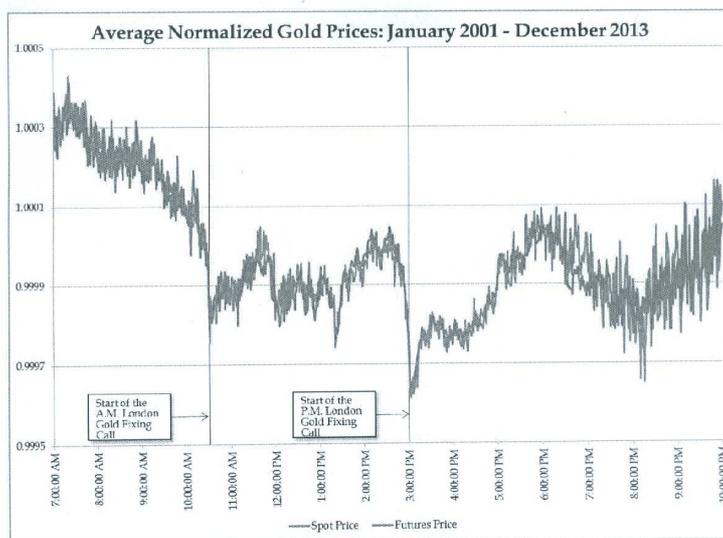


## Behind the Spot Price of Gold



Remarkable pattern

The data shows a large anomalous downwards spike round the time of the fixing – not just in spot prices, but in COMEX prices as well (1)

Many people think that the price of gold for buyers and sellers is determined through the LBMA Gold Price Auction (formerly LBMA Gold Fix). This is not correct.

### LBMA

The London Bullion Market Association (LBMA) is home to the international price of gold.

The LBMA claims to be The Competent Authority for the world Bullion Market.

The LBMA is the pre-eminent body for the world's largest and most important market for gold and silver bullion. The LBMA is centred in London with a global membership and client base, including the majority of the central banks that hold gold, private sector investors, mining companies and others. The LBMA was set up in 1987 by the Bank of England, which was at the time the bullion market's regulator. The LBMA is a truly international market, in that although so-called Market Makers in other bullion trading centres may trade in their local markets, they also deal extensively in "Loco London". This term means that the gold will be settled in London by the LBMA member, either by way of book transfer or physically (2).

The LBMA Gold Price Auction does not set the price of gold and thus all other gold-related products (See later F and O) for the whole day. In fact, the LBMA Gold Price is simply the price agreed to at that point in time (10:30am and 3:00pm); within minutes, the price of gold will fluctuate again based upon the so-called London Spot Price (3).

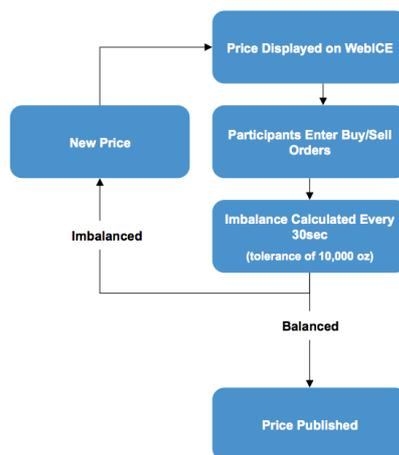
The basis for many transactions in gold is not the LBMA Gold Price but the London Spot Price.

### The LBMA Gold Price Auction (4)

*...LBMA Gold Price...Price of gold for only just a few minutes...*

ICE Benchmark Administration (IBA) is the administrator for the LBMA Gold Price which has replaced the London Gold Fix established in 1919. The LBMA Gold Price is published twice a day.

The LBMA Gold Price Auction is an electronic auction process and takes place twice daily by IBA at 10:30am and 3:00pm with the price set in US dollars per fine troy ounce. Once the auction is concluded, the price is immediately published on WebICE (IBA's website).



Note that the LMBA Gold Price is simply the price agreed to at that point in time (10:30am and 3:00pm); within minutes, the price of gold will fluctuate again based upon the so-called London Spot Price.

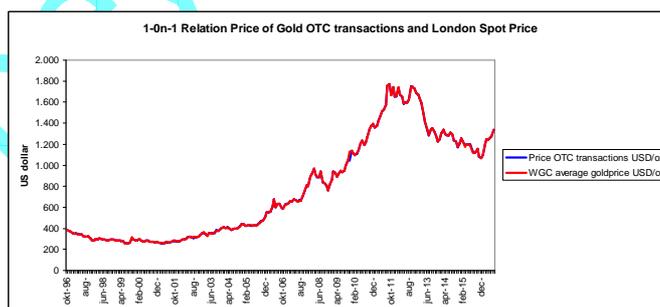
### The London Spot Price

*...London Spot Price...Price of gold around the clock less just a few minutes...Based upon OTC trading...*

This is the basis for many transactions in gold. Actually it is a quotation made by dealers based on US dollars per fine ounce gold (5).

The London Spot Price is published on WebICE and constantly updated by the bullion desks of the so-called Market Makers and is in effect, a bulletin board where these banks can publish their prices(6).

The London Spot Price is determined from trading activity on Over-The-Counter (OTC) markets (7).



The OTC market is a decentralized market, without a central physical location, where professional market participants trade with one another through various communication modes such as the telephone, email and proprietary electronic trading systems. An OTC market and an exchange market are the two basic ways of organizing financial markets. In an OTC market, dealers act as Market Makers by quoting prices at which they will buy and sell a financial instrument such as currencies, commodities, derivatives and so on (quote driven market). A trade can be executed between two participants in an OTC market without others being aware of the price at which the transaction was effected. In general, OTC markets are therefore less transparent than exchanges and are also subject to fewer regulations. According to the LMBA OTC markets provides confidentiality as the transactions are conducted solely between the two principals involved and is this particularly important for central banks activity in the market (5).

The LBMA has 81 Members and 67 Associates, located in more than 30 countries. Under the members are thirteen Market Makers (1):

Full Market Makers	Market Makers	
Citi (S, F, O)	Bank of Nova Scotia (S, F)	Societe Generale (S)
Goldman Sachs (S, F, O)	BNP Paribas (F)	Standard Chartered Bank (S, O)
HSBC Group (S, F, O)	ICBC Standard (S)	Toronto-Dominion Bank (F)
JP Morgan (S, F, O)	Merrill Lynch (S, O)	
UBS (S, F, O)	Morgan Stanley (S, O)	

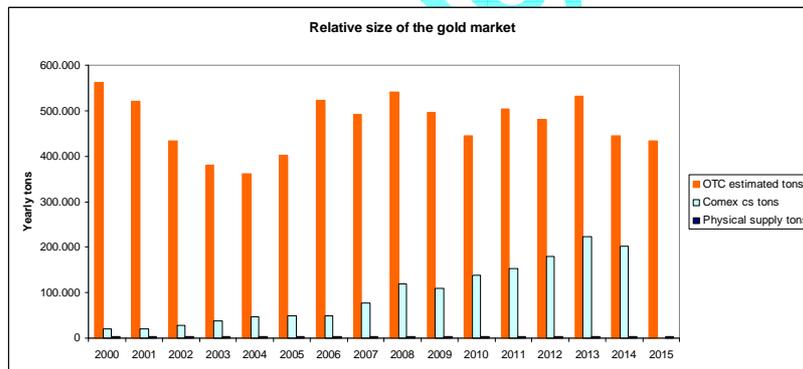
The London Spot (S) Price refers to the price of gold for immediate delivery (read: two working days after the day of the deal). The spot gold market is trading very close to 24 hours a day as there is almost always a location somewhere in the world that is actively taking orders for gold transactions.

Forward (F) is a transaction in which two parties agree to purchase and sale of gold at a future date. Options (O) gives the holder the right, but not the obligation, to buy or sell gold at a pre-determined price and agreed date, for which he pays a premium.

So the London Spot Price is actually the quotation price of gold between Citi, Goldman Sachs, HSBC, JPM, UBS, Bank of Nova Scotia, ICBC, Merrill Lynch, Morgan Stanley, Societe Generale and Standard Chartered Bank based upon their activity in the hardly regulated OTC market.

### The OTC market for gold

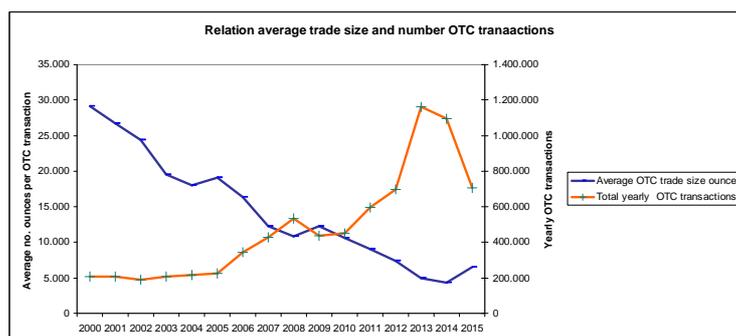
What can we say about the relative size of the gold markets?



Note: The London OTC figures are estimated at least three times the LBMA netted transactions (WGC 2010, GFMS 2014)

So the OTC market for gold was at least 101 times the physical production (in 2015).

What can we say about the relation between the average trade size of a OTC-transaction and the number of OTC transactions?



So if the average trade size of the OTC transaction fails, the more OTC transactions take place. According to the Guide to the London Precious Metal Markets of the LBMA is the standard dealing amount between Market Makers / Full Members are 5.000 – 10.000 fine ounces in gold.

### Remarkable

The gold trading activity on the OTC markets is hardly transparent.

In January 2009, the G20 asked for substantial reforms to OTC derivatives markets in order to 'improve transparency, mitigate systemic risk, and protect against market abuse'. The G20 reform agenda requires standardised OTC derivatives to be cleared through central counterparties on exchange or electronic trading platforms.

Well-known shortcomings are on the so-called pre-trade transparency (information about price quotes and trade sizes is available to the two parties involved in the trade prior to executing the trade), the post-trade transparency (information about executed trades made available to market participants other than the two parties involved in the trade, or a narrow set of dealers).

Through this information asymmetry are uninformed participants at risk of making the wrong trading decisions (8).

It is important to note that the London Spot Price is dominated by a few large banks that trade gold on behalf of their customers or directly with their customers (as principals). Because the banks can become buyers or sellers themselves, the bank have a considerable influence on the price at which they are willing to buy and sell (3).

Viswanathan and Wang (2002) show that when the number of Market Makers is small (thirteen in the case of gold), Market Makers will no longer provide competitive quotes.

According to Ruth Crowell (CEO) in April, 2015 the LBMA won't move from OTC to an exchange. The LBMA currently only reports monthly net volumes of gold and silver transfers between the association's clearing members (HSBC, ICBC, JP Morgan, Scotiabank and UBS) (9). The same LBMA carried out a study in 2011 to quantifying the size of the OTC market. It was the first time such a study had been carried out since 1996, when the Bank of England surveyed the top gold traders. The conclusion was that the volume of gold traded in London is ten times what is implied by the clearing statistics (10)!

According the ISDA bilateral settlements consist of the settlement of financial transactions and physical transactions for which delivery either occurs or is "booked out" by another physical transaction with similar characteristics (10). So if JPM "sells" on the OTC market 5.000 ounces (1,55 tonnes) of gold to Goldman Sachs (with the BIS as principal) at 1.200 US dollar per ounce on the 12<sup>th</sup> October, 2011 and Goldman Sachs (with the BIS as principal) "sells" on the OTC market 5.000 ounces (1,55 tonnes) of gold to JPM at 1.200 US dollar per ounce on the 12<sup>th</sup> October, 2011 nothing really happened. The transactions will be "booked out" against each other. Suppose that the market price at that moment is 1.665 US dollar the London Spot Price will be brought down by these transactions by the bullion desks of JPM and Goldman Sachs (Market Makers). And these orders can be executed multiple times.

### Note of the writer

In our paper from July 20, 2015 we concluded that JPM in cooperation with the BIS controls the dollar gold price through interventions on the development of the dollar gold price. Overall the conclusion was that there is no free market for gold.

In our paper from October 7, 2015 we explained that JPM and the BIS are operating agents for the BIS network to maintain the confidence in the dollar and therefore manipulate the dollar gold price.

The BIS network is the successor of the Gold Pool. The Gold Pool provided for central banks of surplus countries with large foreign exchange reserves to share the burden of interventions in the London gold market in order to keep price fluctuations within a reasonable range. The BIS network determines the intervention zone for the dollar gold price for their operating agents JPM and BIS.

- (1) Consolidated Class Action Complaint 15<sup>th</sup> December, 2014
- (2) Site LBMA September, 2016
- (3) Investingsanswers 19<sup>th</sup> April, 2016
- (4) Description Methodology LBMA Gold Price April, 2016
- (5) Letter LBMA to the Bank of England 30<sup>th</sup> January, 2015 regarding Fair Markets
- (6) Bron Suchecki, VP Monetary Metals, December, 2012
- (7) Kitco.com 16<sup>th</sup> September, 2016
- (8) Bank of England Quarterly Bulletin 2011 Q4
- (9) Bloomberg.com 27<sup>th</sup> April, 2015
- (10) Financial Times 9<sup>th</sup> September, 2011
- (11) Whitepaper OTC commodity markets ISDA (International Swaps and Derivatives Association) April, 2012