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Editorial Comment by Susanne Capano

Hello and welcome to Prague. For over 20 years the Financial Times World Gold Conference has been the gold standard for authoritative analysis and debate. Where else in the world would you find a single source for thorough examination of the role and rationale of central banks...an analysis of trends in supply and demand...a discussion of changing attitudes toward investment in gold? Aside from the current issue of the *Alchemist*, that is. Of course, if you'd rather not stay home and curl up with our current issue, we'll understand, and as our Czech friends say, "At se vam Conference libi!" We're sure you will.

Central Line – Central banks hoard gold. Then again, sometimes they don't. Though it may sound more like a logician's trip on the Circle Line, the explanation for this market-jolting behaviour lies in the timing – and the reasons behind it. Which is why you should make time to read Gold and Central Banks: A Change in Attitude, by Juan Basco of the Central Bank of Argentina.

Sterling Reputation – They began in 1867, fabricating gold and silver ornaments for saddles. Last year, Handy & Harman Refining Group Inc. refined 60 million ounces of silver and a substantial amount of gold, putting them among the world's leading refiners. In a wide-ranging interview on page 8, HHRG President Barry Wayne talks about the art, science and modern alchemy (it's now called pyrometallurgy) of precious metals refining.

US-AU – Say what you will about the Sixties, but back then $35 could buy you an ounce of Uncle Sam's finest three nines five. Of course, there were stipulations (you had to be a manufacturer) and inconveniences – about a pound of paperwork per ounce, for instance. To see how things have changed, and what they've changed from, read A Brief History of...the Physical Gold Market in the United States on page 4.

Birds Don't Do It...Bees Neither – But three out of four people *do* do it. Own gold, that is. And, according to the World Gold Council (Emerging Trends in Gold Demand, page10) that number – 3.5 billion at last count – is growing: last year, 700 million people turned their money into one or another form of gold. This article takes a closer look at the interest in gold as jewellery and investment.

Souk City – To satisfy such demand, enter Dubai. Which is just what Jeffrey Rhodes of Standard Bank London Limited has done (see Letter from Dubai, page 13). His new home town, which recently adopted the slogan "City of Gold", is now the world's top gold redistribution centre. And, at current rates, Dubai should import enough gold this year to equal all of South Africa's annual production. Can all former editors of the *Alchemist* look forward to such a golden future? ■

Susanne Capano, Editor

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Gold and Central Banks A Change in Attitude

by Juan Ignacio Basco, Central Bank of Argentina

The gold market is currently showing a bearish sentiment, which had started at the beginning of last year and continues up to the present. Analysts try to know for how long we are going to maintain this sentiment and to find out if there are any forces that can drive the gold price to the upside.
So it is important to summarise how the market moved during the last year, taking into account that during the first part of 1997 we have been running along a similar path.

PRINCIPAL TRENDS IN THE GOLD MARKET DURING 1996

As indicated in the Gold Fields Report

- The year was dominated by the intense interest in the future development of European official gold reserves. Fear of large-scale official sales gripped the market for much of last year and played an important part in driving down the gold price. Rumors about new sales were very important, even though on a net basis official sector sales came to "only" 239 tonnes in 1996, close to the average level of net sales for the last 10 years of 213 tonnes.
- Mine production grew at the fastest rate since 1992.
- A series of official transactions and statements ensured that any positive sentiment in the gold market would be short lived.
- In March, Belgium announced that it had completed the sale of 203 tonnes of gold "with another central bank."
- Throughout the year, discussions took place at the IMF about the possibility of selling 5% of its gold reserves in order to aid some of the most heavily indebted countries.
- The Swiss National Bank announced a change in its previously passive policy on gold.
- During the fourth quarter, the Netherlands sold 300 tonnes of its reserves, as had been announced in early January 1997.
- New York investment funds sold short heavily.
- There have been no net official purchases on a world-wide basis since 1988 and, bar hoarding, a major component of demand at the end of the 1980s, had declined by last year to only 5% of the total demand.
- On the official purchase side, two countries were prominent: China and Russia. It appears that most of these purchases were done with the objective of portfolio diversification, especially in the context of huge inflows of foreign exchange in recent years.
- The investment interest declined during the year. The sharp fall in coin and bar hoarding demand showed a clear circular relationship between the falling price and the lack of investment interest, with the perception of falling prices encouraging short selling and the resulting sale of borrowed gold pushing the price down further.
- Fabrication rose slightly.
- Producer forward sales appeared for the first time on the demand side of the equation as a result of a net year-on-year decline on forward selling positions.

In their wish to forecast future movements of the market, analysts are continuously looking at central banks. Based on past years' experiences, central banks are regarded as probable net sellers of gold.

The first issue is to recognize that they hoard too much gold and that, in this context, there are good possibilities that some of them decide to reduce their holdings.

THE SIZE OF CENTRAL BANKS' GOLD RESERVES

UBS has recently published a very interesting chart that includes the evolution of central banks' gold reserves. In general, there is a reduction from 36,289 tonnes in 1960 to 34,439 tonnes in 1996. Two groups were behind this reduction: the industrialised countries and Latin America (although the sizes of their reductions were quite different).

All other groups increased their holdings of gold reserves, especially Asia (excluding Japan, which is grouped with the industrialised group) and the Middle East. Figures on East Europe – although they show impressive growth – are very difficult to analyse, in that good information is not available for the first part of the period under study. It is important to point out the strong Multilateral Agencies' group growth.

It is easy to perceive that gold reserves are very large in some countries. If we relate these figures to the total reserves of each country, we see that in some cases the share of gold is extremely high. Nevertheless, sometimes the question is that many countries have undergone a reduction in their reserves (other than gold). As governments were not allowed – by law or in practice – to touch the gold reserves, the share of gold in the total has increased.

So, it is possible to conclude that there is not a pattern in the amount of gold hoarded by central banks in relation to neither the size of the country nor to their total reserves. On the other hand, it is not clear why central banks hoard gold – a matter that has been thoroughly discussed in our institutions.

PRINCIPAL REASONS FOR HOARDING GOLD

- Central banks hoard gold because they have traditionally done so. This is clearly a tautological argument, but sometimes seems the only one that will explain our holdings.

- In the past, gold was seen as the principal "reserve" of a central bank. This idea was quickly given up after the abandonment of the gold standard system. Modern central bank charters (including Argentina's) simply state that they should maintain their reserves in liquid instruments, regardless of whether the reserves are in gold or currencies.

- People have looked upon gold as an untouchable asset for a long time. Governments (fortunately) were not able to use gold for intervention purposes, principally because it was not liquid enough.

WHY CENTRAL BANKS HAVE STARTED TO DISREGARD GOLD HOARDING

- Gold lost its role as a means of payment.
- Hoarding gold is very expensive.
- Gold is illiquid, and therefore not available when market intervention is required.
- There are clearly other instruments offering higher returns.

IS IT CORRECT TO DISREGARD GOLD HOARDING?

- It is true that gold is no longer used as a means of payment, but central banks maintain other assets having the same characteristics.

- Hoarding gold is not more expensive than holding other assets, Central banks can open book accounts in highly rated banks and operate them as any other account in different currencies.

- Gold is now a liquid asset – provided it fulfils the LBMA standards and is located in one of the principal trading centres and/or is booked in active commercial banks. Today, it is possible to actively trade gold on a spot basis or by use of different derivatives in a very deep market. The market recently absorbed important amounts of gold while the operatives hardly perceived who was selling the metal. Although the price dropped, an intervention by any central bank selling a particular currency would have produced a similar effect on its quotation.

WHY SHOULD A CENTRAL BANK AVOID GOLD HOARDING?

The only reason to avoid hoarding gold is the possibility of finding other investments within the market that offer higher returns. Gold is not any different from other assets, and should, therefore, be treated the same as, for instance, investment in yen, pounds, or whatever. Equally, it fulfils the same purpose of diversification as any other asset.

IN THIS CONTEXT, IS IT POSSIBLE THAT A CENTRAL BANK WOULD DECIDE TO INCREASE ITS HOARDING OF GOLD?

A central bank should only decide to increase its gold reserves if and when it has a positive outlook on the gold market. Nowadays, it is extremely difficult to maintain such a perspective. Nevertheless, if central banks currently avoid using extra-economic reasons to explain why they are hoarding gold (and consequently take the decision to reduce their holdings when they have a negative view on gold), sooner or later they could consider the possibility of increasing their holdings and entering the market again.

Up to the present, the market has grown used to seeing central banks as net gold sellers. It will probably maintain this perception for some time. Nevertheless, at a certain point it becomes possible to change that perception. If central banks, taking into account the factors of production costs and overall production versus total demand – indicators sometimes easier to forecast – consider that the prevailing price is low enough, then it becomes possible for them to once more enter the market in order to increase the share of gold among their total reserves.

This view on capital gains is the counterpart of the actual view of possible capital losses. If central banks abandon the use of extra-economic reasons to hoard gold, they can similarly employ future economic prospectives to decide to invest in gold in the future. ■

Juan Ignacio Basco joined the Central Bank of Argentina in 1973, at the Research Economic Department. He was successively in charge as Deputy Manager of the Industrial Activity Economic Research Department and the Foreign Exchange and Open Market Operations Department. Since 1991, he has been Deputy Manager of the External Operations Department at the Reserve Administration area. From 1987 to 1990, he spent three years working at the Ministry of Public Affairs, participating then in different programs of privatisation of public companies (telephones, post services). His educational background includes a degree in Economics at Buenos Aires University (Argentina) and a Doctorate at Grenoble University (France). He has taught at different universities and was awarded several scholarships to complete his professional background.

A Brief History of... the Physical Gold Market in the United States

by Robert G. Arcand, Fleet National Bank

REGULATED AND DEREGULATED From 1933 to 1967, the US government controlled the ownership and supply of nearly all gold bullion in the United States. Prior to 1974, private citizens were restricted to owning gold in the form of coins with mint dates on or before 1933. This was in marked contrast to the rest of the world, where individuals were allowed to own gold in any form they chose.

When US manufacturing companies needed to purchase gold bullion, they did so directly from the government at a fixed price of $35 per ounce.

In 1967, the government began to move towards deregulating gold. It did not totally relinquish its control on the market, but decided to use a two-tier gold pricing system. It would continue to back the US dollar with gold at a fixed rate only with foreign central banks, and would no longer sell gold to manufacturing companies. The US Treasury would instead issue licenses to companies then able to sell gold to manufacturers at a free market price. This was when US bullion banks first began offering pricing and supply services to these companies. The manufacturers had been used to knowing exactly what their gold would cost them and found floating prices a worrying concept. The price fluctuations involved would hardly impress anyone today, but during that time the slightest moves raised eyebrows. Five cents difference between two PM fixings was enough to provoke concern, and a fluctuation of 10 cents between two fixings could almost result in a panic. In order to keep its hand in, the government required that these newly licensed companies fill out an "End-Use" certificate for each shipment of gold, no matter what the size. The certificate had to be completed by the buyer, stating the end use of the gold, signed and returned to the seller. Every six months, the seller was required to submit all certificates to the Treasury. Some buyers might purchase a small amount of gold every day so that, by the end of the six months, the seller could be forced to submit 120 pieces of paper for that customer alone. Eventually, the government abandoned that scheme, although five years had passed before it did so.

On 31 December 1974, the final piece of government control was removed when the ban on private ownership of gold was lifted. However, the government proved it could still control certain aspects of the market at the end of 1986 with the introduction of the Customs User Fee. The User Fee, a revenue enhancing scheme, did not exclusively apply to gold, but to all imports of value. The importer had to pay the government 0.22% of the value of the goods, which on the face of it does not seem high. Gold, however, being of high value in a relatively compact form was the ideal target for the government tax. Several trailer loads of dresses worth $1million might take all afternoon to inspect, whereas the 80 bars contained in a 1-tonne shipment – worth approximately $16 million - could be inspected in less than an hour. The resulting surcharge on imported gold amounted to approximately 90 cents an ounce, thus changing the face of movements of physical material into and out of the US. Although the charge was gradually reduced to a small flat fee a few years later, it would still be possible for the government to re-impose it at any time that it is looking to raise funds inconspicuously again.

Table 1 The Change in Net US Gold Demand

	1981 (tonnes)	1996
US Mine Production	44	329
US Fabrication Usage	150	246
Net Exporter/(Importer)	106	83

Data Source: Gold Fields Mineral Services

Mined and used

However, the US has had an ever-increasing amount of domestic gold supply. Mine production here has increased more than sevenfold in the last 15 years, bringing the US from the forth largest producer in the world to second place. It is easily seen in *Table 1* that the US has gone in that time from being a net major importer to a net major exporter of gold. Logically, supply for domestic needs should always be ample, but that does not mean that temporary shortages do not occur. A sharp decline in the price of gold may not affect US demand levels greatly in itself, the market here being more likely to respond to internal economic conditions and levels of disposable incomes, but it does effect other, more price – sensitive areas, notably Asia. This expanded external demand results in higher levels of overseas shipments than normal, and the ensuing temporary reduction in local supply can cause the premiums of some types of physical gold to increase substantially. This was the case seen last February, when the gold price touched two-and-a-half year lows and the local premium for .9999 gold – the fineness now normally used in fabrication – more than doubled at times.

Over the last 20 years, we have seen a gradual shift in the fineness of gold used in US fabrication. Whereas most gold refined and used for fabrication during the 1970s was .9995, improvements in refining techniques during the 1980s and 1990s resulted in most gold being refined to .9999 as a matter of course. The premiums that refiners were able to get for .9999 over .9995 have all but disappeared. It was also during this time that more of the manufacturers started changing their processes to accept a greater percentage of .9999 material, and now many will only take the higher purities as there is less chance of there being 'large' amounts of other trace elements contained in the metal. Also, more of the small- to mid-size companies, and even some larger ones, are now using grain (shot) as it is easier to dole out as needed and requires less melting time than the traditional 400 ounce bars.

While production has been rising, fabrication in the US has been dropping as a percentage of world fabrication during the last few decades. Although the amount of gold used in fabrication in the US has increased by over 60% from 1981 through 1996, from 150 to 245 tonnes, the US share of world-wide fabrication demand has dropped from 12.5% in 1981, to 7.5% in 1996. *Table 2* reflects the changes in percentages of gold in various uses in the US against the rest of the world in 1996, as compared to 1981.

Table 2 % of Gold Used in Fabrication by Category

Category	1981			1986		
	US	Other Developed Countries	World	US	Other Developed Countries	World
Jewellery	42.7	54.5	64	62.1	75.2	85.3
Electronics	23.7	9.0	7.6	20.8	11.3	6.3
Dental	8.2	8.3	5.4	4.7	4.9	2.1
Other Industrial & Decorative	19.9	4.5	5.1	8.0	4.6	3.4
Coins (Official & Imitation)	5.5	23.7	17.9	4.4	4.0	2.9

Data Source: Gold Fields Mineral Services

Although over 60% of the gold fabrication demand in the US is now in jewellery production, it is still a smaller percentage than in the rest of the world. The US remains, however, the world's second largest consumer of gold jewellery (GFMS 1996 estimated demand: 317 tonnes) by importing almost as much jewellery as it fabricates. Dental use and coinage are currently running about the same for the US as the rest of the world, but the US produces a far greater share of its fabrication in electronics and other industrial uses than do even other developed countries. Since electronics and other industrial manufacturers have less tolerance for impurities than most other types of fabricators, they usually demand higher purities of gold and more accountability for the impurities.

Future stock

High-tech firms are beginning to inquire more about the availability of .99995 material, and it appears that this will become more in demand as the applications become ever more sensitive to impurities. Currently .99995 material carries a hefty price premium, but it should be only a matter of time before refiners start routinely turning out material in these higher purities for decreasing premiums to try to maximize their income from operations.

Another development that has become more in vogue with

many companies in the US is the 'voluntary' compliance with the ISO series of standards (3000, 9000, 9002, etc.) as regulated by the International Organisation for Standardisation. These standards, mostly used in Europe, are a registration process where a company's procedures are documented and reviewed, and audits made to ensure compliance with these procedures, and that they comply with certain requirements. The number of electronic, dental, jewellery and other manufacturers that are complying with these, and are requesting such certification of the metal they receive, is growing rapidly. Although the fineness of the gold bullion is the major concern of these standards at this time, the make-up of the impurities will become more important. Within a few years, refiners will probably have to furnish documents certifying that they are ISO compliant with each shipment of metal that they make. Thus, there will be more demands put on refiners and intermediaries to continually upgrade the products being offered to the end users. ■

Fleet Precious Metals Inc. is a subsidiary of Fleet National Bank (formerly known as Industrial National Bank of RI) which is one of the oldest banks in the US, and is part of the Fleet Financial Group, currently the 11th largest banking group in the US. Fleet was one of the first companies to get a Treasury license to deal in gold and entered the precious metals business in late 1974. Since then, Fleet Precious Metals has grown into one of the largest lenders of precious metals to the end users (jewellery, electronics, dental, refining and other manufacturing) in the US, and offers all the financial products that are necessary for these companies to hedge their precious metals needs. Currently, Fleet offers these services in gold, silver, platinum, palladium and copper, and has over 50 people who are dedicated to helping companies in the metals industry.

Robert G. Arcand joined Fleet in 1982 as Head of the Operations Section in the Precious Metals Group. He moved into the trading area in 1984 and has been Chief Dealer for Fleet Precious Metals since 1992. Bob started working with precious metals in 1970 in the vault at another major bullion bank and moved up through the ranks to manage the precious metals operations before entering the trading area there. He has presented a paper for the IPMI and has been both Secretary and President of the New England Chapter of the IPMI and has served on its Board for 13 years.

LBMA Seminar

Dealers dream or dealers nightmare?

by Susanne Capano

On 5 March, the Swiss announced an intended revaluation and sale of their gold reserves. Not long thereafter, German Finance Minister Theo Waigel announced similar plans for the Bundesbank's gold reserves.

These days, when two European countries agree on anything, it's time to pay attention. When the two countries in question are Germany and Switzerland – and when the agreement concerns fiscal policy – it's time to call in the experts.

Which is just what the LBMA did when, during Platinum Week, it held a seminar focusing on two major issues facing the gold market:

•What will central banks do with their gold reserves?

•What might be the effect on gold if the stock market were to finally undergo a correction?

And, what if central banks should decide to sell, and this action coincided with a stock market collapse? Would it be a dealers dream or a dealers nightmare?

Before introducing the seminar's speakers, outgoing LBMA Chairman Alan Baker put the questions in immediate perspective by offering one of the more succinct market analyses: nothing goes up forever.

It was then left to Ian Lamont, economist with Yorkton Securities, speaking on the possibility of a long-overdue stock market correction, and Robert Pringle of the World Gold Council, who addressed the question of central bank gold reserves. to sort out what might and might not happen. Mr Pringle, head of the public policy centre of the World Gold Council, pointed out that, while the economic climate for gold was hardly favourable, some of the pessimism overhanging the market regarding central bank gold sales was perhaps overdone. In addressing the overall issue of what central banks might do with their gold reserves in the years to come, he examined the recent events in Switzerland and Germany.

In his view, the Swiss National Bank's recent announcement that it was taking a fresh look at how it values its gold reserves should be seen as part of its general review and modernisation of reserve management functions. The conclusion that it came to regarding gold at this stage is that it ought to amend its legislation to enable the lending of a portion of its reserves.

Quite apart from these discussions in all but timing, a proposal was made to fund a Solidarity Fund from a transfer of gold – a crisis response to foreign criticism, and one which drew a storm of internal protest.

Across the border in Germany, Finance Minister Waigel's proposal that his country should revalue its gold reserves merely parallels moves already taken by most other EU central banks. Of course, that did not save it from attracting much controversy and criticism as well. Developments since then have amply confirmed this, with the Bundesbank declaring its firm opposition to the government's proposal.

Pringle concluded by outlining positive reasons why a central bank would hold gold reserves:

1. Gold provides a means of diversifying portfolios, a factor which will grow in importance if EMU goes ahead, as monetary union would effectively narrow the choice of reserve assets.

2. It provides long-term value maintenance and a multigenerational time horizon.

3. It is an asset that is not the liability of any other country – another motive that could become more powerful after 1999, when the dollar will stand out ever more as a reserve currency.

4. Because gold reserves are so sensitive, it is difficult for any one political group to use them without being noticed, unlike currency reserves. What the popular opposition against the recent Swiss and German proposals reveals is that at least in these continental countries, the public needs to be convinced that the reasons behind any gold mobilisation are sufficiently serious before it accepts the moves.

Ian Lamont then took the self-professed minority view concerning the stock market – that it was overvalued, and ripe for a correction. Before addressing the question of whether or not gold and/or gold equities would provide a hedge under such a scenario, he first established the reasons why he thought the market was overvalued, and what might be the trigger for a downfall. He pointed to a number of measures trading at historic highs or lows which showed how overinflated the stock market had become. Among them:

• the dividend yield on the Dow Jones Industrial Average, at only 1.7%, is the lowest this century;

• the Dow is selling at almost 550% of its book value;

• the number of mutual funds, of registered stock and bond salesmen, of hedge funds and investment clubs are all at record levels.

What could cause the bubble to break? Lamont looked at the influence of the yen carry trade. Due to low domestic interest rates, money has been flowing out of Japan in search of higher yields elsewhere, principally into the US bond market. This has, until recently, contributed to a weakening yen and a strengthening dollar – and has enabled the US to fund its deficits with lower interest rates. Lately, however, the dollar has experienced a correction, due possibly to a perception that Japan's economy is recovering and interest rates there may begin to rise. Should the yen carry trade reverse, this would cause money to flow out of the bond market, causing interest rates to rise. Secondly, it would weaken the dollar, causing inflation to rise in a rapidly growing economy.

Lamont then focused his attention on determining if gold or gold shares would provide a good hedge under that scenario. Gold massively outperformed the Dow during the 1970s, but since 1982, Wall Street has experienced a great bull market and, with one brief exception, has well outpaced gold. That exception was the 1987 crash, after which time the gold price rose, eventually managing to climb above $500 before year end.

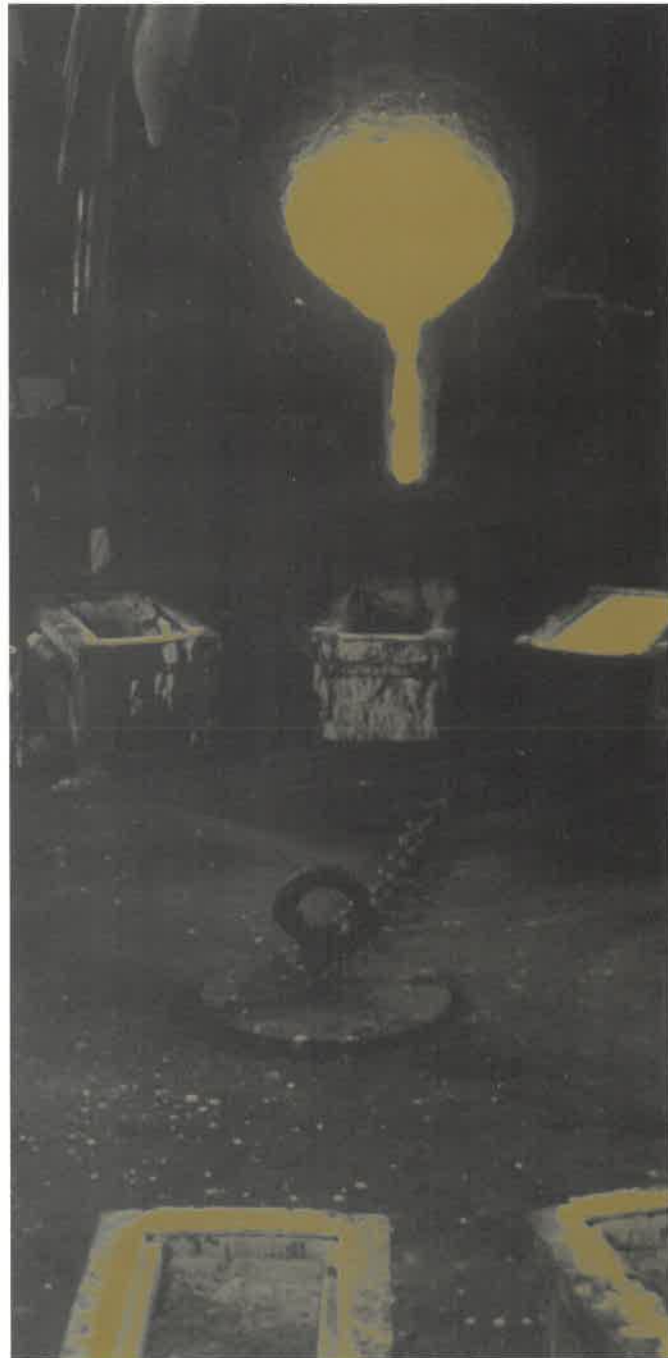
Bottom line: if the stock market experiences a sharp correction...due to rising inflation and interest rates...under that scenario, according to Lamont, "gold will provide an effective – and indeed perhaps the only – hedge against a tumbling dollar and stock market."

But then, there's an old saying – related by Lamont himself – that God only created economists to make weathermen look good.

The Art and Science of Silver Refining

An Interview with Barry Wayne, President & CEO, Handy & Harman Refining Group Inc.

Handy & Harman Refining Group Inc. is a new company with a legacy of over 100 years in the precious metals industry. What are the company's origins?



Handy & Harman was formed in 1867, originally as a partnership between Mr. Parker Handy and Mr. John F. Harman. They fabricated silver and gold alloys, such as sterling silver and carat gold for the arts industries – silversmithing, sterling silver ornaments for saddles and, of course, jewellery manufacture. As time went on, they began processing the scrap they generated, and realised they had a business opportunity in marketing precious metals refining services, as well as alloys and products. They developed various carat gold alloys and some brazing alloys which were used in the war effort. The Company went public in 1967 on the NYSE.

What led to the formation of Handy & Harman Refining Group Inc?

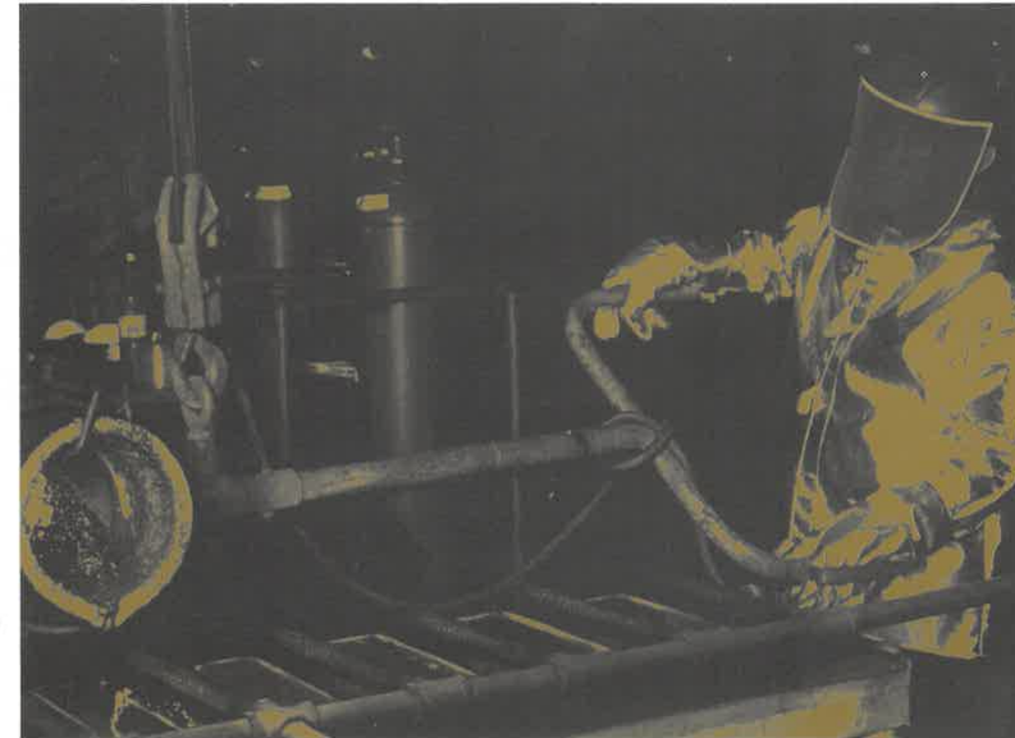
Starting in the 1960s the Company began a diversification program. It expanded into a variety of businesses – automotive, stainless steel, wire, tubing and electronic materials. This was followed by a divestiture of most of its precious metal activities in the 1990s, leading to the closure of the platinum refinery, as well as the gold and platinum fabrication plants. The Refining Division was sold to an Australian publicly-owned company, Golden West Refining Corporation Ltd., in 1996. The new entity, Handy & Harman Refining Group Inc. (HHRG), has refining operations in the US in Connecticut, Massachusetts, Illinois and Arizona. The parent company, Golden West, has operations in Australia and Papua New Guinea.
A refinery in Canada has now been transferred to HHRG.

If not the largest worldwide refiner of silver, HHRG/Golden West certainly ranks among the top. We have an annual output of 60,000,000 ounces of silver – and growing. Additionally, the Group has capacity to refine over 8,000,000 ounces of gold, as well as platinum group metals.

What are some of the main sources of silver and gold today?

Our primary source of feed metal is, of course, mined ore. Reclaimed, or secondary, silver comes from a variety of sources: primarily photographic scrap, followed by industrial and electronic scrap, such as circuit boards, silver contacts and grazing alloys, scrap from the arts industries, and recovery from US and foreign coins.

Gold comes from primary mine sources as well as industrial, electronic and jewellery scrap – most of the primary silver, doré, that we refine contains recoverable gold.



How is the metal actually reclaimed?

The process used to reclaim and refine silver is a function of the type of feed material. The primary process has two stages, involving pyrometalurgy (which is the use of heat and fluxes to refine and upgrade) and electrochemistry. The pyrometallurgical process upgrades the silver content to approximately 98% and the electrochemical process produces 99.99% pure silver. In addition, several specialised chemical processes may be used.

What forms can the refined silver take?

The process results in crystals of pure metallic silver. The crystal can be sold as is, it can be melted into bars, most commonly of 1,000 ounces, it can also be cast into grain, small spheres of approximately 1/4 to 3/8 inches in diameter. To form grain, molten silver is poured into a ceramic or graphite box with holes drilled in it. From there, it flows into a large vat of chilled water. When it hits the water small pellets are formed. After the grain is dried the very fine and very large pieces – normally only about 1% of the total – are screened out, and the balance of the grain is ready for sale.

What different forms of processed silver appeal to different end users?

The 1,000 ounce bars are good delivery material, accepted by exchanges and depositories in the United States, Europe and the Far East, and are the form preferred by investors. There is growing industrial interest in the use of grain for some applications, and crystal for others, as both allow the precious measure of small amounts of silver. Crystal is used as the catalyst for the manufacture of formaldehyde. The spherical shape of silver grain enhances its ability to flow, making it ideal for automated processes. It is also easier to handle than the more irregularly shaped crystal.

What are some of the challenges facing the refining industry today?

Some of the challenges facing the industry are common to many businesses today, notably the issue of providing customers with highest quality service, while maintaining competitive pricing. In many ways, the refining of precious metals is a unique industry: we are dealing with raw materials which ultimately are refined into financial commodities. In order to maximise available opportunities, these products need to be marketed on a global basis to meet constantly shifting world demand in very different market centres.
In addition, refiners today are faced with handling new combinations of materials, never seen before in nature, that need to be handled using processes that grow ever more complex. These processes must comply with environmental regulations and concerns.

How can some of these challenges be met?

On environmental issues, HHRG has taken a very proactive role. We have on staff engineers capable of ensuring compliance with existing and anticipated regulations. We also have a staff member who participates with government agencies to develop effective and responsible regulations for the industry. This individual was the representative for the International Precious Metals Institute for the Basel Convention, which covers the trans-boundary movement of waste materials. By taking a leadership role, we can provide our customers with information on the latest environmental regulations followed by a complete and environmentally safe service.

There is a growing need for expertise in developing economies which were once centrally planned and are now moving towards market systems. As laws become more liberalised, new opportunities in precious metals mining and reclamation are constantly opening up. We monitor exploration and mining developments in Central Europe, South America and other regions. In many cases, we undertake technology transfer programs – forming "partnerships" for refining that provide the opportunity to develop ongoing relationships.

To see how far HHRG has come, it is interesting to make a quantitative comparison between our capacity 20 years ago and today. In 1977, we refined between 5 and 6 million ounces of silver. Last year, that amount stood at 60 million. During the same period, our gold refining more than tripled. Looking toward the not too distant future, within the next several months, we will have the capacity to handle over 70 million ounces of silver and close to 10 million ounces of gold – ensuring our continued place as one of the world's top refiners. ■

Emerging Trends in Gold Demand *by George Milling-Stanley*

Manager, Gold Market Analysis, World Gold Council.

About three and a half billion people — roughly three-quarters of the entire world population — own some gold, in one form or another. Last year alone, an estimated 700 million people around the world bought gold. That represents one in seven of the world's population. What this article will do is examine what lies behind those numbers, in terms of facts and feelings, and take an in-depth look at developments in a few interesting regions during 1996 and the first quarter of 1997, as well as offer a glimpse into the future.

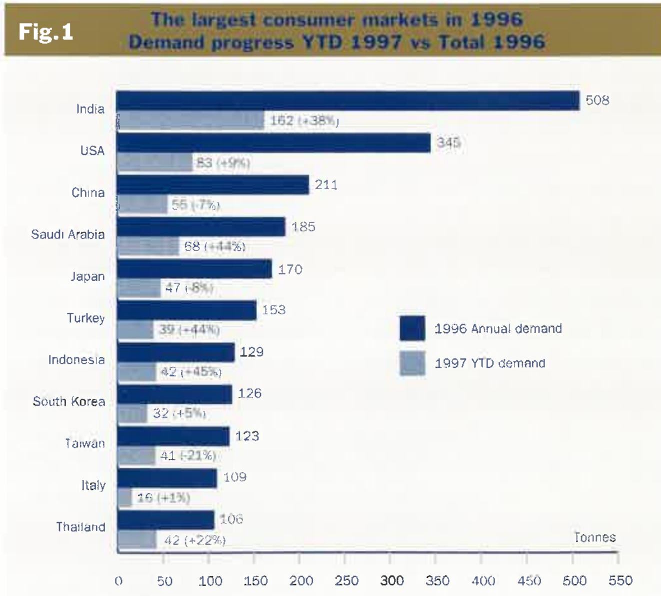
OVERALL GOLD DEMAND

Total gold demand in the markets served by the World Gold Council during 1996 was slightly below the record level of 2,795.7 tonnes set in 1995, as investment demand returned to more normal levels after an exceptional performance the year before. However, the demand for gold jewellery during 1996 reached an annual record high.

The first quarter of 1997 proved a truly outstanding one for gold demand by several measures. Demand in the markets served by the World Gold Council reached the highest level ever seen for any quarter on record. The year-on-year increase of 17% was one of the largest ever recorded, thanks to increases in both jewellery and investment demand, which posted a 20% increase after four consecutive quarters of decline.

Further, the growth in demand was not confined to one or two centres but was broad-based, encompassing a number of regions.

Fig.1 The largest consumer markets in 1996 Demand progress YTD 1997 vs Total 1996



This increase becomes all the more remarkable when it is noted that, in some areas, the gold price measured in local currency did not decline as the dollar-based price did, meaning that the increase could not be exclusively attributed to "bargain-hunting". The Market Weighted Gold Price Index, shown in Figure 2, compares how a basket of various local currency gold prices in key consumption markets has moved relative to the US$ gold price. The index starts at 100 at the end of 1995 and weights the local currency price in WGC monitored markets by each country's share of demand. While the gold price in dollar terms gradually slipped from its February 1996 peak of $414.80, the Market Weighted Index continued to rise throughout 1996. It dipped marginally in Q1 1997 but remains significantly above the US$ price index, indicating that local gold prices in many markets have remained relatively high, despite a decline in the US$ gold price.

Highlights of developing markets

During 1996, full-year demand in the developing markets rose 1% to a new annual record of 1,825 tonnes, the second year in which demand held relatively steady. The first quarter of 1997 showed a much more dramatic rate of growth as overall demand jumped 22% from the first quarter of 1996, to a total of 586.8 tonnes, the most seen so far in any one quarter. India, South East Asia, South Korea, Turkey, Saudi Arabia and the Gulf States all posted strong gains. Following is a closer look at what influences drove the developments in some of these countries.

India, the largest consumer of gold in the world, achieved a new annual record during 1996, and demand continued to expand there in the first quarter of 1997. The gold price fell in rupee terms and last year's improved economic environment carried over into the wedding and festival season in January and February. The result was a 38% increase over the previous year's first quarter to 161.7 tonnes, breaking the previous quarterly record seen at the beginning of 1993.

India has been gradually liberalising the trade in gold for several years now by starting to lift the severe restrictions that had been in place since the country gained its independence from British rule 50 years ago, a process which accelerated following the WGC-sponsored Delhi Gold Economic Conference in November 1996. Import allowances for non-resident Indians, the primary source of supply, have doubled, and a more liberal policy on gold imports for the jewellery export trade is in place for the period from 1997 to 2002. Further reform is on the way.

Gold demand in China remains soft, showing a small decline during 1996 and falling 7% during the first quarter of 1997. While overall retail sales in China have risen this year so far, gold jewellery lags behind, still held back by the fact that gold can only be sold officially by state-owned retailers, of which there are only about 8,000 in the whole country. This equates to one per 150,000 people, compared with Hong Kong at one store per 7,000 inhabitants, Taiwan at one per 6,000 and India at one per 4,000. The People's Bank of China reduced the domestic gold price with effect from the beginning of the year, but the lower prices have not yet had a positive impact on demand.

Demand in the Gulf States increased by 17% during the first quarter of 1997, with good gains in both jewellery and investment. In the United Arab Emirates, demand was stimulated by a combination of good buying at the close of Ramadan, lower gold prices, and the start of the Dubai Shopping Festival 1997, an annual event.

A campaign run during the festival promoted Dubai as the "City of Gold", a slogan which could be found on everything from bumper stickers to balloons. The local jewellery traders sponsored an

Fig.2 INDEXED GOLD PRICES Index numbers, end December 1995 = 100

unusual – and highly successful – gold raffle. Every visitor to the month long festival who spent a minimum of 500 dirhams (about $130) on gold jewellery received a ticket for a daily raffle, the prize of which was 1 kilogram of gold. At the end of the month, all the tickets sold – weighing half a tonne – were put into a special drum for the final drawing of a prize of 10 kilos.

Highlights of developed markets

Gold demand in developed markets remained relatively flat during the first quarter of 1997, rising only 2% from the previous year. Jewellery consumption in the US grew for the sixth consecutive year, and investment demand there for bullion coins moved sharply higher, largely in response to the lower gold price. However, those gains were offset by the situation in Japan, where gold investment demand recovered somewhat from the weak 1996 levels, but jewellery consumption continues weak, coming under increased pressure from gem-set and platinum items.

Trends in gold demand - the impact of jewellery consumption

This section takes a look at the world of gold from the consumer perspective – which factors motivated those 700 million people who bought gold last year. The World Gold Council conducts annual research surveys, alternating each year between developed and developing markets to determine "who buys what, when, where and why".

Turning to developing markets first, conventional wisdom has it that these are price-driven, two-way markets for gold, and that the real motivation lying behind consumer purchases is essentially a financial one, with consumers wanting to "buy low, sell high".

Our research tells another story. For a start, 90 % of consumer demand for physical gold in the developing markets is in the form of jewellery, with bars and coins accounting for only around 10 %.

The primary motivating factor for a consumer purchasing jewellery is one of adornment: two thirds of consumers in the developing world agree with the statement that "gold jewellery is an important part of a woman's total look", while less than half agree that "gold jewellery's investment potential is more important than its beauty."

Turning now to developed markets, the consumer research shows that gold jewellery purchases are almost exclusively by or for women – and are, of course, linked to adornment, with gold seen as a relatively accessible luxury. Two-thirds of all women in developed markets claim to "love real gold jewellery" and say they wear it for their own personal pleasure. Fully one third of all American women agree with the statement, " I never feel properly dressed unless I am wearing my gold jewellery." In addition, they agree that it has sentimental value and brings back personal memories. Needless to say, with attitudes like that, the selling back of gold jewellery is not an issue.

Furthermore, in developed markets, our research shows that there is a certain degree of gold "addiction": women who already own the most gold continue purchasing more items of increasing value. In the case of the United States, there are about 25 million such gold-addicted women. Three quarters of them bought gold last year, and almost half of them purchased on impulse. And while most of these women are., as expected. older, middle class, professional, educated women with comfortable lifestyles, there are another 11 million younger women looking set to follow.

With all of these factors in mind, I am confident that the demand for gold jewellery – accounting for four-fifths of all demand – will continue to grow. During the 1990s, while mine production has grown by an average annual rate of 1.3%, jewellery consumption has expanded by an average annual rate of around 4%. I believe the developing markets will go on setting the pace, but that many of the developed markets will not be far behind. ■

Letter from Dubai

by Jeffrey Rhodes, General Manager, Standard Bank London Limited Dubai

Well, at last we have opened our office in Dubai! On Wednesday, 23 April 1997, our solicitors in Dubai received a fax from the Central Bank of the United Arab Emirates which confirmed that as Standard Bank London Ltd. had "undertaken to comply in each and every aspect with the contents of Union Law No. (10) of 1980 concerning the Central Bank, the Monetary System and Organisation of Banking, and Board of Directors Resolution No. 57/3/96 issued on 14/4/96 regarding regulation for representative offices, is hereby licensed to operate a representative office in the United Arab Emirates..."

Thus the long process of opening our Rep Office in the Middle East had finally come to a successful conclusion and we send our sincere thanks to the officials of the Central Bank of the UAE and the Dubai authorities for their help in turning our dream into reality.

Dubai is certainly one of the world's leading centres for trading of all kinds and, in the first quarter in 1997, Dubai became the world's number one physical gold re-distribution centre, importing over 102 tonnes of the yellow metal in January/February, some 10% higher than the former number one, Singapore, which took in 92 tonnes. Dubai, in fact, adopted as its slogan "Dubai, City of Gold" during the famous month-long shopping festival which spanned much of March and April. At the current rate of offtake, Dubai is set to import in excess of 400 tonnes this year. Indeed, some pundits even suggest a figure as high as 500 tonnes, which is virtually the same as South Africa's annual gold production.

I arrived in Dubai on February 6th, borrowed some furniture from the local agents we had appointed to do the office fit-out, and set about establishing SBL's Dubai office. This was when the fun really started... Give me a 1-tonne gold position $5 out of the market any day!

The painters arrived, all six of them. I left them to it only to find on my return that they had painted the walls the wrong colour. OK, what's wrong with white, although we had asked for light grey? Then the carpet was laid. It was very nice except for the fact that it appeared to have four or five shades of the same colour. A new batch was ordered which arrived six weeks later... same problem. Arrgghh! Don't worry, they said, we have another style, and in fact this was much nicer and all the. same shade. Great, at last it was laid and all was well. Mmmm. This was Thursday, 27 March. On Saturday 29 March, the biggest rain storm in Dubai's history descended on the town, washing out the famous Dubai horse racing World Cup and, you have guessed it, flooding our office, soaking our new carpet!

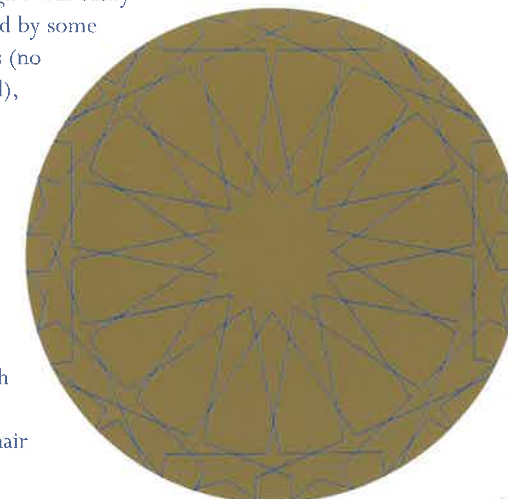
Anyway, back to gold. Since 1987, Dubai gold imports have risen from 149 tonnes, being 6.6% of total world demand, to 350 tonnes in 1996, or 10% of total demand. Some key factors behind this growth are: the historical reputation of Dubai as the 'city of merchants' who maximise trading volume by minimising profit margins and Dubai's strategic location as the gateway to the important gold markets of the Indian sub-continent – Saudi Arabia, the other Gulf States, Turkey, Egypt and Asia, as well as the rapid growth of Dubai as a tourist centre which has boosted local jewellery sales.

Some estimates suggest that up to 80% of Dubai gold bullion imports are re-exported; the effect of liberalisation of gold in India and Pakistan. In 1992, non-resident Indians were allowed to bring in 5kgs of gold. In January 1997, this was increased to 10kgs every six months.

The growing importance of Dubai as one of the world's major gold centres was underlined by a successful international gold conference that was held on 26 and 27 April 1997. I was pleased to be asked to participate in the event although I was easily overshadowed by some heavyweights (no pun intended), such as Ted Arnold of Merill Lynch and George Milling-Stanley of the World Gold Council, with the latter helping to chair the two-day conference. There were other eminent speakers from the Dubai Chamber of Commerce, the Indian Centre for Economic Advice, the Turkish Chamber of Jewellers, CRU International of the UK, Goldman Sachs J.Aron UK, International Mining Research of Australia, Johnson Matthey, Scotia Macleod USA, Standard Bank of South Africa and Swiss Precious Metals Control.

The attendance was good for this first event of its kind in Dubai, with a number of delegates from the LBMA. I understand that the conference is likely to be repeated in the spring of 1998 and I would certainly recommend a visit here to sample the business, sporting and social attractions of Dubai "City of Gold".

I look forward to receiving visits from all my friends in the LBMA and the international bullion market, but in the meantime, I guess it's back to the Emirates Golf Club. Only joking Mr Prinsloo! ■



Annual General Meeting

The LBMA's AGM was held on Wednesday 4 June at the office of Deutsche Morgan Grenfell

The new Management Committee was voted in as follows:

Robert Ashley - N M Rothschild & Sons Limited
Jeremy Charles - Republic National Bank of New York
Peter Fava - Midland Bank Plc

Martin Fraenkel - Chase Manhattan Bank
Martin Stokes - Morgan Guaranty Trust Company of New York

James Dobell - Sumitomo Corporation (UK) Plc
Colin Griffith - Standard Bank London Limited

After the formal proceedings the new Committee unanimously appointed Peter Fava as the new Chairman and Martin Stokes to continue as Vice-Chairman.

The out-going Chairman, Alan Baker, paid tribute to his colleagues on the old Committee and thanked them for their support. He sounded a note of caution over the changing climate for greater regulation. He said: "The London Bullion Market has thrived as a result of the co-operation with – and support received from – our regulator, the Bank of England. It is essential for the continuing competitiveness of London, that – whatever changes are to come – they are introduced and implemented in the same spirit of co-operation, understanding and commitment – nothing must be allowed to blunt London's edge."

Reciprocating Martin Stokes eulogized Alan Baker's dedication (apart perhaps from his powers of delegation) during his 3-year tenure of the Chairmanship and presented him with a handsome silver tray suitably engraved to remind him of the chalice, poisoned or otherwise, that he was now handing on to his successor.

Chairman's message

I feel very honoured to take over the chairmanship of the LBMA from Alan Baker. Alan was Chairman for the last three years at a time of significant change within the LBMA. This included the appointment of a Chief Executive, Chris Elston. Chris will now become an even more significant member of the LBMA team, as I will not be able to allocate as much time to the role as did Alan.

The Management Committee has endeavoured to increase the involvement of the membership. Prior to the AGM, we encouraged others to stand for places on the Committee and this resulted in a vote in the category of either class of Member. Regrettably, someone had to stand down, so I would like to thank John Fairley of Johnson Matthey for his many years of service to the LBMA. I welcome James Dobell of Sumitomo Corp (UK) PLC who replaces him and Jeremy Charles of Republic National Bank of New York, who replaces Alan Baker.

The Management Committee started a review of the constitution this year. This is proving both taxing and enlightening as we struggle to modernise the LBMA without hindering the future development of the market. The Committee realises that Market-Makers are central to London's role as the leading bullion market. They have a very difficult job but the quoting of spot, forwards and options is essential to our maintaining that position. We, therefore, seek to promote market-making status as a distinct category from ordinary membership so as to ensure the continuance of London's position.

We propose to modernise some of the less visible activities of the LBMA. The Physical Committee is seeking ways of making the clearing electronic. It is hoped the system, once established, will be enhanced to handle currency transfers and confirmations.

We also look forward to a new supervisor with mixed feelings. Our close relationship with the Bank of England came from the very early days of the gold and silver markets when the coinage of the day was made of these two metals. This relationship has guided us to a position of strength and is the main reason that London is the world clearing centre for bullion. We thank the Bank for its past support and look forward to working with the SIB in the future. Finally, I would like to thank Alan Baker, on behalf of everyone, for all his hard work as Chairman over the last three years, and also to thank Deutsche Bank for allowing him the time to participate in the LBMA ■

Members of the London Bullion Market Association

Market Making Members

As at 1 June 1997

Member	Telephone
AIG International Limited	(0171) 709 2500
J Aron & Company (Bullion)	(0171) 774 1000
Barclays Bank PLC	(0171) 621 5330
The Chase Manhattan Bank	(0171) 777 2000
Credit Suisse First Boston, London Branch	(0171) 888 8000,
Deutsche Morgan Grenfell	(0171) 971 7000
Midland Bank PLC	(0171) 336 2000
Morgan Guaranty Trust Co of New York	(0171) 600 2300
N M Rothschild & Sons Limited	(0171) 280 5000
Republic National Bank of New York	(0171) 621 7800
Standard Chartered Bank- The Mocatta Group	(0171) 638 3636
Union Bank of Switzerland	(0171) 901 3333

Ordinary Members

As at 1 June 1997

Member	Telephone
Amalgamated Metal Trading Limited	(0171) 626 4521,
Bankers Trust Company	(0171) 982 2500
Bank of America National Trust and Savings Association London Branch	(0171) 634 4887
Bank of China	(0171) 282 8888
The Bank of Nova Scotia	(0171) 638 5644
Barclays Physical Trading Limited	(0171) 283 6362
Bayerische Vereinsbank Aktiengesellschaft	(0171) 626 1301
Billiton Metals Limited	(0171) 860 8250
Brambles Security Services U.K. Limited	(0171) 426 4500
Brink's Limited	(0171) 247 9481
Canadian Imperial Bank of Commerce	(0171) 234 6000
Citibank N A	(0171) 438 1000
Commerzbank Aktiengesellschaft	(0171) 570 0470
Cookson Precious Metals Limited	(0121) 200 2120
Credit Lyonnais Rouse Limited	(0171) 374 6100
Degussa Limited	(01625) 504900
Derek Pobjoy International Limited	(0181) 641 0370
Dresdner Bank AG	(0171) 606 7030
Engelhard-Clal UK Limited	(0181) 974 3077
Engelhard Metals Limited	(0171) 588 4080
First National Bank of Boston, London Branch	(0171) 799 3333
Fleet National Bank	(0171) 248 9531
Gerald Limited	(0171) 867 9400
GNI Limited	(0171) 337 3500
Itochu (UK) PLC	(0171) 822 0822
Johnson Matthey PLC	(0171) 269 8000
Jordan International Bank PLC	(0171) 493 7528
Kanematsu (UK) Ltd	(0171) 628 7901
Lehman Brothers International Europe	(0171) 601 0011
E D & F MAN International Limited	(0171) 285 3000
Marubeni UK PLC	(0171) 826 8600
Merrill Lynch Pierce, Fenner & Smith (Brokers and Dealers) Limited	(0171) 628 1000
Metallgesellschaft Limited	(0171) 488 2244
Mitsubishi Corporation (UK) PLC	(0171) 822 0022
Mitsui & Co UK PLC	(0171) 822 0321
Morgan Stanley International	(0171) 513 8000
Moscow Narodny Bank Limited	(0171) 623 2066
Nissho Iwai (Europe) PLC	(0171) 628 6030
Phibro Bullion, Division of Phibro Futures and Metal Limited	(0171) 721 4000
Prudential-Bache (Futures) limited	(0171) 283-9166
Royal Bank of Canada	(00171) 489 1188
Royal Mint	(01443) 222111
Rudolf Wolff & Co Limited	(0171) 836 1536
Société Générale	(0171) 762 4003
Sogemin Metals Limited	(0171) 410 4950
Standard Bank London Limited	(0171) 815 4130
Sucden (UK) Limited	(0171) 940 9400
Sumitomo Corporation (UK) PLC	(0171) 246 3600
Swiss Bank Corporation	(0171) 329 0329
Tomen (UK) PLC	(0171) 321 6600
Triland Metals Limited	(0171) 236 4382

LBMA News

by Chris Elston, Chief Executive, LBMA

Annual General Meeting The LBMA's AGM was held on Wednesday 4 June at the office of Deutsche Morgan Grenfell (see page 14 for details).

Membership With effect from 30 June 1997 Philbro Bullion Limited are to relinquish their Market-Making Membership in favour of Ordinary Membership in the name of Phibro Bullion, Division of Phibro Futures and Metal Limited.

The name of Barclays Metals Limited (Ordinary Member) changed to Barclays Physical Trading Limited, with effect from 1 May 1997.

The address of Rudolf Wolff and Co Limited (Ordinary Member) changed to: 80 Cheapside, London EC2V 6EE with effect from 26 May 1997, (Telephone 0171 836 1536, Fax 0171 579 1234).

Good Delivery Lists Changes

Gold: Kazakstan – Ust-Kamenogorsk Lead-Zinc Combinat Joint Stock Company: name changed to Kazzinc Opened Joint Stock Company with effect from May 1997.

Silver: Spain – Sociédad Minera y Metalurgica de Peñarroya – España S.A: transferred to Former List with effect from 12 May 1997.

LBMA Annual Golf Day

The Annual Golf Day was held in hot and sunny conditions on Friday 30 May at Brickendon Grange Golf and Country Club near Hertford. Nineteen players took part and, as last year, the day was generously subsidised by Mitsui & Co UK plc and Sumitomo Corporation (UK) ,plc, to whom we are greatly indebted. The course was in superb condition and the Club made us very welcome – our thanks to them.

In the morning, the Stableford Competition for the Jack Spall Trophy was won by David Spraggs of Morgan Guaranty with 37 points, followed by Mike Oliffe-Lee and Chris Elston, both on 35 points. These scores, however, were put in the shade by the winner of the Guest Prize, Paul Taylor, with 40 points.

In the afternoon, Texas Scramble, the LBMA Team Trophy, kindly donated by TFS, was won by Nick Alderman, Bob Ewers, Roy McPherson and David Spraggs with a massively impressive total of over 60 points, streets ahead of the competition.

John Coley of Mitsui & Co UK plc., ably assisted by Stella Thompson of the Executive, did their usual excellent job of organisation and our thanks are due to both of them.
It was a perfect day in all respects. The one disappointment perhaps was the relatively low turn-out, caused no doubt by modern-day pressures of work and other commitments in the schools' half-term week.

John Coley has taken note of this clash of events and has already opted for Thursday 14 May 1998 at Clandon Regis in Surrey for next year's Golf Day. The compiler of these notes can only stress what a great day out it was and urge more golfers among the membership to give a high priority to joining next year's event.

People Commiserations to Robert Guy who failed to hang on to Hove for the Conservatives in the General Election on 1 May. The Tories had a swing against them of over 16%. If it is any consolation to Robert, he was not alone in his predicament.

Congratulations to Neil Newitt on completing a 250-mile bicycle ride over five days in Israel and Jordan, braving heat, hills (mostly up) and heavy trucks to raise over £25,000 for Oxfam projects in those countries. Neil was one of a group of 36 people from England, Scotland and Ireland (and one gentleman from Kyoto, Japan, who had learnt of the ride over the Internet and flew over with his bike at his own expense to participate). Starting from the Sea of Galilee, taking in the Dead Sea and finishing in Jerusalem (2,500 feet above sea level), Neil writes that he ended up emotionally and physically exhausted, but obviously exhilarated at his achievement.

Neil is currently an independent consultant. He started in the bullion market in 1968 with Sharps Pixley, when gold was still $35 an ounce and a Krugerrand about £17. ■

DIARY OF EVENTS

10 July 1997
Southern Africa: Resources, Investment & Trade. Organised by Forum Southern Africa. Gladstone Library, One Whitehall Place, London.

1-3 September 1997
World Gold '97 Conference. The Australian Institute of Mining and Metallurgy. Shangri-la Hotel, Singapore.

17-19 September 1997
3rd European Precious Metals Conference. Eurometaux. Sheraton Firenze Hotel, Florence, Italy.

18 September 1997
Platinum Group Metals Seminar, Metal Bulletin, Hotel Inter-Continental, New York.

Week beginning 6 October 1997
LME Week

7 October 1997
LME Annual Dinner

23-25 November 1997
IV International Gold Symposium in Venezuela, Venezuelan Gold Association, Hotel Caracas Hilton.

"UNFORTUNATELY IT TURNED OUT TO BE NOT EVEN GILT-EDGED"

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London EC2R 8BT
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