

## CME Exchange Volume Comparison Report - Monthly

|                              | Open<br>Outcry<br>MAR 2017 | Open<br>Outcry<br>MAR 2016 | %<br>CHG | ELEC<br>MAR 2017 | ELEC<br>MAR 2016 | %<br>CHG | Open<br>Outcry<br>Y.T.D 2017 | Open<br>Outcry<br>Y.T.D 2016 | %<br>CHG | ELEC<br>Y.T.D 2017 | ELEC<br>Y.T.D 2016 | %<br>CHG |
|------------------------------|----------------------------|----------------------------|----------|------------------|------------------|----------|------------------------------|------------------------------|----------|--------------------|--------------------|----------|
| <b>Interest Rate Futures</b> |                            |                            |          |                  |                  |          |                              |                              |          |                    |                    |          |
| EURODOLLARS                  | 880,351                    | 540,884                    | 62.8%    | 70,993,031       | 52,462,007       | 35.3%    | 2,141,817                    | 2,157,687                    | -0.7%    | 187,937,317        | 169,144,070        | 11.1%    |
| 1-MONTH EURODOLLAR           | 0                          | 0                          | 0.0%     | 2,108            | 789              | 167.2%   | 0                            | 0                            | 0.0%     | 5,381              | 2,545              | 111.4%   |
| 2YR BUNDLE                   | -                          | 0                          | 0.0%     | -                | 0                | 0.0%     | -                            | 0                            | 0.0%     | -                  | 0                  | 0.0%     |
| EURO 5YR BUNDLE              | -                          | 0                          | 0.0%     | -                | 0                | 0.0%     | -                            | 0                            | 0.0%     | -                  | 0                  | 0.0%     |
| 3YR BUNDLE                   | -                          | 0                          | 0.0%     | -                | 0                | 0.0%     | -                            | 0                            | 0.0%     | -                  | 0                  | 0.0%     |
| <b>Interest Rate Options</b> |                            |                            |          |                  |                  |          |                              |                              |          |                    |                    |          |
| EURODOLLARS                  | 12,239,962                 | 8,026,777                  | 52.5%    | 5,227,223        | 2,699,469        | 93.6%    | 31,005,455                   | 36,850,462                   | -15.9%   | 11,922,787         | 9,126,276          | 30.6%    |
| EURO MIDCURVE                | 11,543,613                 | 6,233,324                  | 85.2%    | 6,159,098        | 2,769,345        | 122.4%   | 32,324,751                   | 26,895,102                   | 20.2%    | 14,917,787         | 11,864,529         | 25.7%    |

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|-----------------------------|----------------------------|----------------------------|----------|------------------|------------------|----------|------------------------------|------------------------------|----------|--------------------|--------------------|----------|
| <b>Equity Index Futures</b> |                            |                            |          |                  |                  |          |                              |                              |          |                    |                    |          |
| E-MINI S&P500               | 0                          | 0                          | 0.0%     | 43,097,236       | 44,506,207       | -3.2%    | 0                            | 0                            | 0.0%     | 98,417,296         | 134,871,382        | -27.0%   |
| S&P 500                     | 179,314                    | 252,986                    | -29.1%   | 7,781            | 10,913           | -28.7%   | 274,907                      | 402,681                      | -31.7%   | 17,624             | 44,388             | -60.3%   |
| S&P 600 SMALLCAP EMINI      | -                          | 0                          | 0.0%     | -                | 0                | 0.0%     | -                            | 0                            | 0.0%     | -                  | 0                  | 0.0%     |
| E-MINI MIDCAP               | 0                          | 0                          | 0.0%     | 564,893          | 586,141          | -3.6%    | 0                            | 0                            | 0.0%     | 1,166,792          | 1,527,605          | -23.6%   |
| S&P 400 MIDCAP              | -                          | 0                          | 0.0%     | -                | 0                | 0.0%     | -                            | 0                            | 0.0%     | -                  | 0                  | 0.0%     |
| S&P 500 GROWTH              | 0                          | 0                          | 0.0%     | 37               | 57               | -35.1%   | 0                            | 0                            | 0.0%     | 52                 | 83                 | -37.3%   |
| S&P 500/VALUE               | 0                          | 0                          | 0.0%     | 5,382            | 3,880            | 38.7%    | 0                            | 0                            | 0.0%     | 15,317             | 12,909             | 18.7%    |
| E-MINI RUSSELL 1000         | 0                          | 0                          | 0.0%     | 2,074            | 568              | 265.1%   | 0                            | 0                            | 0.0%     | 3,362              | 2,759              | 21.9%    |
| E-MINI NASDAQ 100           | 0                          | 0                          | 0.0%     | 5,670,654        | 5,701,981        | -0.5%    | 0                            | 0                            | 0.0%     | 12,642,101         | 20,612,469         | -38.7%   |
| NASDAQ                      | -                          | 0                          | 0.0%     | -                | 0                | 0.0%     | -                            | 0                            | 0.0%     | -                  | 0                  | 0.0%     |
| NIKKEI 225 (\$) STOCK       | 0                          | 0                          | 0.0%     | 359,459          | 393,381          | -8.6%    | 0                            | 0                            | 0.0%     | 900,411            | 1,416,539          | -36.4%   |
| NIKKEI 225 (YEN) STOCK      | 0                          | 0                          | 0.0%     | 1,040,504        | 1,300,784        | -20.0%   | 0                            | 0                            | 0.0%     | 2,959,044          | 4,651,538          | -36.4%   |
| DJ US REAL ESTATE           | 0                          | -                          | -        | 3,200            | -                | -        | 0                            | -                            | -        | 5,705              | -                  | -        |
| NASDAQ BIOTECH              | 0                          | 0                          | 0.0%     | 0                | 0                | 0.0%     | 0                            | 0                            | 0.0%     | 0                  | 0                  | 0.0%     |
| E-MICRO NIFTY               | -                          | 0                          | 0.0%     | -                | 0                | 0.0%     | -                            | 0                            | 0.0%     | -                  | 0                  | 0.0%     |
| S&P ENERGY SECTOR           | 0                          | 0                          | 0.0%     | 16,810           | 9,366            | 79.5%    | 0                            | 0                            | 0.0%     | 37,013             | 26,848             | 37.9%    |
| S&P FINANCIAL SECTOR        | 0                          | 0                          | 0.0%     | 23,040           | 11,195           | 105.8%   | 0                            | 0                            | 0.0%     | 42,436             | 25,764             | 64.7%    |
| S&P TECHNOLOGY SECTOR       | 0                          | 0                          | 0.0%     | 9,261            | 4,710            | 96.6%    | 0                            | 0                            | 0.0%     | 17,543             | 11,368             | 54.3%    |
| S&P CONSUMER DSCRTNRY S     | 0                          | 0                          | 0.0%     | 6,751            | 4,681            | 44.2%    | 0                            | 0                            | 0.0%     | 16,396             | 16,815             | -2.5%    |
| S&P HEALTH CARE SECTOR      | 0                          | 0                          | 0.0%     | 17,852           | 8,360            | 113.5%   | 0                            | 0                            | 0.0%     | 34,659             | 25,011             | 38.6%    |
| S&P MATERIALS SECTOR        | 0                          | 0                          | 0.0%     | 10,326           | 3,431            | 201.0%   | 0                            | 0                            | 0.0%     | 17,975             | 11,192             | 60.6%    |
| S&P INDUSTRIAL SECTOR       | 0                          | 0                          | 0.0%     | 5,159            | 2,887            | 78.7%    | 0                            | 0                            | 0.0%     | 13,763             | 7,376              | 86.6%    |
| S&P CONSUMER STAPLES SE     | 0                          | 0                          | 0.0%     | 17,296           | 15,131           | 14.3%    | 0                            | 0                            | 0.0%     | 26,485             | 24,845             | 6.6%     |
| S&P UTILITIES SECTOR        | 0                          | 0                          | 0.0%     | 26,275           | 22,832           | 15.1%    | 0                            | 0                            | 0.0%     | 48,672             | 39,615             | 22.9%    |
| IBOVESPA INDEX              | 0                          | 0                          | 0.0%     | 660              | 657              | 0.5%     | 0                            | 0                            | 0.0%     | 2,120              | 1,536              | 38.0%    |
| E-MINI RUSSELL 1000 VALUE   | 0                          | 0                          | 0.0%     | 3,034            | 643              | 371.9%   | 0                            | 0                            | 0.0%     | 5,626              | 2,671              | 110.6%   |
| FT-SE 100                   | 0                          | 0                          | 0.0%     | 1,108            | 2,056            | -46.1%   | 0                            | 0                            | 0.0%     | 5,343              | 5,746              | -7.0%    |
| E-MINI RUSSELL 1000 GROWT   | 0                          | 0                          | 0.0%     | 663              | 582              | 13.9%    | 0                            | 0                            | 0.0%     | 1,329              | 1,742              | -23.7%   |
| NIFTY 50                    | 0                          | 0                          | 0.0%     | 6,082            | 7,606            | -20.0%   | 0                            | 0                            | 0.0%     | 13,816             | 24,888             | -44.5%   |

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|-----------------------------|----------------------------|----------------------------|----------|------------------|------------------|----------|------------------------------|------------------------------|----------|--------------------|--------------------|-----------|
| <b>Equity Index Options</b> |                            |                            |          |                  |                  |          |                              |                              |          |                    |                    |           |
| E-MINI S&P500               | 0                          | 0                          | 0.0%     | 5,332,859        | 6,513,513        | -18.1%   | 0                            | 47,365                       | -100.0%  | 12,826,519         | 22,012,856         | -41.7%    |
| S&P 500                     | 433,583                    | 919,475                    | -52.8%   | 0                | 0                | 0.0%     | 975,899                      | 2,835,770                    | -65.6%   | 0                  | 0                  | 0.0%      |
| E-MINI MIDCAP               | 0                          | 0                          | 0.0%     | 0                | 4                | -100.0%  | 0                            | 0                            | 0.0%     | 0                  | 5                  | -100.0%   |
| E-MINI NASDAQ 100           | 0                          | 0                          | 0.0%     | 220,336          | 181,610          | 21.3%    | 0                            | 0                            | 0.0%     | 549,638            | 746,568            | -26.4%    |
| NASDAQ                      | -                          | 0                          | 0.0%     | -                | 0                | 0.0%     | -                            | 0                            | 0.0%     | -                  | 0                  | 0.0%      |
| EOM S&P 500                 | 217,888                    | 176,792                    | 23.2%    | 0                | 0                | 0.0%     | 572,000                      | 436,770                      | 31.0%    | 0                  | 0                  | 0.0%      |
| EOM EMINI S&P               | 0                          | 0                          | 0.0%     | 2,868,113        | 1,081,630        | 165.2%   | 0                            | 0                            | 0.0%     | 6,199,645          | 3,514,048          | 76.4%     |
| EOW1 S&P 500                | 77,828                     | 46,897                     | 66.0%    | 0                | 0                | 0.0%     | 210,013                      | 133,435                      | 57.4%    | 0                  | 0                  | 0.0%      |
| EOW1 EMINI S&P 500          | 0                          | 0                          | 0.0%     | 1,335,206        | 1,004,399        | 32.9%    | 0                            | 0                            | 0.0%     | 3,494,295          | 2,784,888          | 25.5%     |
| EOW2 S&P 500                | 224,213                    | 139,945                    | 60.2%    | 0                | 0                | 0.0%     | 547,460                      | 291,396                      | 87.9%    | 0                  | 0                  | 0.0%      |
| EOW2 EMINI S&P 500          | 0                          | 0                          | 0.0%     | 1,152,445        | 1,062,644        | 8.5%     | 0                            | 0                            | 0.0%     | 3,444,498          | 3,096,086          | 11.3%     |
| EOW4 EMINI S&P 500          | 0                          | 0                          | 0.0%     | 1,507,468        | 695,316          | 116.8%   | 0                            | 0                            | 0.0%     | 3,455,076          | 3,020,388          | 14.4%     |
| EOW3 S&P 500                | 409,001                    | 41,561                     | 884.1%   | 0                | 0                | 0.0%     | 1,110,833                    | 61,206                       | 1,714.9% | 0                  | 0                  | 0.0%      |
| EOW3 EMINI S&P 500          | 0                          | 0                          | 0.0%     | 3,830,967        | 39,813           | 9,522.4% | 0                            | 0                            | 0.0%     | 11,282,213         | 44,331             | 25,349.9% |
| <b>FX Futures</b>           |                            |                            |          |                  |                  |          |                              |                              |          |                    |                    |           |
| AUSTRALIAN DOLLAR           | 401                        | 4                          | 9,925.0% | 2,295,842        | 2,281,483        | 0.6%     | 747                          | 54                           | 1,283.3% | 5,588,789          | 6,424,162          | -13.0%    |
| BRITISH POUND               | 244                        | 0                          | 0.0%     | 3,093,300        | 2,522,932        | 22.6%    | 246                          | 266                          | -7.5%    | 7,549,919          | 6,457,860          | 16.9%     |
| BRAZIL REAL                 | 0                          | 0                          | 0.0%     | 48,748           | 83,219           | -41.4%   | 0                            | 0                            | 0.0%     | 120,871            | 184,628            | -34.5%    |
| CANADIAN DOLLAR             | 550                        | 102                        | 439.2%   | 1,716,768        | 1,744,512        | -1.6%    | 762                          | 245                          | 211.0%   | 4,204,358          | 5,017,706          | -16.2%    |
| E-MINI EURO FX              | 0                          | 0                          | 0.0%     | 101,902          | 96,909           | 5.2%     | 0                            | 0                            | 0.0%     | 260,070            | 296,494            | -12.3%    |
| EURO FX                     | 958                        | 1,313                      | -27.0%   | 5,747,358        | 5,413,033        | 6.2%     | 1,096                        | 3,350                        | -67.3%   | 13,693,117         | 14,011,815         | -2.3%     |
| E-MINI JAPANESE YEN         | 0                          | 0                          | 0.0%     | 36,468           | 28,878           | 26.3%    | 0                            | 0                            | 0.0%     | 98,043             | 114,593            | -14.4%    |
| JAPANESE YEN                | 1,094                      | 892                        | 22.6%    | 4,014,467        | 3,013,705        | 33.2%    | 6,190                        | 1,530                        | 304.6%   | 10,566,224         | 10,617,139         | -0.5%     |
| MEXICAN PESO                | 5                          | 0                          | 0.0%     | 1,285,495        | 1,063,205        | 20.9%    | 5                            | 0                            | 0.0%     | 3,066,404          | 3,327,484          | -7.8%     |
| NEW ZEALND DOLLAR           | 0                          | 0                          | 0.0%     | 614,530          | 493,638          | 24.5%    | 0                            | 0                            | 0.0%     | 1,563,913          | 1,282,795          | 21.9%     |
| NKR/USD CROSS RATE          | 0                          | 0                          | 0.0%     | 4,692            | 2,829            | 65.9%    | 0                            | 0                            | 0.0%     | 6,235              | 4,119              | 51.4%     |
| RUSSIAN RUBLE               | 0                          | 0                          | 0.0%     | 55,523           | 37,139           | 49.5%    | 0                            | 0                            | 0.0%     | 99,704             | 96,903             | 2.9%      |
| S.AFRICAN RAND              | 0                          | 0                          | 0.0%     | 78,157           | 19,587           | 299.0%   | 0                            | 0                            | 0.0%     | 131,056            | 40,921             | 220.3%    |
| SWISS FRANC                 | 0                          | 0                          | 0.0%     | 592,290          | 528,609          | 12.0%    | 0                            | 0                            | 0.0%     | 1,436,279          | 1,492,396          | -3.8%     |
| AD/CD CROSS RATES           | 0                          | 0                          | 0.0%     | 9                | 6                | 50.0%    | 0                            | 0                            | 0.0%     | 15                 | 30                 | -50.0%    |
| AD/JY CROSS RATES           | 0                          | 0                          | 0.0%     | 3,230            | 3,989            | -19.0%   | 0                            | 0                            | 0.0%     | 6,178              | 16,701             | -63.0%    |
| AD/NE CROSS RATES           | 0                          | 0                          | 0.0%     | 39               | 110              | -64.5%   | 0                            | 0                            | 0.0%     | 74                 | 293                | -74.7%    |

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| <b>FX Futures</b>      |                            |                            |          |                  |                  |          |                              |                              |          |                    |                    |          |
| BP/JY CROSS RATES      | 0                          | 0                          | 0.0%     | 2,953            | 1,334            | 121.4%   | 0                            | 0                            | 0.0%     | 6,582              | 4,810              | 36.8%    |
| BP/SF CROSS RATES      | 0                          | 0                          | 0.0%     | 20               | 9                | 122.2%   | 0                            | 0                            | 0.0%     | 20                 | 35                 | -42.9%   |
| CD/JY CROSS RATES      | 0                          | 0                          | 0.0%     | 276              | 3                | 9,100.0% | 0                            | 0                            | 0.0%     | 278                | 9                  | 2,988.9% |
| EC/AD CROSS RATES      | 0                          | 0                          | 0.0%     | 6,799            | 1,658            | 310.1%   | 0                            | 0                            | 0.0%     | 7,691              | 5,079              | 51.4%    |
| EC/CD CROSS RATES      | 0                          | 0                          | 0.0%     | 6,017            | 2,844            | 111.6%   | 0                            | 0                            | 0.0%     | 9,928              | 8,681              | 14.4%    |
| EC/NOK CROSS RATES     | 0                          | 0                          | 0.0%     | 36               | 2                | 1,700.0% | 0                            | 0                            | 0.0%     | 115                | 5                  | 2,200.0% |
| EC/SEK CROSS RATES     | 0                          | 0                          | 0.0%     | 345              | 99               | 248.5%   | 0                            | 0                            | 0.0%     | 478                | 160                | 198.8%   |
| EFX/BP CROSS RATES     | 0                          | 0                          | 0.0%     | 98,966           | 112,519          | -12.0%   | 0                            | 0                            | 0.0%     | 172,127            | 252,638            | -31.9%   |
| EFX/JY CROSS RATES     | 0                          | 0                          | 0.0%     | 74,261           | 59,280           | 25.3%    | 0                            | 0                            | 0.0%     | 138,077            | 139,546            | -1.1%    |
| EFX/SF CROSS RATES     | 0                          | 0                          | 0.0%     | 53,069           | 40,263           | 31.8%    | 0                            | 0                            | 0.0%     | 87,630             | 97,431             | -10.1%   |
| SF/JY CROSS RATES      | 0                          | -                          | -        | 0                | -                | -        | 0                            | -                            | -        | 0                  | -                  | -        |
| SKR/USD CROSS RATES    | 0                          | 0                          | 0.0%     | 4,093            | 2,165            | 89.1%    | 0                            | 0                            | 0.0%     | 5,896              | 4,052              | 45.5%    |
| HUNGARIAN FORINT (US)  | -                          | 0                          | 0.0%     | -                | 0                | 0.0%     | -                            | 0                            | 0.0%     | -                  | 0                  | 0.0%     |
| POLISH ZLOTY (US)      | 0                          | 0                          | 0.0%     | 60               | 284              | -78.9%   | 0                            | 0                            | 0.0%     | 468                | 1,154              | -59.4%   |
| POLISH ZLOTY (EC)      | 0                          | 0                          | 0.0%     | 10               | 257              | -96.1%   | 0                            | 0                            | 0.0%     | 64                 | 2,433              | -97.4%   |
| SHEKEL                 | -                          | 0                          | 0.0%     | -                | 0                | 0.0%     | -                            | 0                            | 0.0%     | -                  | 0                  | 0.0%     |
| RMB USD                | 0                          | 0                          | 0.0%     | 41               | 584              | -93.0%   | 0                            | 6                            | -100.0%  | 119                | 1,432              | -91.7%   |
| KOREAN WON             | 0                          | 0                          | 0.0%     | 40               | 49               | -18.4%   | 0                            | 0                            | 0.0%     | 44                 | 71                 | -38.0%   |
| TURKISH LIRA           | 0                          | 0                          | 0.0%     | 0                | 0                | 0.0%     | 0                            | 0                            | 0.0%     | 0                  | 0                  | 0.0%     |
| TURKISH LIRA (EU)      | -                          | 0                          | 0.0%     | -                | 0                | 0.0%     | -                            | 0                            | 0.0%     | -                  | 0                  | 0.0%     |
| E-MICRO EUR/USD        | 0                          | 0                          | 0.0%     | 268,627          | 347,983          | -22.8%   | 0                            | 0                            | 0.0%     | 829,899            | 1,112,205          | -25.4%   |
| E-MICRO GBP/USD        | 0                          | 0                          | 0.0%     | 61,656           | 55,610           | 10.9%    | 0                            | 0                            | 0.0%     | 195,630            | 167,937            | 16.5%    |
| E-MICRO USD/CAD        | 0                          | 0                          | 0.0%     | 0                | 13               | -100.0%  | 0                            | 0                            | 0.0%     | 0                  | 15                 | -100.0%  |
| E-MICRO USD/CHF        | 0                          | 0                          | 0.0%     | 0                | 1                | -100.0%  | 0                            | 0                            | 0.0%     | 0                  | 1                  | -100.0%  |
| E-MICRO USD/JPY        | 0                          | 0                          | 0.0%     | 0                | 2                | -100.0%  | 0                            | 0                            | 0.0%     | 0                  | 2                  | -100.0%  |
| E-MICRO AUD/USD        | 0                          | 0                          | 0.0%     | 99,871           | 91,810           | 8.8%     | 0                            | 0                            | 0.0%     | 261,913            | 260,681            | 0.5%     |
| MICRO CHF/USD          | 0                          | 0                          | 0.0%     | 1,153            | 4,332            | -73.4%   | 0                            | 0                            | 0.0%     | 2,753              | 8,421              | -67.3%   |
| INDIAN RUPEE           | 0                          | 0                          | 0.0%     | 36,814           | 9,754            | 277.4%   | 0                            | 0                            | 0.0%     | 84,735             | 32,447             | 161.1%   |
| USDZAR                 | 0                          | 0                          | 0.0%     | 0                | 0                | 0.0%     | 0                            | 0                            | 0.0%     | 0                  | 4                  | -100.0%  |
| E-MICRO INR/USD        | 0                          | 0                          | 0.0%     | 2,564            | 888              | 188.7%   | 0                            | 0                            | 0.0%     | 6,755              | 1,501              | 350.0%   |
| E-MICRO JPY/USD        | 0                          | 0                          | 0.0%     | 43,836           | 24,557           | 78.5%    | 0                            | 0                            | 0.0%     | 161,713            | 83,672             | 93.3%    |
| CHINESE RENMINBI (CNH) | 0                          | 0                          | 0.0%     | 1,490            | 1,725            | -13.6%   | 0                            | 0                            | 0.0%     | 5,275              | 5,049              | 4.5%     |
| FCXRX                  | 0                          | -                          | -        | 1,599            | -                | -        | 0                            | -                            | -        | 4,202              | -                  | -        |
| E-MICRO USD/CNH        | 0                          | 0                          | 0.0%     | 0                | 10               | -100.0%  | 0                            | 0                            | 0.0%     | 0                  | 48                 | -100.0%  |
| E-MICRO CAD/USD        | 0                          | 0                          | 0.0%     | 16,895           | 19,721           | -14.3%   | 0                            | 0                            | 0.0%     | 43,347             | 54,256             | -20.1%   |

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## CME Exchange Volume Comparison Report - Monthly

|                      | Open<br>Outcry<br>MAR 2017 | Open<br>Outcry<br>MAR 2016 | %<br>CHG | ELEC<br>MAR 2017 | ELEC<br>MAR 2016 | %<br>CHG | Open<br>Outcry<br>Y.T.D 2017 | Open<br>Outcry<br>Y.T.D 2016 | %<br>CHG | ELEC<br>Y.T.D 2017 | ELEC<br>Y.T.D 2016 | %<br>CHG |
|----------------------|----------------------------|----------------------------|----------|------------------|------------------|----------|------------------------------|------------------------------|----------|--------------------|--------------------|----------|
| <b>FX Options</b>    |                            |                            |          |                  |                  |          |                              |                              |          |                    |                    |          |
| AUSTRALIAN DOLLAR    | 365                        | 570                        | -36.0%   | 40,879           | 142,595          | -71.3%   | 2,273                        | 2,103                        | 8.1%     | 124,182            | 420,078            | -70.4%   |
| BRITISH POUND        | 43                         | 3,505                      | -98.8%   | 37,993           | 189,329          | -79.9%   | 607                          | 15,519                       | -96.1%   | 222,378            | 622,439            | -64.3%   |
| CANADIAN DOLLAR      | 150                        | 7,806                      | -98.1%   | 27,327           | 133,945          | -79.6%   | 1,621                        | 16,581                       | -90.2%   | 104,941            | 554,792            | -81.1%   |
| EURO FX              | 1,862                      | 14,006                     | -86.7%   | 190,938          | 844,532          | -77.4%   | 5,224                        | 50,771                       | -89.7%   | 632,307            | 2,604,237          | -75.7%   |
| JAPANESE YEN         | 1,119                      | 9,030                      | -87.6%   | 89,307           | 262,698          | -66.0%   | 5,996                        | 26,199                       | -77.1%   | 352,523            | 924,035            | -61.8%   |
| MEXICAN PESO         | 10                         | 135                        | -92.6%   | 1,192            | 1,247            | -4.4%    | 109                          | 295                          | -63.1%   | 16,892             | 7,467              | 126.2%   |
| NEW ZEALND DOLLAR    | -                          | 0                          | 0.0%     | -                | 0                | 0.0%     | -                            | 0                            | 0.0%     | -                  | 0                  | 0.0%     |
| RUSSIAN RUBLE        | 0                          | 0                          | 0.0%     | 0                | 0                | 0.0%     | 0                            | 0                            | 0.0%     | 0                  | 0                  | 0.0%     |
| SWISS FRANC          | 0                          | 12                         | -100.0%  | 569              | 5,712            | -90.0%   | 0                            | 135                          | -100.0%  | 3,677              | 24,247             | -84.8%   |
| JAPANESE YEN (EU)    | 0                          | 0                          | 0.0%     | 12               | 331              | -96.4%   | 0                            | 0                            | 0.0%     | 105                | 2,129              | -95.1%   |
| EURO FX (EU)         | 0                          | 0                          | 0.0%     | 122              | 2,692            | -95.5%   | 0                            | 0                            | 0.0%     | 206                | 12,890             | -98.4%   |
| SWISS FRANC (EU)     | 0                          | -                          | -        | 1                | -                | -        | 0                            | -                            | -        | 1                  | -                  | -        |
| CANADIAN DOLLAR (EU) | 0                          | 0                          | 0.0%     | 9                | 458              | -98.0%   | 0                            | 0                            | 0.0%     | 41                 | 1,506              | -97.3%   |
| BRITISH POUND (EU)   | 0                          | 0                          | 0.0%     | 167              | 1,670            | -90.0%   | 0                            | 0                            | 0.0%     | 625                | 5,187              | -88.0%   |
| AUSTRALIAN DLR (EU)  | 0                          | 0                          | 0.0%     | 0                | 0                | 0.0%     | 0                            | 0                            | 0.0%     | 2                  | 917                | -99.8%   |
| CHF/USD PQO 2pm Fix  | 0                          | -                          | -        | 1,892            | -                | -        | 0                            | -                            | -        | 6,611              | -                  | -        |
| AUD/USD PQO 2pm Fix  | 1,075                      | -                          | -        | 110,025          | -                | -        | 1,375                        | -                            | -        | 212,199            | -                  | -        |
| EUR/USD PQO 2pm Fix  | 4,530                      | -                          | -        | 498,241          | -                | -        | 7,428                        | -                            | -        | 1,050,623          | -                  | -        |
| CAD/USD PQO 2pm Fix  | 1,740                      | -                          | -        | 88,952           | -                | -        | 1,740                        | -                            | -        | 219,564            | -                  | -        |
| JPY/USD PQO 2pm Fix  | 3,814                      | -                          | -        | 288,932          | -                | -        | 23,227                       | -                            | -        | 632,961            | -                  | -        |
| GBP/USD PQO 2pm Fix  | 495                        | -                          | -        | 173,862          | -                | -        | 499                          | -                            | -        | 393,585            | -                  | -        |

## CME Exchange Volume Comparison Report - Monthly

|  | Open<br>Outcry<br>MAR 2017 | Open<br>Outcry<br>MAR 2016 | %<br>CHG | ELEC<br>MAR 2017 | ELEC<br>MAR 2016 | %<br>CHG | Open<br>Outcry<br>Y.T.D 2017 | Open<br>Outcry<br>Y.T.D 2016 | %<br>CHG | ELEC<br>Y.T.D 2017 | ELEC<br>Y.T.D 2016 | %<br>CHG |
|--|----------------------------|----------------------------|----------|------------------|------------------|----------|------------------------------|------------------------------|----------|--------------------|--------------------|----------|
| <b>Commodities and<br/>Alternative Investments</b> |                            |                            |          |                  |                  |          |                              |                              |          |                    |                    |          |
| <b>Futures</b>                                     |                            |                            |          |                  |                  |          |                              |                              |          |                    |                    |          |
| LIVE CATTLE  | 4,635                      | 4,783                      | -3.1%    | 1,545,170        | 1,181,522        | 30.8%    | 10,514                       | 14,213                       | -26.0%   | 3,793,805          | 3,254,160          | 16.6%    |
| FEEDER CATTLE                                      | 0                          | 0                          | 0.0%     | 303,451          | 245,203          | 23.8%    | 129                          | 44                           | 193.2%   | 735,324            | 634,672            | 15.9%    |
| LEAN HOGS  | 3,728                      | 2,598                      | 43.5%    | 957,445          | 792,600          | 20.8%    | 7,582                        | 6,772                        | 12.0%    | 2,538,241          | 2,097,838          | 21.0%    |
| LUMBER   | 0                          | 0                          | 0.0%     | 14,811           | 16,779           | -11.7%   | 0                            | 0                            | 0.0%     | 46,155             | 44,362             | 4.0%     |
| MILK   | 278                        | 0                          | 0.0%     | 33,453           | 19,498           | 71.6%    | 581                          | 16                           | 3,531.3% | 88,460             | 60,790             | 45.5%    |
| MLK MID  | 0                          | 0                          | 0.0%     | 0                | 0                | 0.0%     | 0                            | 0                            | 0.0%     | 0                  | 0                  | 0.0%     |
| NFD MILK   | 0                          | 0                          | 0.0%     | 5,301            | 6,950            | -23.7%   | 0                            | 0                            | 0.0%     | 19,188             | 19,087             | 0.5%     |
| BUTTER CS  | 0                          | 0                          | 0.0%     | 4,175            | 3,299            | 26.6%    | 0                            | 0                            | 0.0%     | 9,190              | 10,480             | -12.3%   |
| CLASS IV MILK                                      | 9                          | 0                          | 0.0%     | 1,716            | 208              | 725.0%   | 50                           | 0                            | 0.0%     | 4,910              | 1,450              | 238.6%   |
| DRY WHEY   | 0                          | 0                          | 0.0%     | 2,708            | 702              | 285.8%   | 0                            | 0                            | 0.0%     | 8,583              | 3,739              | 129.6%   |
| GSCI EXCESS RETURN FUT                             | 0                          | 0                          | 0.0%     | 288              | 366              | -21.3%   | 0                            | 0                            | 0.0%     | 327                | 409                | -20.0%   |
| GOLDMAN SACHS                                      | 0                          | 0                          | 0.0%     | 35,829           | 27,365           | 30.9%    | 0                            | 0                            | 0.0%     | 105,728            | 82,982             | 27.4%    |
| HDD WEATHER  | 0                          | 0                          | 0.0%     | 0                | 0                | 0.0%     | 0                            | 0                            | 0.0%     | 50                 | 78                 | -35.9%   |
| CDD WEATHER  | 0                          | 0                          | 0.0%     | 0                | 0                | 0.0%     | 0                            | 0                            | 0.0%     | 0                  | 0                  | 0.0%     |
| HDD SEASONAL STRIP                                 | 0                          | 0                          | 0.0%     | 0                | 0                | 0.0%     | 0                            | 0                            | 0.0%     | 0                  | 0                  | 0.0%     |
| CDD SEASONAL STRIP                                 | 0                          | 0                          | 0.0%     | 0                | 0                | 0.0%     | 0                            | 0                            | 0.0%     | 0                  | 0                  | 0.0%     |
| HDD WEATHER EUROPEAN                               | 0                          | 0                          | 0.0%     | 0                | 100              | -100.0%  | 0                            | 0                            | 0.0%     | 50                 | 100                | -50.0%   |
| CAT WEATHER EUROPEAN                               | -                          | 0                          | 0.0%     | -                | 0                | 0.0%     | -                            | 0                            | 0.0%     | -                  | 0                  | 0.0%     |
| HDD EURO SEASONAL STRIP                            | 0                          | 0                          | 0.0%     | 0                | 50               | -100.0%  | 0                            | 0                            | 0.0%     | 0                  | 50                 | -100.0%  |
| CAT EURO SEASONAL STRIP                            | 0                          | -                          | -        | 0                | -                | -        | 0                            | -                            | -        | 0                  | -                  | -        |
| HOUSING INDEX                                      | 0                          | 0                          | 0.0%     | 14               | 2                | 600.0%   | 0                            | 0                            | 0.0%     | 47                 | 19                 | 147.4%   |
| USD CRUDE PALM OIL                                 | 0                          | -                          | -        | 0                | -                | -        | 0                            | -                            | -        | 0                  | -                  | -        |
| CASH-SETTLED CHEESE                                | 0                          | 0                          | 0.0%     | 15,294           | 11,939           | 28.1%    | 0                            | 0                            | 0.0%     | 36,328             | 33,622             | 8.0%     |
| MALAYSIAN PALM SWAP                                | 0                          | 0                          | 0.0%     | 0                | 0                | 0.0%     | 0                            | 0                            | 0.0%     | 0                  | 0                  | 0.0%     |
| S&P GSCI ENHANCED ER SWA                           | 0                          | 0                          | 0.0%     | 0                | 0                | 0.0%     | 0                            | 0                            | 0.0%     | 0                  | 0                  | 0.0%     |
| PALM OIL   | 0                          | 0                          | 0.0%     | 0                | 0                | 0.0%     | 0                            | 0                            | 0.0%     | 0                  | 0                  | 0.0%     |



## CME Exchange Volume Comparison Report - Monthly

|  | Open<br>Outcry<br>MAR 2017 | Open<br>Outcry<br>MAR 2016 | %<br>CHG     | ELEC<br>MAR 2017   | ELEC<br>MAR 2016   | %<br>CHG     | Open<br>Outcry<br>Y.T.D 2017 | Open<br>Outcry<br>Y.T.D 2016 | %<br>CHG     | ELEC<br>Y.T.D 2017 | ELEC<br>Y.T.D 2016 | %<br>CHG     |
|--|----------------------------|----------------------------|--------------|--------------------|--------------------|--------------|------------------------------|------------------------------|--------------|--------------------|--------------------|--------------|
| <b>Commodities and<br/>Alternative Investments</b> |                            |                            |              |                    |                    |              |                              |                              |              |                    |                    |              |
| <b>Options</b>                                     |                            |                            |              |                    |                    |              |                              |                              |              |                    |                    |              |
| LIVE CATTLE  | 69,858                     | 135,062                    | -48.3%       | 239,841            | 299,618            | -20.0%       | 178,205                      | 446,172                      | -60.1%       | 603,381            | 741,253            | -18.6%       |
| FEEDER CATTLE                                      | 4,393                      | 4,592                      | -4.3%        | 40,947             | 32,995             | 24.1%        | 8,540                        | 13,485                       | -36.7%       | 85,538             | 86,091             | -0.6%        |
| LEAN HOGS  | 23,839                     | 23,772                     | 0.3%         | 175,467            | 104,514            | 67.9%        | 77,541                       | 99,390                       | -22.0%       | 454,137            | 325,028            | 39.7%        |
| LUMBER   | 0                          | 5                          | -100.0%      | 996                | 953                | 4.5%         | 25                           | 5                            | 400.0%       | 3,396              | 3,025              | 12.3%        |
| MILK   | 13,622                     | 9,100                      | 49.7%        | 32,719             | 12,985             | 152.0%       | 39,092                       | 29,838                       | 31.0%        | 77,091             | 36,511             | 111.1%       |
| MLK MID  | 69                         | 39                         | 76.9%        | 0                  | 0                  | 0.0%         | 310                          | 123                          | 152.0%       | 0                  | 0                  | 0.0%         |
| NFD MILK   | 2,081                      | 1,908                      | 9.1%         | 2,287              | 510                | 348.4%       | 6,580                        | 9,680                        | -32.0%       | 10,432             | 3,454              | 202.0%       |
| BUTTER CS  | 609                        | 551                        | 10.5%        | 201                | 281                | -28.5%       | 2,935                        | 4,227                        | -30.6%       | 812                | 704                | 15.3%        |
| CLASS IV MILK                                      | 199                        | 21                         | 847.6%       | 1,127              | 308                | 265.9%       | 1,602                        | 204                          | 685.3%       | 2,872              | 747                | 284.5%       |
| DRY WHEY   | 254                        | 65                         | 290.8%       | 174                | 0                  | 0.0%         | 1,015                        | 189                          | 437.0%       | 270                | 19                 | 1,321.1%     |
| HDD WEATHER  | 0                          | 0                          | 0.0%         | 0                  | 0                  | 0.0%         | 0                            | 0                            | 0.0%         | 0                  | 0                  | 0.0%         |
| CDD WEATHER  | 0                          | 0                          | 0.0%         | 0                  | 0                  | 0.0%         | 0                            | 0                            | 0.0%         | 0                  | 0                  | 0.0%         |
| HDD SEASONAL STRIP                                 | 0                          | 0                          | 0.0%         | 0                  | 0                  | 0.0%         | 0                            | 0                            | 0.0%         | 0                  | 0                  | 0.0%         |
| CDD SEASONAL STRIP                                 | 0                          | 0                          | 0.0%         | 0                  | 0                  | 0.0%         | 0                            | 0                            | 0.0%         | 0                  | 0                  | 0.0%         |
| HDD WEATHER EUROPEAN                               | 0                          | 0                          | 0.0%         | 0                  | 0                  | 0.0%         | 0                            | 0                            | 0.0%         | 0                  | 0                  | 0.0%         |
| CAT WEATHER EUROPEAN                               | -                          | 0                          | 0.0%         | -                  | 0                  | 0.0%         | -                            | 0                            | 0.0%         | -                  | 0                  | 0.0%         |
| HDD EURO SEASONAL STRIP                            | 0                          | 0                          | 0.0%         | 0                  | 0                  | 0.0%         | 0                            | 0                            | 0.0%         | 0                  | 0                  | 0.0%         |
| HOUSING INDEX                                      | 0                          | -                          | -            | 6                  | -                  | -            | 0                            | -                            | -            | 24                 | -                  | -            |
| LV CATL CSO  | 59                         | 0                          | 0.0%         | 0                  | 0                  | 0.0%         | 855                          | 25                           | 3,320.0%     | 0                  | 0                  | 0.0%         |
| CASH-SETTLED CHEESE                                | 3,755                      | 3,282                      | 14.4%        | 2,579              | 3,148              | -18.1%       | 13,049                       | 9,764                        | 33.6%        | 10,231             | 8,810              | 16.1%        |
| <b>Foreign Exchange Futures</b>                    |                            |                            |              |                    |                    |              |                              |                              |              |                    |                    |              |
| CHILEAN PESO                                       | 0                          | 0                          | 0.0%         | 307                | 4                  | 7,575.0%     | 0                            | 6                            | -100.0%      | 529                | 4                  | 13,125.0%    |
| <b>TOTAL FUTURES GROUP</b>                         |                            |                            |              |                    |                    |              |                              |                              |              |                    |                    |              |
| Interest Rate Futures                              | 880,351                    | 540,884                    | 62.8%        | 70,995,139         | 52,462,796         | 35.3%        | 2,141,817                    | 2,157,687                    | -0.7%        | 187,942,698        | 169,146,615        | 11.1%        |
| Equity Index Futures                               | 179,314                    | 252,986                    | -29.1%       | 50,895,537         | 52,598,049         | -3.2%        | 274,907                      | 402,681                      | -31.7%       | 116,410,880        | 163,365,089        | -28.7%       |
| FX Futures   | 3,252                      | 2,311                      | 40.7%        | 20,470,309         | 18,111,539         | 13.0%        | 9,046                        | 5,451                        | 66.0%        | 50,416,988         | 51,629,814         | -2.3%        |
| Commodities and Alternative Inve                   | 8,650                      | 7,381                      | 17.2%        | 2,919,655          | 2,306,583          | 26.6%        | 18,856                       | 21,045                       | -10.4%       | 7,386,386          | 6,243,838          | 18.3%        |
| Foreign Exchange Futures                           | 0                          | 0                          | 0.0%         | 307                | 4                  | #####        | 0                            | 6                            | -100.0%      | 529                | 4                  | 13,125.0%    |
| <b>TOTAL FUTURES</b>                               | <b>1,071,567</b>           | <b>803,562</b>             | <b>33.4%</b> | <b>145,280,947</b> | <b>125,478,971</b> | <b>15.8%</b> | <b>2,444,626</b>             | <b>2,586,870</b>             | <b>-5.5%</b> | <b>362,157,481</b> | <b>390,385,360</b> | <b>-7.2%</b> |

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## CME Exchange Volume Comparison Report - Monthly

|                                  | Open<br>Outcry<br>MAR 2017 | Open<br>Outcry<br>MAR 2016 | %<br>CHG     | ELEC<br>MAR 2017   | ELEC<br>MAR 2016   | %<br>CHG     | Open<br>Outcry<br>Y.T.D 2017 | Open<br>Outcry<br>Y.T.D 2016 | %<br>CHG     | ELEC<br>Y.T.D 2017 | ELEC<br>Y.T.D 2016 | %<br>CHG     |
|----------------------------------|----------------------------|----------------------------|--------------|--------------------|--------------------|--------------|------------------------------|------------------------------|--------------|--------------------|--------------------|--------------|
| <b>TOTAL OPTIONS GROUP</b>       |                            |                            |              |                    |                    |              |                              |                              |              |                    |                    |              |
| Equity Index Options             | 1,362,513                  | 1,324,670                  | 2.9%         | 16,247,394         | 10,578,929         | 53.6%        | 3,416,205                    | 3,805,942                    | -10.2%       | 41,251,884         | 35,219,170         | 17.1%        |
| Interest Rate Options            | 23,783,575                 | 14,260,101                 | 66.8%        | 11,386,321         | 5,468,814          | 108.2%       | 63,330,206                   | 63,745,564                   | -0.7%        | 26,840,574         | 20,990,805         | 27.9%        |
| FX Options                       | 15,203                     | 35,064                     | -56.6%       | 1,550,420          | 1,585,209          | -2.2%        | 50,099                       | 111,603                      | -55.1%       | 3,973,423          | 5,179,924          | -23.3%       |
| Commodities and Alternative Inve | 118,738                    | 178,397                    | -33.4%       | 496,344            | 455,312            | 9.0%         | 329,749                      | 613,102                      | -46.2%       | 1,248,184          | 1,205,642          | 3.5%         |
| <b>TOTAL OPTIONS</b>             | <b>25,280,029</b>          | <b>15,798,232</b>          | <b>60.0%</b> | <b>29,680,479</b>  | <b>18,088,264</b>  | <b>64.1%</b> | <b>67,126,259</b>            | <b>68,276,211</b>            | <b>-1.7%</b> | <b>73,314,065</b>  | <b>62,595,541</b>  | <b>17.1%</b> |
| <b>TOTAL COMBINED</b>            |                            |                            |              |                    |                    |              |                              |                              |              |                    |                    |              |
| Interest Rate                    | 24,663,926                 | 14,800,985                 | 66.6%        | 82,381,460         | 57,931,610         | 42.2%        | 65,472,023                   | 65,903,251                   | -0.7%        | 214,783,272        | 190,137,420        | 13.0%        |
| Equity Index                     | 1,541,827                  | 1,577,656                  | -2.3%        | 67,142,931         | 63,176,978         | 6.3%         | 3,691,112                    | 4,208,623                    | -12.3%       | 157,662,764        | 198,584,259        | -20.6%       |
| FX                               | 18,455                     | 37,375                     | -50.6%       | 22,020,729         | 19,696,748         | 11.8%        | 59,145                       | 117,054                      | -49.5%       | 54,390,411         | 56,809,738         | -4.3%        |
| Commodities and Alternative Inve | 127,388                    | 185,778                    | -31.4%       | 3,415,999          | 2,761,895          | 23.7%        | 348,605                      | 634,147                      | -45.0%       | 8,634,570          | 7,449,480          | 15.9%        |
| Foreign Exchange                 | 0                          | 0                          | 0.0%         | 307                | 4                  | #####        | 0                            | 6                            | -100.0%      | 529                | 4                  | 13,125.0%    |
| <b>GRAND TOTAL</b>               | <b>26,351,596</b>          | <b>16,601,794</b>          | <b>58.7%</b> | <b>174,961,426</b> | <b>143,567,235</b> | <b>21.9%</b> | <b>69,570,885</b>            | <b>70,863,081</b>            | <b>-1.8%</b> | <b>435,471,546</b> | <b>452,980,901</b> | <b>-3.9%</b> |

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