

January 18, 2013 Final Edition



# Calendar of Releases

	Titles for the current	week are links to their	respective releases.	
MONDAY*	TUESDAY	WEDNESDAY	THURSDAY*	FRIDAY
January 14	January 15   PPI (Dec)   A: -0.2% PF: -0.1%   Core PPI (Dec)   A: 0.1% PF: 0.2%   Retail Sales (Dec)   A: 0.5% PF: 0.2%   Business Inventories (Nov)   A: 0.3% PF: 0.3%	January 16   CPI (Dec)   A: 0.0% PF: 0.0%   CPI Core (Dec)   A: 0.1% PF: 0.2%   Industrial Production (Dec)   A: 0.3% PF: 0.3%   Capacity Utilization (Dec)   A: 78.8 PF: 78.5	January 17   Initial Claims (1/12)   A: 335K PF: 365K   Housing Starts (Dec)   A: 954K PF: 890K   Building Permits (Dec)   A: 903K PF: 903K	January 18
January 21	January 22 Existing Home Sales (Dec) CF: 5.10M PF: 5.09M	January 23	<b>January 24</b> Initial Claims (1/19) CF: 355K PF: N/A	January 25 New Home Sales (Dec) CF: 386K PF: 385K
January 28 Durable Goods (Dec) CF: 1.0%	January 29	January 30 GDP (Q4) CF: 1.4% FOMC Meeting Statement	January 31 Initial Claims (1/26) CF: N/A ECI (Q4) CF: 0.4% Personal Income (Dec) CF: 0.7% Core PCE (Dec) CF: 0.1% Latest Issue	February 1 Nonfarm Payrolls (Jan) CF: 160K Unemployment Rate (Jan) CF: 7.8% Construct Spending (Dec) CF: 0.6% ISM Index (Jan) CF: 51.0 Latest Issue National Economic Trends

DEFINITIONS: A, actual value; PF, previous week's forecast; CF, current week's forecast; K, thousand; M, million; B, billion.

\*The Board of Governors of the Federal Reserve System provides H.3, H.4.1, and H.6 releases each Thursday and H.10 and H.15 releases each Monday.

Forecast data are from Thomson Reuters. ©Thomson Reuters, 2012. All Rights Reserved. Use, duplication, or sale of this service or the data contained herein, except as described in the Federal Reserve Bank of St. Louis Subscription Agreement, is strictly prohibited.

# Contents

# Page

3	Adjusted Monetary Base
4	Adjusted Reserves
5	MZM
6	M2
7	Composition of Federal Reserve Assets and Liabilities
8	Reserve Bank Credit and Selected Categories
9	Other Federal Reserve Balance Sheet Items
10	Yields on Selected Securities
11	Corporate Bond Spreads and Mortgage Interest Rates
12	Yields on Nominal and Inflation-Indexed Treasury Securities
13	Federal Funds Futures Market
14	Equity Price Indices
15	Crude Oil Prices
16	Natural Gas Prices
17	Exchange Rates
18	Currency, Savings, and Small Time Deposits
19	Institutional and Retail Money Funds, and Borrowings from Federal Reserve Banks
20	Bank Loans
21	Commercial Paper Outstanding
22	Reference Tables
23	Notes

# Conventions used in this publication:

- 1. Unless otherwise indicated, figure and table data are weekly and seasonally adjusted.
- 2. For pages 10, 14, 15 (top chart), 16 (top chart), and 22 (top table), the last observation is a daily average that incorporates all available data at the time of publication, which usually includes observations for the first three trading days of the week (Monday through Wednesday). The previous observations signify that week's average.

We welcome your comments addressed to:

Editor, *U.S. Financial Data* Research Division Federal Reserve Bank of St. Louis P.O. Box 442 St. Louis, MO 63166-0442

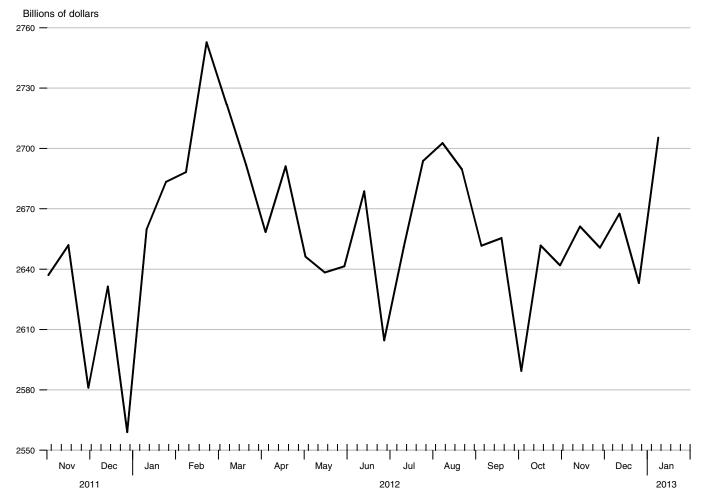
or to:

stlsFRED@stls.frb.org

*U.S. Financial Data* is published weekly by the Research Division of the Federal Reserve Bank of St. Louis. For more information on data in this publication, please visit research.stlouisfed.org/fred2 or call (314) 444-8590. To be added to our free email notification list, please visit our web site at research.stlouisfed.org/publications/usfd.

# **Adjusted Monetary Base**

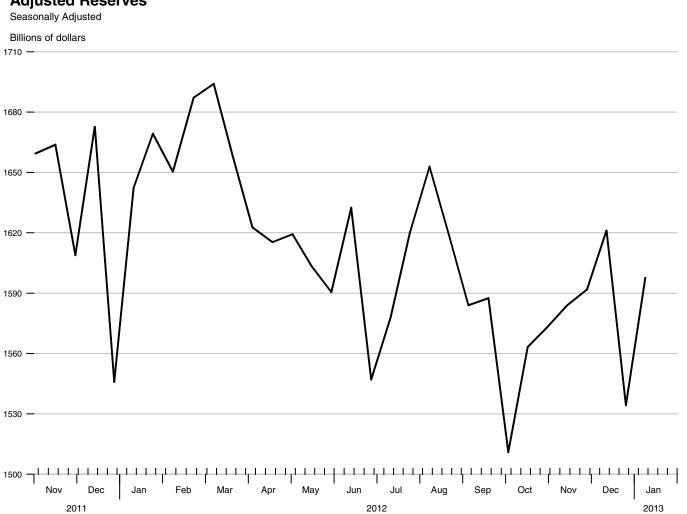
Averages of Daily Figures, Seasonally Adjusted



# **Adjusted Monetary Base**

To the average of	Compounded annual rates of change, average of two maintenance periods ending:											
two maintenance periods ending:	01/11/12	04/04/12	06/13/12	07/11/12	08/08/12	09/05/12	10/17/12	11/14/12				
06/13/12	4.7											
07/11/12	1.4	-6.4										
08/08/12	6.0	2.5	9.7									
09/05/12	3.6	-0.4	1.7	11.1								
10/17/12	0.6	-3.8	-4.2	-1.0	-14.1							
11/14/12	1.9	-1.4	-0.8	2.6	-6.3	-3.7						
12/12/12	2.1	-0.9	-0.1	2.8	-4.1	-1.6	10.0					
01/09/13	2.3	-0.3	0.6	3.2	-2.5	-0.2	8.3	4.4				

# **Adjusted Reserves**



# **Adjusted Reserves**

To the average of	Compounded annual rates of change, average of two maintenance periods ending:										
two maintenance periods ending:	01/11/12	04/04/12	06/13/12	07/11/12	08/08/12	09/05/12	10/17/12	11/14/12			
06/13/12	2.6										
07/11/12	-3.9	-16.4									
08/08/12	4.7	-0.6	10.6								
09/05/12	0.7	-5.5	-2.7	17.3							
10/17/12	-4.6	-11.3	-12.8	-5.9	-27.9						
11/14/12	-1.2	-6.0	-4.8	2.9	-12.6	-7.3					
12/12/12	0.8	-2.9	-0.6	6.8	-5.2	1.2	33.2				
01/09/13	-1.8	-5.8	-4.9	0.4	-9.9	-6.3	8.4	-5.0			

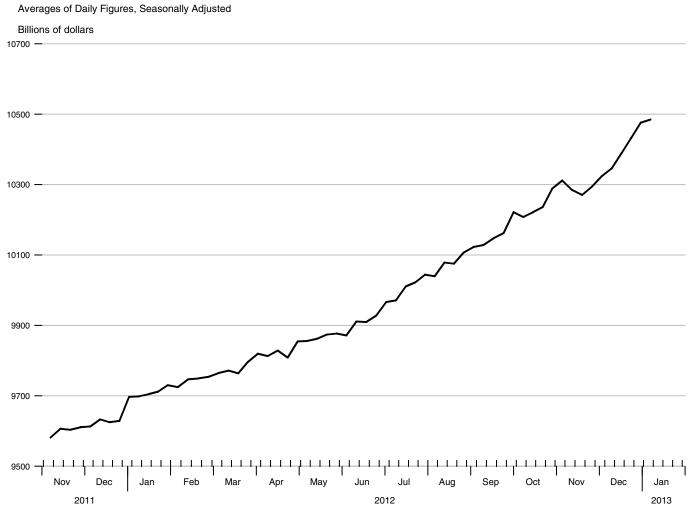
#### MZM

Averages of Daily Figures, Seasonally Adjusted Billions of dollars 11700 — 11600 -11500 -11400 11300 -11200 -11100 -11000 -10900 10800 10700 10600 Feb Мау Nov Dec Jan Mar Apr Jun Jul Aug Sep Oct Nov Dec Jan 2011 2012 2013

# MZM

To the average	Compounded annual rates of change, average of four weeks ending:											
of four weeks ending:	01/09/12	04/02/12	06/11/12	07/09/12	08/06/12	09/03/12	10/15/12	11/12/12				
06/11/12	5.4											
07/09/12	5.8	5.9										
08/06/12	6.7	7.5	10.5									
09/03/12	7.1	7.9	10.3	11.6								
10/15/12	7.7	8.5	10.5	11.3	10.5							
11/12/12	7.8	8.6	10.2	10.7	10.0	10.1						
12/10/12	7.5	8.1	9.3	9.6	8.8	8.5	6.8					
01/07/13	8.4	9.2	10.7	11.1	10.7	10.9	10.9	12.0				

#### M2

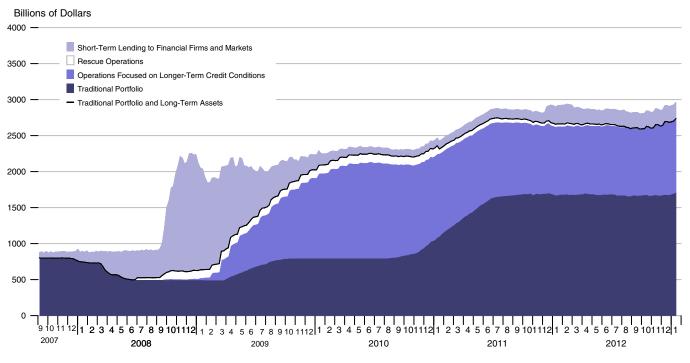


# M2

To the average	Compounded annual rates of change, average of four weeks ending:											
of four weeks ending:	01/09/12	04/02/12	06/11/12	07/09/12	08/06/12	09/03/12	10/15/12	11/12/12				
06/11/12	5.5											
07/09/12	5.9	6.1										
08/06/12	6.7	7.3	10.0									
09/03/12	6.9	7.6	9.7	10.4								
10/15/12	7.3	8.0	9.6	10.0	9.4							
11/12/12	7.6	8.3	9.8	10.1	9.6	9.9						
12/10/12	7.3	7.8	8.8	8.9	8.3	8.1	6.9					
01/07/13	8.1	8.8	10.1	10.3	10.1	10.3	10.7	10.9				

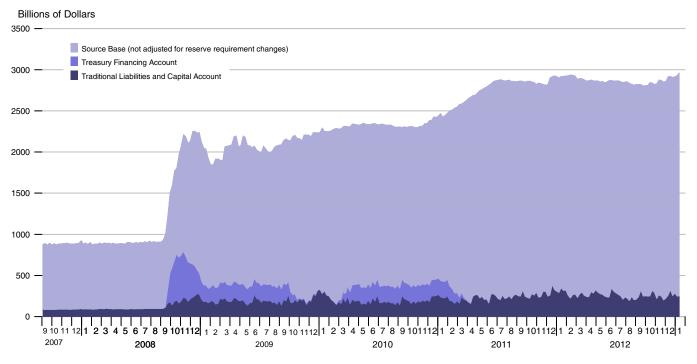
# **Composition of Federal Reserve Assets**

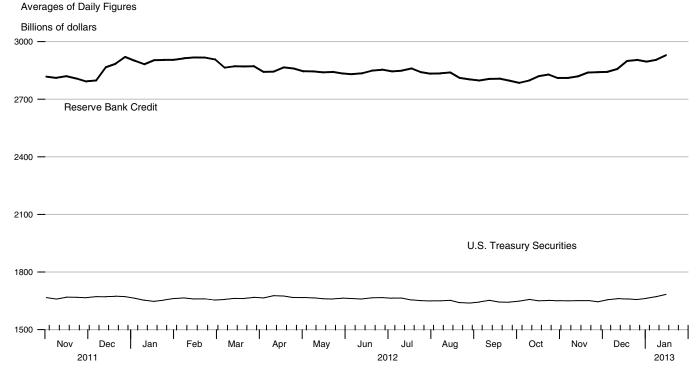
End of Period Wednesday Figures



## **Composition of Federal Reserve Liabilities**

End of Period Wednesday Figures



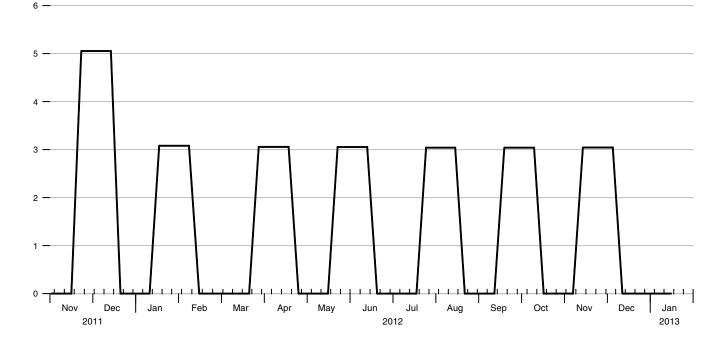


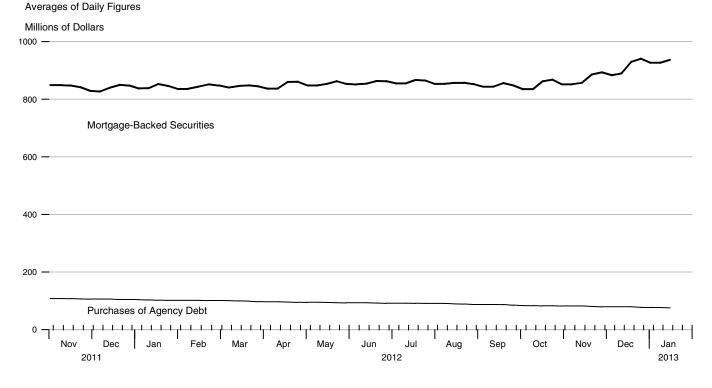
# Reserve Bank Credit and Federal Reserve Holdings of U.S. Treasury Securities

#### Term Deposits Held by Depository Institutions

End of Period Wednesday Figures

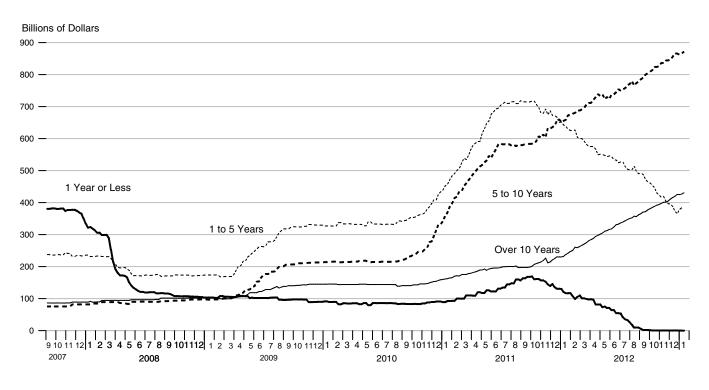
Billions of dollars





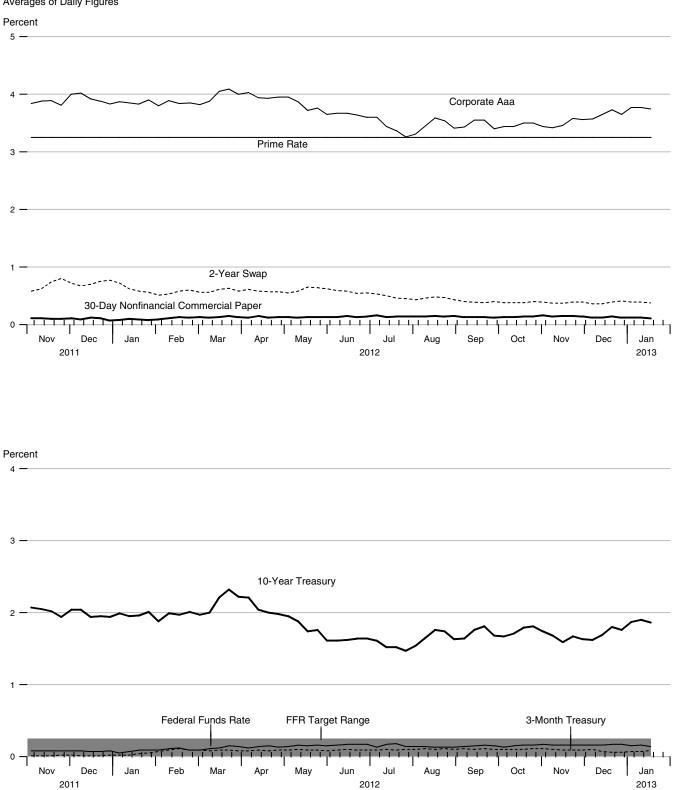
# Federal Reserve Holdings of Agency Debt and Mortgage-Backed Securities

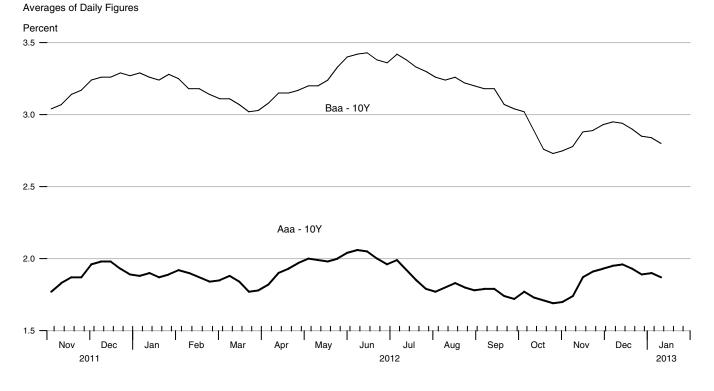
# Maturity Distribution of U.S. Treasury Securities Held by the Federal Reserve



# **Yields on Selected Securities**

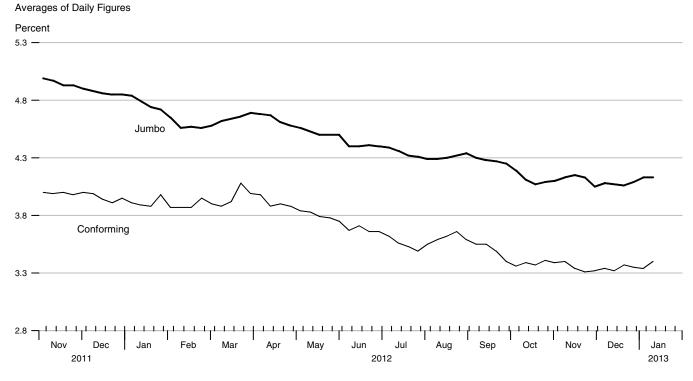
Averages of Daily Figures



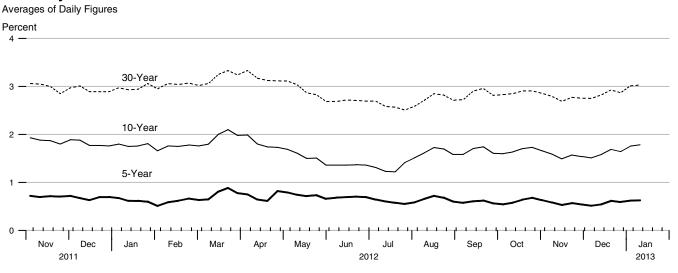


# Corporate Bond Yields Relative to Yields on 10 - Year Treasury Securities

Interest Rates on 30 - Year Conforming and Jumbo Mortgages

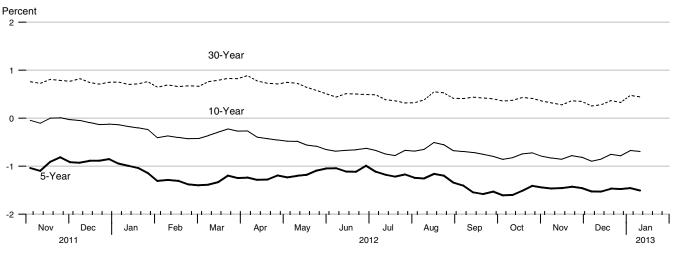


#### **Treasury Note Yields**



# Inflation-Indexed Treasury Yields

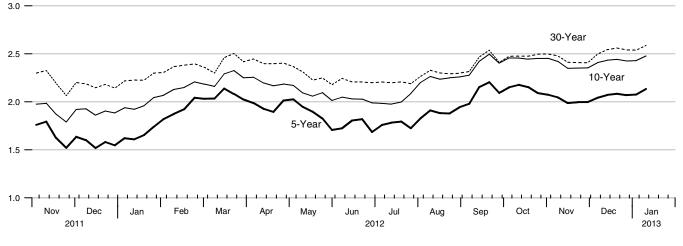
Averages of Daily Figures



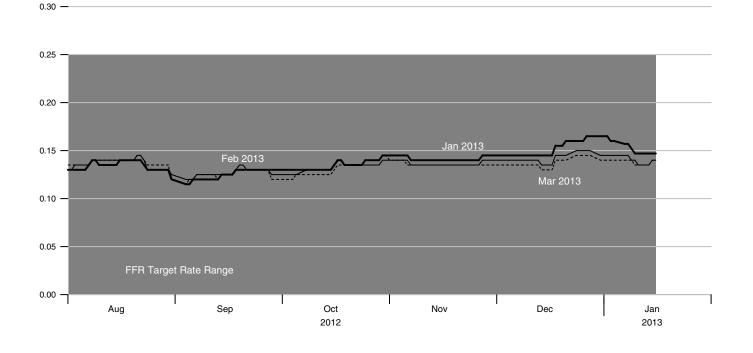
# Inflation-Indexed Treasury Yield Spreads

Averages of Daily Figures

Percent

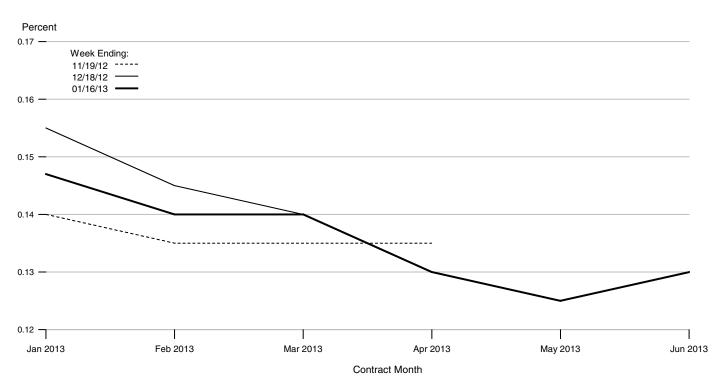


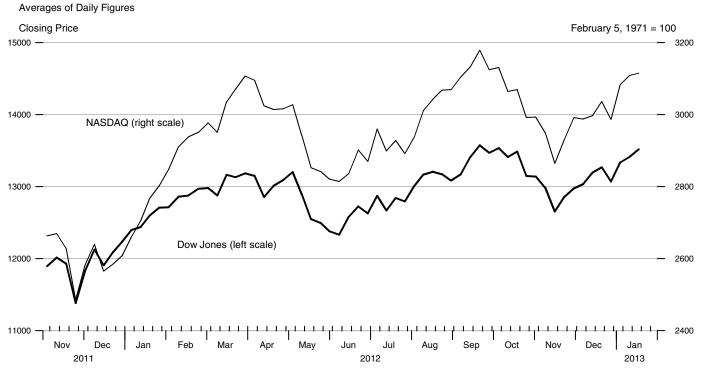
Percent



#### Rates on Federal Funds Futures Contracts Daily Data

# **Rates on Federal Funds Futures on Selected Dates**





# Dow Jones Industrial Average and NASDAQ Composite®

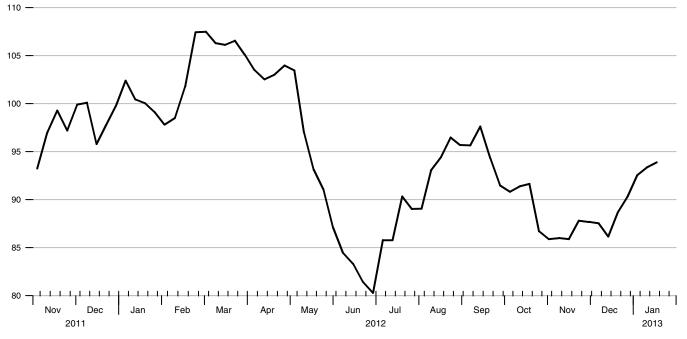
## Wilshire 5000<sup>®</sup> and Standard & Poor's 500



# **Crude Oil Spot Prices**

West Texas Intermediate, Averages of Daily Figures

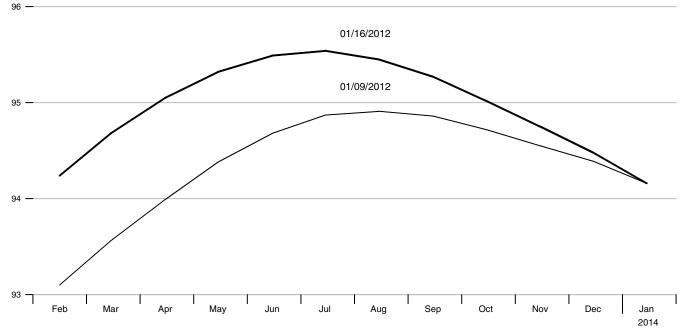
#### Dollars per barrel



**Crude Oil Futures Prices** 

West Texas Intermediate

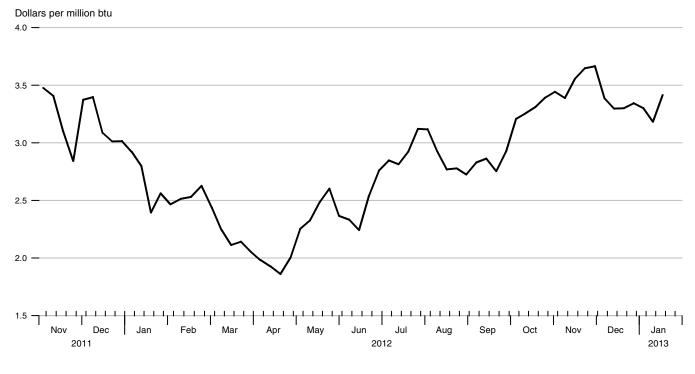




Research Division Federal Reserve Bank of St. Louis

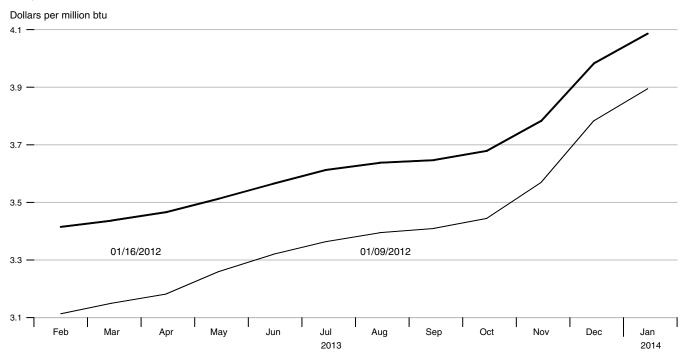
# **Natural Gas Spot Prices**

Henry Hub, Averages of Daily Figures

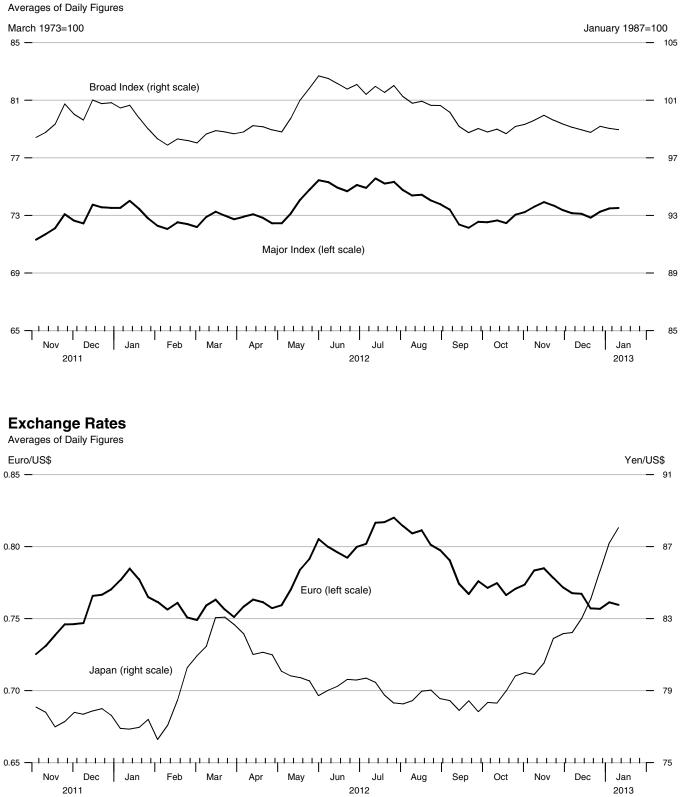


**Natural Gas Futures Prices** 

Henry Hub

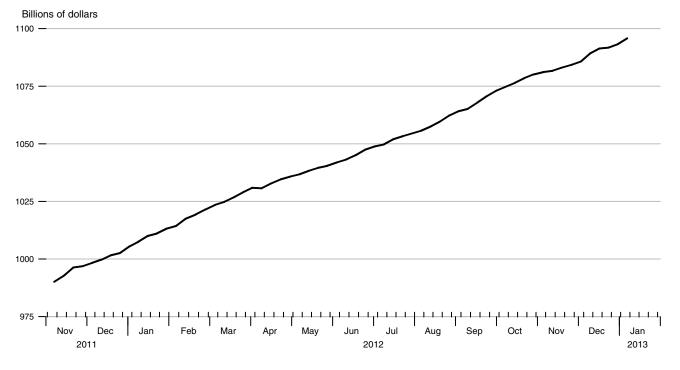


# **Trade-Weighted Exchange Rate Indexes**

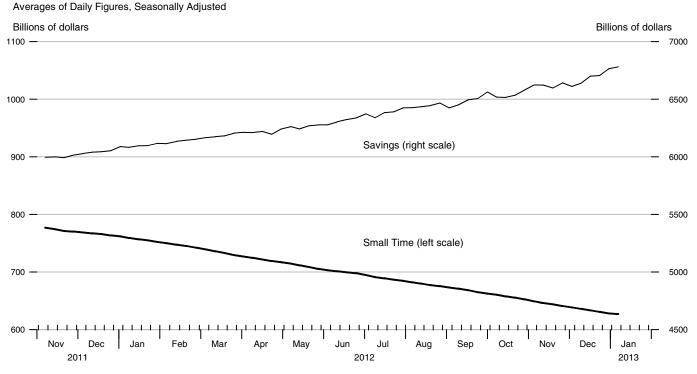


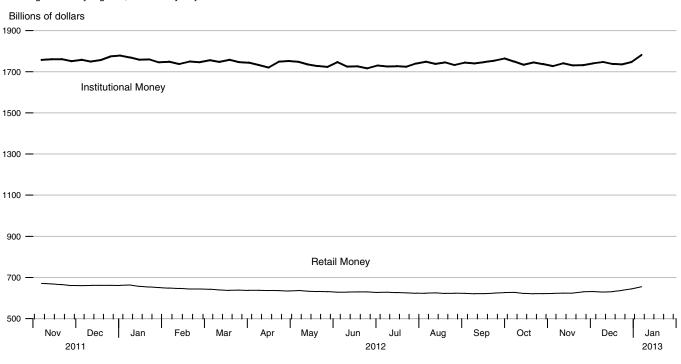
# **Currency Component of M1**

Averages of Daily Figures, Seasonally Adjusted



**Savings and Small Time Deposits** 



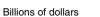


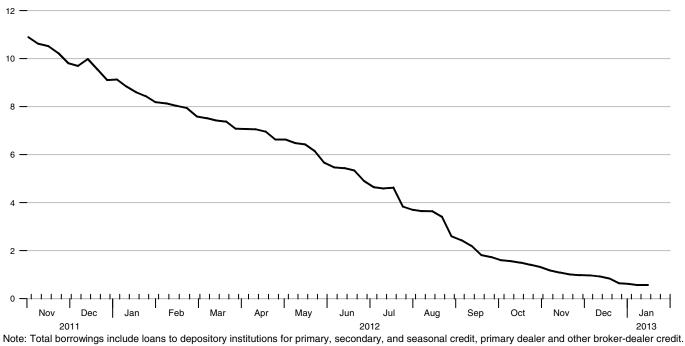
# Institutional and Retail Money Funds

Averages of Daily Figures, Seasonally Adjusted

## **Total Borrowings from Federal Reserve Banks**

Averages of Daily Figures

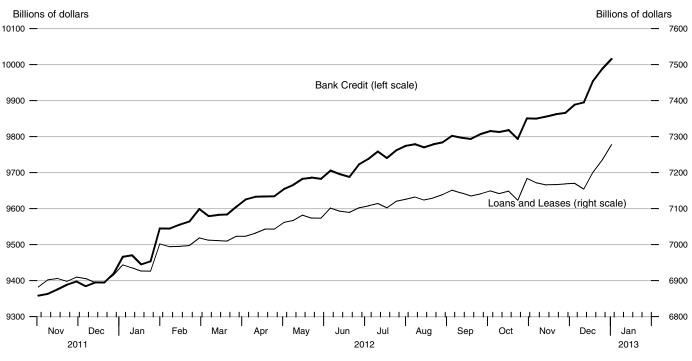




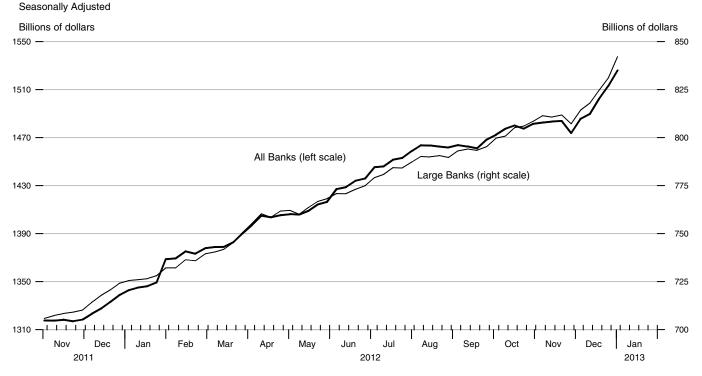
Note: Total borrowings include loans to depository institutions for primary, secondary, and seasonal credit, primary dealer and other broker-dealer credit This category also contains asset-backed commercial paper money market mutual fund liquidity facility, credit extended to American International Group, Inc.,net, term asset-backed securities loan facility, and other credit extensions. Term auction credit is excluded.

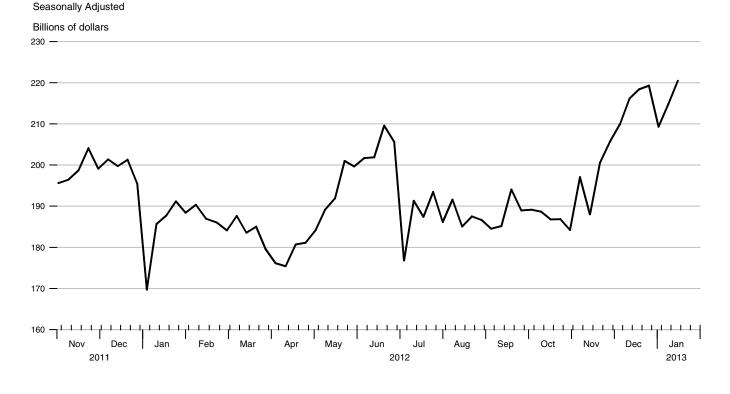
## **Bank Loans and Credit**

All Commercial Banks in the United States, Seasonally Adjusted



**Commercial and Industrial Loans** 

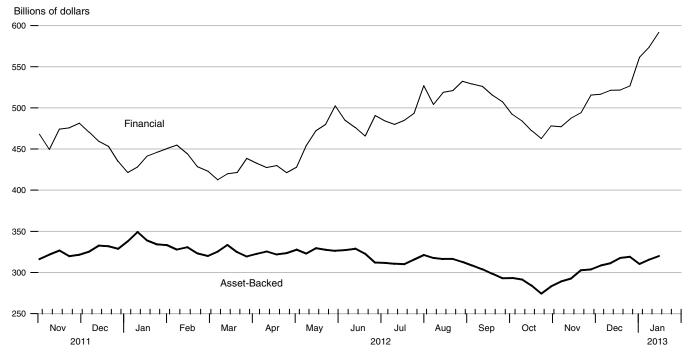




# **Commercial Paper Outstanding of Nonfinancial Companies**

**Commercial Paper Outstanding: Financial and Asset-Backed** 

Seasonally Adjusted



**Reserves and Base** 

Billions of dollars, seasonally adjusted

#### **Interest Rates**

Percent

		30-Day Comm. Paper	90-Day CDs	2-Year Interest Rate Swap	Corporate Aaa Bonds	Corporate Baa Bonds	Municipal Bonds	Federal Funds	3-Month Treasury Bill	2-Year Treasury Securities	5-Year Treasury Securities	10-Year Treasury Securities	30-Year Treasury Securities
Oct	26	0.14	0.23	0.40	3.50	4.54	3.68	0.16	0.11	0.30	0.78	1.81	2.94
Nov	2	0.16	0.25	0.39	3.44	4.49	3.67	0.17	0.11	0.30	0.73	1.74	2.88
	9	0.14	0.23	0.37	3.42	4.46	3.55	0.16	0.10	0.28	0.68	1.68	2.83
	16	0.15	0.24	0.37	3.46	4.47	3.41	0.16	0.09	0.25	0.63	1.59	2.73
	23	0.15	0.24	0.39	3.58	4.56	3.37	0.16	0.09	0.27	0.68	1.67	2.81
	30	0.14	0.24	0.39	3.56	4.56	3.29	0.16	0.09	0.26	0.64	1.63	2.80
Dec	7	0.12	0.24	0.36	3.57	4.57	3.27	0.16	0.10	0.25	0.62	1.62	2.79
	14	0.12	0.23	0.36	3.65	4.63	3.44	0.16	0.07	0.25	0.66	1.69	2.86
	21	0.14	0.24	0.39	3.73	4.70	3.64	0.17	0.06	0.27	0.76	1.80	2.97
	28	0.12	0.23	0.41	3.65	4.61	3.58	0.17	0.06	0.26	0.74	1.76	2.91
Jan	4	0.12	0.23	0.39	3.77	4.71	3.68	0.15	0.07	0.27	0.78	1.87	3.05
	11	0.12	0.23	0.39	3.77	4.70	3.60	0.16	0.07	0.26	0.79	1.90	3.07
	18 *	0.11	0.22	0.38	3.75	4.68		0.14	0.08	0.26	0.76	1.86	3.03

\*Averages of rates available

# Money Stock and Components

Billions of dollars, seasonally adjusted

#### Adjusted Adjusted Monetary Small Retail Institutional Currency Savings Money Money Base Reserves MZM M2 Time 11386 1084 640.9 6642.0 1732.3 Oct 17 1563.17 Nov 26 10295 630.1 2651.735 Dec 3 10325 11427 1086 638.4 6611.6 631.2 1741.1 31 2641.925 1572.97 10 10346 11458 1089 636.0 6640.6 628.9 1748.1 Nov 14 2661.199 1583.80 6700.4 17 10389 11494 1091 633.4 631.2 1738.3 28 2650.669 1591.83 630.7 6706.9 637.3 1736.3 10432 11538 1092 Dec 12 2667.561 1621.08 24 6765.3 1748.7 31 10476 11597 1093 628.1 644.6 26 2633.081 1534.26 6781.7 1782.0 1597.59 7 10485 11640 1096 627.2 655.2 9 2705.398 Jan Jan

# **Bank Loans and Credit**

Billions of dollars, seasonally adjusted

# **Exchange Rates**

		Bank Credit	Loans and Leases	C&I Loans (All)	C&I Loans (Large)	Comm. Paper (sa)	Total Borrowings			Major Exchange Rate Index	Broad Exchange Rate Index	Exchange Rate: Euro/\$	Exchange Rate: Yen/\$
Dec	5	9888.7	7170.3	1485.7	814.3	209.9	0.968	No	v 30	73.4	99.3	0.772	82.2
	12	9895.1	7154.7	1489.7	818.0	216.2	0.925	De	c 7	73.2	99.1	0.768	82.2
	19	9954.8	7201.5	1502.4	824.7	218.4	0.839		14	73.1	98.9	0.767	83.0
	26	9988.5	7235.6	1513.1	831.1	219.3	0.640		21	72.8	98.8	0.757	84.1
Jan	2	10015.8	7277.6	1526.0	842.1	209.3	0.614		28	73.3	99.2	0.757	85.7
	9					214.7	0.565	Ja	n 4	73.5	99.0	0.761	87.2
	16					220.5	0.567		11	73.5	99.0	0.760	88.1

# Definitions

M1: The sum of currency held outside the vaults of depository institutions, Federal Reserve Banks, and the U.S. Treasury; travelers checks; and demand and other checkable deposits issued by financial institutions (except demand deposits due to the Treasury and depository institutions), minus cash items in process of collection and Federal Reserve float.

**M2**: M1 plus savings deposits (including money market deposit accounts) and small-denomination (less than \$100,000) time deposits issued by financial institutions; and shares in retail money market mutual funds (funds with initial investments of less than \$50,000), net of retirement accounts.

M3: M2 plus large-denomination (\$100,000 or more) time deposits; repurchase agreements issued by depository institutions; Eurodollar deposits, specifically, dollar-denominated deposits due to nonbank U.S. addresses held at foreign offices of U.S. banks worldwide and all banking offices in Canada and the United Kingdom; and institutional money market mutual funds (funds with initial investments of \$50,000 or more).

# Notes

*Cover Page*: Economic forecasts are median responses from the Thomson Reuters Weekly Economic Survey, which is sent out to 20 to 25 Wall Street economists each week (usually on Tuesday). These forecasts are released on Friday—at which time, Thursday's *USFD* cover page will be updated.

*Page 3*: **Adjusted Monetary Base** equals the sum of currency in circulation outside Federal Reserve Banks and the U.S. Treasury, deposits of depository financial institutions at Federal Reserve Banks, and an adjustment for the effects of changes in statutory reserve requirements on the quantity of base money held by depositories. This series is a spliced chain index; see Anderson and Rasche (1996a, 1996b, 2001, 2003).

*Page 4*: **Adjusted Reserves** is defined as the sum of vault cash and Federal Reserve Bank deposits held by depository institutions and an adjustment for the effects of changes in statutory reserve requirements on the quantity of base money held by depositories. This series, a spliced chain index, is numerically larger than the Board of Governors' measure, which excludes vault cash not used to satisfy statutory reserve requirements and Federal Reserve Bank deposits used to satisfy required clearing balance contracts; see Anderson and Rasche (1996a, 2001, 2003).

*Page 5*: **MZM** includes the zero maturity, or immediately available, components of M3. MZM equals M2 minus small-denomination time deposits, plus institutional money market mutual funds (that is, the money market mutual funds included in M3 but excluded from M2). The label MZM, or "Money, Zero Maturity," was coined by William Poole (1991) for this aggregate, proposed earlier by Motley (1988). Readers are cautioned that since early 1994 the level and growth of M1 have been depressed by retail sweep programs that reclassify transactions deposits (demand deposits and other checkable deposits) as savings deposits overnight, thereby reducing banks' required reserves; see Anderson and Rasche (2001) and research.stlouisfed.org/aggreg/swdata.html.

*Page 7*: The asset groups are aggregates of the following categories on the H.4.1: **Short-term lending to financial firms and markets** is the sum of repurchase agreements, term auction credit, commercial paper funding facility, central bank liquidity swaps, money market investor funding facility, other loans (less AIG loan), and other assets. **Rescue operations** is the sum of credit extended to AIG, and net portfolio holdings of Maiden Lanes I, II, III, and preferred interests in AIA Aurora and ALICO Holdings. **Operations focused on long term credit conditions** is the sum of Federal Reserve agency obligations held outright, mortgage backed securities, the term asset-backed securities loan facility (TALF), and the TALF LLC. **Traditional portfolio** is the sum of treasury securities, gold certificate account, special drawing rights, coin, items in process of collection, and bank premises. On the liability side, **Source base** is the sum of deposits of depository institutions and Federal Reserve notes. **Treasury financing account** appears on the H.4.1. **Traditional liabilities and capital account** is the sum of deferred availability cash items, foreign official account deposits, U.S. Treasury general account, accrued dividends, reverse repurchase agreements, other deposits, and capital accounts. H.4.1 data are not seasonally adjusted.

*Page 8*: Federal Reserve Holdings of U.S. Treasury Securities include nominal securities, inflation-indexed securities, and the compensation that adjusts for the effect of inflation on the original face value of inflation-indexed securities (inflation compensation). Term Deposits Held by Depository Institutions are interest-bearing deposits with a specific maturity date offered by the Federal Reserve Banks. For more information on the Term Deposit Facility, see http://www.frbservices.org/centralbank/term\_deposit\_facility.html.

*Page 9*: Current data appear in the Federal Reserve Board's H.4.1 release. For more information, see http://www.federalreserve.gov/newsevents/recentactions.htm.

*Page 10*: Current data appear in the Federal Reserve Board's H.15 release, except for the **Intended Federal Funds Rate**. Federal Funds Rate represents seven-day averages for the week ending two days earlier than the date shown in the release.

*Page 11*: Yields on the 10-year U.S. Treasury security, Aaa- and Baarated corporate bonds, and the interest rate on 3-year conforming mortgages appear in the Federal Reserve Board's H.15 release. The interest rates on jumbo mortgages (typically, mortgages in excess of \$417,000) are listed in the *Wall Street Journal*.

*Page 12*: **Inflation-Indexed Treasury Yields** are the most recently issued inflation-indexed bonds of 5- ,10- , and 30-year original maturities. **Inflation-Indexed Treasury Yield Spreads** equal the difference between yields on the most recently issued inflation-indexed bonds and the unadjusted **Treasury Note Yields** of similar maturities.

*Page 13*: **Rates on Federal Funds Futures Contracts** trace through time the yield on three specific contracts. **Rates on Federal Funds Futures on Selected Dates** displays a single day's snapshot of yields for contracts expiring in the months shown on the horizontal axis.

*Page 15*: **Crude Oil** (West Texas intermediate) spot and futures prices are listed in the Wall Street Journal. **Spot Prices** are weekly averages of daily prices; **Futures Prices** are usually taken on Wednesday.

*Page 16*: **Natural Gas** (Henry Hub) spot and futures prices are listed in the Wall Street Journal. **Spot Prices** are weekly averages of daily prices; **Futures Prices** are usually taken on Wednesday.

*Page 17*: Data appear in the Federal Reserve Board's H.10 release. The **Major Index** comprises 7 currencies. The **Broad Index** comprises the **Major Index** plus 19 additional currencies. Further details may be found at www.federalreserve.gov/releases/h10/summary/.

*Page 18*: Data appear in the Federal Reserve Board's H.6 release. **Savings Deposits** is the sum of money market deposit accounts and passbook and statement savings. **Small Time Deposits** have a minimum initial maturity of 7 days. Savings deposits and small time deposits are at all depository institutions. *Page 19*: Data appear in the Federal Reserve Board's H.6 and H.4.1 releases. **Retail Money Funds** are included in M2. **Institutional Money Funds** are not part of M2; they used to be included in M3, which was discontinued as of March 23, 2006. See www.federalreserve.gov/releases/h6/discm3.htm.

**Total Borrowings** include loans to depository institutions for (i) primary, secondary, and seasonal credit and (ii) primary dealer and other broker-dealer credit. This category also includes the asset-backed commercial paper money market mutual fund liquidity facility, credit extended to American International Group, Inc., term asset-backed securities loan facility, and other credit extensions. Term auction credit is excluded. Data and recent information regarding Federal Reserve lending programs appear in the Federal Reserve Board's H.4.1 release at http://www.federalreserve.gov/releases/h41/Current/.

*Page 20*: Data appear in the Federal Reserve Board's H.8 release. **Bank Loans and Credit** include foreign-related institutions. **Bank Credit** includes loans and leases and securities. **All Banks** includes foreign-related institutions. **Large Banks** are domestically chartered banks (adjusted for mergers) and report on a weekly basis.

*Page 21*: Current data appear at www.federalreserve.gov/releases/cp/outstandings.htm.

*Page 22*: **Treasury Security** yields are Treasury constant maturities as reported in the Board of Governors of the Federal Reserve System's H.15 release.

The **3-Month Treasury Bill** yield is the secondary market yield from the H.15 release. **Federal Funds** represents seven-day averages for the week ending two days earlier than the date shown in the table. **Municipal Bonds** represents Bond Buyer's Average Index of 20 municipal bonds, Thursday data.

# Sources

Board of Governors of the Federal Reserve System Monetary aggregates and components: H.6 release. Bank credit: H.8 release. Total Borrowings and Federal Reserve Balance Sheet Items: H.4.1 release. Interest rates: H.15 release. Exchange rates: H.10 release. Commercial paper: Board of Governors web site.

*Chicago Board of Trade* Federal funds futures contract.

Dow Jones Indexes Dow Jones Industrial Average. Federal Reserve Bank of St. Louis Adjusted monetary base, adjusted reserves, and MZM.

NASDAQ Stock Market, Incorporated NASDAQ Composite<sup>®</sup>.

Standard & Poor's Standard & Poor's 500 composite index.

U.S. Department of the Treasury U.S. inflation-indexed security yields.

Wall Street Journal Jumbo mortgage interest rates, oil (West Texas intermediate) and natural gas (Henry Hub) spot and futures prices.

Wilshire Associates Incorporated (www.wilshire.com) Wilshire 5000<sup>®</sup>.

# References

- Anderson, Richard G. and Robert H. Rasche (1996a). "A Revised Measure of the St. Louis Adjusted Monetary Base," Federal Reserve Bank of St. Louis *Review*, March/April, 78(2), pp. 3-13.
- \_\_\_\_\_ and \_\_\_\_\_(1996b). "Measuring the Adjusted Monetary Base in an Era of Financial Change," Federal Reserve Bank of St. Louis *Review*, November/ December, 78(6), pp. 3-37.

\_\_\_\_\_ and \_\_\_\_(2001). "Retail Sweep Programs and Bank Reserves, 1994-1999," Federal Reserve Bank of St. Louis *Review*, January/February, pp. 51-72.

- \_\_\_\_\_ and \_\_\_\_\_, with Jeffrey Loesel (2003). "A Reconstruction of the Federal Reserve Bank of St. Louis Adjusted Monetary Base and Reserves," Federal Reserve Bank of St. Louis *Review*, September/October, 85(5), pp. 39-70.
- Motley, Brian (1988). "Should M2 Be Redefined?" Federal Reserve Bank of San Francisco *Economic Review*, Winter, pp. 33-51.
- Poole, William (1991). Statement before the Subcommittee on Domestic Monetary Policy of the Committee on Banking, Finance and Urban Affairs, U.S. House of Representatives, November 6, 1991. Government Printing Office, Serial No. 102-82.

*Note:* Articles from this Bank's *Review* are available on the Internet at research.stlouisfed.org/publications/review/.