

Market Transparency Report

Monthly Guide to the U.S. Retail Fixed Income Markets

March 2015

As of Mar. 31, 2015

www.tradeweb.com

1177 Avenue of the Americas
New York, NY 10036
866.645.7524

Overview

About the Market Transparency Report

The data and analysis contained in this monthly report are intended to provide transparency into the dynamics of the U.S. Fixed Income markets for retail investors. The report presents the important trends in the market, including trade volumes, most active issuers, yield/spread movements and buy/sell ratios. Retail trades are defined as odd-lot transactions under 100 bonds (i.e. less than \$100,000 par value). The retail market is much smaller than the institutional market on a par value basis, but it accounts for more than 2/3 of the trades that occur in the marketplace.

Page Reference

3. Market Commentary
4. Yield Matrix
5. Treasury, Agency, CD Transaction Trend Summary
6. Corporate Bonds: Odd-Lot Customer Transaction Trend Summary
7. Municipal Bonds: Odd-Lot Customer Transaction Trend Summary
8. Corporate Bonds: Top 20 Most Active Issuers
9. Corporate Bonds: Top 20 Issuers with Highest Buy/Sell Ratio
10. Corporate Bonds: Top 20 Issuers with Lowest Buy/Sell Ratio
11. Corporate Bonds: Top 20 Most Bought Issues
12. Corporate Bonds: Top 20 Most Sold Issues
13. Appendix
14. Disclosures

Monthly Change in Market Data: March vs. February

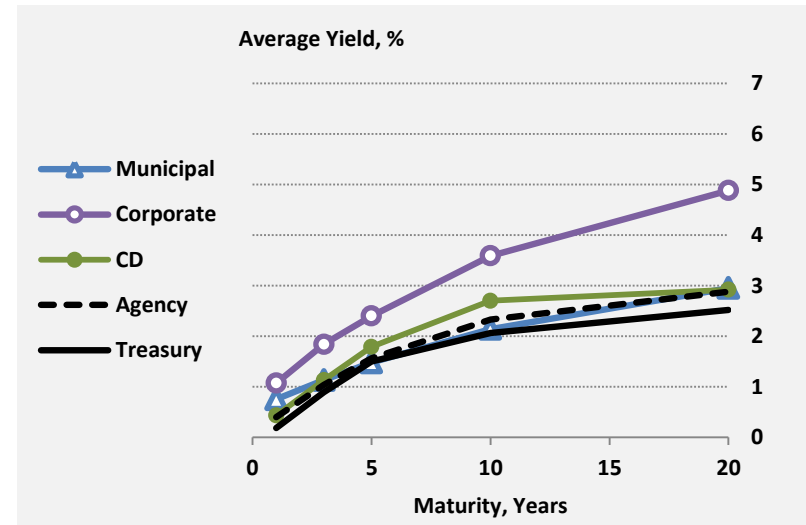
Security	Median Yield	Daily Trade Volume	Buy-to-Sell Ratio
Agency	-6 bps	-7.4%	-0.2
CD	-5 bps	-1.4%	-0.1
Corporate	-25 bps	-7.6%	0.0
Municipal	9 bps	-0.8%	-0.1
Treasury	-17 bps	-11.3%	0.0

For monthly security trend data, see slides 5, 6 and 7

Yield Matrix

Average Yield, % Mar-15	Asset Class	Maturity, Years					Median Maturity, Years
		1	3	5	10	20	
	Treasury	0.2	0.9	1.5	2.1	2.5	1.2
	Agency	0.4	1.0	1.6	2.3	2.9	3
	CD	0.4	1.1	1.8	2.7	2.9	1.5
	Corporate	1.1	1.8	2.4	3.6	4.9	5
	Municipal	0.8	1.1	1.5	2.1	3.0	14

Asset Class	Rating	Maturity, Years					Median Maturity, Years	
		1	3	5	10	20		
Corporate	AAA	-	-	-	-	-	-	
	AA	0.6	1.5	1.5	2.9	3.9	3	
	A	0.8	1.5	2.1	3.2	3.7	5	
	BBB	1.2	2.2	2.5	3.8	5.4	8	
	High Yield	1.9	3.3	3.9	4.8	7.4	4	
	Non-Financial	AAA	0.5	-	1.7	2.5	3.6	6
		AA	0.4	1.2	2.0	2.7	3.8	4
		A	0.7	1.6	2.2	3.2	3.9	6
		BBB	1.0	1.8	2.8	4.1	5.3	8
		High Yield	1.5	4.5	6.3	6.6	8.0	6
Municipal	AAA	0.5	0.9	1.2	1.8	2.7	13	
	AA	0.6	1.0	1.4	2.1	3.0	11	
	A	0.7	1.1	1.5	2.2	3.0	10	
	BBB	1.0	1.4	1.6	2.5	3.3	15	
	High Yield	11.8	10.5	10.5	8.5	8.9	12	
Revenue	AAA	0.6	0.9	1.3	1.8	2.4	9	
	AA	0.6	1.0	1.4	2.0	2.8	14	
	A	0.7	1.2	1.6	2.3	3.0	18	
	BBB	0.9	1.9	2.0	2.6	3.2	19	
	High Yield	10.4	10.1	8.8	7.8	7.1	15	

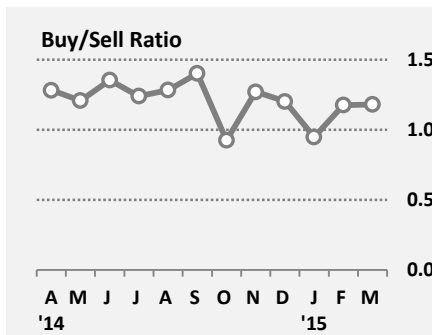
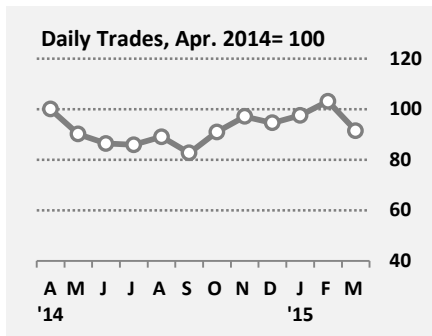
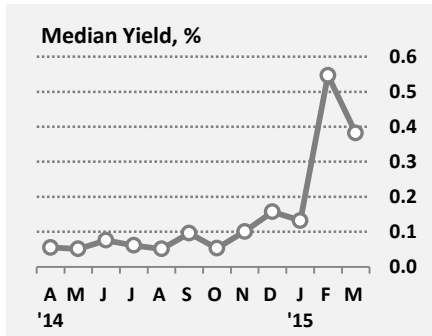


Source: TRACE, RTRS (MSRB's Real-time Transaction Reporting System) and Tradeweb Direct as of 3/31/2015.

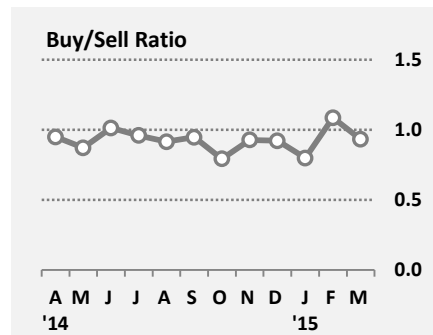
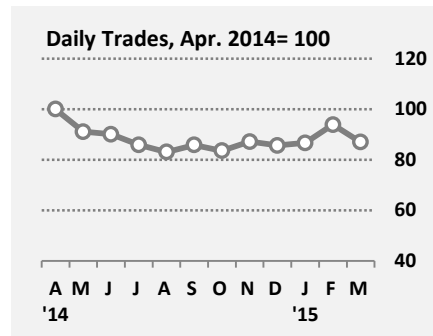
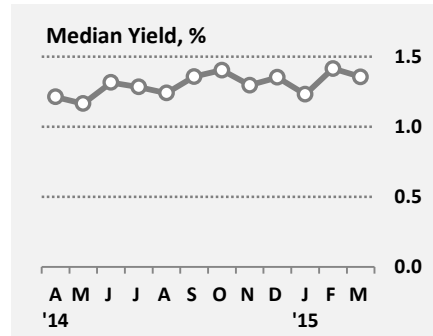
- The yields in each cell for Corporate/Agency/Municipal are the weighted average yield based on odd-lot customer buy transactions reported in TRACE/MSRB.
- The yields in each cell for Treasury/CD are the weighted average yield based on buy transactions on the Tradeweb Direct Platform.
- The weights are based on transaction size.
- Yield summaries for Corporate and Agency exclude transactions in callable or floating-rate coupon bonds.
- Yield summaries for Municipal exclude transactions in taxable bonds.
- See appendix for the definition of maturity and rating buckets.

Treasury, Agency, CD Transaction Trend Summary

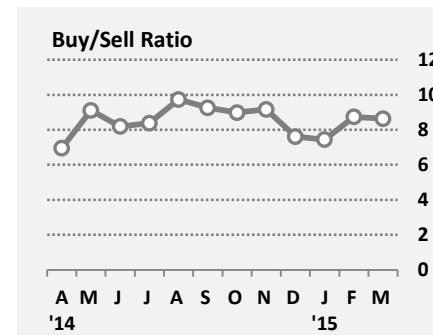
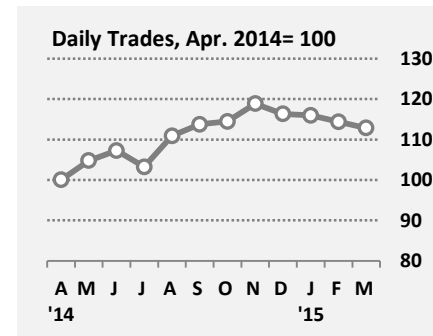
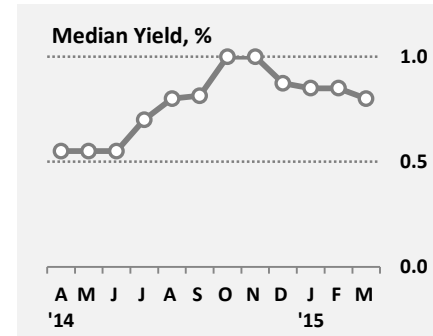
Treasury



Agency



CD



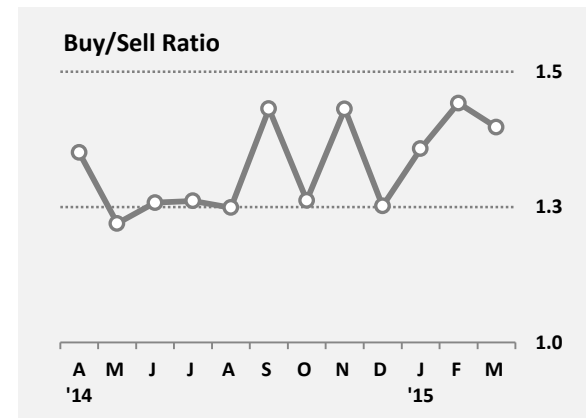
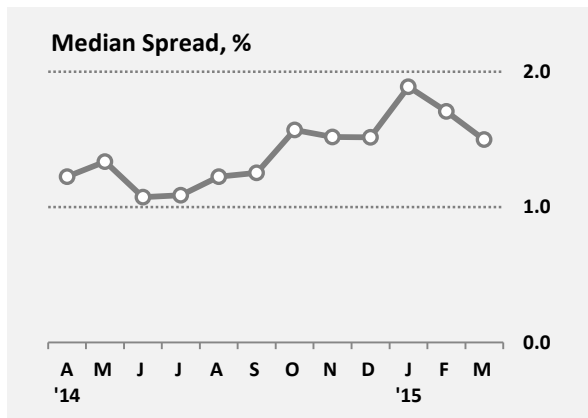
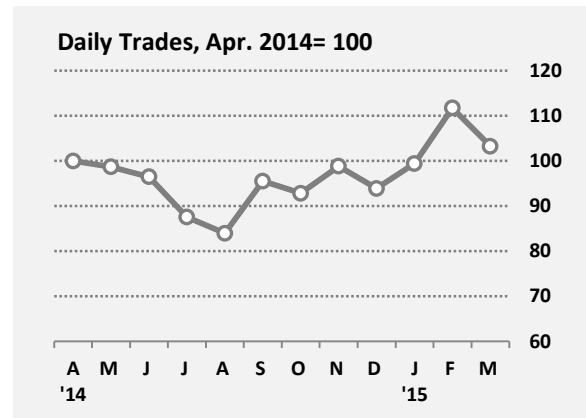
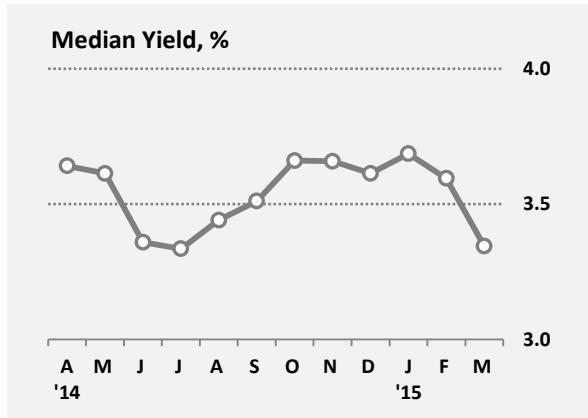
Source: TRACE and Tradeweb Direct as of 3/31/2015.

Treasury and CD are based on transactions on the Tradeweb Direct Platform. Median yields are based on all customer buy transactions.

Agency is based on odd-lot customer transactions (<100M) reported in TRACE. Median yields are based on all odd-lot customer buy transactions.



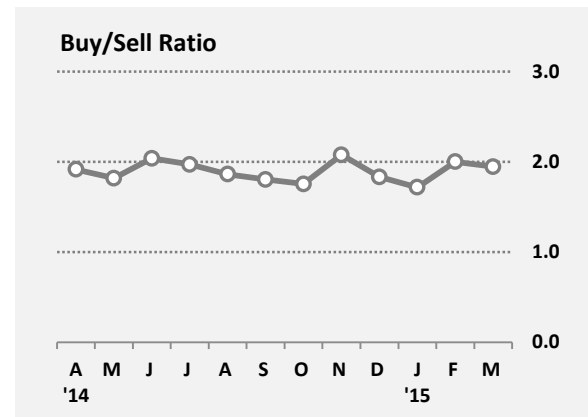
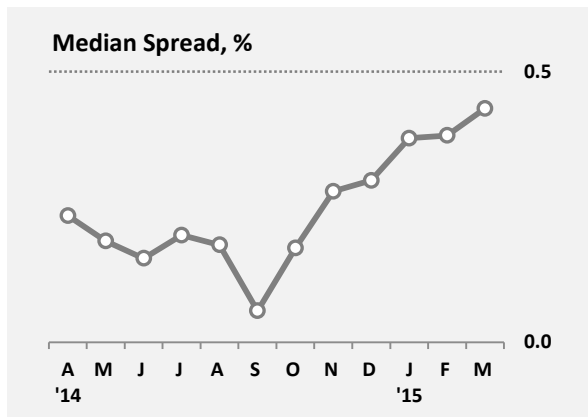
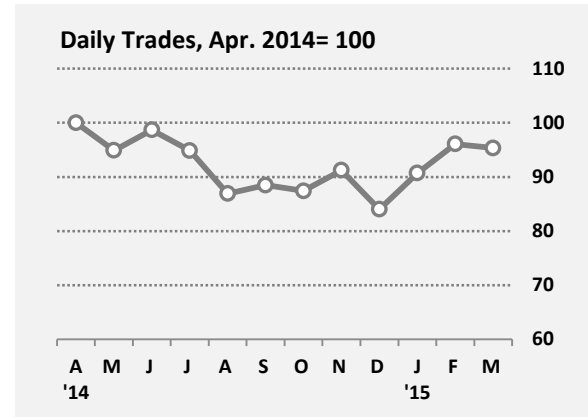
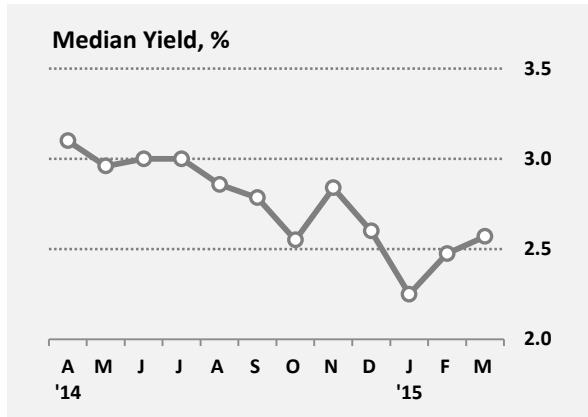
Corporate Bonds: Odd-Lot Customer Transaction Trend Summary



Source: TRACE and Tradeweb Direct as of 3/31/2015.

- Based on odd-lot customer transactions (<100M) reported in TRACE.
- Median yields and spreads are based on all odd-lot customer buy transactions.
- Spread for each transaction is calculated against the Treasury yield for the same maturity.

Municipal Bonds: Odd-Lot Customer Transaction Trend Summary



Source: RTRS (MSRB's Real-time Transaction Reporting System) and Tradeweb Direct as of 3/31/2015.

- Based on odd-lot customer transactions (<100M) reported in MSRB.
- Median yields and spreads are based on all odd-lot customer buy transactions.
- Spread for each transaction is calculated against the Treasury yield for the same maturity.

Corporate Bonds: Top 20 Most Active Issuers

March 2015

	Issuer Reference*	Issuer Name	Rating	Issues Traded	% of Trades	Num of Trades	Buy/Sell Ratio	Dollar Vol. Traded (in Millions)	Median Yield (%), Investor Buys				
									1Y	3Y	5Y	10Y	20Y
1	JPM	JP MORGAN CHASE	A	480	3.6	13,021	1.4	286	0.7	1.6	2.3	3.3	6.0
2	BAC	BANK OF AMERICA	BBB	577	3.3	12,242	1.2	265	1.2	2.0	2.5	3.7	3.8
3	GS	GOLDMAN SACHS	BBB	704	3.1	11,364	1.1	277	0.9	1.9	2.4	3.4	4.6
4	GE	GENERAL ELECTRIC	AA	451	3.0	11,104	1.0	255	0.6	1.4	2.3	3.0	3.9
5	C	CITIGROUP	BBB	273	2.3	8,296	1.9	205	1.0	1.8	2.3	3.6	4.4
6	MS	MORGAN STANLEY	BBB	678	2.1	7,703	0.9	204	0.9	1.8	2.4	3.5	1.0
7	WFC	WELLS FARGO	A	177	1.9	6,980	1.6	167	0.9	1.4	2.2	3.2	3.4
8	PBR	PETROBRAS	BB	23	1.8	6,469	1.1	179	6.2	7.3	7.4	7.1	7.8
9	T	AT&T	BBB	58	1.5	5,561	2.3	126	1.0	1.9	-	3.1	4.8
10	VZ	VERIZON	BBB	68	1.4	5,279	1.4	113	1.0	1.9	2.5	3.2	4.8
11	RIG	TRANSOCEAN INC	BB	14	1.4	5,112	4.8	97	2.1	7.1	9.4	8.1	10.0
12	HBC	HSBC	A	440	0.9	3,319	0.9	135	0.8	1.7	3.0	3.5	4.9
13	BCS	BARCLAYS	A	476	0.9	3,202	0.9	60	1.1	1.7	2.4	3.1	3.5
14	FCX	FREEMPORT-MCMORAN COPPER & GOLD INC	BBB	18	0.8	2,851	5.7	60	-	2.6	3.7	5.1	6.1
15	BRK	BERKSHIRE HATHAWAY	A	124	0.8	2,841	0.8	74	0.7	1.2	3.2	2.8	4.5
16	AAPL	APPLE INC	AA	18	0.8	2,785	1.6	73	0.4	1.3	1.7	2.6	-
17	FTR	FRONTIER COMMUNICATIONS CORP	BB	21	0.7	2,668	1.9	47	-	4.2	5.5	6.7	7.9
18	CLF	CLIFFS NATURAL RESOURCES	C	5	0.7	2,407	0.2	29	-	12.1	14.9	-	-
19	CHRC	REVIVAL PENTE TABERNACLE	N/R	124	0.7	2,404	32.9	21	-	-	-	-	7.0
20	AXP	AMERICAN EXPRESS	A	38	0.6	2,356	1.1	54	0.9	1.5	2.1	3.2	-

Source: TRACE and Tradeweb Direct as of 3/31/2015.

- Based on odd-lot customer transactions (<100M) reported in TRACE.

- Issuer ratings are based on median rating of traded bonds from each issuer. Bond ratings are from Moody's and S&P.

* Actual issue symbol will vary.

Corporate Bonds: Top 20 Issuers with Highest Buy/Sell Ratio

March 2015

Issuer Reference*	Issuer Name	Rating	Issues Traded	% of Trades	Num of Trades			Buy/Sell Ratio	Dollar Vol. Traded (in Millions)	Median Yield (%), Investor Buys					
					All	Buys	Sells			1Y	3Y	5Y	10Y	20Y	
1	OUTR	OUTERWALL INC	BB	2	0.4	1,320	1,306	14	93	19	-	6.4	-	-	-
2	CHRC	REVIVAL PENTE TABERNACLE	N/R	124	0.7	2,404	2,333	71	33	21	-	-	-	-	7.0
3	EAC	Erickson Air-Crane Incorporated	B	1	0.2	815	770	45	17	6	-	-	12.9	-	-
4	NBR	NABORS INDS INC	BBB	6	0.5	1,710	1,603	107	15	36	2.0	3.7	4.9	5.5	-
5	DISH	DISH DBS CORP	BB	11	0.3	1,143	1,050	93	11	21	2.1	3.5	4.7	5.2	-
6	NE	NOBLE HLDG INTL LTD	BBB	13	0.4	1,435	1,314	121	11	30	1.9	3.7	5.4	6.0	-
7	WIN	WINDSTREAM CORP	B	7	0.3	988	878	110	8	20	-	4.3	6.2	7.8	-
8	MUR	MURPHY OIL CORP	BBB	6	0.3	1,052	929	123	8	23	-	2.7	-	4.5	-
9	EBAY	EBAY INC	A	11	0.6	2,132	1,820	312	6	51	0.6	1.4	2.5	3.5	-
10	FCX	FREEMPORT-MCMORAN COPPER & GOLD INC	BBB	18	0.8	2,851	2,426	425	6	60	-	2.6	3.7	5.1	6.1
11	ACT		BBB	17	0.4	1,326	1,101	225	5	29	-	1.8	2.9	3.4	4.3
12	RIG	TRANSOCEAN INC	BB	14	1.4	5,113	4,233	880	5	97	2.1	7.1	9.4	8.1	10.0
13	LINE	Linn Energy, LLC	B	7	0.3	946	781	165	5	16	-	-	11.9	10.6	-
14	IEP	ICAHN ENTERPRISES	BB	4	0.3	1,143	925	218	4	25	-	3.8	4.7	-	-
15	L	CNA FINL CORP	A	24	0.3	1,199	964	235	4	26	1.0	2.1	2.9	3.7	6.0
16	ALLY	ALLY FINANCIAL	BB	67	0.4	1,460	1,167	293	4	36	2.2	3.2	3.7	4.4	5.4
17	EMC	EMC CORP	A	3	0.2	777	610	167	4	14	-	1.5	2.0	3.2	-
18	PSEC	PROSPECT CAPITAL CORPORATION	BBB	142	0.3	1,178	918	260	4	22	2.5	4.5	3.7	5.1	4.4
19	WFT	WEATHERFORD INTL LTD BERMUDA	BBB	12	0.3	1,261	966	295	3	29	1.6	3.7	5.3	-	7.2
20	CHK	CHESAPEAKE ENERGY	BB	15	0.6	2,042	1,558	484	3	43	3.2	-	6.3	5.7	2.0

Source: TRACE and Tradeweb Direct as of 3/31/2015.

- Based on odd-lot customer transactions (<100M) reported in TRACE.

- The top 20 issuers are selected among top 100 most active issuers in odd-lot TRACE.

- Issuer ratings are based on median rating of traded bonds from each issuer. Bond ratings are from Moody's and S&P.

* Actual issue symbol will vary.

Corporate Bonds: Top 20 Issuers with Lowest Buy/Sell Ratio

March 2015

Issuer Reference*	Issuer Name	Rating	Issues Traded	% of Trades	Num of Trades			Buy/Sell Ratio	Dollar Vol. Traded (in Millions)	Median Yield (%), Investor Sells					
					All	Buys	Sells			1Y	3Y	5Y	10Y	20Y	
1	MCP	MOLYCORP INC DEL	C	4	0.3	966	90	876	0.1	5.5	436.5	164.1	29.1	-	-
2	CLF	CLIFFS NATURAL RESOURCES	C	5	0.7	2,407	362	2,045	0.2	28.6	-	15.6	14.9	-	-
3	DELL	DELL	BB	8	0.3	1,173	233	940	0.2	28.4	2.3	3.3	4.0	-	6.4
4	UBS	UBS	A	199	0.3	948	299	649	0.5	23.9	1.5	2.1	3.6	4.3	-
5	TWC	TIME WARNER	BBB	15	0.3	1,010	332	678	0.5	24.1	-	2.4	2.8	3.7	4.9
6	AA	ALCOA	BBB	11	0.5	1,732	579	1,153	0.5	41.5	-	3.0	3.8	4.7	5.6
7	MET	METLIFE	A	21	0.3	1,056	361	695	0.5	23.0	1.0	1.8	2.5	3.0	3.9
8	RBS	ROYAL BANK OF SCOTLAND	BBB	85	0.2	811	285	526	0.5	21.5	1.5	3.1	2.7	4.4	4.9
9	CRBM	DYNCORP INTL INC	B	24	0.3	1,179	419	760	0.6	24.3	-	14.9	5.2	7.8	7.6
10	AIG	AIG	BBB	41	0.3	1,180	475	705	0.7	29.9	2.3	1.6	2.4	4.6	4.0
11	VOD	VODAFONE	BBB	14	0.4	1,296	528	768	0.7	28.4	-	1.7	2.2	3.2	4.6
12	CS	CREDIT SUISSE	A	268	0.6	2,165	899	1,266	0.7	37.3	8.0	2.2	2.8	-	-
13	UAL	UNITED AIRLINES	B	31	0.3	1,113	468	645	0.7	30.0	7.2	4.3	4.9	3.6	-
14	CMCS	COMCAST	A	41	0.4	1,507	646	861	0.8	38.7	0.9	1.4	2.2	2.8	4.0
15	CSCO	CISCO	AA	12	0.3	1,033	446	587	0.8	22.0	0.7	1.7	2.0	2.7	4.0
16	INTC	INTEL CORP	A	9	0.3	930	403	527	0.8	21.8	0.8	1.2	-	2.7	1.4
17	MT	ArcelorMitta	BB	10	0.4	1,465	642	823	0.8	37.0	2.4	3.8	4.9	-	7.4
18	BRK	BERKSHIRE HATHAWAY	A	124	0.8	2,841	1,247	1,594	0.8	74.0	0.7	1.3	2.4	2.9	4.8
19	HPQ	HEWLETT PACKARD	BBB	20	0.5	1,870	836	1,034	0.8	47.0	1.2	1.7	2.9	3.5	-
20	DB	DEUTSCHE BANK	A	160	0.4	1,295	579	716	0.8	27.2	1.2	1.6	-	3.3	-

Source: TRACE and Tradeweb Direct as of 3/31/2015.

- Based on odd-lot customer transactions (<100M) reported in TRACE.

- The top 20 issuers are selected among top 100 most active issuers in odd-lot TRACE.

- Issuer ratings are based on median rating of traded bonds from each issuer. Bond ratings are from Moody's and S&P.

* Actual issue symbol will vary.

Corporate Bonds: Top 20 Most Bought Issues

March 2015

Issue	Issuer Reference*	Coupon	Maturity	Rating	Number of Trades			Dollar Vol. Traded (in Million)	Median Yield, %		Median Price		
					Buys	Sells	Total		Buyers	Sellers	Buyers	Sellers	
1	OUTERWALL INC	OUTR	6.000	Mar-19	BB	1,305	14	1,319	18.6	6.4	6.8	98.6	97.2
2	TRANSOCEAN INC	RIG	6.500	Nov-20	BB	1,031	176	1,207	22.1	9.4	10.0	87.4	85.0
3	CITIGROUP INC	C	5.875	Mar-49	BB	982	4	986	26.8	-	-	101.2	100.9
4	ERICKSON INC	EAC	8.250	May-20	B	770	45	815	6.1	12.9	13.3	82.9	81.7
5	BANK OF AMERICA CORP	BAC	6.100	Mar-49	BB	763	34	797	24.3	-	-	102.3	100.5
6	TRANSOCEAN INC	RIG	6.000	Mar-18	BB	697	99	796	16.5	7.1	8.0	97.0	94.7
7	GASTAR EXPL INC NEW	GST	8.625	May-18	C	681	16	697	5.6	11.2	11.3	93.2	93.1
8	US STEEL CORP	X	7.500	Mar-22	B	603	72	675	9.8	7.2	7.3	101.1	100.8
9	CHESAPEAKE ENERGY CORP	CHK	3.503	Apr-19	BB	588	82	670	14.6	-	-	98.5	97.8
10	VERIZON COMMUNICATIONS INC	VZ	4.500	Sep-20	BBB	585	171	756	12.9	2.5	2.6	110.1	109.5
11	FRONTIER COMMUNICATIONS CORP	FTR	8.500	Apr-20	BB	583	37	620	6.0	5.5	5.6	112.9	112.4
12	GRAFTECH INTL LTD	GTI	6.375	Nov-20	B	558	50	608	4.2	10.7	9.9	82.0	84.9
13	TRANSOCEAN INC	RIG	7.500	Apr-31	BB	553	46	599	7.2	10.3	10.1	78.5	79.4
14	ACTAVIS FUNDING SCS	ACT	3.450	Mar-22	BBB	522	12	534	9.3	3.1	3.2	101.1	101.6
15	JPMORGAN CHASE & CO	JPM	6.750	Aug-49	BBB	516	121	637	15.1	-	-	110.1	108.0
16	COACH INC	COH	4.250	Apr-25	BBB	503	11	514	12.1	4.1	4.1	101.5	101.0
17	BANK OF AMERICA CORP	BAC	6.500	Oct-49	BB	493	32	525	15.9	-	-	106.8	104.9
18	NABORS INDS INC	NBR	5.100	Sep-23	BBB	485	14	499	10.1	5.5	5.9	97.3	94.4
19	APPLE INC	AAPL	2.400	May-23	AA	484	381	865	22.4	2.6	2.6	98.6	98.3
20	TRANSOCEAN INC	RIG	5.050	Dec-16	BB	482	53	535	12.2	4.5	5.2	101.2	100.2

Source: TRACE and Tradeweb Direct as of 3/31/2015.

- Based on odd-lot customer transactions (<100M) reported in TRACE.

- Ratings (AAA, AA, A, BBB, BB, B, C) are based on aggregate ratings from Moody's and S&P (when available).

* Actual issue symbol will vary.

Corporate Bonds: Top 20 Most Sold Issues

March 2015

Issue	Issuer Reference*	Coupon	Maturity	Rating	Number of Trades			Dollar Vol. Traded (in Million)	Median Yield, %		Median Price		
					Buys	Sells	Total		Buyers	Sellers	Buyers	Sellers	
1	MOLYCORP INC DEL	MCP	10.000	Jun-20	C	74	858	932	5.4	29.3	29.1	50.0	50.4
2	CLIFFS NATURAL RESOURCES	CLF	4.800	Oct-20	C	19	724	743	6.8	15.8	14.9	60.6	62.7
3	JPMORGAN CHASE & CO	JPM	7.900	Apr-49	BBB	471	686	1,157	21.8	-	-	108.1	107.7
4	CLIFFS NATURAL RESOURCES	CLF	4.875	Apr-21	C	36	583	619	7.3	15.2	13.9	60.1	63.7
5	VODAFONE GROUP PLC NEW	VOD	1.500	Feb-18	BBB	81	513	594	8.1	1.6	1.7	99.6	99.5
6	FRONTIER COMMUNICATIONS	FTR	8.125	Oct-18	BB	9	508	517	4.8	3.9	4.2	113.7	112.5
7	PETROBRAS INTL	PBR	5.375	Jan-21	BB	300	462	762	20.2	7.5	7.7	90.3	89.4
8	PETROBRAS GLOBAL FINANCE B V	PBR	4.375	May-23	BB	235	457	692	16.3	7.0	7.1	83.8	83.0
9	APPLE INC	AAPL	2.400	May-23	AA	484	381	865	22.4	2.6	2.6	98.6	98.3
10	WELLS FARGO & COMPANY	WFC	7.980	Feb-49	BBB	455	354	809	19.3	-	-	110.1	109.3
11	UNITED CONTL HLDGS INC	UAL	6.000	Apr-15	B	28	344	372	10.6	6.0	6.0	100.2	100.0
12	GENERAL ELECTRIC CO	GE	5.250	Dec-17	AA	152	341	493	8.8	1.3	1.3	110.6	110.4
13	DELL INC	DELL	5.875	Jun-19	BB	41	333	374	6.7	3.9	3.7	107.6	108.5
14	CLIFFS NATURAL RESOURCES	CLF	5.900	Mar-20	C	84	323	407	5.4	14.9	17.0	69.0	63.5
15	JPMORGAN CHASE & CO	JPM	4.400	Jul-20	A	155	290	445	8.9	2.4	2.6	109.7	109.1
16	GENERAL ELEC CAP CORP MTN BE	GE	5.875	Jan-38	AA	91	290	381	8.1	3.9	4.0	128.9	127.9
17	PETROBRAS GLOBAL FINANCE B V	PBR	3.000	Jan-19	BB	195	274	469	12.8	7.1	7.4	86.4	85.5
18	LINCOLN NATL CORP IND	LNC	7.000	May-66	BBB	131	264	395	6.4	-	-	99.7	96.1
19	-	HBHC	-	-	N/R	218	261	479	3.9	-	-	24.8	24.4
20	ALCOA INC	AA	5.950	Feb-37	BBB	31	256	287	7.7	5.4	5.6	106.5	105.0

Source: TRACE and Tradeweb Direct as of 3/31/2015.

- Based on odd-lot customer transactions (<100M) reported in TRACE.

- Ratings (AAA, AA, A, BBB, BB, B, C) are based on aggregate ratings from Moody's and S&P (when available).

* Actual issue symbol will vary.

Appendix

Maturity

We consider the following maturity ranges for maturity buckets. TTM is Time to Maturity in years.

1Y:	0.5 <= TTM <= 1.5
3Y:	2 <= TTM <= 4
5Y:	4 < TTM <= 6
10Y:	7.5 <= TTM <= 12.5
20Y:	15 <= TTM <= 25

Rating

Rating buckets (AAA, AA, A, BBB, HY) in yield matrix are based on aggregate ratings from Moody's and S&P (when available).

For Corporate, we only consider transactions in bonds that are rated by both rating agencies.

- Corporate AAA: Bonds rated AAA by both rating agencies.
 - Corporate AA: Bonds rated AA by both rating agencies.
 - Corporate A: Bonds rated A by both rating agencies.
 - Corp BBB: Bonds rated BBB by both rating agencies.
 - Corporate High Yield: Bonds rated High Yield by both rating agencies.
- (Transactions in corporate bonds that are rated as AA by one agency and as A by another agency are excluded.)

- Municipal AAA: Bonds rated AAA by both rating agencies, or AAA by one agency and not rated by another agency.
 - Municipal AA: Bonds rated AA by both rating agencies, or AA by one agency and not rated by another agency.
 - Municipal A: Bonds rated A by both rating agencies, or A by one agency and not rated by another agency.
 - Municipal BBB: Bonds rated BBB by both rating agencies, or BBB by one agency and not rated by another agency.
 - Municipal High Yield: Bonds rated High Yield by both rating agencies, or High Yield by one agency and not rated by another agency.
- (Transactions in municipal bonds that are rated as AA by one agency and as A by another agency are excluded.)
Transactions in municipal bonds that are rated as AA by one agency and not rated by the other agency are included.)

Disclosures

This report represents certain customer trades in securities that have been reported by dealers to FINRA's Trade Reporting and Compliance Engine ("TRACE"), and the Municipal Securities Rulemaking Board ("MSRB"). The report does not necessarily reflect all transactions that were effected on dates noted. There is the possibility of errors or delays in the trade submission process. Prices for transactions vary with market conditions and can be affected by trade size and other factors. The information provided has been obtained from sources deemed to be reliable, however Tradeweb Direct does not guarantee the accuracy of the information contained in this report.

Fixed income securities are subject to increased loss of principal during periods of rising interest rates. Fixed-income investments are subject to various risks including changes in credit quality, market valuations, liquidity, prepayments, early redemption, corporate events, tax ramifications and other factors. Defaults on interest payments and/or principal may also occur. Projections, results and assumptions contained herein reflect past performance of the referenced securities and asset classes. Past performance is no guarantee of future results. The investment return and principal value of an investment will fluctuate such that an investment, if and when redeemed, may be worth more or less than its original cost.

This information is intended for general informational purposes only, and should not be used as the sole basis for any investment decisions. None of the information in the report constitutes an offer or solicitation to buy or sell any security or financial product, a recommendation concerning any security, financial product or asset class, or an offer to provide investment advice or any other service. Where appropriate, please consult with a qualified financial and tax professional.