,167	3,841
Equity	668	867	734	681	1,595	1,359	1,454	1,649	1,624	1,727	1,444	-43	2,895	2,464	1,805	1,427	-1,040	4,148
Commodity & Other	271	161	353	296	330	211	300	324	395	286	346	274	323	-43	1,109	600	646	905
Credit	263	342	118	634	447	128	566	-178	487	215	141	-476	485	30	43	34	-34	1,129
Total Trading Revenue	5,650	7,062	6,420	6,006	8,031	6,981	6,940	5,824	7,684	7,384	7,059	4,030	10,035	8,081	7,198	7,194	6,688	14,666

*The trading revenue figures are for cash and derivative activities. Revenue figures are for each quarter alone, not year-to-date.
 Note: Numbers may not add up to total due to rounding.
 Source: Call reports

Graph 9b
Quarterly Trading Revenue (Cash and Derivative Positions)*
Holding Company

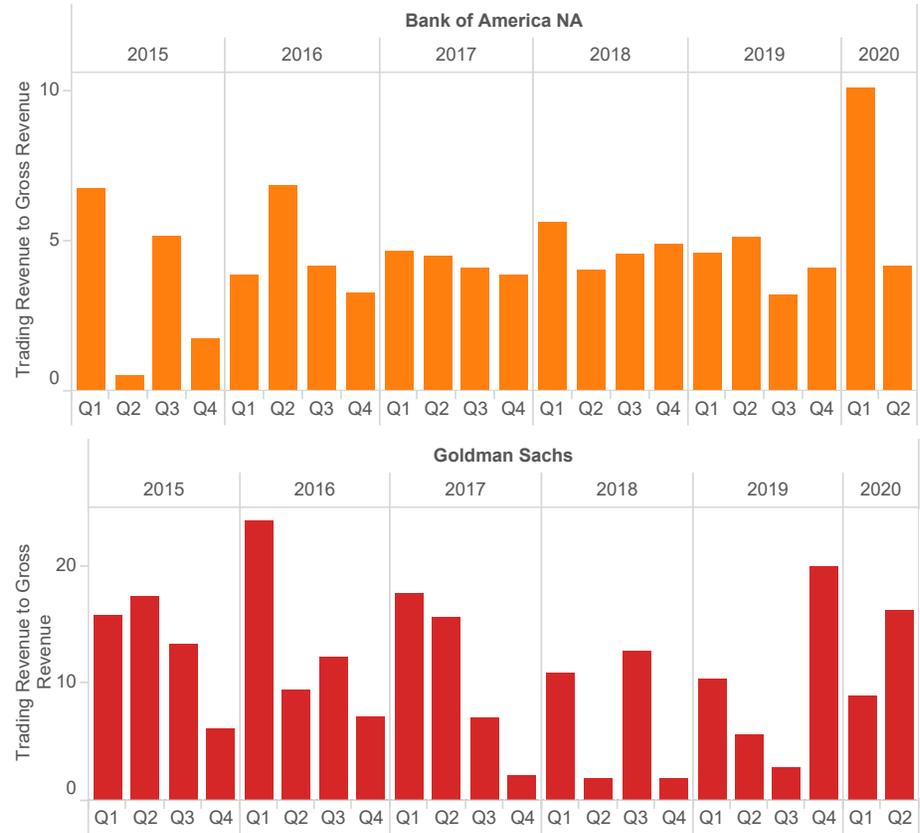
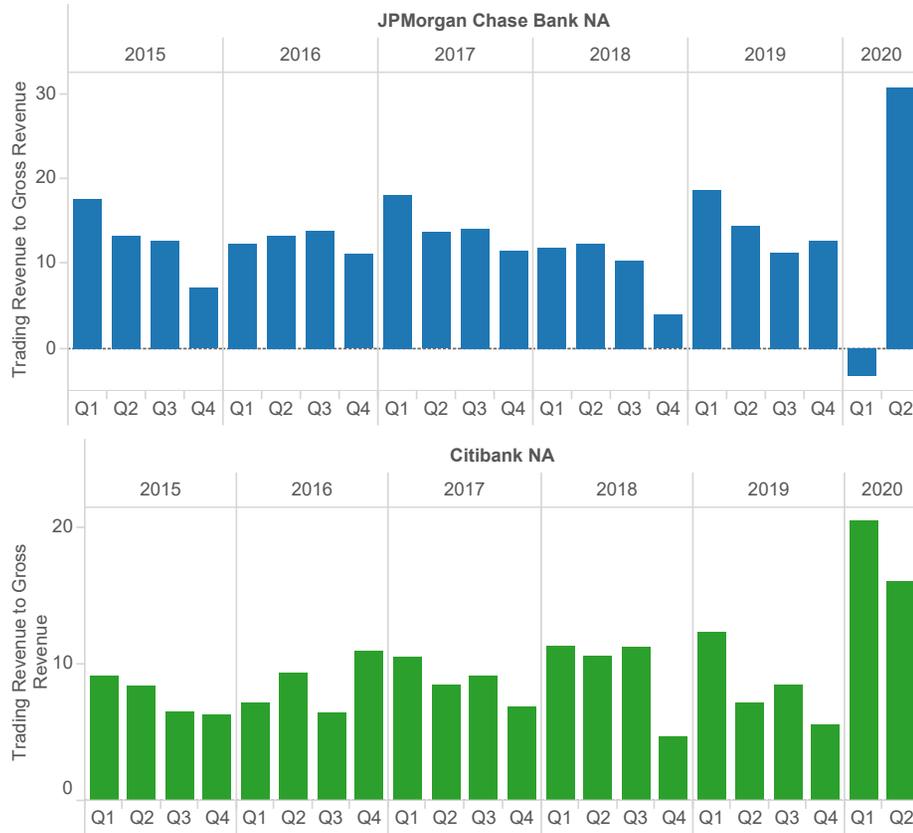


In millions of dollars

	2016				2017				2018				2019				2020	
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2
Interest Rate	\$3,808	\$2,965	\$5,359	(\$1,193)	\$6,055	\$6,019	\$5,124	\$4,006	\$5,361	(\$336)	\$3,550	\$1,997	\$8,050	\$6,733	\$5,352	\$5,431	\$11,948	\$7,806
Foreign Exchange	2,025	4,318	2,899	8,007	2,524	733	1,848	2,589	3,900	5,133	3,222	2,530	3,396	3,351	4,241	1,463	-288	6,360
Equity	3,441	3,612	4,159	3,021	5,939	5,783	5,123	3,867	5,431	7,445	5,222	502	9,215	6,083	4,548	7,387	-4,546	13,602
Commodity & Other	738	1,491	969	1,003	299	1,317	769	568	1,177	779	874	508	1,298	512	1,045	981	1,664	2,486
Credit	1,880	2,940	1,482	742	3,381	1,523	1,996	-310	1,359	1,848	666	-25	2,903	1,684	1,226	159	257	6,331
Total Trading Revenue	11,892	15,327	14,868	11,579	18,198	15,376	14,861	10,721	17,229	14,870	13,534	5,513	24,862	18,364	16,412	15,420	9,036	36,585

*The trading revenue figures are for cash and derivative activities. Revenue figures are for each quarter alone, not year-to-date.
 Note: Numbers may not add up to total due to rounding.
 Source: Y9

Graph 10
Quarterly Trading Revenue (Cash and Derivative Positions) as a Percentage of Gross Revenue (in Percentage)
Top 4 Insured U.S. Commercial Banks and Savings Associations by Derivative Holdings



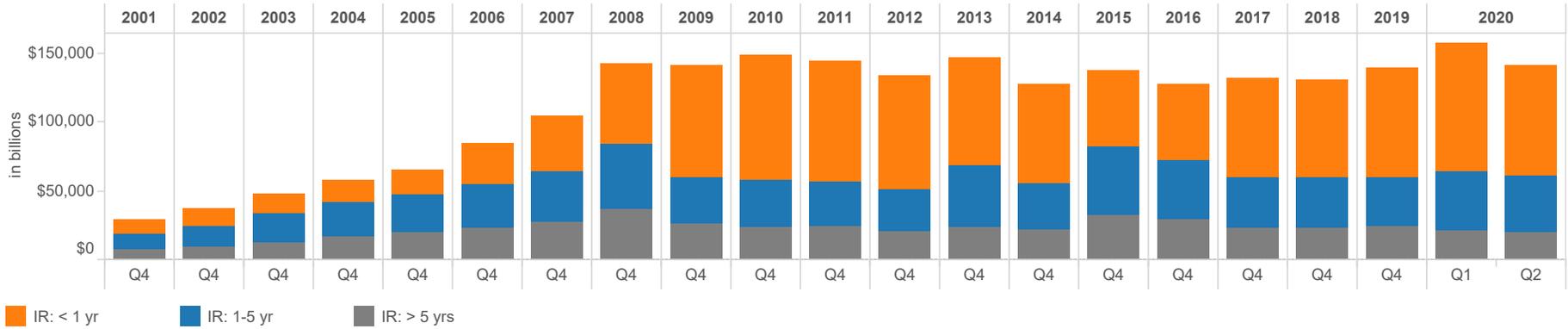
Trading Revenue to Gross Revenue*

	2014				2015				2016				2017				2018				2019				2020	
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2
JPMorgan Chase Bank NA	12.63	13.31	13.47	6.97	17.73	13.25	12.65	7.03	12.26	13.34	13.83	11.17	17.98	13.66	14.01	11.52	11.90	12.19	10.26	3.92	18.57	14.57	11.30	12.62	-3.33	30.88
Bank of America NA	7.80	9.11	5.11	3.68	6.78	0.49	5.19	1.72	3.90	6.87	4.18	3.28	4.70	4.49	4.09	3.87	5.62	4.04	4.54	4.90	4.60	5.14	3.20	4.09	10.13	4.14
Citibank NA	8.51	7.43	5.48	4.78	9.17	8.41	6.54	6.30	7.19	9.41	6.47	10.97	10.47	8.50	9.12	6.94	11.33	10.69	11.26	4.66	12.32	7.23	8.48	5.56	20.50	16.05
Goldman Sachs	23.67	22.21	13.74	13.06	15.85	17.32	13.32	6.16	23.78	9.54	12.16	7.22	17.71	15.66	7.10	2.15	10.85	1.84	12.77	1.86	10.31	5.65	2.81	20.02	8.96	16.21
TOTAL	10.06	10.45	8.53	5.35	11.68	7.62	8.41	5.03	8.45	10.14	8.51	8.51	11.68	9.32	9.39	7.55	9.77	8.95	8.82	4.36	12.43	9.53	7.93	8.77	7.44	19.55

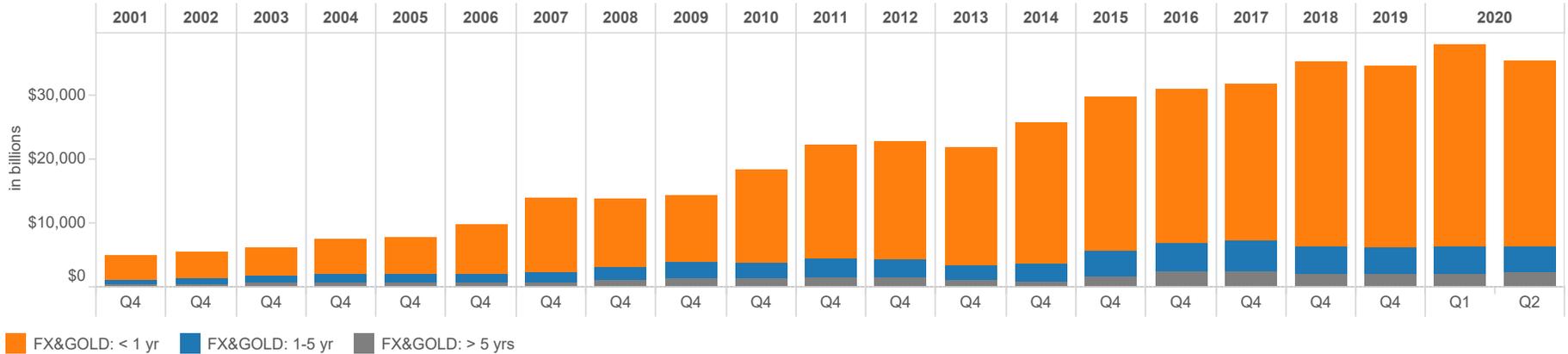
*The trading revenue figures are for cash and derivative activities. Revenue figures are quarterly, not year-to-date numbers.
 Note: Gross revenue equals interest income plus non-interest income.
 Source: Call reports

Graph 11
Notional Amounts of Interest Rate and FX + Gold Contracts by Maturity
Insured U.S. Commercial Banks and Savings Associations

Interest Rate



FX & Gold



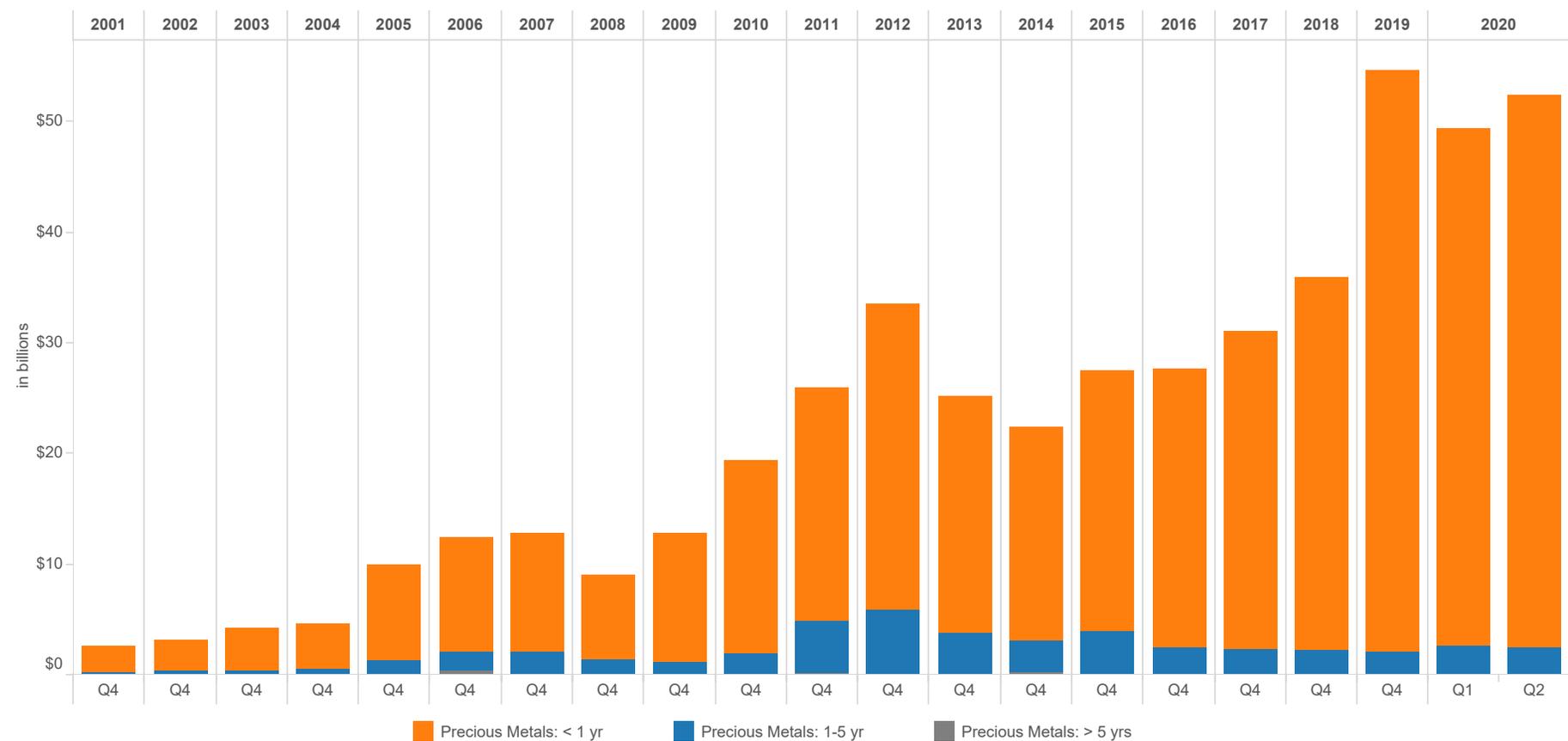
In billions of dollars

	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	
	Q4	Q1	Q2																
IR: < 1 yr	\$13,581	\$15,921	\$18,483	\$29,552	\$39,085	\$58,618	\$81,236	\$90,843	\$87,812	\$82,948	\$77,758	\$71,808	\$55,054	\$55,061	\$72,589	\$71,491	\$79,130	\$92,838	\$80,134
IR: 1-5 yr	20,404	25,893	27,683	31,386	37,222	47,456	33,970	33,497	32,750	30,191	44,157	33,727	49,406	43,261	36,154	36,681	35,854	43,088	41,092
IR: > 5 yrs	13,117	16,492	19,825	23,273	27,724	36,868	26,374	24,307	24,168	21,175	24,630	22,214	32,981	29,762	23,565	23,244	24,259	20,987	19,974
FX&GOLD: < 1 yr	4,510	5,384	5,728	7,730	11,660	10,640	10,490	14,629	17,632	18,386	18,372	22,145	24,130	23,912	24,380	28,891	28,241	31,570	29,050
FX&GOLD: 1-5 yr	1,146	1,317	1,381	1,452	1,639	2,195	2,473	2,462	3,117	2,910	2,341	2,587	3,986	4,454	4,805	4,219	4,052	4,128	4,239
FX&GOLD: > 5 yrs	582	762	689	594	622	1,082	1,347	1,290	1,503	1,480	1,029	969	1,648	2,420	2,525	2,096	2,146	2,152	2,179

Note: Figures above exclude FX contracts with an original maturity of 14 days or less, written options, basis swaps, and any other contracts not subject to risk-based capital requirements. Effective Q1 2015, the reporting form and call report instructions changed. Schedule RC-R now requires banks to report gold and FX notionals in aggregate, rather than separately. Source: Call reports

Graph 12
Notional Amounts of Precious Metal Contracts by Maturity
Insured U.S. Commercial Banks and Savings Associations

Precious Metals



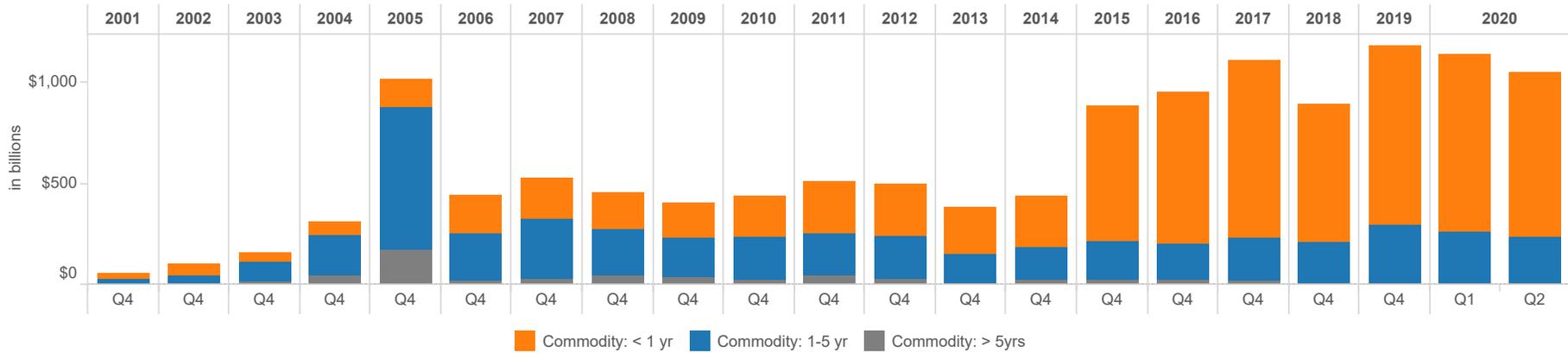
In billions of dollars

	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	
	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q1	Q2
Precious Metals: < 1 yr	\$2.72	\$3.87	\$4.04	\$8.59	\$10.35	\$10.72	\$7.55	\$11.55	\$17.47	\$21.12	\$27.68	\$21.41	\$19.29	\$23.51	\$25.07	\$28.62	\$33.62	\$52.58	\$46.74	\$49.96
Precious Metals: 1-5 yr	0.46	0.33	0.51	1.29	1.75	2.10	1.51	1.24	1.89	4.74	5.82	3.80	2.84	3.92	2.49	2.38	2.25	2.06	2.64	2.46
Precious Metals: > 5 yrs	0.00	0.00	0.00	0.06	0.33	0.01	0.00	0.00	0.03	0.10	0.03	0.00	0.29	0.07	0.02	0.01	0.01	0.00	0.00	0.00

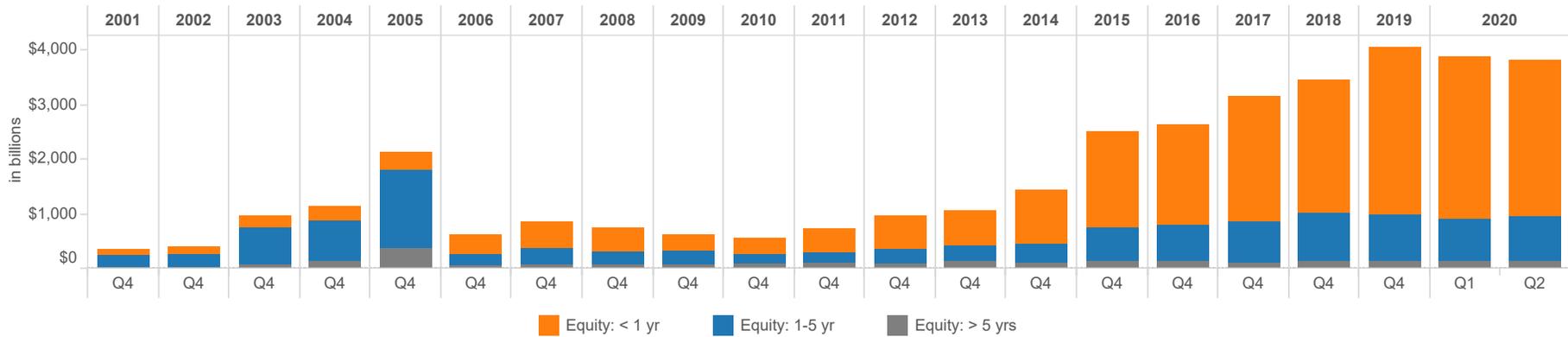
Note: Figures exclude FX contracts with an original maturity of 14 days or less, written options, basis swaps, and any other contracts not subject to risk-based capital requirements.
Source: Call reports

Graph 13
Notional Amounts of Commodity and Equity Contracts by Maturity
Insured U.S. Commercial Banks and Savings Associations

Commodity



Equity

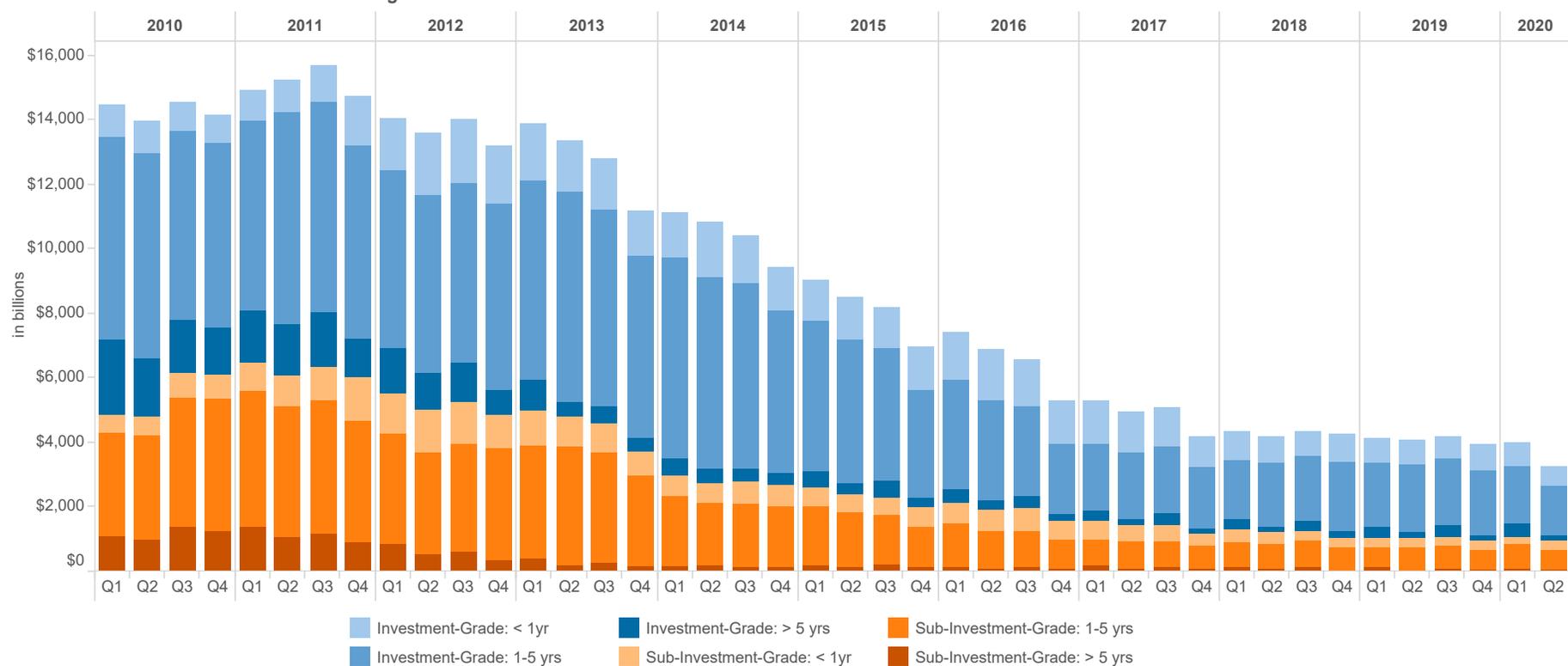


In billions of dollars

	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	
	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q4	Q1	Q2
Commodity: < 1 yr	\$55	\$43	\$64	\$133	\$185	\$206	\$179	\$176	\$203	\$261	\$261	\$235	\$257	\$668	\$750	\$883	\$688	\$884	\$877	\$820
Commodity: 1-5 yr	35	103	205	707	235	297	233	198	209	209	208	144	164	197	179	202	198	286	251	226
Commodity: > 5 yrs	9	14	40	175	20	25	43	33	25	46	28	6	20	22	23	25	9	10	9	9
Equity: < 1 yr	127	197	273	321	341	473	409	312	296	427	627	645	996	1,743	1,842	2,296	2,449	3,084	2,959	2,851
Equity: 1-5 yr	249	674	736	1,428	221	297	256	228	191	210	262	291	352	628	677	733	864	844	780	826
Equity: > 5 yrs	25	84	140	383	45	70	72	82	85	94	82	136	101	130	123	113	139	136	124	129

Note: Figures above exclude foreign exchange contracts with an original maturity of 14 days or less, written options, basis swaps, and any other contracts not subject to risk-based capital requirements.
 Source: Call reports

Graph 14
Notional Amounts of Credit Derivative Contracts by Credit Quality and Maturity
Insured U.S. Commercial Banks and Savings Associations



In billions of dollars

	2015				2016				2017				2018				2019				2020	
	Q1	Q2	Q3	Q4	Q1	Q2																
Investment-Grade: < 1yr	\$1,256	\$1,292	\$1,270	\$1,380	\$1,471	\$1,549	\$1,451	\$1,348	\$1,343	\$1,234	\$1,216	\$934	\$880	\$805	\$764	\$837	\$763	\$758	\$675	\$781	\$726	\$619
Investment-Grade: 1-5 yrs	4,649	4,450	4,108	3,328	3,400	3,101	2,765	2,170	2,072	2,073	2,085	1,897	1,839	1,995	1,988	2,173	1,976	2,083	2,084	2,018	1,799	1,523
Investment-Grade: > 5 yrs	508	359	520	281	457	262	385	214	309	195	345	186	331	184	338	204	367	189	330	198	367	171
Total Investment Grade	\$6,413	\$6,101	\$5,898	\$4,990	\$5,328	\$4,911	\$4,601	\$3,732	\$3,724	\$3,502	\$3,647	\$3,016	\$3,050	\$2,984	\$3,089	\$3,214	\$3,106	\$3,030	\$3,089	\$2,997	\$2,891	\$2,313
	2015				2016				2017				2018				2019				2020	
	Q1	Q2	Q3	Q4	Q1	Q2																
Sub-Investment-Grade: < 1yr	\$596	\$562	\$569	\$607	\$622	\$683	\$683	\$581	\$582	\$509	\$480	\$375	\$400	\$335	\$318	\$304	\$259	\$283	\$275	\$268	\$247	\$278
Sub-Investment-Grade: 1-5 yrs	1,813	1,673	1,518	1,271	1,313	1,159	1,122	869	838	830	814	718	763	791	801	691	661	701	708	624	743	608
Sub-Investment-Grade: > 5 yrs	194	152	213	119	155	101	157	111	159	93	149	77	133	69	133	61	119	60	111	56	105	56
Total Sub-Investment Grade	\$2,604	\$2,387	\$2,299	\$1,997	\$2,090	\$1,943	\$1,962	\$1,561	\$1,579	\$1,432	\$1,443	\$1,170	\$1,296	\$1,195	\$1,252	\$1,056	\$1,039	\$1,044	\$1,093	\$947	\$1,095	\$942

Note: Figures exclude FX contracts with an original maturity of 14 days or less, written options, basis swaps, and any other contracts not subject to risk-based capital requirements.
Source: Call reports

Graph 15
2Q 2020 Notional Amounts of Over-the-Counter and Centrally Cleared Derivative Contracts
Insured U.S. Commercial Banks and Savings Associations



In billions of dollars

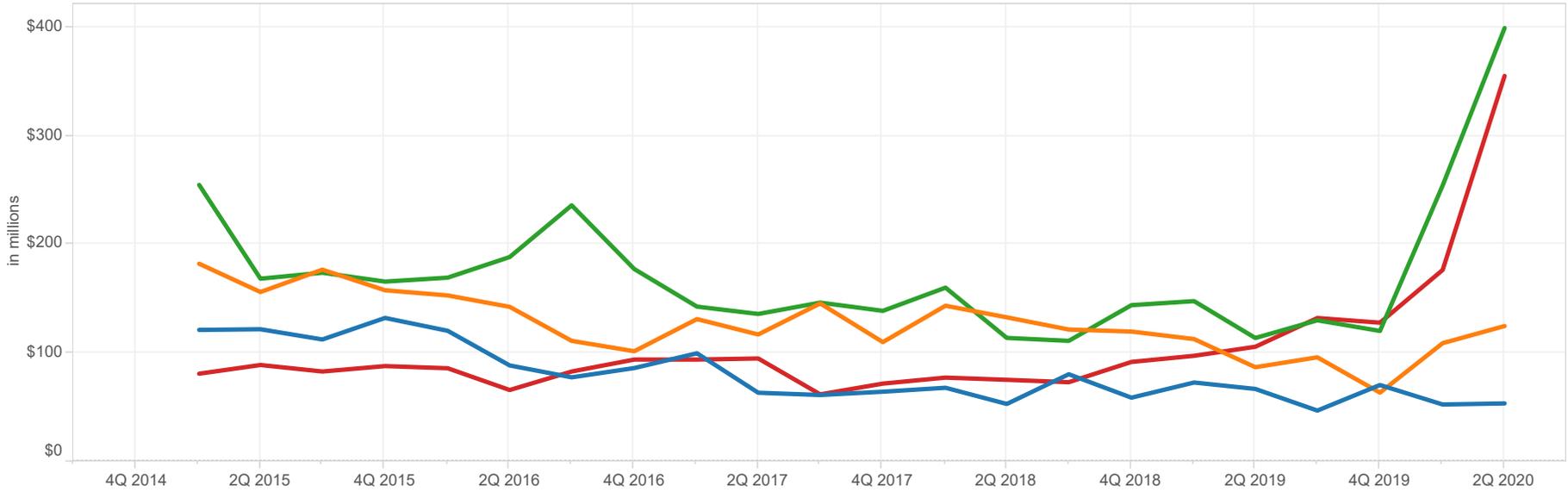
Bank Name	Interest Rate		Foreign Exchange		Equity		Precious Metals		Credit				Other		Total Centrally Cleared	Over-the-Counter	Total Notional
	Centrally Cleared	Over-the-Counter	Investment Grade		Non-Investment Grade		Centrally Cleared	Over-the-Counter									
									Centrally Cleared	Over-the-Counter	Centrally Cleared	Over-the-Counter					
JPMorgan Chase Bank NA	26,490	27,619	141	10,187	748	1,694	0	28	454	435	168	228	49	686	28,051	40,877	68,928
Citibank NA	17,063	7,729	279	11,068	66	453	1	7	230	543	60	211	72	94	17,770	20,105	37,875
Bank of America NA	8,659	4,663	103	4,352	124	402	0	3	154	179	53	133	0	21	9,093	9,752	18,845
Goldman Sachs	7,095	25,687	94	4,816	0	23	0	0	0	98	0	65	0	4	7,189	30,694	37,882
HSBC NA	1,729	489	51	1,155	0	87	0	12	2	11	9	21	0	3	1,791	1,778	3,569
Wells Fargo Bank NA	8,388	1,981	0	404	40	137	0	2	0	2	1	24	0	60	8,429	2,610	11,039
Morgan Stanley Bank NA	0	25	0	26	0	1	0	0	0	8	0	4	0	0	0	65	65
Grand Total	69,424	68,193	667	32,008	978	2,797	1	51	841	1,275	291	688	121	868	72,323	105,880	178,203
ALL OTHER	2,138	1,445	4	2,789	0	30	0	0	1	24	0	24	6	60	2,150	4,372	6,522
TOTAL	71,563	69,637	671	34,797	978	2,827	1	51	842	1,299	291	712	127	928	74,472	110,252	184,724

% of Total

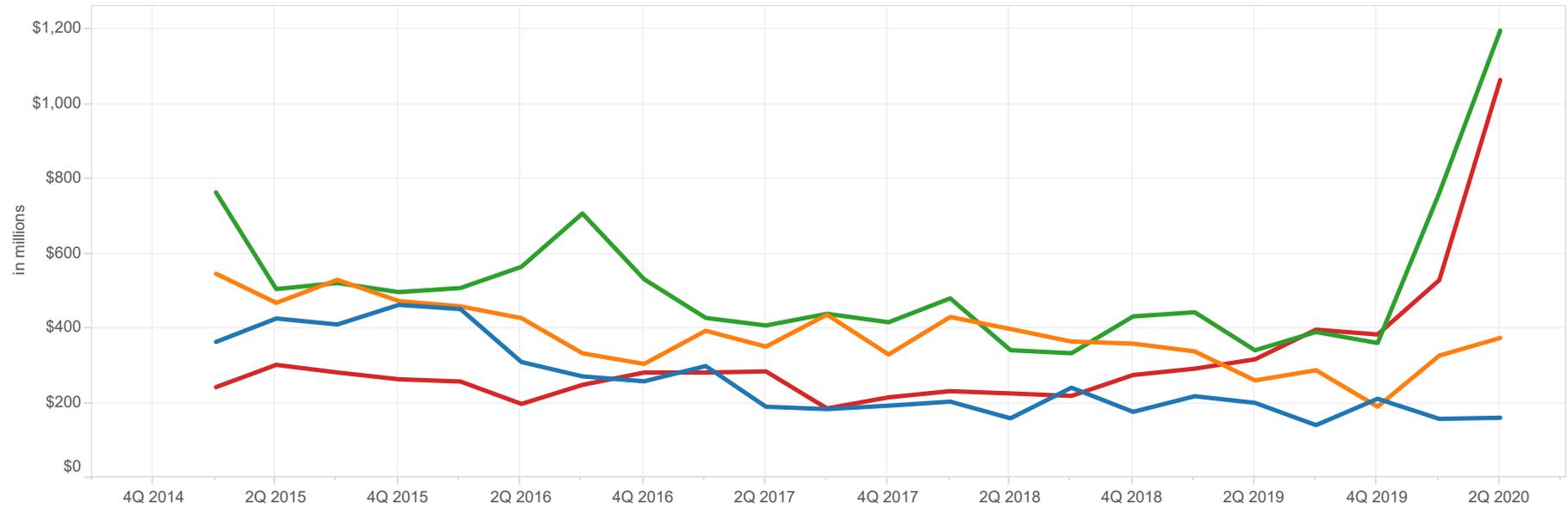
Bank Name	Interest Rate		Foreign Exchange		Equity		Precious Metals		Credit				Other		Total Centrally Cleared as a % of Total Notional	Total Over-the-Counter as a % of Total Notional
	Centrally Cleared	Over-the-Counter	Investment Grade		Non-Investment Grade		Centrally Cleared	Over-the-Counter								
									Centrally Cleared	Over-the-Counter	Centrally Cleared	Over-the-Counter				
JPMorgan Chase Bank NA	49%	51%	1%	99%	31%	69%	0%	100%	51%	49%	42%	58%	7%	93%	41%	59%
Citibank NA	69%	31%	2%	98%	13%	87%	14%	86%	30%	70%	22%	78%	43%	57%	47%	53%
Bank of America NA	65%	35%	2%	98%	24%	76%	0%	100%	46%	54%	28%	72%	0%	100%	48%	52%
Goldman Sachs	22%	78%	2%	98%	0%	100%	0%	100%	0%	100%	0%	100%	0%	100%	19%	81%
HSBC NA	78%	22%	4%	96%	0%	100%	0%	100%	19%	81%	30%	70%	0%	100%	50%	50%
Wells Fargo Bank NA	81%	19%	0%	100%	23%	77%	0%	100%	7%	93%	3%	97%	1%	99%	76%	24%
Morgan Stanley Bank NA	0%	100%	0%	100%	0%	100%	0%	100%	0%	100%	0%	100%	0%	100%	0%	100%

Source: Call reports, Schedule RC-R

Graph 16
Average 60 Day VaR



VaR Capital Requirement



■ Bank of America, National Association
 ■ Citibank, N.A.
 ■ JPMorgan Chase Bank, National Association
 ■ Goldman Sachs Bank USA

Source: Market Risk Regulatory Report for Institutions Subject to the Market Risk Capital Rule—FFIEC 102

TABLE 1

**NOTIONAL AMOUNTS OF DERIVATIVE CONTRACTS
TOP 25 COMMERCIAL BANKS, SAVINGS ASSOCIATIONS AND TRUST COMPANIES IN DERIVATIVES
JUNE 30, 2020, MILLIONS OF DOLLARS**

RANK	BANK NAME	LEGAL ENTITY IDENTIFIER	TOTAL ASSETS	TOTAL DERIVATIVES	TOTAL FUTURES (EXCH TR)	TOTAL OPTIONS (EXCH TR)	TOTAL FORWARDS (OTC)	TOTAL SWAPS (OTC)	TOTAL OPTIONS (OTC)	TOTAL CREDIT DERIVATIVES (OTC)	SPOT FX
1	JPMORGAN CHASE BANK NA	7H6GLXDRUGQU57RNE97	\$2,820,922	\$52,642,731	\$1,236,719	\$2,240,483	\$10,360,426	\$29,111,698	\$8,466,708	\$1,226,697	\$720,614
2	GOLDMAN SACHS BANK USA	KD3XUN7C6T14HNAYLU02	282,583	43,312,307	1,013,477	1,970,304	5,950,122	25,211,719	8,995,205	171,480	305,005
3	CITIBANK NATIONAL ASSN	E57ODZWZ7FF32TWEFA76	1,633,678	41,110,666	646,714	598,836	6,667,203	26,530,901	5,591,154	1,075,858	401,513
4	BANK OF AMERICA NA	B4TYDEB6GKMZO031MB27	2,161,656	18,552,679	195,063	163,230	4,773,225	10,121,757	2,786,657	512,747	376,550
5	WELLS FARGO BANK NA	KB1H1DSPRFMYMCUFXT09	1,799,940	12,232,053	259,494	186,862	5,189,936	4,843,128	1,657,060	95,573	4,319
6	HSBC NA	1IE8VN30JCEQV1H4R804	211,045	3,700,591	84,889	703	955,560	2,263,854	312,308	83,278	81,472
7	STATE STREET BANK&TRUST CO	571474TGEMMWANRLN572	276,808	2,592,842	3,936	0	2,531,515	26,259	31,132	0	86,650
8	BANK OF NEW YORK MELLON	HPFHU0OQ28E4N0NFVK49	357,961	969,832	6,609	45	271,985	664,501	26,527	165	72,640
9	U S BANK NATIONAL ASSN	6BYL5QZYBDK8S7L73M02	536,291	650,890	15,226	500	108,104	373,083	142,815	11,162	497
10	PNC BANK NATIONAL ASSN	AD6GFRVSDT01YPT1CS68	455,306	482,166	3,698	4,016	28,806	401,252	33,283	11,110	759
11	TRUIST BANK	JJKC32MCHWDI71265Z06	493,999	304,900	4,282	22,910	25,023	184,100	58,320	10,265	251
12	NORTHERN TRUST CO	6PTKHDJ8HDUF78PFWH30	150,924	270,478	0	0	251,061	18,784	633	0	18,375
13	TD BANK NATIONAL ASSN	03D0JEWFDUFUS0SEEK89	383,967	249,594	0	0	2,708	245,359	1,527	0	0
14	CITIZENS BANK NATIONAL ASSN	DRMSV1Q0EKMEXLAU1P80	179,841	220,615	2,282	0	23,675	176,557	15,375	2,727	134
15	CAPITAL ONE NATIONAL ASSN	207ALC1P1YM0OVDV0K75	363,709	199,424	6,751	0	4,446	181,051	1,308	5,867	87
16	MUFG UNION BANK NA	OX3PU53ZLPQKJ4700D47	136,272	197,937	5,084	0	85,680	101,087	5,988	97	722
17	FIFTH THIRD BANK NA	QFROUN1UWUYU0DVIWD51	201,287	143,671	1,130	181	8,039	98,800	30,437	5,085	207
18	REGIONS BANK	EQTWL1G7ODGC2MGLV11	143,443	133,795	1,341	0	4,465	99,386	21,456	7,147	31
19	KEYBANK NATIONAL ASSN	HUX2X73FUCYHUVH1BK78	169,805	126,895	2,258	0	7,295	96,837	19,914	591	280
20	BOKF NATIONAL ASSN	FU7RSW4CQQY98A2O7J66	45,622	116,975	1,372	536	104,173	7,397	3,473	23	0
21	MANUFACTURERS&TRADERS TR CO	WWB2V0FCW3A0EE3ZJN75	139,153	98,247	0	0	3,535	90,875	3,837	0	107
22	MORGAN STANLEY BANK NA	G1MLHIS0N32I3QPILB75	167,077	77,666	0	0	18,321	31,591	15,685	12,069	2,525
23	HUNTINGTON NATIONAL BANK	2WHM8VNJH63UN14OL754	118,284	76,740	59	0	4,404	49,460	19,451	3,367	11
24	BBVA USA	C90VT034M03BN29IRA40	100,853	60,884	2,330	0	2,497	46,121	8,963	973	0
25	SANTANDER BANK N A	TR24TWEY5RVRQV65HD49	87,751	52,322	0	0	1,497	43,225	7,450	149	6
TOP 25 COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			\$13,418,179	\$178,576,898	\$3,492,713	\$5,188,606	\$37,383,700	\$101,018,783	\$28,256,665	\$3,236,431	\$2,072,753
OTHER COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			5,511,202	994,536	5,181	724	136,684	715,330	118,457	18,160	2,850
TOTAL COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			18,929,380	179,571,434	3,497,894	5,189,330	37,520,384	101,734,113	28,375,122	3,254,590	2,075,603

Note: Credit derivatives have been included in the sum of total derivatives. Credit derivatives have been included as an "over the counter" category, although the call report does not differentiate by market currently.

Note: Before the first quarter of 1995 total derivatives included spot FX. Beginning in that quarter, spot FX has been reported separately.

Note: Numbers may not add up to total due to rounding.

Source: Call reports, Schedule RC-L

TABLE 2

**NOTIONAL AMOUNTS OF DERIVATIVE CONTRACTS (HOLDING COMPANIES)
TOP 25 HOLDING COMPANIES IN DERIVATIVES
JUNE 30, 2020, MILLIONS OF DOLLARS**

RANK	HOLDING COMPANY	LEGAL ENTITY IDENTIFIER	TOTAL ASSETS	TOTAL DERIVATIVES	FUTURES (EXCH TR)	OPTIONS (EXCH TR)	FORWARDS (OTC)	SWAPS (OTC)	OPTIONS (OTC)	CREDIT DERIVATIVES (OTC)	SPOT FX
1	JPMORGAN CHASE & CO.	7H6GLXDRUGQFU57RNE97	\$3,213,115	\$52,298,483	\$1,260,921	\$2,610,220	\$10,904,477	\$28,111,329	\$8,161,091	\$1,250,445	\$708,445
2	GOLDMAN SACHS GROUP, INC., THE	KD3XUN7C6T14HNAYLU02	1,141,526	42,509,967	1,465,848	3,378,792	6,274,318	20,570,145	9,714,469	1,106,395	209,865
3	CITIGROUP INC.	E57ODZWZ7FF32TWEFA76	2,232,715	41,702,798	793,824	2,155,663	7,669,635	24,464,476	5,400,295	1,218,905	406,075
4	BANK OF AMERICA CORPORATION	B4TYDEB6GKMZO031MB27	2,741,688	36,843,470	1,162,030	1,030,137	9,531,200	20,124,732	4,092,967	902,404	284,459
5	MORGAN STANLEY	IGJSJL3JD5P30I6NJZ34	975,363	31,316,101	733,052	1,443,796	4,829,797	16,070,464	7,754,019	484,973	49,588
6	WELLS FARGO & COMPANY	KB1H1DSPRFMYMCUFXT09	1,968,766	12,591,448	266,061	228,901	5,716,602	4,646,959	1,652,709	80,216	4,308
7	MIZUHO AMERICAS LLC		47,522	6,242,131	22,690	12,472	775,918	5,280,850	144,813	5,388	4,628
8	HSBC NORTH AMERICA HOLDINGS INC.	213800JCL1FHBQK3M654	283,450	5,705,802	300,762	479,274	955,905	3,567,105	319,479	83,278	81,472
9	SMBC AMERICAS HOLDINGS, INC.		24,757	5,242,763	148,259	1,309,186	1,507,648	1,467,580	808,867	1,223	3,226
10	STATE STREET CORPORATION	571474TGEMMWANRLN572	280,242	2,583,881	3,936	0	2,531,515	17,298	31,132	0	86,650
11	BANK OF NEW YORK MELLON CORPORATION, THE	HPFHU00Q28E4N0NFVK49	442,316	964,561	7,287	158	288,057	642,367	26,527	165	72,680
12	U.S. BANCORP	6BYL5QZYBDK8S7L73M02	546,652	650,766	15,226	500	107,725	373,338	142,815	11,162	497
13	BARCLAYS US LLC	213800H14XVWV870I72	148,325	637,226	13,356	240,212	325,600	14,567	0	43,491	12
14	RBC US GROUP HOLDINGS LLC		141,563	572,778	164,077	268,369	22,099	117,213	579	440	91
15	PNC FINANCIAL SERVICES GROUP, INC., THE	AD6GFRVSDT01YPT1CS68	459,038	475,516	3,733	4,016	32,419	390,953	33,283	11,110	759
16	CREDIT SUISSE HOLDINGS (USA), INC.	549300YHT5NGRKJD1R94	121,584	439,085	8,919	3,531	208,385	115,701	11,069	91,478	149
17	TRUIST FINANCIAL CORPORATION	JJKC32MCHWDI71265Z06	504,336	321,542	4,282	22,910	28,915	196,850	58,320	10,265	251
18	TD GROUP US HOLDINGS LLC	03D0JEWDFUS0SEEKG89	475,631	280,341	15,310	0	11,730	251,775	1,527	0	0
19	CAPITAL ONE FINANCIAL CORPORATION	ZUE8T73ROZOF6FLBAR73	421,296	269,698	6,751	0	11,807	243,965	1,308	5,867	87
20	NORTHERN TRUST CORPORATION	6PTKHDJ8HDUF78PFWH30	151,433	267,728	0	0	251,061	16,034	633	0	18,375
21	CITIZENS FINANCIAL GROUP, INC.	DRMSV1Q0EKMEXLAU1P80	180,246	220,615	2,282	0	23,675	176,557	15,375	2,727	134
22	MUFG AMERICAS HOLDINGS CORPORATION	OX3PU53ZLPQKJ4700D47	167,350	218,598	5,819	582	104,990	101,123	5,988	97	722
23	FIFTH THIRD BANCORP	THRNG6BD57P9QWTQLG42	202,906	144,376	1,130	181	8,039	99,505	30,437	5,085	207
24	AMERIPRISE FINANCIAL, INC.	6ZLKQF7QB6JAEKQS5388	154,916	135,991	5,611	5,674	270	66,974	54,880	2,581	2
25	KEYCORP	RKPI3RZGV1V1FJTH5T61	172,039	135,022	2,258	0	10,059	101,510	20,604	591	280
TOP 25 HOLDING COMPANIES WITH DERIVATIVES			\$17,198,776	\$242,770,687	\$6,413,423	\$13,194,575	\$52,131,844	\$127,229,371	\$38,483,187	\$5,318,287	\$1,932,961

Note: Currently, the Y-9 report does not differentiate credit derivatives.

Note: Before the first quarter of 2005, total derivatives included spot FX. Beginning in that quarter, spot FX has been reported separately.

Note: Numbers may not add up to total due to rounding.

Source: Consolidated Financial Statements for Bank Holding Companies, FR Y-9, Schedule HC-L

TABLE 3

DISTRIBUTION OF DERIVATIVE CONTRACTS
TOP 25 COMMERCIAL BANKS, SAVINGS ASSOCIATIONS AND TRUST COMPANIES IN DERIVATIVES
JUNE 30, 2020, MILLIONS OF DOLLARS

RANK	BANK NAME	LEGAL ENTITY IDENTIFIER	TOTAL ASSETS	TOTAL DERIVATIVES	PERCENT EXCH TRADED CONTRACTS	PERCENT OTC CONTRACTS	PERCENT INT RATE CONTRACTS	PERCENT FOREIGN EXCH CONTRACTS	PERCENT EQUITY CONTRACTS	PERCENT OTHER CONTRACTS	PERCENT CREDIT DERIVATIVES
1	JPMORGAN CHASE BANK NA	7H6GLXDRUGQFU57RNE97	\$2,820,922	\$52,642,731	(%)	(%)	(%)	(%)	(%)	(%)	(%)
2	GOLDMAN SACHS BANK USA	KD3XUN7C6T14HNAYLU02	282,583	43,312,307	6.6	93.4	70.3	22.4	3.4	1.6	2.3
3	CITIBANK NATIONAL ASSN	E57ODZWZ7FF32TWEFA76	1,633,678	41,110,666	6.9	93.1	87.3	12.2	0.1	0.0	0.4
4	BANK OF AMERICA NA	B4TYDEB6GKMZO031MB27	2,161,656	18,552,679	3.0	97.0	64.6	29.7	2.1	1.0	2.6
5	WELLS FARGO BANK NA	KB1H1DSPRFMYMUCUFT09	1,799,940	12,232,053	1.9	98.1	69.9	24.5	2.6	0.1	2.8
6	HSBC NA	1IE8VN30JCEQV1H4R804	211,045	3,700,591	3.6	96.4	93.1	3.4	2.1	0.6	0.8
7	STATE STREET BANK&TRUST CO	571474TGEMMWANRLN572	276,808	2,592,842	2.3	97.7	62.2	31.8	2.3	1.4	2.3
8	BANK OF NEW YORK MELLON	HPFHU00Q28E4N0NFVK49	357,961	969,832	0.2	99.8	1.1	97.8	0.0	1.1	0.0
9	U S BANK NATIONAL ASSN	6BYL5QZYBDK8S7L73M02	536,291	650,890	0.7	99.3	25.6	74.3	0.1	0.0	0.0
10	PNC BANK NATIONAL ASSN	AD6GFRVSDT01YPT1CS68	455,306	482,166	2.4	97.6	87.0	11.0	0.0	0.3	1.7
11	TRUIST BANK	JJKC32MCHWDI71265Z06	493,999	304,900	1.6	98.4	90.9	3.6	1.3	1.9	2.3
12	NORTHERN TRUST CO	6PTKHDJ8HDUF78PFWH30	150,924	270,478	8.9	91.1	78.4	3.9	13.4	0.9	3.4
13	TD BANK NATIONAL ASSN	03D0JEWFDUFUS0SEEKG89	383,967	249,594	0.0	100.0	6.9	92.8	0.2	0.0	0.0
14	CITIZENS BANK NATIONAL ASSN	DRMSV1Q0EKMEXLAU1P80	179,841	220,615	1.0	99.0	91.4	7.3	0.0	0.1	1.2
15	CAPITAL ONE NATIONAL ASSN	207ALC1P1YM0OVDV0K75	363,709	199,424	3.4	96.6	88.5	1.9	0.0	6.7	2.9
16	MUFG UNION BANK NA	OX3PU53ZLPQKJ4700D47	136,272	197,937	2.6	97.4	92.7	7.2	0.1	0.0	0.0
17	FIFTH THIRD BANK NA	QFROUN1UWUYU0DVIWD51	201,287	143,671	0.9	99.1	79.6	9.3	2.2	5.4	3.5
18	REGIONS BANK	EQTWLNK1G7ODGC2MGLV11	143,443	133,795	1.0	99.0	92.5	1.0	0.0	1.1	5.3
19	KEYBANK NATIONAL ASSN	HUX2X73FUCYHUVH1BK78	169,805	126,895	1.8	98.2	89.7	4.8	0.0	5.0	0.5
20	BOKF NATIONAL ASSN	FU7RSW4CQQY98A2O7J66	45,622	116,975	1.6	98.4	94.5	0.5	0.1	4.8	0.0
21	MANUFACTURERS&TRADERS TR CO	WWB2V0FCW3A0EE3ZJN75	139,153	98,247	0.0	100.0	99.2	0.8	0.0	0.0	0.0
22	MORGAN STANLEY BANK NA	G1MLHISON32I3QPILB75	167,077	77,666	0.0	100.0	38.1	45.1	1.3	0.0	15.5
23	HUNTINGTON NATIONAL BANK	2WHM8VNJH63UN14OL754	118,284	76,740	0.1	99.9	89.4	2.7	0.5	3.0	4.4
24	BBVA USA	C90VT034M03BN29IRA40	100,853	60,884	3.8	96.2	95.0	2.9	0.5	0.0	1.6
25	SANTANDER BANK N A	TR24TWEY5RVRQV65HD49	87,751	52,322	0.0	100.0	94.9	4.7	0.2	0.0	0.3
TOP 25 COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			\$13,418,179	\$178,576,898	\$8,681,319	\$169,895,579	\$131,124,791	\$39,143,479	\$3,571,301	\$1,500,897	\$3,236,431
OTHER COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			5,511,202	994,536	5,905	988,631	919,610	47,736	3,038	5,992	18,160
TOTAL FOR COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			18,929,380	179,571,434	8,687,224	170,884,210	132,044,400	39,191,215	3,574,339	1,506,889	3,254,590
				(%)	(%)	(%)	(%)	(%)	(%)	(%)	(%)
TOP 25 COMMERCIAL BANKS, SAs & TCs: % OF TOTAL COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES				99.4	4.8	94.6	73.0	21.8	2.0	0.8	1.8
OTHER COMMERCIAL BANKS, SAs & TCs: % OF TOTAL COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES				0.6	0.0	0.6	0.5	0.0	0.0	0.0	0.0
TOTAL FOR COMMERCIAL BANKS, SAs & TCs: % OF TOTAL COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES				100.0	4.8	95.2	73.5	21.8	2.0	0.8	1.8

Note: Currently, the call report does not differentiate credit derivatives by over the counter or exchange traded. Credit derivatives have been included in the "over the counter" category as well as in the sum of total derivatives here.

Note: "FX" does not include spot FX.

Note: "Other" is defined as the sum of commodity and equity contracts.

Note: Numbers may not add up to total due to rounding.

Source: Call reports, Schedule RC-L

TABLE 4

CREDIT EQUIVALENT EXPOSURES
TOP 25 COMMERCIAL BANKS, SAVINGS ASSOCIATIONS AND TRUST COMPANIES IN DERIVATIVES
JUNE 30, 2020, MILLIONS OF DOLLARS

RANK	BANK NAME	LEGAL ENTITY IDENTIFIER	TOTAL ASSETS	TOTAL DERIVATIVES	TOTAL RISK-BASED CAPITAL	BILATERALLY		TOTAL CREDIT (%)	
						NETTED CURRENT CREDIT EXPOSURE	POTENTIAL FUTURE EXPOSURE	EXPOSURE FROM ALL CONTRACTS	TOTAL CREDIT EXPOSURE TO CAPITAL
1	JPMORGAN CHASE BANK NA	7H6GLXDRUGQFU57RNE97	\$2,820,922	\$52,642,731	\$234,631	\$199,397	\$188,768	\$388,165	165
2	GOLDMAN SACHS BANK USA	KD3XUN7C6T14HNAYLU02	282,583	43,312,307	36,221	68,485	39,818	108,303	299
3	CITIBANK NATIONAL ASSN	E57ODZWZ7FF32TWEFA76	1,633,678	41,110,666	155,799	78,739	111,134	189,873	122
4	BANK OF AMERICA NA	B4TYDEB6GKMZO031MB27	2,161,656	18,552,679	173,492	47,439	54,756	102,195	59
5	WELLS FARGO BANK NA	KB1H1DSPRFMYMCUFXT09	1,799,940	12,232,053	162,657	30,015	16,037	46,052	28
6	HSBC NA	1IE8VN30JCEQV1H4R804	211,045	3,700,591	23,140	7,559	14,067	21,625	93
7	STATE STREET BANK&TRUST CO	571474TGEMMWANRLN572	276,808	2,592,842	18,130	7,870	7,600	15,470	85
8	BANK OF NEW YORK MELLON	HPFHU0OQ28E4N0NFVK49	357,961	969,832	22,206	5,277	5,270	10,547	47
9	U S BANK NATIONAL ASSN	6BYL5QZYBDK8S7L73M02	536,291	650,890	51,356	5,656	7,442	13,097	26
10	PNC BANK NATIONAL ASSN	AD6GFRVSDT01YPT1CS68	455,306	482,166	41,800	8,990	-1,709	7,281	17
11	TRUIST BANK	JJKC32MCHWDI71265Z06	493,999	304,900	47,489	5,070	4,370	9,440	20
12	NORTHERN TRUST CO	6PTKHDJ8HDUF78PFWH30	150,924	270,478	11,261	1,653	2,400	4,053	36
13	TD BANK NATIONAL ASSN	03D0JEWDFUS0SEEKG89	383,967	249,594	29,998	175	1,054	1,230	4
14	CITIZENS BANK NATIONAL ASSN	DRMSV1Q0EKMEXLAU1P80	179,841	220,615	18,757	2,017	1,479	3,495	19
15	CAPITAL ONE NATIONAL ASSN	207ALC1P1YM0OVDV0K75	363,709	199,424	27,315	4,944	4,170	9,115	33
16	MUFG UNION BANK NA	OX3PU53ZLPQKJ4700D47	136,272	197,937	15,107	2,280	368	2,648	18
17	FIFTH THIRD BANK NA	QFROUN1UWUYU0DVIWD51	201,287	143,671	19,379	2,890	2,025	4,915	25
18	REGIONS BANK	EQTWLK1G7ODGC2MGLV11	143,443	133,795	13,960	1,697	558	2,255	16
19	KEYBANK NATIONAL ASSN	HUX2X73FUCYHUVH1BK78	169,805	126,895	16,860	2,247	1,565	3,813	23
20	BOKF NATIONAL ASSN	FU7RSW4CQQY98A2O7J66	45,622	116,975	3,999	22	13	35	1
21	MANUFACTURERS&TRADERS TR CO	WWB2V0FCW3A0EE3ZJN75	139,153	98,247	12,780	1,270	190	1,460	11
22	MORGAN STANLEY BANK NA	G1MLHIS0N32I3QPILB75	167,077	77,666	17,844	235	2,632	2,867	16
23	HUNTINGTON NATIONAL BANK	2WHM8VNJH63UN14OL754	118,284	76,740	11,824	2,234	739	2,973	25
24	BBVA USA	C90VT034M03BN29IRA40	100,853	60,884	9,377	865	193	1,058	11
25	SANTANDER BANK N A	TR24TWEY5RVRQV65HD49	87,751	52,322	11,005	1,618	431	2,050	19
TOP 25 COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			\$13,418,179	\$178,576,898	\$1,186,387	\$488,645	\$465,371	\$954,015	80
OTHER COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			5,511,202	994,536	517,398	22,169	8,100	30,269	6
TOTAL AMOUNT FOR COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			18,929,380	179,571,434	1,703,785	510,814	473,471	984,285	58

Note: Total credit exposure is defined as the credit equivalent amount from derivative contracts (RC-R column B lines 20 and 21), which is the sum of netted current credit exposure and PFE.

Note: The total credit exposure to capital ratio is calculated using risk based capital (tier 1 plus tier 2 capital).

Note: Currently, the call report does not differentiate credit derivatives by contract type. Credit derivatives have been included in the sum of total derivatives here.

Note: Numbers may not add up to total due to rounding.

Source: Call reports, Schedule RC-L and RC-R

TABLE 5

**NOTIONAL AMOUNTS OF DERIVATIVE CONTRACTS HELD FOR TRADING
TOP 4 COMMERCIAL BANKS, SAVINGS ASSOCIATIONS AND TRUST COMPANIES IN DERIVATIVES
JUNE 30, 2020, MILLIONS OF DOLLARS**

RANK	BANK NAME	LEGAL ENTITY IDENTIFIER	TOTAL ASSETS	TOTAL DERIVATIVES	TOTAL HELD FOR TRADING & MTM	% HELD FOR TRADING & MTM	TOTAL NOT FOR TRADING MTM	% NOT FOR TRADING MTM
1	JPMORGAN CHASE BANK NA	7H6GLXDRUGQFU57RNE97	\$2,820,922	\$52,642,731	\$50,927,232	99.0	\$488,802	1.0
2	GOLDMAN SACHS BANK USA	KD3XUN7C6T14HNAYLU02	282,583	43,312,307	43,115,831	99.9	24,996	0.1
3	CITIBANK NATIONAL ASSN	E57ODZWZ7FF32TWEFA76	1,633,678	41,110,666	39,898,807	99.7	136,001	0.3
4	BANK OF AMERICA NA	B4TYDEB6GKMZO031MB27	2,161,656	18,552,679	17,289,910	95.8	750,022	4.2
TOP 4 COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			\$6,898,839	\$155,618,383	\$151,231,780	99.1	\$1,399,821	0.9
OTHER COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			12,030,541	23,953,051	21,490,975	90.7	2,194,268	9.3
TOTAL AMOUNT FOR COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			18,929,380	179,571,434	172,722,755	98.0	3,594,089	2.0

Note: Currently, the call report does not differentiate between traded and not-traded credit derivatives. Credit derivatives have been excluded from the sum of total derivatives here.

Note: Numbers may not add up to total due to rounding.

Source: Call reports, Schedule RC-L

TABLE 6

**GROSS FAIR VALUES OF DERIVATIVE CONTRACTS
TOP 4 COMMERCIAL BANKS, SAVINGS ASSOCIATIONS AND TRUST COMPANIES IN DERIVATIVES
JUNE 30, 2020, MILLIONS OF DOLLARS**

RANK	BANK NAME	LEGAL ENTITY IDENTIFIER	TOTAL ASSETS	TOTAL DERIVATIVES	TRADING		NOT FOR TRADING		CREDIT DERIVATIVES	
					GROSS POSITIVE FAIR VALUE*	GROSS NEGATIVE FAIR VALUE**	GROSS POSITIVE FAIR VALUE*	GROSS NEGATIVE FAIR VALUE**	GROSS POSITIVE FAIR VALUE*	GROSS NEGATIVE FAIR VALUE**
1	JPMORGAN CHASE BANK NA	7H6GLXDRUGQFU57RNE97	\$2,820,922	\$52,642,731	\$728,423	\$713,983	\$3,312	\$3,300	\$13,371	\$14,336
2	GOLDMAN SACHS BANK USA	KD3XUN7C6T14HNAYLU02	282,583	43,312,307	909,495	903,057	345	266	3,524	3,907
3	CITIBANK NATIONAL ASSN	E57ODZWZ7FF32WEFA76	1,633,678	41,110,666	500,358	504,995	2,955	3,256	10,133	9,747
4	BANK OF AMERICA NA	B4TYDEB6GKMZO031MB27	2,161,656	18,552,679	199,174	199,973	24,813	30,216	4,906	5,502
TOP 4 COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			\$6,898,839	\$155,618,383	\$2,337,450	\$2,322,008	\$31,425	\$37,038	\$31,934	\$33,492
OTHER COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			12,030,541	23,953,051	191,631	170,025	24,206	20,034	2,080	3,316
TOTAL AMOUNT FOR COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			18,929,380	179,571,434	2,529,081	2,492,033	55,631	57,072	34,014	36,808

Note: Currently, the call report does not differentiate between traded and non-traded credit derivatives. Credit derivatives have been included in the sum of total derivatives here. Numbers may not sum due to rounding.

*Market value of contracts that have a positive fair value as of the end of the quarter.

**Market value of contracts that have a negative fair value as of the end of the quarter.

Source: Call reports, Schedule RC-L

TABLE 7

TRADING REVENUES FROM CASH INSTRUMENTS AND DERIVATIVES
TOP 4 COMMERCIAL BANKS, SAVINGS ASSOCIATIONS AND TRUST COMPANIES IN DERIVATIVES
JUNE 30, 2020, MILLIONS OF DOLLARS
NOTE: REVENUE FIGURES ARE FOR THE QUARTER (NOT YEAR-TO-DATE)

RANK	BANK NAME	LEGAL ENTITY IDENTIFIER	TOTAL ASSETS	TOTAL DERIVATIVES	TOTAL TRADING REV FROM CASH & OFF BAL SHEET POSITIONS	TRADING REV FROM INT RATE POSITIONS	TRADING REV FROM FOREIGN EXCH POSITIONS	TRADING REV FROM EQUITY POSITIONS	TRADING REV FROM COMMOD & OTH POSITIONS	TRADING REV FROM CREDIT POSITIONS
1	JPMORGAN CHASE BANK NA	7H6GLXDRUGQFU57RNE97	\$2,820,922	\$52,642,731	\$9,114	\$2,041	\$1,517	\$3,352	\$633	\$1,571
2	GOLDMAN SACHS BANK USA	KD3XUN7C6T14HNAYLU02	282,583	43,312,307	355	78	427	(81)	0	(69)
3	CITIBANK NATIONAL ASSN	E57ODZWZ7FF32WEFA76	1,633,678	41,110,666	2,521	1,431	1,069	513	(78)	(414)
4	BANK OF AMERICA NA	B4TYDEB6GKMZO031MB27	2,161,656	18,552,679	731	293	170	260	(20)	28
TOP 4 COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			\$6,898,839	\$155,618,383	\$12,721	\$3,843	\$3,183	\$4,044	\$535	\$1,116
OTHER COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			12,030,541	23,953,051	1,945	800	658	104	370	13
TOTAL AMOUNT FOR COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			18,929,380	179,571,434	14,666	4,643	3,841	4,148	905	1,129

Note: Effective in the first quarter of 2007, trading revenues from credit exposures are reported separately, along with the four other types of exposures. The total derivatives column includes credit exposures.

Note: Trading revenue is defined here as "trading revenue from cash instruments and off-balance-sheet derivative instruments."

Note: Numbers may not add up to total due to rounding.

Source: Call reports, Schedule RC-L and Schedule RI

TABLE 8

**NOTIONAL AMOUNTS OF DERIVATIVE CONTRACTS BY CONTRACT TYPE AND MATURITY (INTEREST RATE, FX AND GOLD)
TOP 4 COMMERCIAL BANKS, SAVINGS ASSOCIATIONS AND TRUST COMPANIES IN DERIVATIVES
JUNE 30, 2020, MILLIONS OF DOLLARS**

RANK	BANK NAME	LEGAL ENTITY IDENTIFIER	TOTAL ASSETS	TOTAL DERIVATIVES	INT RATE MATURITY < 1 YR	INT RATE MATURITY 1 - 5 YRS	INT RATE MATURITY > 5 YRS	INT RATE ALL MATURITIES	FX and GOLD MATURITY < 1 YR	FX and GOLD MATURITY 1 - 5 YRS	FX and GOLD MATURITY > 5 YRS	FX and GOLD ALL MATURITIES
1	JPMORGAN CHASE BANK NA	7H6GLXDRUGQFU57RNE97	\$2,820,922	\$52,642,731	\$28,554,792	\$20,986,645	\$4,567,843	\$54,109,280	\$7,135,725	\$2,156,461	\$1,035,074	\$10,327,260
2	GOLDMAN SACHS BANK USA	KD3XUN7C6T14HNAYLU02	282,583	43,312,307	18,329,559	7,444,018	7,008,070	32,781,647	3,546,201	771,948	591,375	4,909,524
3	CITIBANK NATIONAL ASSN	E57ODZWZ7FF32TWFA76	1,633,678	41,110,666	18,848,961	3,255,149	2,687,951	24,792,061	10,598,798	550,180	197,808	11,346,786
4	BANK OF AMERICA NA	B4TYDEB6GKMZO031MB27	2,161,656	18,552,679	5,524,016	4,765,019	3,032,576	13,321,611	3,782,395	438,821	233,235	4,454,451
TOP 4 COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			\$6,898,839	\$155,618,383	\$71,257,328	\$36,450,831	\$17,296,440	\$125,004,599	\$25,063,119	\$3,917,410	\$2,057,492	\$31,038,021
OTHER COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			12,030,541	23,953,051	8,876,438	4,641,448	2,677,516	16,195,403	3,986,422	321,277	122,006	4,429,705
TOTAL AMOUNT FOR COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			18,929,380	179,571,434	80,133,766	41,092,279	19,973,956	141,200,002	29,049,541	4,238,687	2,179,498	35,467,726

Note: Figures above exclude any contracts not subject to risk-based capital requirements, such as FX contracts with an original maturity of 14 days or less, futures contracts, written options, and basis swaps. Therefore, the total notional amount of derivatives by maturity will not add to the total derivatives figure in this table.

Note: Numbers may not add up to total due to rounding.

Note: Effective 2015 Q1, the reporting form and call report instructions changed. Schedule RC-R now requires banks to report FX and gold notional amounts in aggregate, rather than separately.

Source: Call reports, Schedule RC-L and RC-R

TABLE 9

**NOTIONAL AMOUNTS OF DERIVATIVE CONTRACTS BY CONTRACT TYPE & MATURITY (PRECIOUS METALS)
TOP 4 COMMERCIAL BANKS, SAVINGS ASSOCIATIONS AND TRUST COMPANIES IN DERIVATIVES
JUNE 30, 2020, MILLIONS OF DOLLARS**

RANK	BANK NAME	LEGAL ENTITY IDENTIFIER	TOTAL ASSETS	TOTAL DERIVATIVES	PREC METALS MATURITY < 1 YR	PREC METALS MATURITY 1 - 5 YRS	PREC METALS MATURITY > 5 YRS	PREC METALS ALL MATURITIES
1	JPMORGAN CHASE BANK NA	7H6GLXDRUGQFU57RNE97	\$2,820,922	\$52,642,731	\$27,170	\$1,051	\$0	\$28,221
2	GOLDMAN SACHS BANK USA	KD3XUN7C6T14HNAYLU02	282,583	43,312,307	0	0	0	0
3	CITIBANK NATIONAL ASSN	E57ODZWZ7FF32TWEFA76	1,633,678	41,110,666	7,308	421	0	7,729
4	BANK OF AMERICA NA	B4TYDEB6GKMZO031MB27	2,161,656	18,552,679	2,688	80	0	2,768
TOP 4 COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			\$6,898,839	\$155,618,383	\$37,166	\$1,552	\$0	\$38,718
OTHER COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			12,030,541	23,953,051	12,793	908	0	13,701
TOTAL FOR COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			18,929,380	179,571,434	49,959	2,460	0	52,419

Note: Figures above exclude any contracts not subject to risk-based capital requirements, such as FX contracts with an original maturity of 14 days or less, futures contracts, written options, and basis swaps. Therefore, the total notional amount of derivatives by maturity will not add to the total derivatives figure in this table.

Note: Numbers may not add up to total due to rounding.

Source: Call reports, Schedule RC-L and RC-R

TABLE 10

**NOTIONAL AMOUNTS OF DERIVATIVE CONTRACTS BY CONTRACT TYPE AND MATURITY (OTHER COMMODITY AND EQUITY)
TOP 4 COMMERCIAL BANKS, SAVINGS ASSOCIATIONS AND TRUST COMPANIES IN DERIVATIVES
JUNE 30, 2020, MILLIONS OF DOLLARS**

RANK	BANK NAME	LEGAL ENTITY IDENTIFIER	TOTAL ASSETS	TOTAL DERIVATIVES	OTHER COMM MATURITY < 1 YR	OTHER COMM MATURITY 1 - 5 YRS	OTHER COMM MATURITY > 5 YRS	OTHER COMM ALL MATURITIES	EQUITY MATURITY < 1 YR	EQUITY MATURITY 1 - 5 YRS	EQUITY MATURITY > 5 YRS	EQUITY ALL MATURITIES
1	JPMORGAN CHASE BANK NA	7H6GLXDRUGQFU57RNE97	\$2,820,922	\$52,642,731	\$638,880	\$90,556	\$5,267	\$734,703	\$1,846,024	\$497,520	\$99,301	\$2,442,845
2	GOLDMAN SACHS BANK USA	KD3XUN7C6T14HNAYLU02	282,583	43,312,307	2,911	1,246	0	4,157	14,030	8,348	980	23,358
3	CITIBANK NATIONAL ASSN	E57ODZWZ7FF32TWEFA76	1,633,678	41,110,666	108,913	53,846	3,348	166,107	406,541	105,343	6,325	518,209
4	BANK OF AMERICA NA	B4TYDEB6GKMZO031MB27	2,161,656	18,552,679	14,503	6,412	0	20,915	401,257	113,308	11,193	525,758
TOP 4 COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			\$6,898,839	\$155,618,383	\$765,207	\$152,060	\$8,615	\$925,882	\$2,667,852	\$724,519	\$117,799	\$3,510,170
OTHER COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			12,030,541	23,953,051	54,547	74,260	135	128,941	182,888	101,148	10,880	294,916
TOTAL FOR COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			18,929,380	179,571,434	819,754	226,320	8,750	1,054,823	2,850,740	825,667	128,679	3,805,086

Note: Figures above exclude any contracts not subject to risk-based capital requirements, such as FX contracts with an original maturity of 14 days or less, futures contracts, written options, and basis swaps.

Therefore, the total notional amount of derivatives by maturity will not add to the total derivatives figure in this table.

Note: Numbers may not add up to total due to rounding.

Source: Call reports, Schedule RC-L and RC-R

TABLE 11

**NOTIONAL AMOUNTS OF CREDIT DERIVATIVE CONTRACTS BY CONTRACT TYPE AND MATURITY (INVESTMENT GRADE AND SUB-INVESTMENT GRADE)
TOP 4 COMMERCIAL BANKS, SAVINGS ASSOCIATIONS AND TRUST COMPANIES IN DERIVATIVES
JUNE 30, 2020, MILLIONS OF DOLLARS**

RANK	BANK NAME	LEGAL ENTITY IDENTIFIER	TOTAL ASSETS	TOTAL DERIVATIVES	TOTAL CREDIT DERIVATIVES	CREDIT DERIVATIVES INVESTMENT GRADE			CREDIT DERIVATIVES SUB-INVESTMENT GRADE				
						MATURITY < 1 YR	MATURITY 1 - 5 YRS	MATURITY > 5 YRS	ALL MATURITIES	MATURITY < 1 YR	MATURITY 1 - 5 YRS	MATURITY > 5 YRS	ALL MATURITIES
1	JPMORGAN CHASE BANK NA	7H6GLXDRUGQFU57RNE97	\$2,820,922	\$52,642,731	\$1,226,697	\$203,483	\$648,927	\$68,849	\$921,259	\$77,139	\$217,306	\$10,993	\$305,438
2	GOLDMAN SACHS BANK USA	KD3XUN7C6T14HNAYLU02	282,583	43,312,307	171,480	20,198	63,530	17,669	101,397	13,081	43,965	13,037	70,083
3	CITIBANK NATIONAL ASSN	E57ODZWZ7FF32TWEFA76	1,633,678	41,110,666	1,075,858	232,287	521,490	46,379	800,156	92,927	175,772	7,003	275,702
4	BANK OF AMERICA NA	B4TYDEB6GKMZO031MB27	2,161,656	18,552,679	512,747	113,897	210,824	22,901	347,622	79,971	76,575	8,579	165,125
TOP 4 COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			\$6,898,839	\$155,618,383	\$2,986,782	\$569,865	\$1,444,771	\$155,798	\$2,170,434	\$263,118	\$513,618	\$39,612	\$816,348
OTHER COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			12,030,541	23,953,051	267,808	48,964	77,872	15,448	142,283	15,098	94,114	16,313	125,525
TOTAL AMOUNT FOR COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			18,929,380	179,571,434	3,254,590	618,829	1,522,643	171,246	2,312,717	278,216	607,732	55,925	941,873

Note: Figures above exclude any contracts not subject to risk-based capital requirements, such as FX contracts with an original maturity of 14 days or less, futures contracts, written options, and basis swaps. Therefore, the total notional amount of derivatives by maturity will not add to the total derivatives figure in this table.
 Note: Numbers may not add up to total due to rounding.
 Source: Call reports, Schedule RC-L and RC-R

TABLE 12

**DISTRIBUTION OF CREDIT DERIVATIVE CONTRACTS HELD FOR TRADING
TOP 25 COMMERCIAL BANKS, SAVINGS ASSOCIATIONS AND TRUST COMPANIES IN DERIVATIVES
JUNE 30, 2020, MILLIONS OF DOLLARS**

RANK	BANK NAME	LEGAL ENTITY IDENTIFIER	TOTAL ASSETS	TOTAL DERIVATIVES	TOTAL CREDIT DERIVATIVES	TOTAL CREDIT DERIVATIVES				SOLD					
						PURCHASED	SOLD	CREDIT DEFAULT SWAPS	TOTAL RETURN SWAPS	CREDIT OPTIONS	OTHER CREDIT DERIVATIVES	CREDIT DEFAULT SWAPS	TOTAL RETURN SWAPS	CREDIT OPTIONS	OTHER CREDIT DERIVATIVES
1	JPMORGAN CHASE BANK NA	7H6GLXDRUGQFU57RNE97	\$2,820,922	\$52,642,731	\$1,226,697	\$632,687	\$594,010	\$589,069	\$18,120	\$21,763	\$3,735	\$565,699	\$7,108	\$21,179	\$24
2	GOLDMAN SACHS BANK USA	KD3XUN7C6T14HNAYLU02	282,583	43,312,307	171,480	102,278	69,202	88,959	2,784	6,140	4,395	62,199	2,784	3,885	334
3	CITIBANK NATIONAL ASSN	E57ODZWZ7FF32TWEFA76	1,633,678	41,110,666	1,075,858	569,924	505,934	555,146	11,543	3,235	0	499,113	2,578	4,243	0
4	BANK OF AMERICA NA	B4TYDEB6GKMZ0031MB27	2,161,656	18,552,679	512,747	269,776	242,971	211,376	9,105	49,295	0	192,250	13,667	37,054	0
5	WELLS FARGO BANK NA	KB1H1DSPRFMYMCFUXT09	1,799,940	12,232,053	95,573	47,891	47,682	6,631	20,740	0	20,520	4,739	30,667	0	12,276
6	HSBC NA	11E8VN30JCEQV1H4R804	211,045	3,700,591	83,278	47,718	35,560	38,346	9,371	0	0	34,309	1,251	0	0
7	STATE STREET BANK&TRUST CO	571474TGEMMWANRLN572	276,808	2,592,842	0	0	0	0	0	0	0	0	0	0	0
8	BANK OF NEW YORK MELLON	HPFHU00Q28E4N0NFVK49	357,961	969,832	165	165	0	165	0	0	0	0	0	0	0
9	U S BANK NATIONAL ASSN	6BYL5QZYBDK8S7L73M02	536,291	650,890	11,162	4,222	6,940	1,183	0	0	3,039	0	0	0	6,940
10	PNC BANK NATIONAL ASSN	AD6GFRVSDT01YPT1CS68	455,306	482,166	11,110	3,560	7,550	0	0	0	3,560	0	0	0	7,550
11	TRUIST BANK	JJKC32MCHWDI71265Z06	493,999	304,900	10,265	3,892	6,373	744	1,543	0	1,605	0	0	0	6,373
12	NORTHERN TRUST CO	6PTKHDJ8HDUF78PFVH30	150,924	270,478	0	0	0	0	0	0	0	0	0	0	0
13	TD BANK NATIONAL ASSN	03D0JEWDFUS0SEKGG89	383,967	249,594	0	0	0	0	0	0	0	0	0	0	0
14	CITIZENS BANK NATIONAL ASSN	DRMSV1Q0EKMEXLAU1P80	179,841	220,615	2,727	0	2,727	0	0	0	0	0	0	0	2,727
15	CAPITAL ONE NATIONAL ASSN	207ALC1P1YM00VDV0K75	363,709	199,424	5,867	2,272	3,595	0	0	0	2,272	0	0	0	3,595
16	MUFG UNION BANK NA	OX3PU53ZLPQKJ4700D47	136,272	197,937	97	97	0	97	0	0	0	0	0	0	0
17	FIFTH THIRD BANK NA	QFROUN1UWUYU0DVIWD51	201,287	143,671	5,085	1,300	3,785	0	0	0	1,300	0	0	0	3,785
18	REGIONS BANK	EQTWLK1G7ODGC2MGLV11	143,443	133,795	7,147	2,573	4,574	42	0	0	2,531	42	0	0	4,532
19	KEYBANK NATIONAL ASSN	HUX2X73FUCYHUVH1BK78	169,805	126,895	591	171	420	171	0	0	0	327	93	0	0
20	BOKF NATIONAL ASSN	FU7RSW4CQQY98A2O7J66	45,622	116,975	23	4	18	4	0	0	0	18	0	0	0
21	MANUFACTURERS&TRADERS TR CO	WWWB2V0FCW3A0EE3ZJN75	139,153	98,247	0	0	0	0	0	0	0	0	0	0	0
22	MORGAN STANLEY BANK NA	G1MLHISON32I3QPILB75	167,077	77,666	12,069	9,675	2,394	8,537	0	1,138	0	2,394	0	0	0
23	HUNTINGTON NATIONAL BANK	2WHM8VNH63UN14OL754	118,284	76,740	3,367	2,566	801	0	0	0	2,566	0	0	0	801
24	BBVA USA	C90VT034M03BN29IRA40	100,853	60,884	973	7	966	7	0	0	0	966	0	0	0
25	SANTANDER BANK N A	TR24TWEY5RVQRQV65HD49	87,751	52,322	149	14	136	14	0	0	0	136	0	0	0
TOP 25 COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			\$13,418,179	\$178,576,898	\$3,236,431	\$1,700,793	\$1,535,637	\$1,500,493	\$73,206	\$81,571	\$45,523	\$1,362,192	\$58,148	\$66,361	\$48,937
OTHER COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			5,511,202	994,536	18,160	8,418	9,742	352	3,152	0	4,914	1,356	2	0	8,384
TOTAL AMOUNT FOR COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES			18,929,380	179,571,434	3,254,590	1,709,211	1,545,379	1,500,844	76,358	81,571	50,437	1,363,548	58,150	66,361	57,321
TOP 25 COMMERCIAL BANKS, SAs & TCs: % OF TOTAL COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES					(%)	(%)	(%)	(%)	(%)	(%)	(%)	(%)	(%)	(%)	(%)
OTHER COMMERCIAL BANKS, SAs & TCs: % OF TOTAL COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES					99.4	52.3	47.2	46.1	2.2	2.5	1.4	41.9	1.8	2.0	1.5
TOTAL AMOUNT FOR COMMERCIAL BANKS, SAs & TCs: % OF TOTAL COMMERCIAL BANKS, SAs & TCs WITH DERIVATIVES					100.0	52.5	47.5	46.1	2.3	2.5	1.5	41.9	1.8	2.0	1.8

Note: Credit derivatives have been excluded from the sum of total derivatives here.
 Note: Numbers may not add up to total due to rounding.
 Source: Call reports, Schedule RC-L

TABLE 13

DERIVATIVES DATA REPORTED BY FFIEC 051 FILERS*
COMMERCIAL BANKS, SAVINGS ASSOCIATIONS AND TRUST COMPANIES IN DERIVATIVES
JUNE 30, 2020, MILLIONS OF DOLLARS

Call Report Schedule SU															
A. Gross Notional Amount of Derivatives															
	2Q20	1Q20	4Q19	3Q19	2Q19	1Q19	4Q18	3Q18	2Q18	1Q18	4Q17	3Q17	2Q17	1Q17	
Total gross notional amount of interest rate derivatives held for trading	\$5,183	\$4,476	\$2,293	\$2,526	\$913	\$1,131	\$623	\$751	\$736	\$684	\$542	\$729	\$749	\$655	
Total gross notional amount of all other derivatives held for trading	\$34	\$48	\$33	\$30	\$37	\$24	\$2	\$2	\$5	\$7	\$5	\$5	\$6	\$2	
Total gross notional amount of interest rate derivatives not held for trading	\$52,733	\$37,572	\$20,044	\$18,527	\$11,135	\$9,020	\$8,432	\$6,893	\$7,642	\$8,483	\$6,092	\$7,731	\$8,259	\$7,154	
Total gross notional amount of all other derivatives not held for trading	\$1,302	\$1,171	\$631	\$546	\$273	\$242	\$160	\$2,754	\$3,133	\$531	\$86	\$89	\$89	\$80	
Call Report Schedule RC-R**															
A. Notional principal amounts of over-the-counter derivative contracts covered by the regulatory capital rules:															
a. Interest rate	\$33,122	Data Not Reported	\$12,478	Data Not Reported	\$7,177	\$5,858	\$4,147	\$4,459	\$4,584	\$4,471	\$3,847	\$4,657	\$5,024	\$4,758	
b. Foreign exchange rate and gold	\$19		\$18		\$4	\$5	\$3	\$4	\$5	\$429	\$0	\$0	\$0	\$0	
c. Credit (investment grade reference asset)	\$199		\$166		\$39	\$41	\$35	\$17	\$14	\$14	\$13	\$14	\$8	\$4	
d. Credit (non-investment grade reference asset)	\$138		\$61		\$25	\$25	\$12	\$12	\$12	\$11	\$11	\$11	\$11	\$11	
e. Equity	\$0		\$0		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
g. Other	\$25		\$9		\$5	\$5	\$5	\$5	\$5	\$5	\$5	\$5	\$5	\$5	
f. Precious metals (except gold)	\$0		\$0		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
B. Notional principal amounts of centrally cleared derivative contracts covered by the regulatory capital rules:															
a. Interest rate	\$299		\$96		\$168	\$686	\$1,937	\$2,731	\$3,169	\$129	\$249	\$343	\$178	\$158	
b. Foreign exchange rate and gold	\$0		\$0		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
c. Credit (investment grade reference asset)	\$0		\$0		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$4	
d. Credit (non-investment grade reference asset)	\$0		\$0		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
e. Equity	\$0		\$0		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
f. Precious metals (except gold)	\$0		\$0		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
g. Other	\$0		\$0		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
C. Current credit exposure across all derivative contracts covered by the regulatory capital rules															
	\$504		\$140		\$95	\$59	\$49	\$76	\$119	\$62	\$44	\$57	\$49	\$39	

Source: Call reports, Schedule SU and Schedule RC-R

*Beginning September 30, 2019, the eligibility to file the FFIEC 051 Call Report expanded from banks with total assets less than \$1 billion to include banks with less than \$5 billion in total assets.

**Beginning September 30, 2019, banks filing the FFIEC 051 Call Report complete this information from schedule RC-R in the June and December reports only.