

## “Platinum 2010”

Johnson Matthey’s latest market survey of the platinum group metals (pgms), “Platinum 2010”, was published on 17th May 2010. It covers supply and demand for the calendar year 2009, together with a short-term outlook on the status of the pgm market and pgm prices into 2010.

### Platinum

#### Platinum Market in Surplus in 2009

The platinum market was in surplus by 285,000 oz in 2009. Gross demand for platinum fell by 11.9 per cent to 7.04 million oz. Demand for platinum net of recycling fell by 8.5 per cent to 5.635 million oz, and supplies of platinum from current mining operations fell by 0.3 per cent to 5.92 million oz.

#### Supplies in 2009 Marginally Below 2008 Level

South African supplies of platinum rose by 0.3 per cent to 4.53 million oz. Increased output from newer mines and the sale of metal from stocks accumulated in 2008 offset losses from the closing of some uneconomic shafts and pits. North American supplies, hit by industrial action, fell to 260,000 oz and Russian supplies fell slightly to 785,000 oz. Expansion at Zimbabwean platinum mines led to output increasing by 27.8 per cent to 230,000 oz.

#### Autocatalyst Demand for Platinum Down

Gross demand for platinum in autocatalysts dropped by 39.0 per cent to 2.23 million oz in 2009 as global vehicle production fell heavily in nearly all regions. European gross demand was worst hit and dropped by over half to 970,000 oz due to a sharp, short-term decline in the market share of diesel cars. Meanwhile the proportion of diesel vehicles in the European region that were fitted with a platinum-catalysed diesel particulate filter (DPF) rose with the introduction of the light-duty Euro 5 emissions rules, that applied to vehicles from the final quarter of 2009.

Recovery of platinum from spent autocatalysts was also sharply down in 2009, falling by 26.5 per cent to 830,000 oz globally due to a decline in the number of vehicles scrapped.

#### Industrial Demand for Platinum Reduced

The economic downturn hit industrial demand for platinum in almost all applications as industrial plants operated well below capacity, product inventories were reduced and capital investment was delayed. A large amount of platinum was sold from the glass industry after redundant cathode ray tube glass factories were closed in China, and the fall in platinum demand was further affected by the fibre glass industry’s move towards more durable higher-rhodium, lower-platinum alloys, particularly in North America and Europe. Although medical and biomedical demand for platinum was flat at 250,000 oz, total industrial purchases of platinum were 33.7 per cent lower than in 2008 at 1.14 million oz.

#### Rising Platinum Demand for Jewellery Manufacture

Gross purchases of platinum for jewellery manufacture climbed by 46.1 per cent in 2009 to 3.01 million oz worldwide. The reduced value of platinum led to a fall in recycling of scrap jewellery by 18.7 per cent to 565,000 oz, resulting in net global demand of 2.445 million oz, a rise of 79.1 per cent. In China, the booming economy and a lower average platinum price than in 2008 boosted gross demand to a record 2.08 million oz. The rebuilding of stocks of metal and finished jewellery throughout the trade contributed to the increase.



Within China, plain platinum and gold jewellery is typically priced per gram, with the price displayed on boards such as this (Image copyright David Jollie/Johnson Matthey PLC)

## **Palladium**

### **Palladium Market Surplus in 2009**

The palladium market was in surplus by 760,000 oz in 2009. Net demand declined by 5.0 per cent to 6.34 million oz, while supplies of palladium fell by 2.9 per cent to 7.10 million oz. Production from current Russian mining slipped marginally to 2.68 million oz and sales of material from Russian state stocks are estimated to have contributed another 960,000 oz of palladium to supplies, tipping the palladium market into surplus. South African supplies dropped by 60,000 oz to 2.37 million oz.

### **Incentives Support Autocatalyst Demand**

Gross purchases of palladium for use in autocatalysts decreased by 9.3 per cent to 4.05 million oz in 2009, largely due to the fall in global vehicle output. However, European auto demand for palladium was almost flat compared to 2008, as various scrappage schemes supported the sale of gasoline-fuelled vehicles and palladium continued to gain ground at the expense of platinum in diesel engine catalysts. Demand for palladium for the rapidly expanding vehicle market in China grew to 685,000 oz, up by 76.0 per cent on 2008.

### **Weaker Palladium Jewellery Demand**

In the jewellery sector, global gross demand for palladium decreased by 17.3 per cent in 2009 to 815,000 oz. Gross demand in China slipped from 740,000 oz to 560,000 oz as manufacturers devoted resources to making platinum jewellery. North American demand was flat but European demand was driven marginally higher by the introduction of a palladium hallmark in the UK. Net global demand fell by 12.9 per cent to 745,000 oz.

### **Industrial and Investment Demand for Palladium**

Industrial gross demand for palladium (including dental demand) decreased by 5.8 per cent to 2.28 million oz in 2009 as the effects of recession lingered. Electrical gross demand fell by 100,000 oz to 1.27 million oz due to lower output of automotive electronics and heavy destocking of components in early 2009. Recycling of electronic scrap increased by 50,000 oz, leaving net electrical demand down 14.6 per cent at 875,000 oz.

Identifiable physical investment demand for palladium climbed by 48.8 per cent to 625,000 oz in 2009. Once again, there was strong buying interest in palladium through the European Exchange Traded Funds (ETFs), encouraged by the rising metal price.

### **Recycling of Platinum Group Metals**

There is a new chapter in "Platinum 2010" on recycling, which describes the drivers and incentives behind recycling of pgm-containing post-consumer scrap. It defines "open loop" recycling, where control and ownership of the metal change hands, as opposed to "closed loop" recycling where the precious metal is reclaimed and recycled on behalf of the same organisation which initially purchased it. Open loop recycling figures for platinum, palladium and rhodium are reported for the automotive, electronics and jewellery sectors, with the metal recovered allocated to the region where the scrapped material had been in use.

### **Special Features**

A special feature on 'The Zimbabwean Mining Industry' includes a schematic map showing the four major platinum deposits located along Zimbabwe's Great Dyke, and describes progress towards the development of Zimbabwe's mining potential. A feature on 'The Chinese Platinum Jewellery Market' discusses the various factors involved in this complex market, including "consumer pull", "manufacturer push" and changes in stock levels of both finished jewellery and unprocessed metal.

### **Availability of "Platinum 2010"**

The book can be downloaded, free of charge, as a PDF file in English, Chinese or Russian by visiting the Platinum Today website at: <http://www.platinum.matthey.com/publications/pgm-market-reviews/archive/platinum-2010/>. Alternatively the English version can be ordered in hard copy, by filling in the form at: <http://www.platinum.matthey.com/publications/pgm-market-reviews/request-a-copy/>, by emailing a request to: [ptbook@matthey.com](mailto:ptbook@matthey.com), or by writing to: Johnson Matthey, Precious Metals Marketing, Orchard Road, Royston, Hertfordshire SG8 5HE, UK.