



Get It Wrong, Get It Right
The Importance Of Being Accurate

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Paradigm Shift: Fundamentals Rule...
Again, For Now

The Return Of The Fundamentals

Reduced indexed commodities investment and trading have reduced the correlations of commodities prices to the dollar's exchange rate, stocks, bonds, and each other that characterized commodities trading and prices from 2006 until just recently.

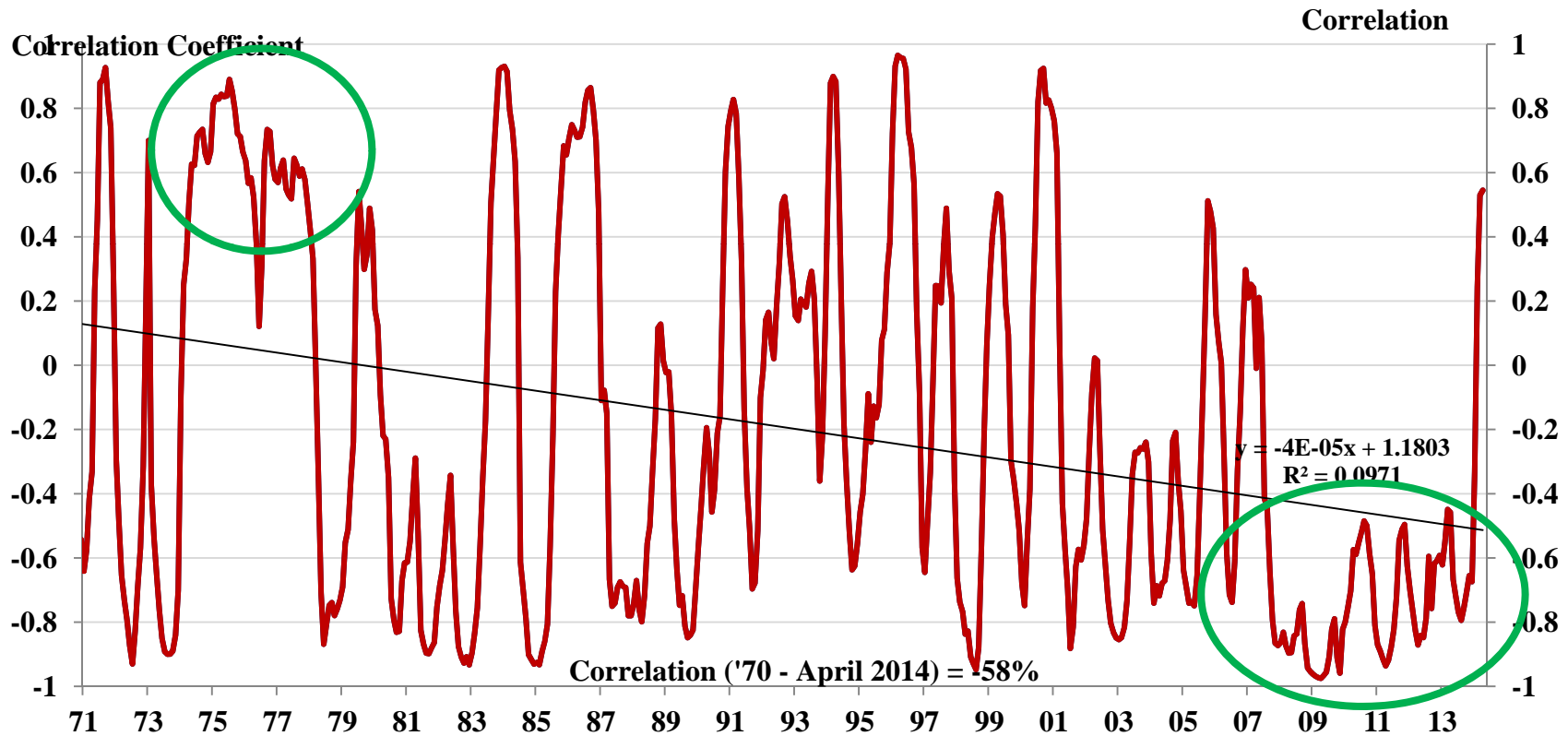
Commodities price correlations have broken down.

Fundamentals in each commodity market now are more important price determinants once more.

Commodities and the Dollar: Anomalies End

Rolling 1-yr Correlation Coefficient Between the CRB and the J.P. Morgan Trade-weighted Dollar: Trading Anomalies End

Computed using monthly data, through April 2014

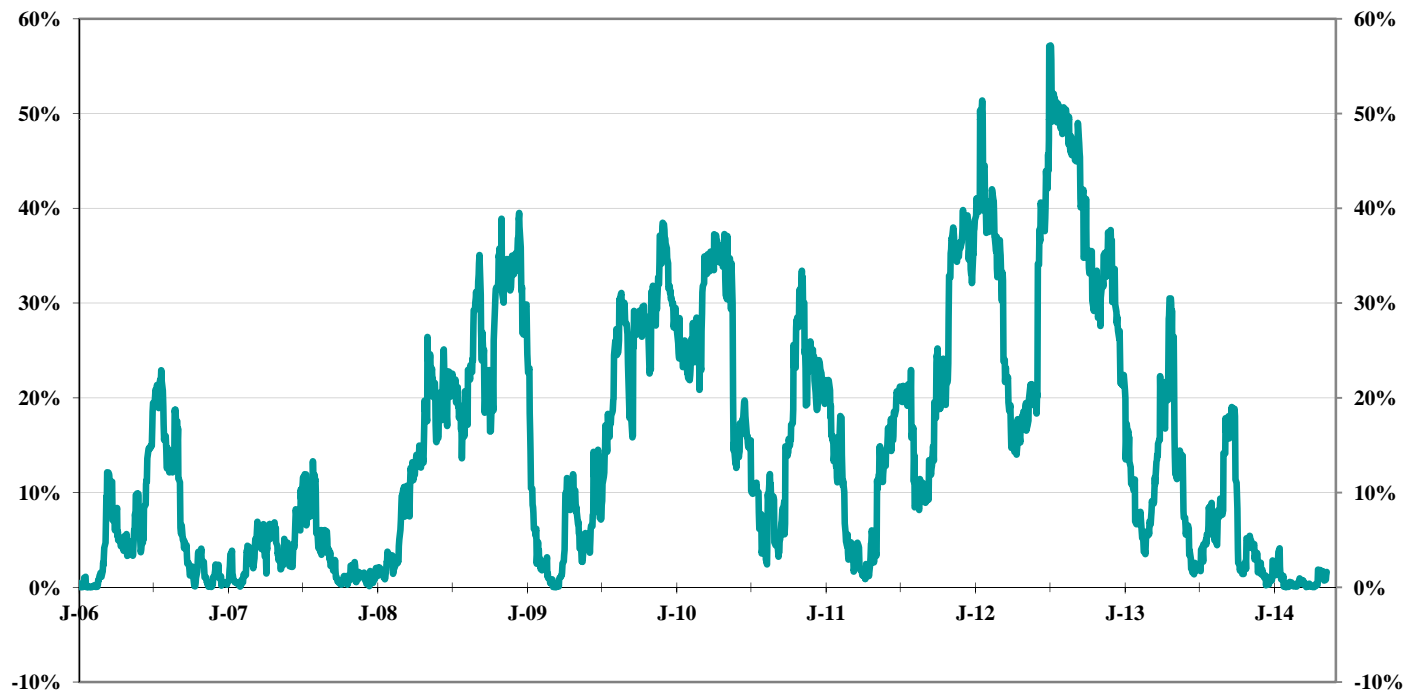


Base Metals Dollar Relationship Breaks Down

60-Day Rolling Correlation of LME and ICE Dollar

Daily price change data, through 8 May 2014

Rolling Correlation (R-squared)

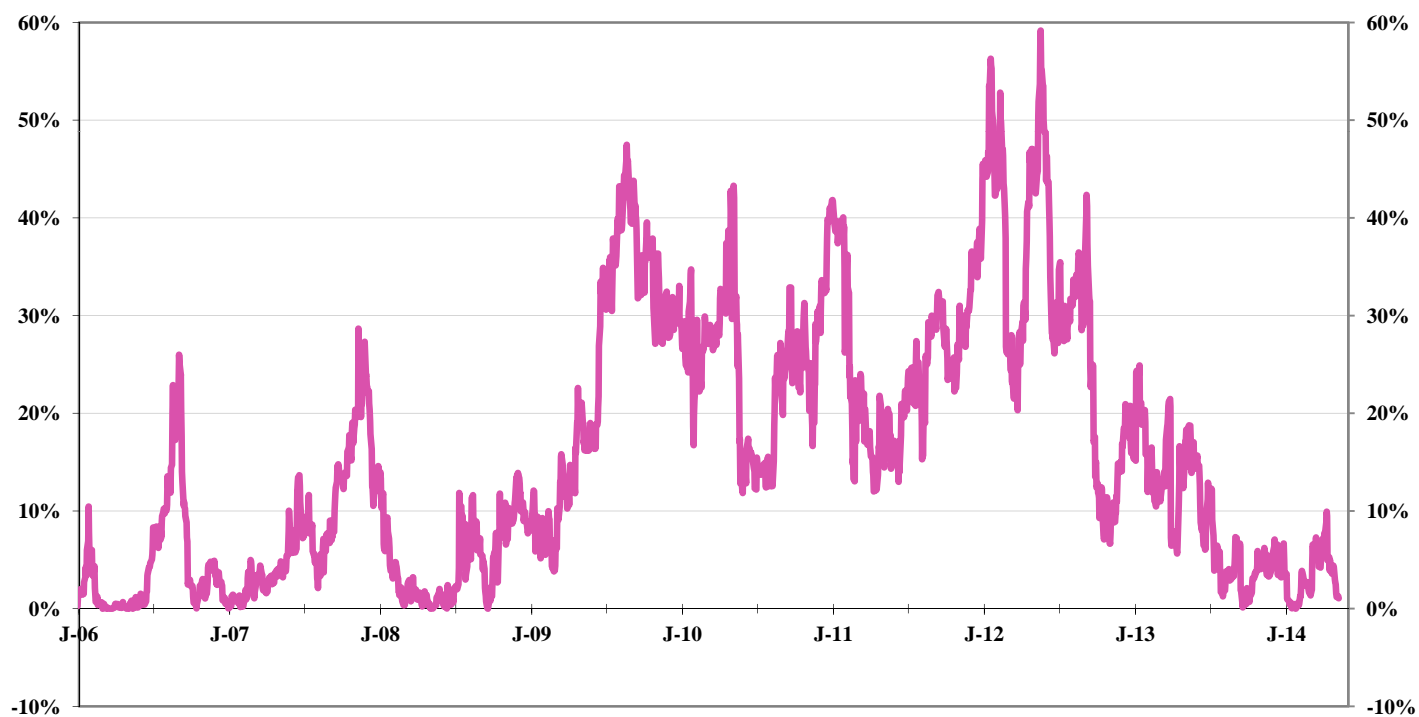


Base Metals Stocks Relationship Breaks Down

60-Day Rolling Correlation of LME and S&P 500

Daily price change data, through 8 May 2014

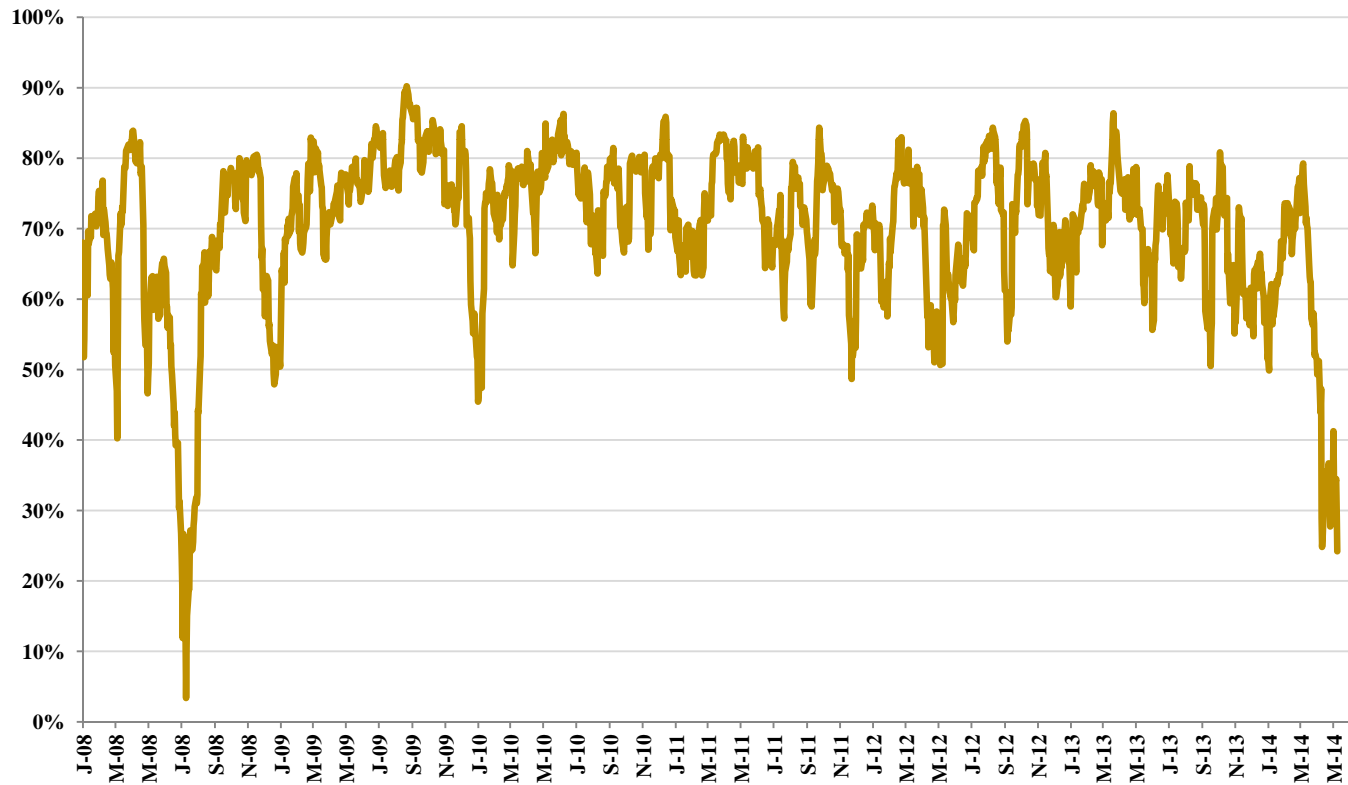
Rolling Correlation (R-squared)



Base Metals Inter-Relationships Break Down

Average LME Base Metal Price 20-day Rolling Correlation

Daily, through 7 May 2014
Correlation



Base Metals Inter-Relationships Break Down

LME Base Metal Price Correlation Matrix: **1**
Jan. 2013 - 31 Mar. 2014

Daily Price Changes

	Aluminum	Copper	Lead	Nickel	Tin	Zinc
Aluminum	1.00	0.67	0.73	0.62	0.53	0.79
Copper	0.67	1.00	0.71	0.63	0.61	0.71
Lead	0.73	0.71	1.00	0.62	0.57	0.85
Nickel	0.62	0.63	0.62	1.00	0.53	0.64
Tin	0.53	0.61	0.57	0.53	1.00	0.55
Zinc	0.79	0.71	0.85	0.64	0.55	1.00

LME Base Metal Price Correlation Matrix:
1 Apr. 2014 - 8 May. 2014

Daily Price Changes

	Aluminum	Copper	Lead	Nickel	Tin	Zinc
Aluminum	1.00	0.30	0.46	0.61	0.32	0.46
Copper	0.30	1.00	0.52	0.25	0.45	0.38
Lead	0.46	0.52	1.00	0.22	0.72	0.80
Nickel	0.61	0.25	0.22	1.00	0.33	0.27
Tin	0.32	0.45	0.72	0.33	1.00	0.54
Zinc	0.46	0.38	0.80	0.27	0.54	1.00

Why Do 90% Of Investors In Commodities Lose Money?

The Four Sins of Intellect

Sin

Commodities Market Equivalent

Ignorance

The lack of knowledge

Bad Data (statistics, information)

Stupidity

The lack of mental capacity to think critically, discern good information from incorrect information; a lack of ability to analyze, learn and understand things.

Bad Analysis

Delusion

Believing a false idea or set of ideas.

Foregoing data and analysis for beliefs.

Self-Delusion



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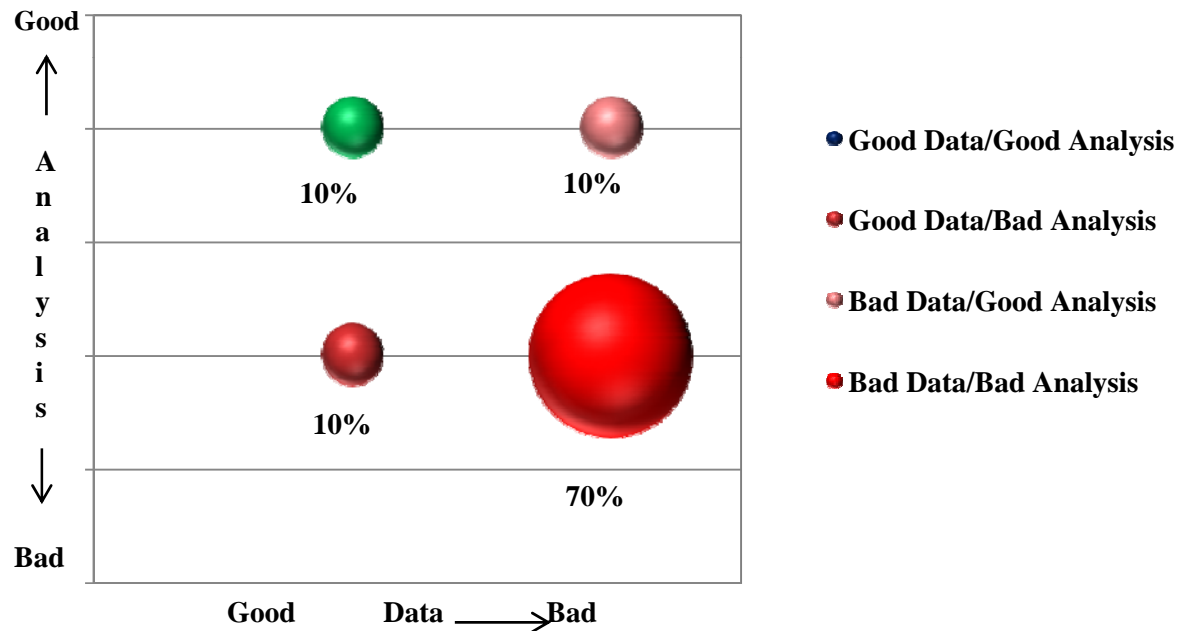
Good Analysis Of Bad Data Leads To Bad Results

	<u>Good Data</u>	<u>Bad Data</u>
<u>Good Analysis</u>	Win	Lose
<u>Bad Analysis</u>	Lose	Lose

The Odds Are Stacked Against Getting It Right

The odds of getting good information and analyzing it correctly are around 10%.

The odds of Getting It Wrong are 90%.



The Markets Are Clogged With Bad Data And Analysis

- **“The Fed won’t let the Bundesbank have its gold for seven years.”**
- **“Comex will run out of gold.”**
- **“All the gold in London and Zurich is going to Asia.”**
- **“Higher interest rates will push gold prices lower.”**



“All The Gold In Switzerland...”

Swiss gold inventories have risen 152.1 million ounces since 2008

+9.8 million ounces in 2013

+ 4.5 million ounces in the first four months of 2014.

Swiss Gold Imports and Exports

Troy

Ounces

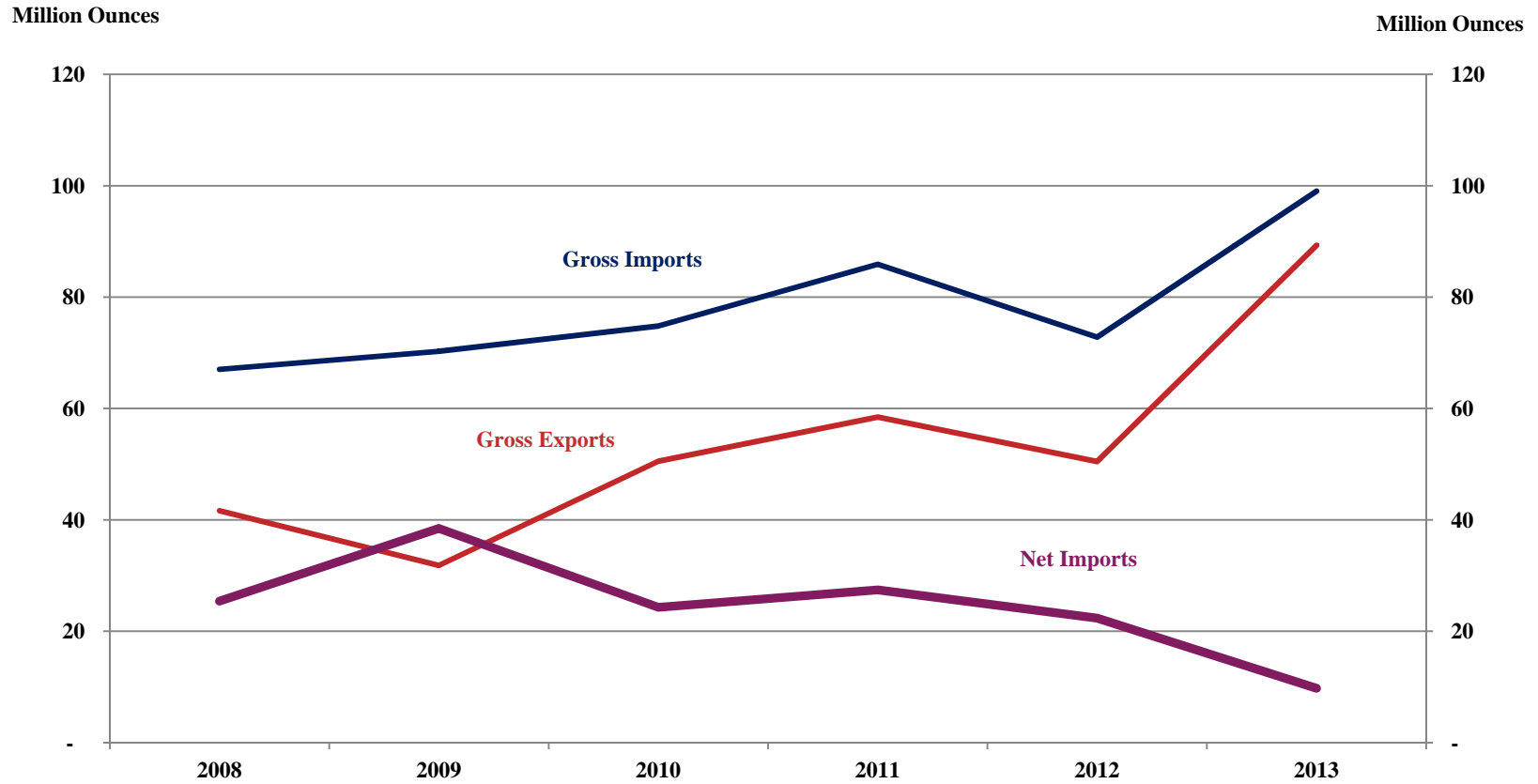
	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>Jan-Apr</u> <u>2014</u>	<u>Apr-14</u>
Import	67,028,294	70,275,359	74,811,540	85,892,006	72,821,184	99,038,832	25,267,336	3,921,298
%CH		4.8%	6.5%	14.8%	-15.2%	36.0%		
Export	41,632,098	31,826,410	50,523,291	58,457,227	50,476,769	89,286,192	20,784,172	3,566,193
%CH		-23.6%	58.7%	15.7%	-13.7%	76.9%		
Net Trade	25,396,196	38,448,949	24,288,249	27,434,779	22,344,415	9,752,640	4,483,164	355,105
%CH		51.4%	-36.8%	13.0%	-18.6%	-56.4%		



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Switzerland Is Not Running Out Of Gold

Swiss Gold Imports and Exports



Switzerland Running Out Of Gold?

Yes, That's Right.

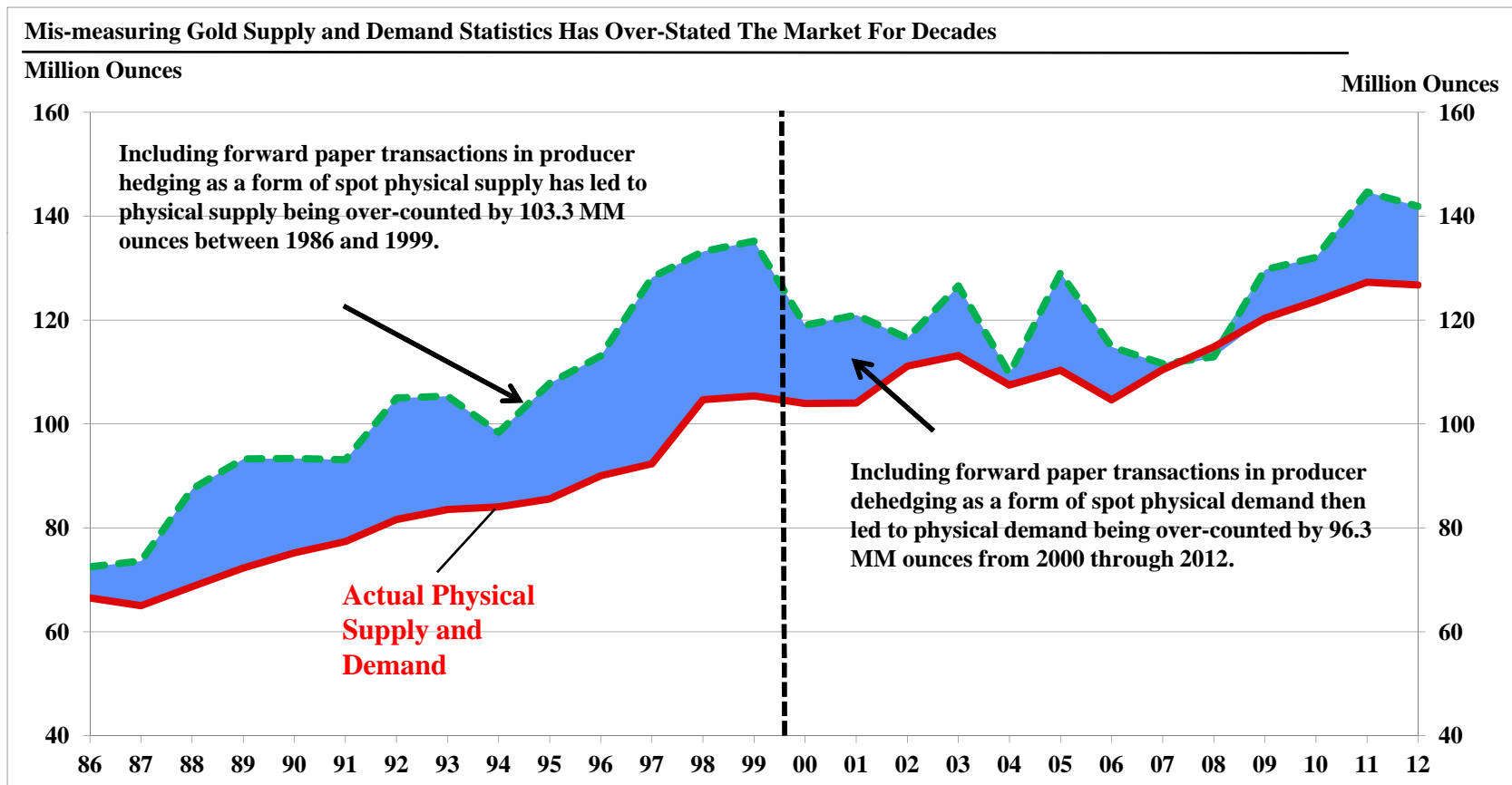
Swiss gold net imports gold totaled 147.7 million ounces from 2008 through 2013.

Chinese gold investment demand totaled 43.5 million ounces over the same time.

**MORE INVESTORS BOUGHT MORE GOLD STORED IN SWITZERLAND
OVER THE PAST SIX YEARS THAN THEY BOUGHT GOLD STORED IN
CHINA.**

Forwards Do Not Involve Spot Physical Purchases and Sales

Counting forwards as spot supply or demand leads to over-counting physical markets – around 200 million ounces of gold and a billion ounces of silver.

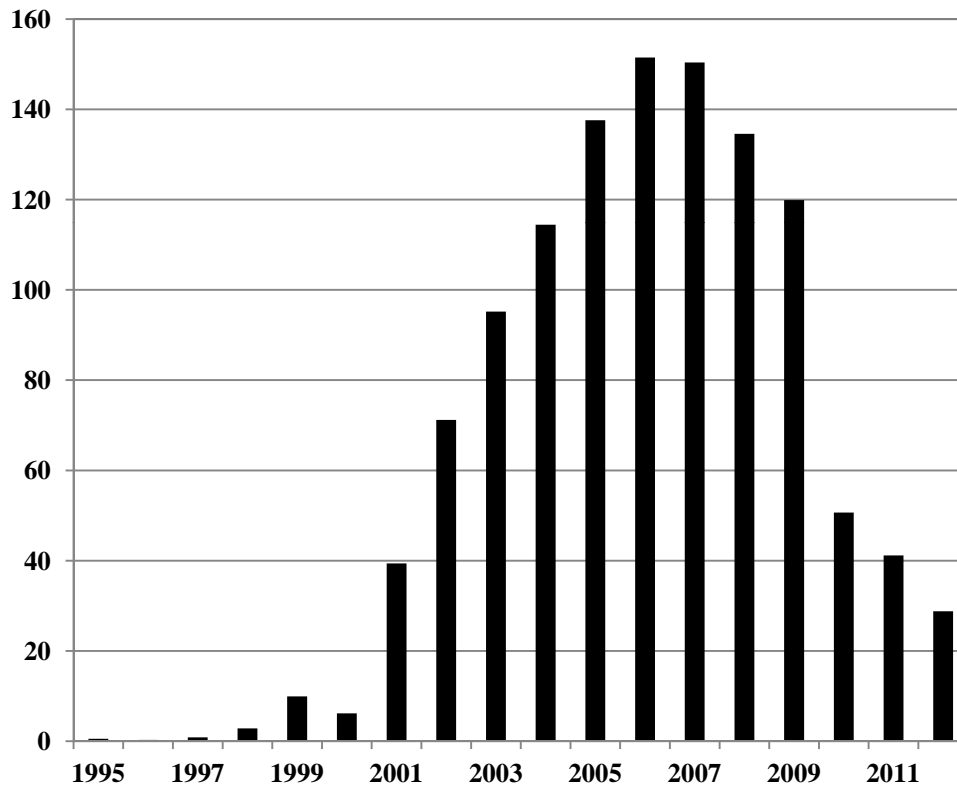


Chinese re-exports of refined silver mis-identified

Chinese Gross Exports of Silver and Silver Products

Annual, Through 2012

Million Ounces



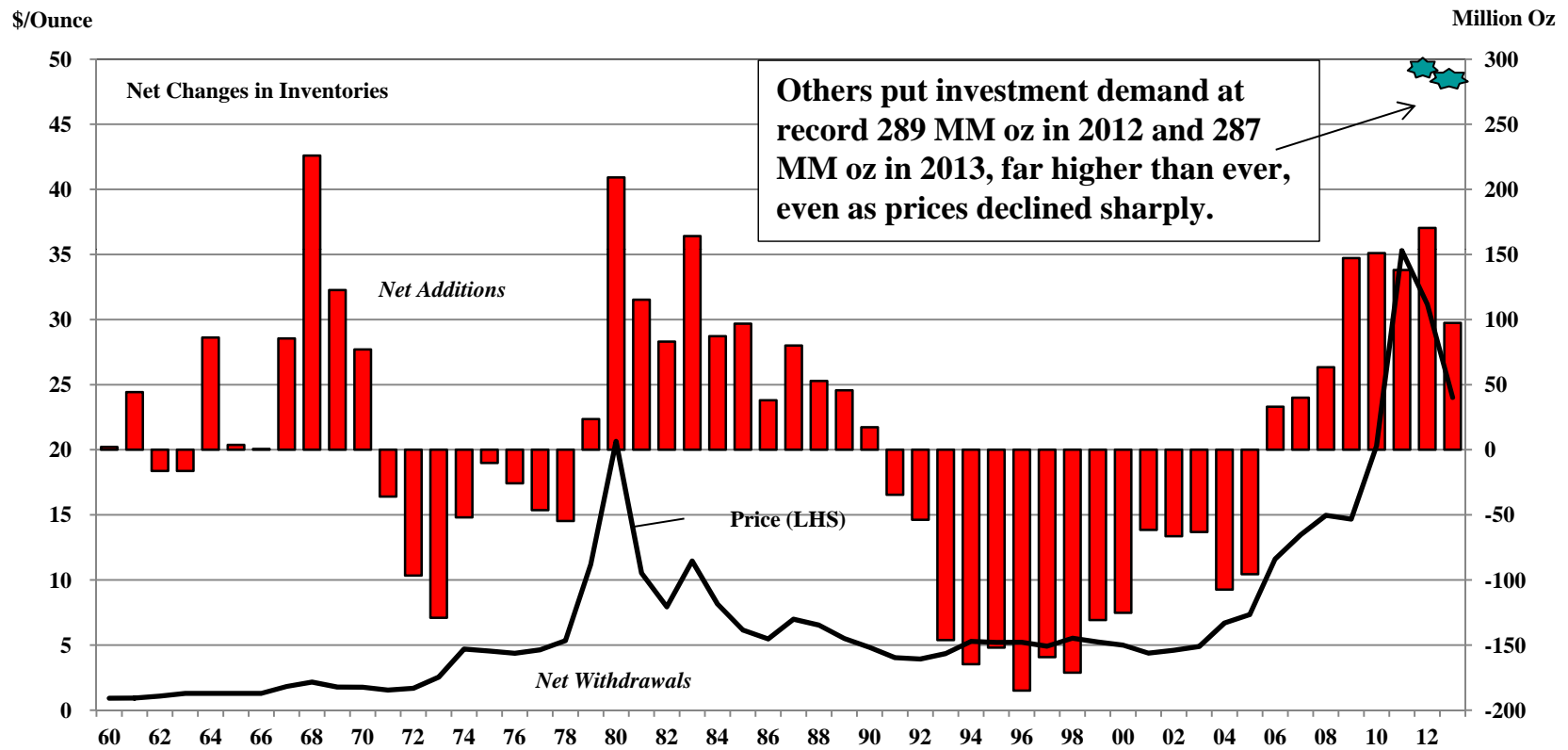
Analysts spotted large Chinese silver exports in the 2000s and guessed they must have been central bank inventory sales.

CPM Group worked with a major copper producer and the PBOC on a system to allow Chinese base metals smelters to bid effectively for precious metals-rich overseas concentrates, allowing us to properly identify the surge starting in 2001 in Chinese silver exports as re-exports from imported concentrates.

The result: Another billion ounces of misidentified and double-counted supply by others... and investment demand was over-estimated by a billion ounces since it was a calculated residual in their statistics.

Investors Bought Enormous Sums Of Silver Yet Prices Plunged

Silver Market Balance: Record Volumes on Bargain-Hunting Demand Are Unlikely, Unsupported by Dealers Reports



“Rising Interest Rates Will Push Gold Prices Lower”

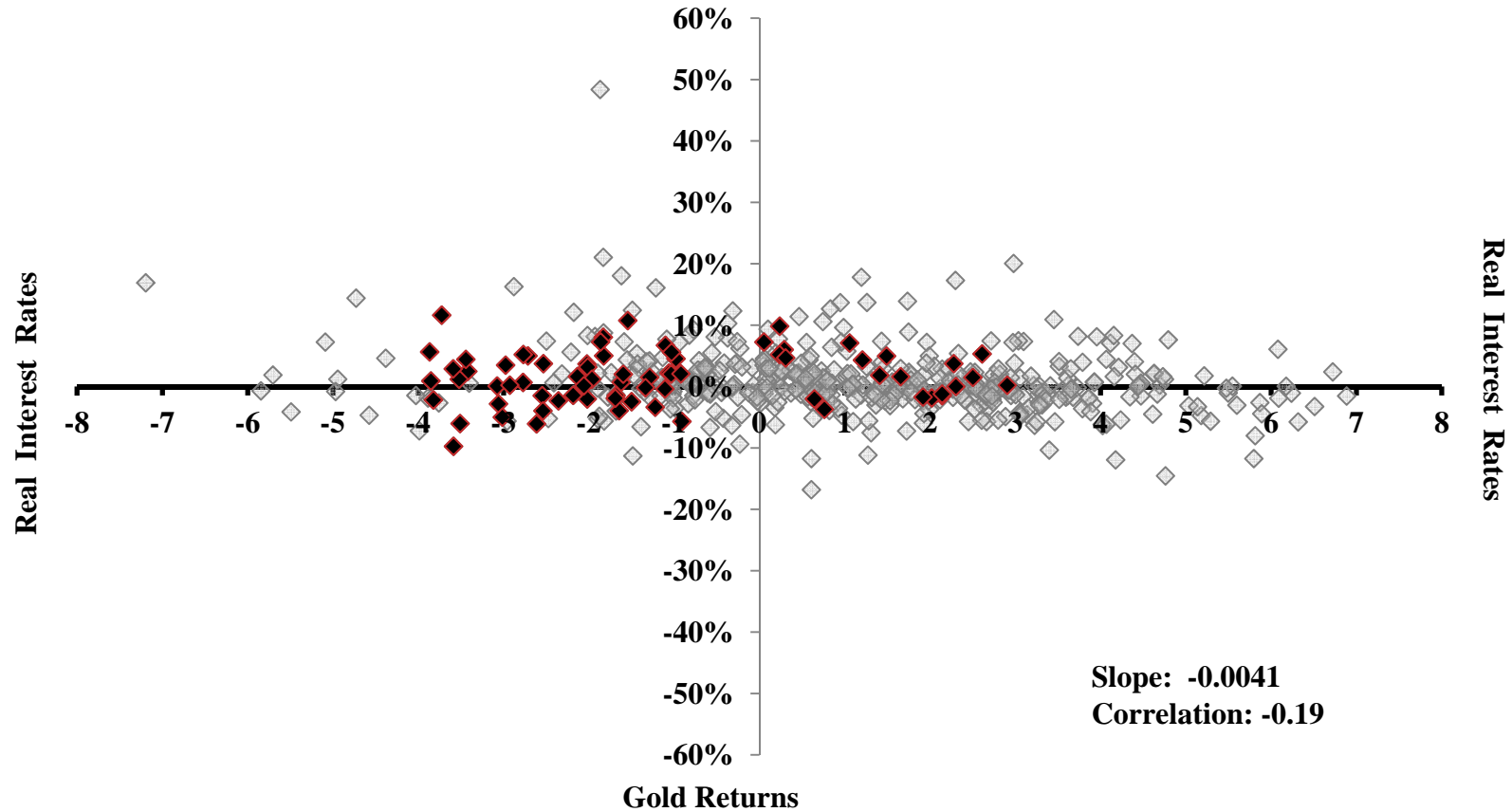
Various market commentators, mostly at major banks, have suggested that rising U.S. interest rates, real and nominal, will push gold prices lower.

We ran regression analyses over numerous time periods and studied the relationships between real and nominal interest rates and gold prices.

(In fact, we have studied this intensely on an on-going fashion since the 1970s.)

No Correlation Between Returns on Gold and Real Interest Rates

Returns on Gold and Real Interest Rates



Note: Monthly data from May 1968 through December 2012. Gold returns are based on changes in monthly average London PM fix gold prices. Real interest rates are U.S. 3-Month Treasury bills minus U.S. Consumer Price Index. Gold prices are the dependent variable and real interest rates are the independent variable. Data points in black are for those between September 2007 and December 2012.

Gold Is Highly Uncorrelated Over Time With Other Assets

Long - Term Correlations

Monthly Data

Gold	Inflation	TWD	DJIA	S&P	T-Bill	T-Bond	Silver
1970 - 2013	9%	-33%	-5%	-6%	0%	3%	70%
1970 - 1990	9%	-34%	2%	-2%	-2%	10%	71%
1978 - 1982	6%	6%	32%	13%	-13%	3%	85%
1990 - 2013	-3%	-35%	-18%	-14%	2%	-3%	65%
2000 - 2013	1%	-38%	-20%	-17%	1%	-8%	75%
2002 - 2013	3%	-38%	-18%	-17%	1%	-9%	75%
2008 - 2013	-5%	-34%	-23%	-22%	3%	-5%	80%

Source: CPM Group

January, 2014



Gold “Smackdowns,” Gold Price Suppression Theories

Commentators cry market manipulation whenever gold prices fall sharply... but never when they spike higher.

We examined actual market data to see what exactly was happening when gold prices change suddenly and dramatically in short periods of time. Then we examined other markets.

The example here is from last October.



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There Are No Real Efforts To Push Gold And Silver Prices Down

Contrary to market commentary, using last October as an example, one sees what really goes on in the market:

1. More than half of the trades have been heavy buying pushing prices higher; obviously not ‘smack-downs.’
2. No single entity but hundreds of algorithmic traders using similar systems generating the same sell points.
3. Occurring across financial markets: Other commodities, fixed income, currencies, equities.

Recent Major Intraday Price and Volume Changes

Date	Time Interval	Stop Logic	Volume During Time Interval		Price Action during Time Interval	Daily Change in Settlement Prices	
			Troy Ounces	as % of Total Daily December Contract Volume			as % of Total Daily Aggregate Futures Volume
22-Oct	8:20 - 8:30	NA	2,219,600	13.9%	12.6%	\$19.50	\$26.80
17-Oct	4:00 - 4:10	No	1,780,000	8.2%	8.1%	\$33.00	\$40.70
15-Oct	9:50 - 10:00	No	1,320,000	6.5%	6.1%	\$11.00	-\$3.40
11-Oct	8:50 - 9:00	20 Seconds	2,810,000	15.1%	14.3%	-\$27.00	-\$28.70
9-Oct	10:10 - 10:20	No	1,280,000	8.1%	7.8%	-\$10.00	-\$17.40
7-Oct	9:50 - 10:00	No	1,140,000	11.9%	11.4%	\$11.00	\$15.20
1-Oct	8:40 - 8:50	10 Seconds	2,410,000	11.3%	10.9%	-\$24.00	-\$40.40
Averages on Declines			2,166,667	11.5%	11.0%	-\$20.33	-\$28.83
Averages on Increases			1,614,900	10.1%	9.6%	\$18.63	\$19.83
Ratio of Declines to Increases			1.34	1.14	1.15	-1.09	-1.45

Note: Time is military time, EDT.

Sources: Reuters data, CPM Group

“Comex Is Going To Run Flat Out Of Gold”

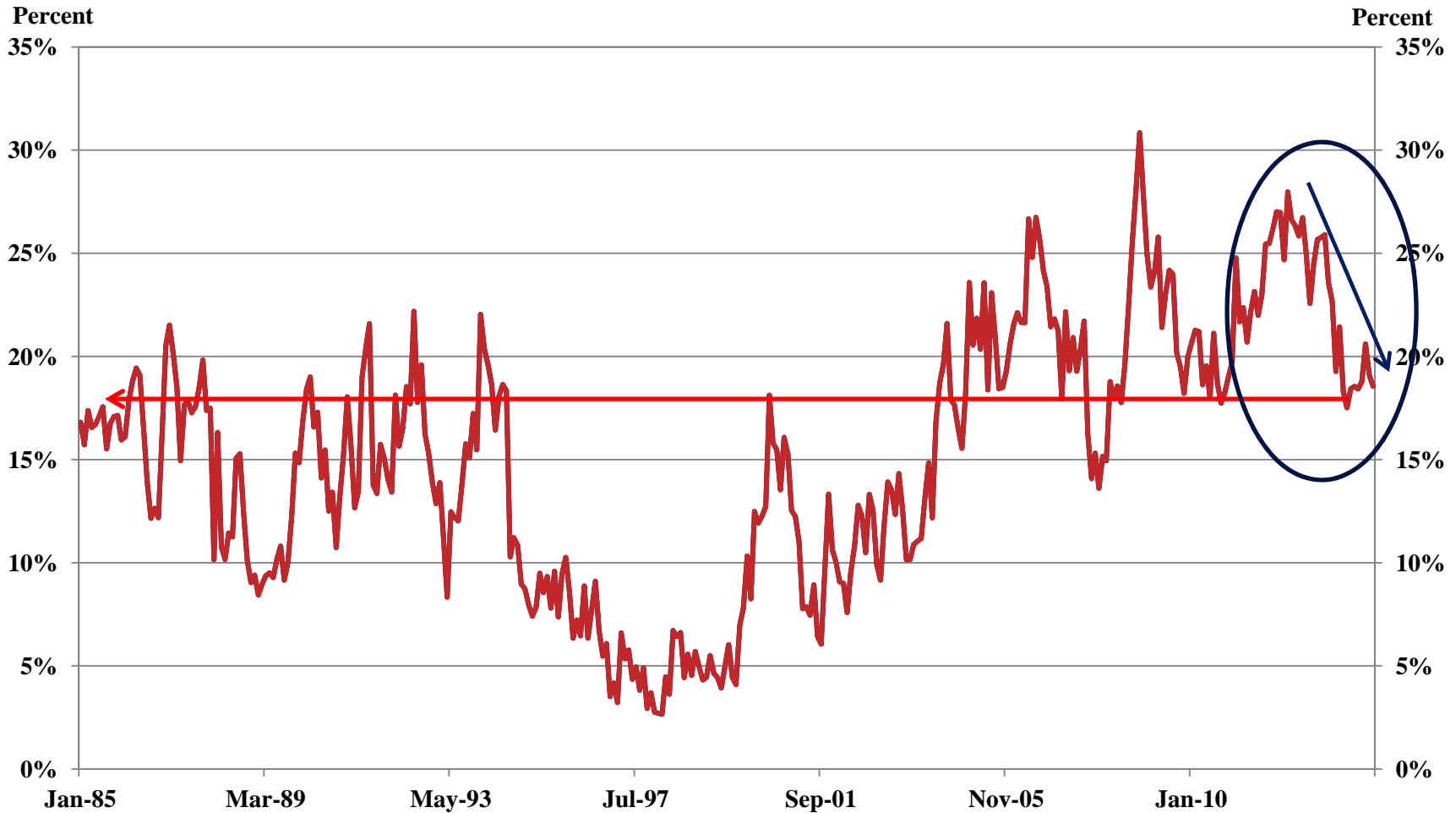
A statistical examination of the amount of gold registered and eligible for gold delivery against Comex futures positions... and a comparison of registered and reported inventories with other market measures such as open interest and futures contract delivery levels demonstrates the claims of a brewing crisis are unfounded in fact or reality.



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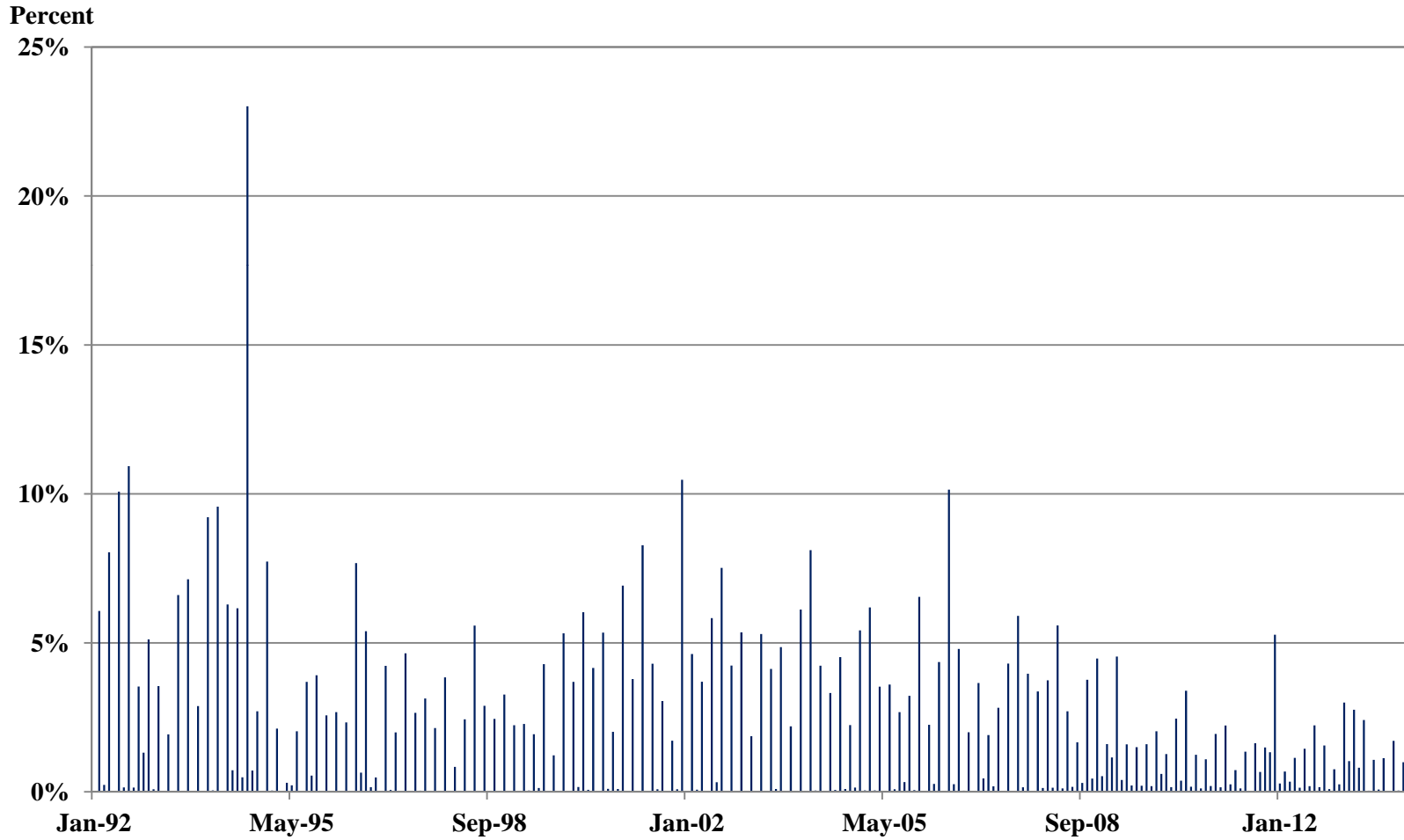
Percent of Comex Gold Open Interest Backed by Stocks

Monthly, Through February 2014



Percent of Comex Gold Deliveries to Total Open Interest

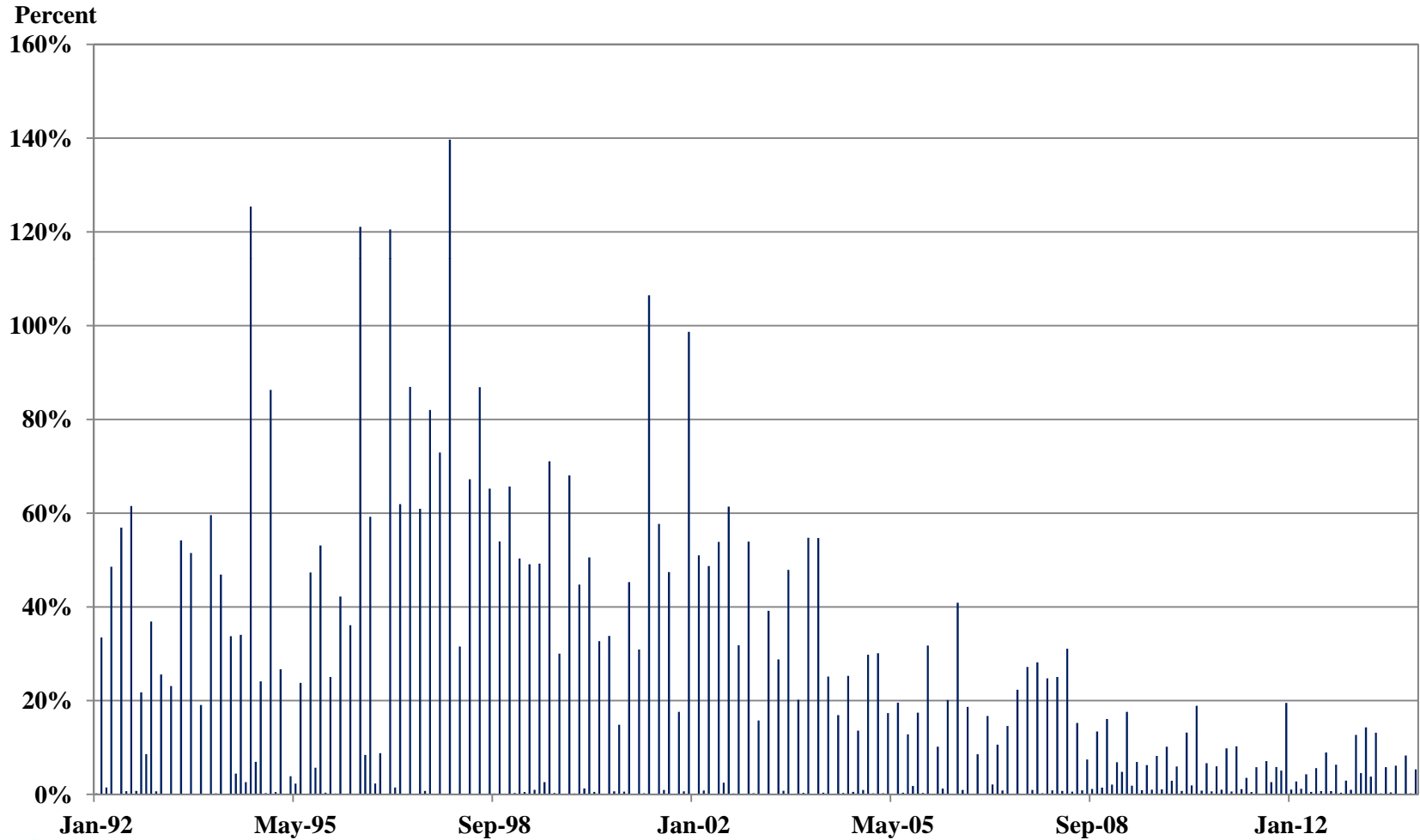
Monthly, Through February 2014



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Percent of Comex Gold Deliveries to Total Gold Stocks

Monthly, Through February 2014



“The Fed Has Made The U.S. Economy More Volatile”

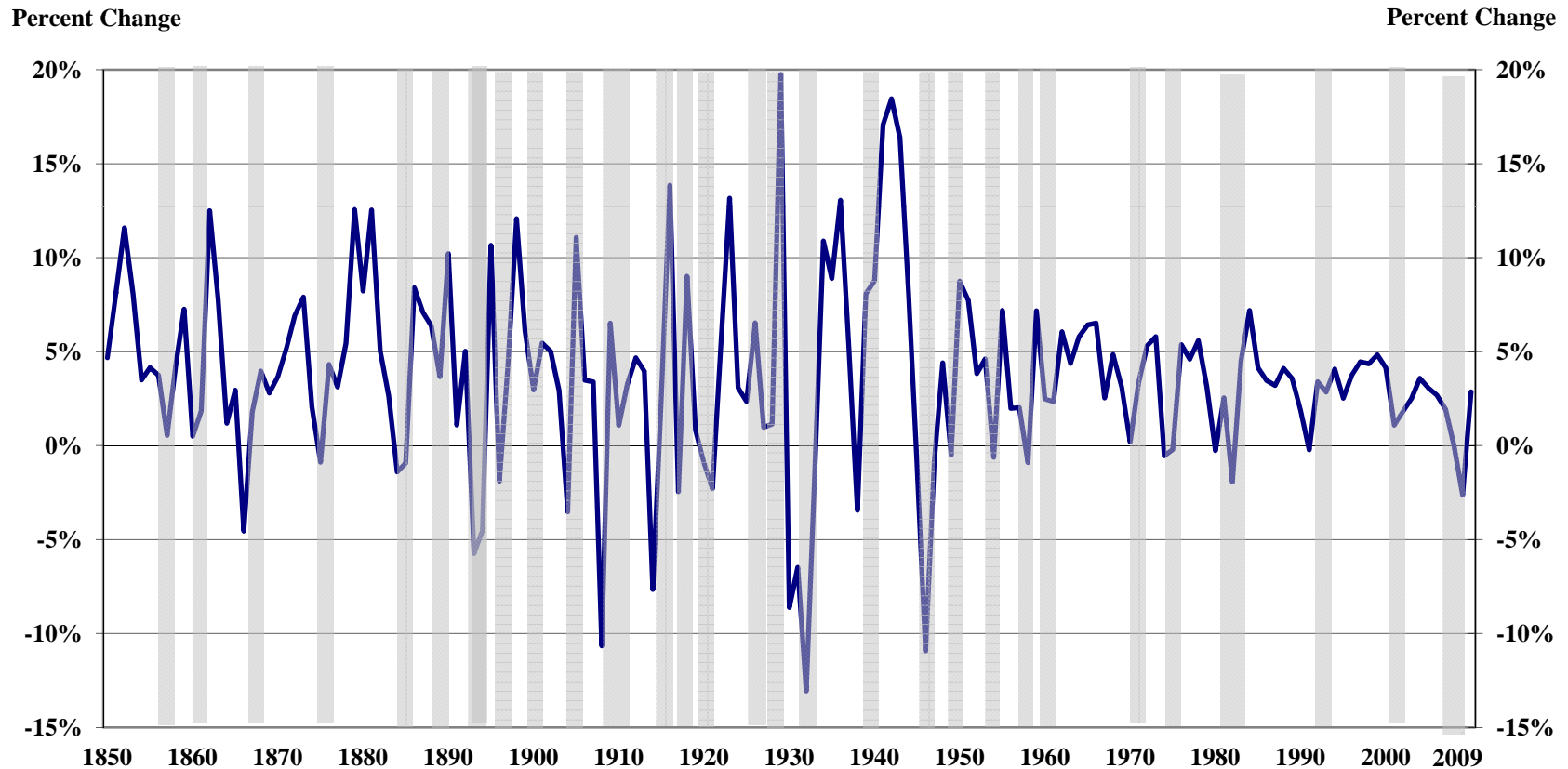
Some politician said that the creation and operation of the Federal Reserve system has led to a more volatile U.S. economy.

So we looked at the data. The statistics show the opposite: The U.S. economy is much less volatile than it was prior to 1913. In fact, it was the volatility, the lack of regulations over banks leading to repeated banking scandals and panics, and the consequently deep and frequent bouts of inflation and depression that led to the creation of the Fed.



The Economy Was More Volatile in the Good Old Days

*U.S. real GDP: 1850 – 1919, 16 recessions, 22 month average length;
1945 – 2009, 11 recessions, 10 months average length*



**“Population Growth And Rising Incomes
Will Inexorably Boost Commodities Prices”**

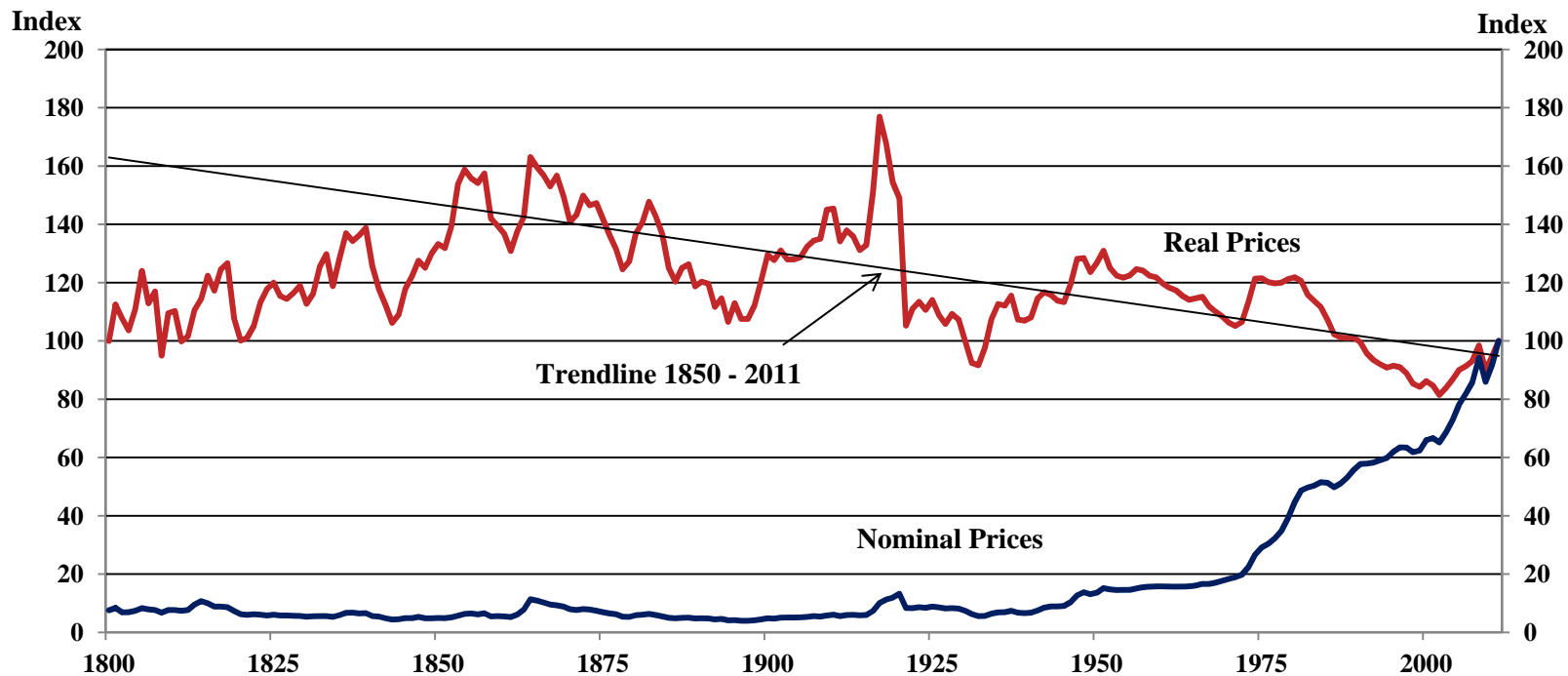
... even though historically the opposite has been the experience.

Rising Real Commodity Prices Are Not Guaranteed

Beware of assuming commodity prices must rise given rising populations and global income. Since 1850 the world's population has risen 7-fold, real GDP has risen 85-fold, consumption of commodities has risen exponentially... and real commodities prices have been cut in half.

Real And Nominal Commodity Prices Since 1800

U.S. Annual Data, Through 2011, Indexed to 2011 = 100.



Central Banks Are Buying Gold

Yes, and no.

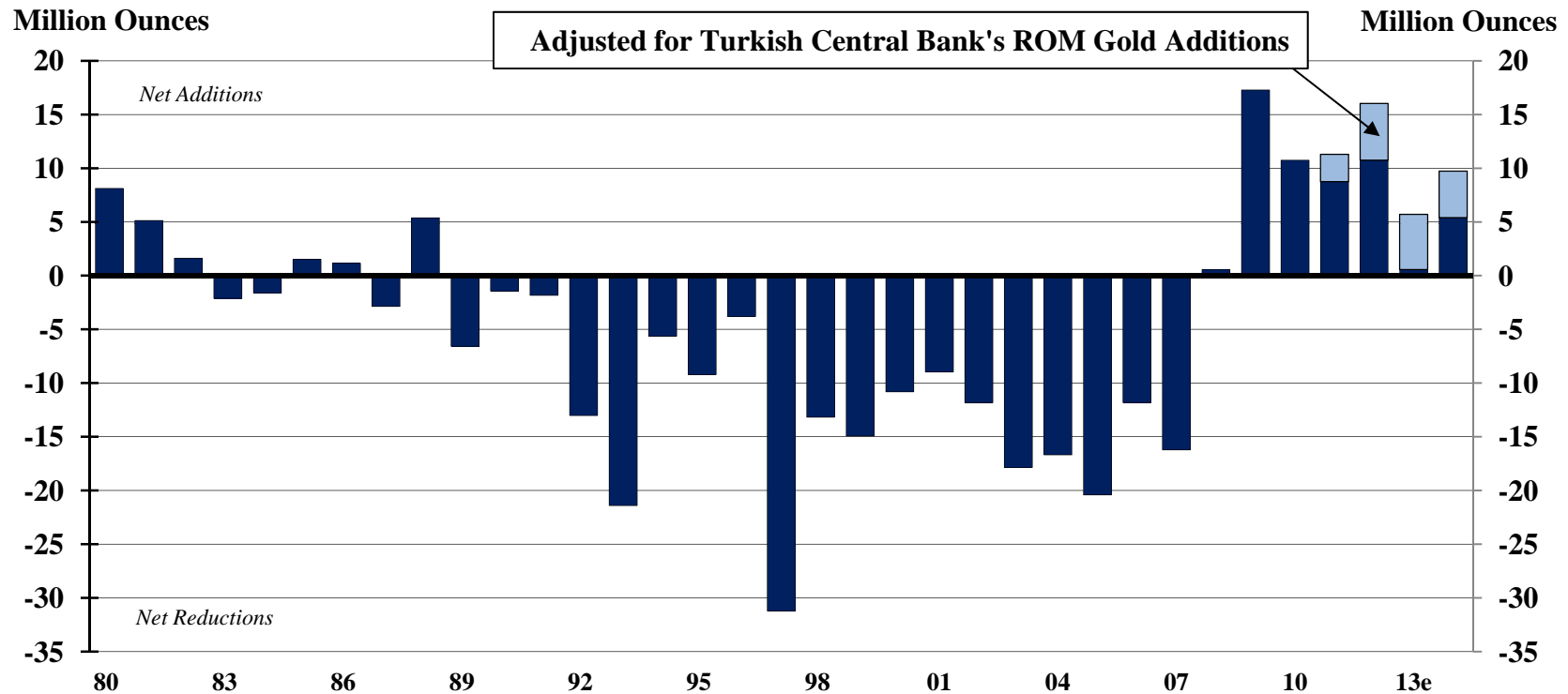
A handful of central banks are buying gold, and the countries involved represent the role models we would expect every other country to want to emulate.

Also, the numbers have been inflated, and now deflated, by special non-buying gold transactions by the Central bank of Turkey and the Bank for International Settlements.

Official Transactions, Adjusted for Turkish Central Bank Additions

Official Transactions

Annual Data, Projected through 2014



Note: Turkey introduced a policy in 2011 that allowed commercial banks to use gold to meet a portion of their reserve requirements. The bank included this gold in its monetary reserves. Because these additions were not outright central bank purchases and no ownership has been transferred from the actual owner to the central bank, annual official transactions have been adjusted to exclude Turkish central bank gold additions since 2011.

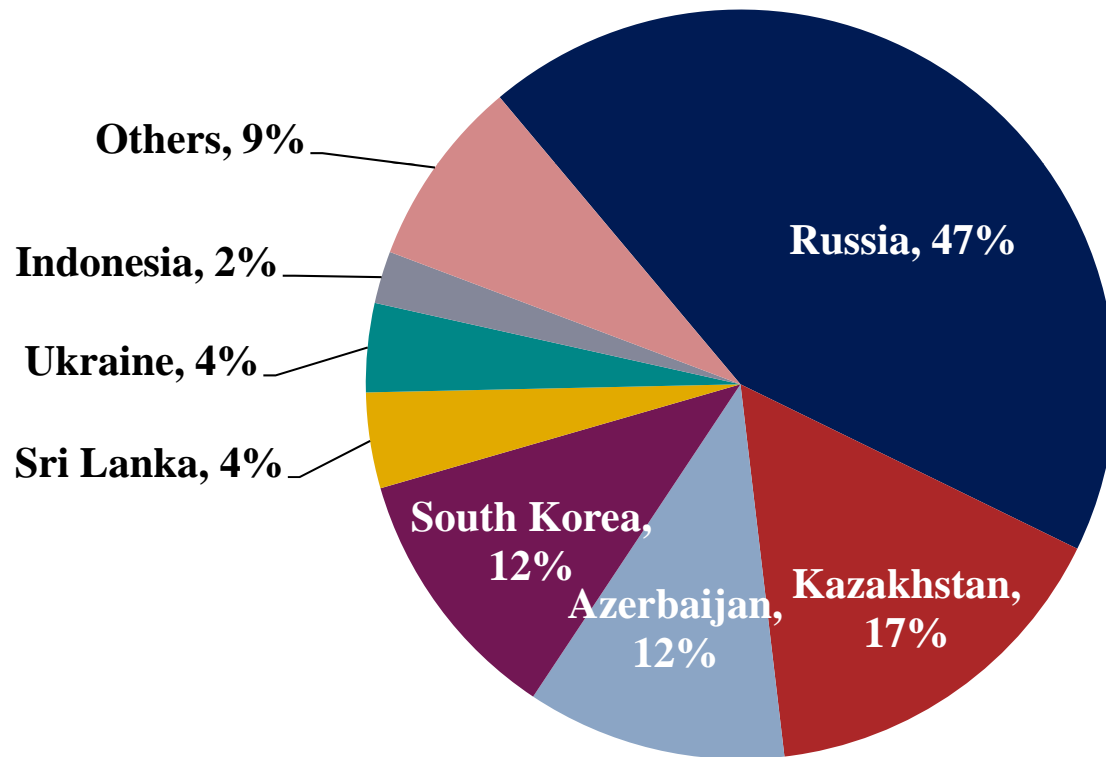


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A Handful of Central Banks Do Most Of The Buying

Russia bought 40% of all central bank gold purchases 2010 – 2013.

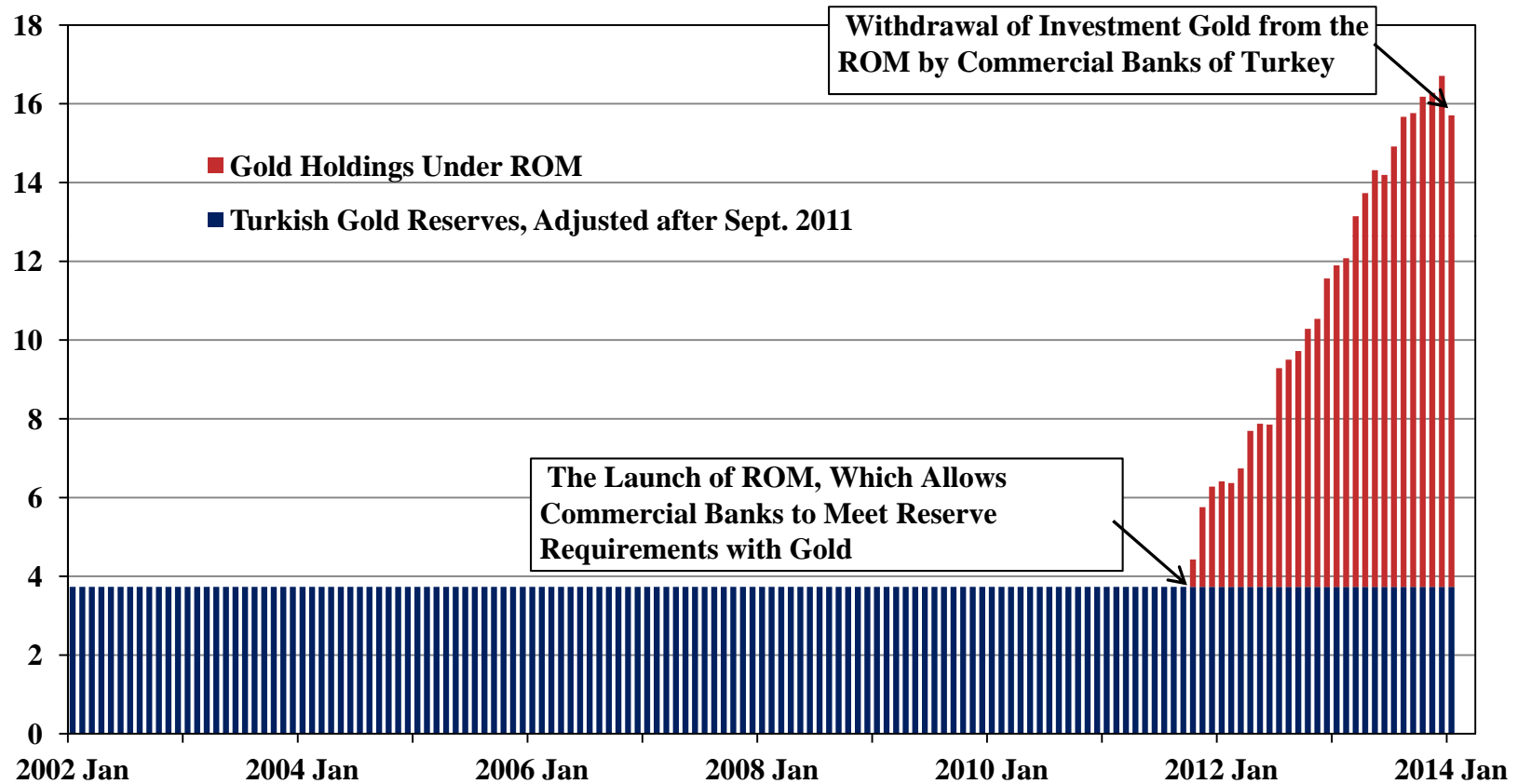
Share of Central Banks in Gross Gold Reserve Additions, 2013



Reported Turkish Central Bank Gold Holdings Included Gold Reserves Added via its Reserve Options Mechanism

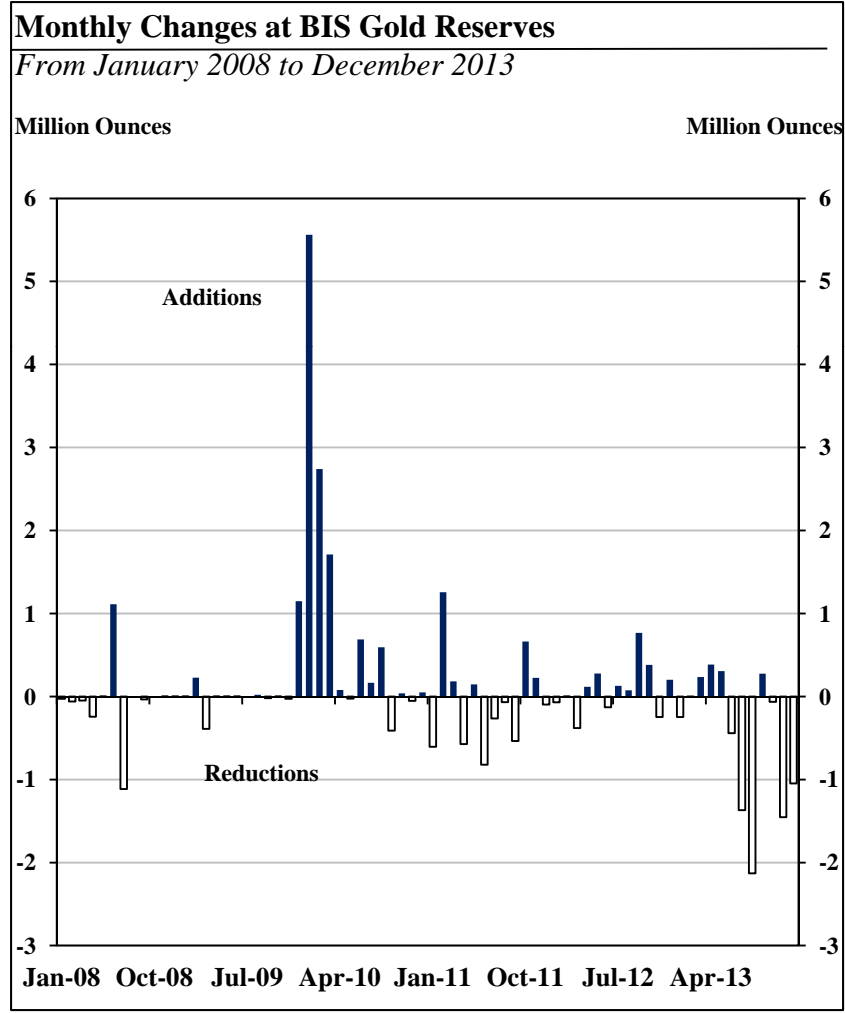
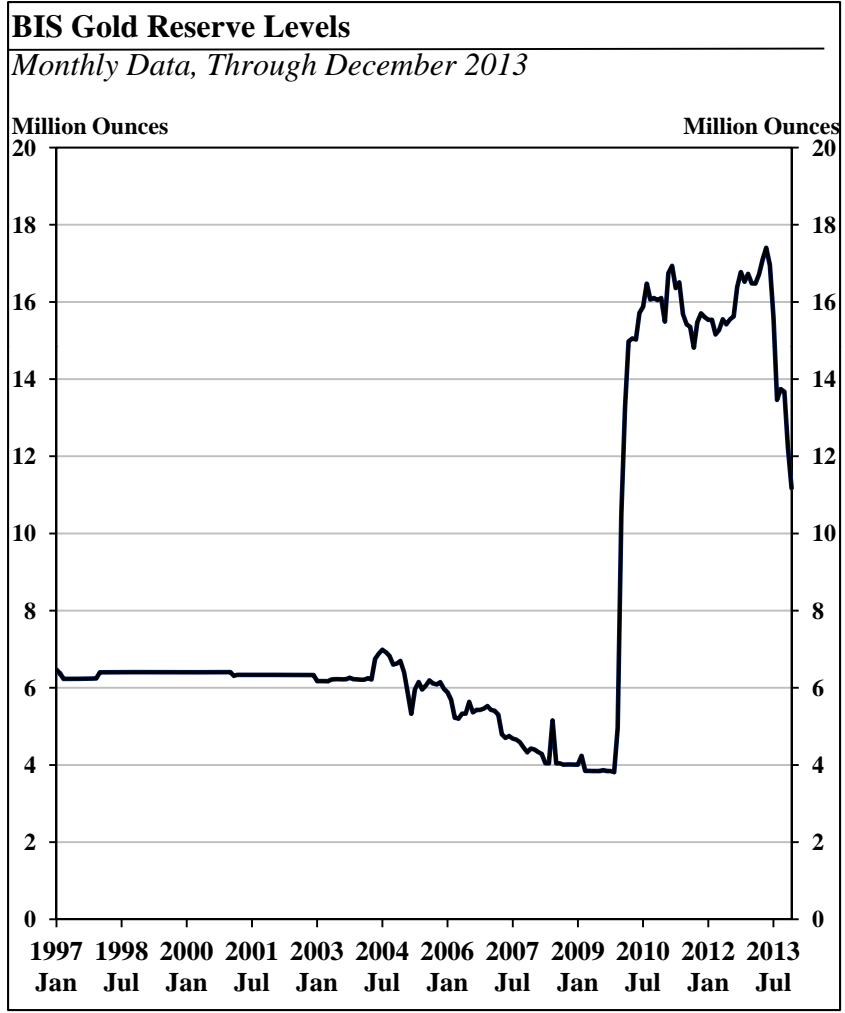
Turkish Central Bank Gold Holdings

Monthly, Through January 2014



Source: IMF, Central Bank of the Republic of Turkey, CPM Group

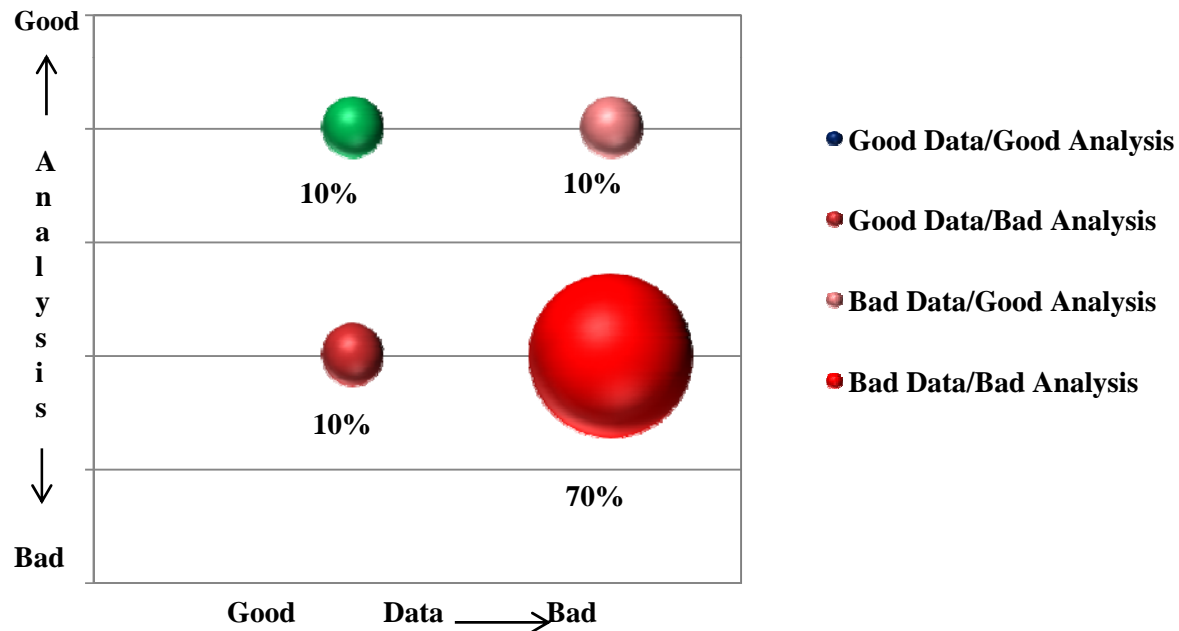
BIS Gold Reserve Reductions Account for Much of the Selloffs



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