Commodity 2017 Midyear Outlook

BI Commodities, Global Dashboard



1. BI 2017 Midyear Outlook: Commodity

(Bloomberg Intelligence) -- If energy is done being a primary drag, the commodities market should have plenty of mean-reversion recovery room. The worst of its plunge likely complete, crude oil could indefinitely hold to a narrow range. A strong dollar, the other key pressure factor, appears to have peaked as the market looks ahead to an endgame for Federal Reserve rate tightening. Sustained rallies are typically demand driven. Agriculture, metals and natural gas appear to be in early transition stages as evidenced by record U.S. exports.

Table of Contents 2H 2017 Outlook

- ▲ Improving Macro
- Stabilizing Energy
- ▲ Ag-Livestock Sizzle
- ▲ Metals Vs. Greenback

Exports of predominately U.S.-traded agriculture commodities are on record pace, grains stocks-to-use is near a 25-year high, and net shorts are extreme -- a strong recipe for a price bottom. Metals should be primary beneficiaries if the dollar has peaked. (06/06/17)

Topics

Improving Macro

2. Commodity Total Returns May Narrow Gap to Dollar, Energy Curve

Two primary broad-commodity pressure elements -- the dollar and energy-futures curves -- have shifted in favor of better total returns. Indicating a potential peak despite the higher interest-rate cycle, the Bloomberg Dollar Spot Index is down about 3% through June 2. The average of the Bloomberg Energy Subindex one-year futures curves near 1% contango is the flattest since November 2014. In 2014-15, the 21% dollar rally and 63% energy decline were predominant drags on commodities.

Crude oil remains under pressure, down 12% in 2017, but the flattening curve will reduce negative roll yields and indicates tightening demand vs. supply. "Sell the fact" after an extended "buy the rumor" period in the dollar appears to be in play, looking ahead to a rate-hike endgame. (06/06/17)



Peak Dollar, Flat Energy Curve: BCOM Support

3. Commodities May Have Plenty of Catch-Up Room to Macro Drivers

The Bloomberg Commodity Index Total Return may gain on some of its primary macro drivers, assuming the recovery in those catalysts is sustained. Up slightly since March 2016, the BCOM could follow the JPMorgan Global Manufacturing PMI, which has increased to 52.6 from 50. Also within reach is China PMI (51.2 vs. 50.2), U.S. CPI (up 110 bps to 2.2%) and a China GDP that appears to have bottomed, increasing to 6.9% from 6.7%. Since 2000, the average of the annual BCOM correlations to these measures is 0.66.

Oversupplied energy has been the primary drag on broad commodities in the past few years. This may have longer-lasting bullish implications for other sectors, notably metals. To the extent that commodity prices have been dragged lower, the demand incentive is higher vs. diminished supply. (06/06/17)



BCOM Appearing Low to Improving Macro Drivers

4. Hedge Funds Less Overweight, Commodities Regain Stronger Footing

Broad commodities appear ripe for recovery, no longer burdened by overenthusiastic long positions. Bloomberg Commodity Index (BCOM) managed-money net positions totaling 667,000 through May 19 are the lowest since March 18, 2016. Indicating improving demand vs. supply conditions, the 2.4% average of the BCOM one-year futures curves is less than half of the peak near 5.6% last March. Agriculture is the only short sector, near records, leaving it increasingly vulnerable to weather scares.

Reduced energy positions are the primary reason for the decline in broad commodity net longs. The worstperforming sector in 2017 is notably less burdened by excessive longs, as lower prices have also increased OPEC's resolve. Similar long reduction in industrial metals is providing sounder footing. (05/24/17)

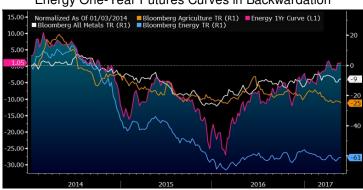


BCOM Positions Dip to Lowest Since March

5. What's Changed the Most in Commodities Since 2016: Energy Curves

Flat energy futures curves indicate the worst of the plunge is over. The average of one-year futures curves of Bloomberg Energy Subindex components bottomed at 27% in contango at the start of 2016, the steepest since the global crisis. On May 24, they averaged 1% in backwardation. Front prices above the backs indicate that current demand exceeds supply. Petroleum is an oversupplied market that will take awhile to rebalance, but the forward-looking futures curves paint an optimistic picture.

Substantially reduced managed-money net positions and the flattening curve indicate that WTI crude oil is likely to remain within \$45-\$55 a barrel. On the other hand, natural gas appears a few years ahead as U.S. demand and exports explode, responding to multiple years of declining prices. (05/26/17)



Energy One-Year Futures Curves in Backwardation

Stabilizing Energy

6. Energy Total Returns Set to Catch Up to Flattening Futures Curve

Contributing Analysts William Foiles

The Bloomberg Energy Subindex Total Return is down slightly from January 2016, yet futures curves have flattened substantially and returns are likely to close the gap. At 1% in contango on June 2, the average of energy one-year futures curves has shifted substantially to the positive since peaking near 27% in February 2016. The flattening trend is indicative of tightening demand vs. supply, with a direct impact on roll yields. Since the beginning of January, spot prices are up 20% vs. a minus 5% total return.

That disparity could narrow as rapidly as the flattening curve. Reduced excessive managed-money net longs from early 2017, coinciding with the plunge in WTI crude to \$45 a barrel from \$55, leave the market on better footing for recovery, notably if positions and the curve continue to trend higher. (06/06/17)



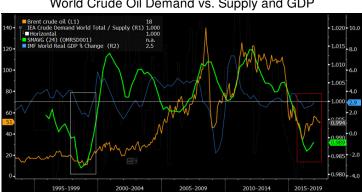
7. Crude Oil Wants to Party Like It's 1999; Good Luck With That One

This report may not be modified or altered in any way. The BLOOMBERG PROFESSIONAL service and BLOOMBERG Data are owned and distributed locally by Bloomberg Finance LP ("BFLP") and its subsidiariesin all jurisdictions other than Argentina, Bermuda, China, India, Japan and Korea (the ("BFLP Countries"). BFLP is a wholly-owned subsidiary of Bloomberg LP ("BLP"). BLP provides BFLP with all the global marketingand operational support and service for the Services and distributes the Services either directly or through a non-BFLP subsidiary in the BLP Countries. BFLP, BLP and their affiliates do not provide investment advice, and nothing herein shall constitute an offer of financial instruments by BFLP, BLP or their affiliates.

Contributing Analysts William Foiles

The ratio of world crude-oil demand vs. supply appears to be recovering similar to 1999, when Brent bottomed at \$9.64 a barrel. That trough set up the rally that peaked in 2008 at \$146.08. The last time that the two-year average of IEA world crude total demand vs. supply recovered from levels similar to 2016-17 was 1999. Demand still trails supply, but the ratio appears to have bottomed. A strong rally ensued once demand sustained above supply, coincident with GDP of more than 3%.

What's different today is that the five-year average annual supply has risen to 1.9% vs. 1.6% for demand and supply since 1994. Demand is also becoming less responsive to GDP. Historically, demand has increased about 0.55% per one percent of real GDP growth. The past five-year average is 0.51%. (06/06/17)



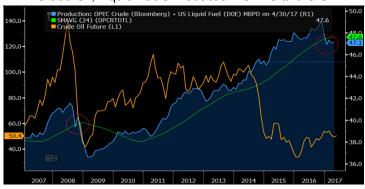
World Crude Oil Demand vs. Supply and GDP

8. OPEC Supply Decline May Be Getting as Serious as Global Crisis

Contributing Analysts Philipp Chladek (Energy)

Crude-oil prices should stabilize if OPEC cuts are sustained. For the first time since the global crisis, estimates of combined OPEC crude and U.S. liquid-fuels production are below the 24-month moving average. Currently near 47 million barrels a day, or 48% of global output, it peaked near 49 million in August (50% of the world's production). November 2008 was the last time that the same measure had a similar decline in velocity; at that time, it was about 46%.

Since the end of 2008, U.S. liquid-fuel production has increased by about 8 million barrels a day, or 80%, vs. 2 million (8%) for OPEC. Unless the trend in U.S. liquid-fuel production reverses, WTI crude oil prices should remain under pressure. Seaborne Brent crude should be better off. (05/22/17)



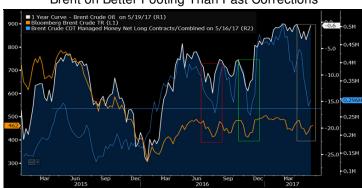
Crude Oil, Liquid Fuels Production: OPEC and U.S.

9. Hedge Funds Flushed, Brent Appears Better Positioned Than Past

Contributing Analysts Daniel Krauser

Total returns on Brent crude oil are poised for recovery. Unchanged since the end of April 2016, the Bloomberg Brent Crude Subindex potential for appreciation has much improved since the past two price declines. Indicating better demand vs. supply, the one-year curve has bucked lower prices, about flat vs. declining to almost 13% contango amid the price plunges in July and November. Diminishing declines have set in, as both previous corrections liquidated 15,000 contracts for each percentage point of price decline.

It took 22,000 positions of liquidation in the recent peak-to-trough price plunge per percent. With more liquidation amid diminishing price declines, positions that are far from excesses at the 2017 peak and the backwardation trend indicate that Brent may be poised for brighter days. (05/22/17)



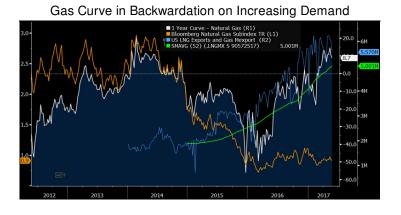
Brent on Better Footing Than Past Corrections

10. Natural Gas and Backwardation: Oxymoron Indicating a New Market

Contributing Analysts Daniel Krauser

Natural gas, the worst-performing commodity on a total-return basis, may finally be staging a recovery. Among the most expensive commodities to store, and with the highest negative roll yield and steepest contango, the one-year natural gas futures curve ended May 19 about 9% in backwardation. It's averaging about zero in 2017 vs. 18% contango for the past 10 years. Lower prices may have finally turned the tide due to substantial demand for heating, electricity and U.S. exports.

Advancing technology has spiked U.S. natural gas supply. This year could mark an inflection point where demand finally exceeds supply, notably if summer is a bit hotter than normal -- a favorable trend. Backwardation in May indicates expectations of strong summer demand, a coincident positive. (05/22/17)

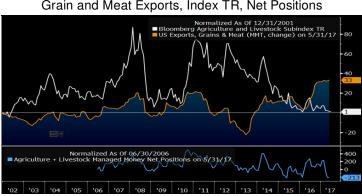


Ag-Livestock Sizzle

11. Hedge Funds Prone to Summer Overheat in Agriculture, Livestock

U.S. agriculture and livestock exports have never been higher, coincident with more net-short positions and a lower Bloomberg Agriculture and Livestock Subindex Total Return. The recipe is ripe for a continued drift lower in prices if the record supply pace of the past few years is sustained (notably in the grains) or with a potential multiyear bottom. Risks appear elevated against combined managed-money net positions (short 169,000 contracts), near the highest ever in this combined database history.

Higher prices would curtail the strong export trend in combined corn, soybeans, wheat, beef and pork. Belowtrend U.S. grain production this summer would be a catalyst to higher prices. Exports may continue to increase until prices do, notably on the back of a weaker dollar. (06/06/17)

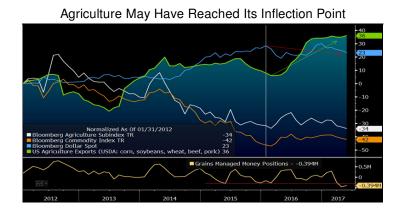


Grain and Meat Exports, Index TR, Net Positions

12. Agriculture May Be Leading Commodities to a Demand-Driven Market

Burdened by excess supply the last few years, agriculture may be the primary commodity sector transitioning to demand-driven. Plunging prices since 2012 appeared to have reached an inflection point in the demand vs. supply balance in 1Q16 as ag prices bottomed, the dollar peaked and exports took off. Combined U.S. exports of corn, soybean, wheat, beef and pork have increased 35% since the beginning of 2012 and 24% in the last year. Higher prices may be a key factor to suppress such a high-velocity trend.

Just a few hot and dry weeks in the U.S. Corn Belt in July-August could have an oversized bullish impact, notably due to near-record net short managed-money grain positions. (05/26/17)

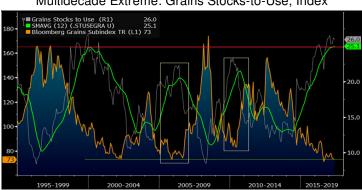


13. Grains Mean Reversion Risk Near 25-Year High With Stocks-to-Use

The grain market is under pressure and may be ripe for significant mean reversion with stocks-to-use near a

potential multidecade nadir. The 12-month average of USDA corn, soybean and wheat stocks-to-use ratios at 25.1% is the highest since 1992. June 2006 and September 2010 marked the most recent peaks in this measure of supply vs. demand, both near 21%. Subsequent to those peaks, the average recovery in the Bloomberg Grains Subindex Total Return, trough to peak, was about a double.

In a downtrend since 2012 amid substantially increased supply and favorable weather, the grains may be nearing a transition to a demand-driven market. Record U.S. exports are indicative of the strong elastic demand that may require higher prices to suppress. (06/06/17)



Multidecade Extreme: Grains Stocks-to-Use, Index

14. Primary Damper for Record U.S. Grain Exports Is Higher Prices

Sharp gains in U.S. grain exports have historically been followed by higher prices that bring exports into check. Exports of combined corn, soybeans and wheat are currently projected to be a record. Weekly data and the declining U.S. dollar in 2017 indicate estimates may increase when the USDA issues updated WASDE projections for the 2017-18 year on May 10. Unlike export booms in 2007-08 and 2010-11, which were boosted by a declining dollar, the dollar has rallied since 2013 and exports are still at all-time highs.

A primary export driver has been higher U.S. production and lower prices. If the dollar continues lower in 2017 and the weather comes in just a bit less than favorable, the recipe for a decent grain rally may be in place, potentially sparked by covering of substantial managed money net short positions. (05/10/17)



Combined U.S. Corn, Soybeans & Wheat Exports

15. Higher Soybean Prices May Be Necessary to Revive Brazil Exports

Contributing Analysts Sean Casey

Higher prices may be necessary to increase stalled Brazilian soybean exports. Despite record production estimates in 2017, Brazilian producers appear reluctant to release supplies to the global market until they get

better prices. The 12-month average of Brazilian government soybean export estimates, at 54.5 million tons, is unchanged from year-end 2015. Over the same period, USDA U.S. soybean exports have increased by onequarter to a record 2.2 billion bushels, about 58.5 million tons.

Though the market appears focused on Brazilian soybean production, it may have little effect on U.S.-traded prices unless widely exported. Since year-end 2015, front soybean futures have risen about 11%. Price risks appear greater to the upside on the back of rapidly increasing U.S. exports. (05/11/17)



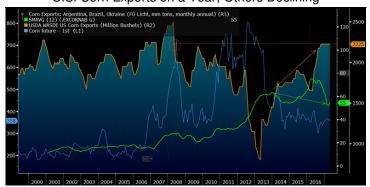
Brazilian Soybean Exports Decline, U.S. Rockets

16. Increasing World Production May Pop Corn Prices If Not Exported

Contributing Analysts Sean Casey

The highest USDA estimated U.S. corn exports in 10 years, coinciding with declining exports from other primary producers, shifts risks for prices to tick higher. A market focused on increasing global grain production may be missing a key element: actual supply put on the world market. Absent more non-U.S. corn exports, U.S. exports may simply increase until dampered by higher prices. Lower U.S.-traded prices and increasing local demand are reducing export incentives for non-U.S. producers.

U.S. production is the primary factor that should affect corn prices this growing season, but it is an unknown this early in the growing cycle. The trends of increasing U.S. exports vs. declines from other exporters indicate corn price risks are rising for potentially equal changes in production. (05/11/17)



U.S. Corn Exports on a Tear, Others Declining

17. Wheat May Be Ripe to Visit \$4.70 Resistance on Surging Exports

Relieved of record shorts from the end of April, the wheat market may be poised to provide higher levels for those looking to reset. Due to low prices, U.S. plantings have declined to multi-decade lows. The 52-week average of

U.S. weekly wheat exports has surged to 490,000 tons (25.5 million total), up 32% year-over-year. Recent adverse weather in prime U.S. wheat-growing regions prompted a price increase and stopped-out some of the record wheat net shorts.

It may be a spark that's needed to get prices to revisit \$4.70 a bushel, where wheat consolidated last April-May before breaking down, when exports reversed the downtrend into the current surge. Front wheat futures at \$4.34 on May 23 may be poised to catch up to December futures near \$4.70. (05/24/17)



U.S. Wheat Exports On a Roll, Prices May Follow

18. Expunged of Excessive Hedge Fund Longs, Sugar Is Ripe to Sweeten

The recipe for increased sugar prices has improved. Prices have dipped to below 16 cents a pound, global stocks-to-use estimates are trending down, and managed-money net positions are net short 24,393 raw-sugar contracts -- the most in almost two years. Indicating greater demand vs. supply, global sugar stocks-to-use is trending down for the longest run since 2009-11. The last similar example of a significant price correction within a favorable supply-to-demand trend was 2010.

Sugar declined 50% in January-June 2010, then rallied 150% to the 2011 peak. F.O. Licht says that 2017's surplus has pressured prices vs. a deficit in 2016. Higher prices may be necessary to stunt the favorable stocksto-use scenario. (05/24/17)



Net Sugar Positions Nearing Bottom of Range

19. Cotton Longs Just Riding the Tide of Surging U.S. Exports

Unless the surge in U.S. cotton exports reverses, historic long positions appear poised to continue to benefit from increasing prices. The 90% 12-month export surge is a prime driver of record managed-money net longs and almost a 40% increase in cotton prices from the March 2016 low through May 23. A few months prior, the 52week average of USDA cotton export estimates bottomed, and a few weeks later, net positions did so as well,

near 13,000 short. The latest CFTC report shows 105,000 long.

Record longs heighten liquidation risk as U.S. production and prices increase. If history is a guide and exports remain strong, prices appear to have room to catch up. Exports and prospective planted acres are about the same as 2011, when prices averaged \$1.36 a pound -- 85% above current levels. (05/24/17)



Cotton Positions, Exports & Prices in Bull Market

20. Trump and Sizzling Exports May Put a Fire Under Summer BBQ Costs

U.S. traded live cattle and lean hog futures are poised to continue to lead commodities in 2017 on the back of record export demand. The highest USDA U.S. combined beef and pork estimated exports ever and positive 12% 12-month rate of change, the greatest in five years, are key drivers of the 10.5% 2017 total return in the Bloomberg Livestock Index to May 15. Indicative of demand exceeding supply, livestock is the only BCOM sector subindex that remains in backwardation on a one-year curve basis.

Historically pressured by high negative roll expenses, livestock is the only sector with a positive roll yield the past year at 6.7%. Already recovering, rising meat exports to China, a recent trade initiative of the Trump administration, could mean a long-term low in livestock prices has been passed. (05/15/17)



U.S. Beef and Pork Exports Jump to New Record

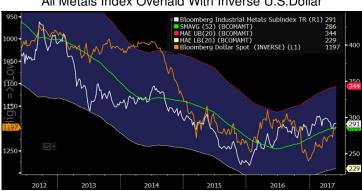
Metals Vs. Greenback

21. Metals on Recovery Road, Set to Accelerate If Dollar Has Peaked

The metals sector has the highest negative correlation to the U.S. dollar and appears set to continue to perform well, notably if the dollar has peaked. Were the total return of the Bloomberg All Metals Subindex to catch up with its 10-year quarterly negative beta of 1.85 to the Bloomberg Dollar Spot Index, it would be up 10.4% in 2017. The metals, a bit more than halfway there (up 5.7% through June 2 vs. the dollar decline of 5.6%) may be waiting for

confirmation that the dollar won't resume its five-year rally.

Metals appeared on the road to recovery in 2014 until the dollar rally kicked in and the lower crude-oil tide dragged down all commodities. With crude oil stabilized and the dollar potentially peaking despite the rate-hike cycle, metals may be set to return to 2014 levels. (06/06/17)



All Metals Index Overlaid With Inverse U.S.Dollar

22. Industrial Metals Demand Exceeding Supply Most in Over a Decade

Industrial-metals prices should continue to appreciate if the history of demand vs. supply is a guide. Since February 2016, the 12-month sum of World Bureau of Metals Statistics copper, aluminum, nickel and zinc demand vs. supply estimates has sustained the highest and longest period above 1.0 since 2006. The Bloomberg Industrial Metals Subindex Total Return has increased about 20% over the period. Historically, the two measures trend strongly together.

Despite its leadership, the metals index has substantially trailed since 2014. External pressures including the strong dollar and plunge in crude oil may have artificially suppressed metals prices, providing a unique opportunity for mean-reversion recovery. (06/06/17)



23. Gold, Silver Gaining Attraction at Lowest Love Interest in 2017

Risk vs. reward for new precious-metals longs is much improved as net positions close in on rate-hike cycle lows. Managed-money net positions for gold, silver, platinum and palladium have declined to a mere 88,000, or less than 12,000 contracts above the January low and 110,000 below the mean since the beginning of the cycle. Appearing more organically driven than much of 2016, gold and silver open interest is up only 16% compared with the 19% total return of the Bloomberg Precious Metals Subindex.

The rapid increase in open interest and managed-money net positions to new records in 2016 drove gold and silver price gains, until long liquidation flushed the market. The lowest amount of precious metals net longs since the first week of 2017 may provide an opportunity for further price appreciation. (05/24/17)



Precious Metals Positions and Prices Diverge

24. Gold Market to the Fed: Bring It On, Tightening Is Good for Us

Anticipating a rate-hike endgame or more increases with rising inflation, gold is poised to continue to perform well. In the current tightening cycle, spot gold and the S&P 500 Index are neck and neck, up 19% to June 1. Diminishing returns for stocks-to-gold may have set in. Since the Fed's March 15 rate hike, gold is up 5.6% vs. 3.2% for stocks. The spot Bloomberg Commodity Index increase of 21% was just passed by the S&P 500 (23% total return). Commodity total returns are set to recover on the flat energy curve.

The U.S. dollar and bond markets appear to be looking ahead to a rate-hike endgame. The Bloomberg Dollar Spot Index is down 2.3% in the cycle and the U.S. Treasury 10-year yield has declined to 2.21% on June 1 from 2.27% on Dec. 14, 2015. (06/02/17)

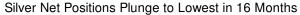


25. Silver Is Looking More Lustrous Now That Hedge Funds Are Out

Price resilience in the face of the massive liquidation of long silver futures leaves the market with a muchimproved base. The lowest level of net managed-money long positions since the start of 2016, when silver was below \$16 an ounce vs. \$17.06 on May 23, should improve risk vs. reward for new longs. How the market got there is more impressive as 65,556 futures contracts were liquidated in the 12 weeks through May 19 -- the most for any similar period in CFTC database history for COMEX silver.

Long-liquidation pressure on silver has rarely been more extreme, yet the market remains up 7.2% in 2017. The 5.2% decline in the Bloomberg Dollar Spot Index is key support. Were silver to catch up with its guarterly beta to

the dollar at minus 2.4 over the past 10 years, it would be up 13% in 2017. (05/24/17)





To contact the analyst for this research:

Mike McGlone at mmcglone8@bloomberg.net