

Prices & Futures Markets

Platinum

Platinum advanced strongly during 2000, rising from a low of \$414 in January to a peak of \$625 in December. During the early part of the year, uncertainty over Russian exports was the key factor behind the rally. Although Almaz made intermittent sales from May onwards, platinum maintained its gains, supported by strong consumer demand and limited physical availability. During December, platinum climbed to a series of highs, after concerns about Russian supplies were reactivated by reports that Gokhran did not plan to sell metal during 2001.

Platinum declined sharply in early **January** 2000, falling from \$442 on the 4th, the first day of trading, to the year's low of \$414 on the 6th. The fall was in response to news that Vladimir Putin, then acting president of Russia, had signed a revision to Clause 19 of the 1999 budget bill. This amendment provided the legal framework for the resumption of platinum exports (which had been held up since April 1999), and prompted selling by both dealers and funds. From mid month onwards, bullish sentiment returned as it became clear that regular

shipments would not resume immediately. Consumer demand was also strong and this led to an increasing physical shortage of metal, with lease rates rising from 30 per cent on the 13th to over 75 per cent on the 28th. The price also made strong gains, reaching \$495 at the month end.

Although lease rates began to retreat, the platinum price continued to climb during the first three weeks of **February**, peaking at an eleven year high of \$575 on the 17th. Continued concerns about delays in Russian shipments stimulated heavy buying on TOCOM, with the exchange recording an exceptional trading volume equivalent to 5.47 million oz on the 8th. Meanwhile, the rally was reinforced by a steep ascent in the palladium price, which recorded a series of all-time highs before peaking at \$800 on the 21st. However, platinum's gains were quickly eroded. Expectations of an imminent resumption of Russian platinum exports caused the price to retreat to \$465 on the 25th, although it then recovered to \$490.

Platinum dipped to \$465 on 2nd **March**, responding to reports that Vladimir Putin had signed a decree enabling the start of platinum shipments.

This decline was short-lived: another rise in lease rates, a continued lack of Russian material in the market, and strikes at two South African producers saw the price bounce back to \$496 on the 22nd. It retreated slightly at the month end, slipping to \$482 on the 31st.

April saw some wide swings in the platinum price. It spiked to \$521 on the 5th, stimulated by strong consumer demand and fund buying on NYMEX, then sank back to \$488 on the 10th. Over the next two weeks, the price moved between \$470 and \$510, responding to conflicting reports about Russian sales. From the 27th onwards, platinum began a rapid ascent, surging to \$525 on the 28th. The rally was prompted by a continued lack of Russian metal in the market, combined with a renewed rise in lease rates to over 70 per cent.

During the first half of **May**, lease rates fell back to 45 per cent, and the price also retreated, to just above \$500. Physical demand provided strong support at this level, and an announcement by Anglo Platinum that it planned to increase annual platinum production by 1.5 million oz by 2006 had no impact. In mid month, platinum embarked on another climb, soaring to \$565 on the

Average PGM Prices in \$ per oz

Average	Platinum	Palladium	Rhodium	Iridium	Ruthenium
1999	377.03	358.18	907.25	414.82	40.01
2000	544.92	681.74	1,998.00	415.00	129.83
Percentage Change	45%	90%	120%	0%	224%

Platinum and palladium prices are averages of London am and pm fixings. Other pgm prices are averages of Johnson Matthey European base prices.



24th. The rally was motivated by market expectations of higher demand in auto-catalysts, following news that General Motors was planning to increase its use of platinum by 10 per cent by 2002.

The price was subsequently supported at around \$550 by a report that Gokhran, Russia's State Fund, would not export any platinum during the year.

Platinum slid to \$540 in mid **June**, as a fall in lease rates to 30 per cent stimulated some long liquidation by investors. This decline was quickly reversed; the price surged to \$580 on the 27th, with fund purchasing in a thin market the main factor behind the rally. There was still concern about Russian supplies – especially among Japanese investors – despite the release of Swiss trade statistics showing the import of 224,000 oz of platinum from Russia in May.

Early **July** saw another dip in the platinum price, which dropped to \$532 on the 5th in response to Russian selling. However, a remarkable rally in palladium – which gained over \$200 during the month – helped platinum regain the \$580 level by the end of July. Concerns that supplies of pgm from Russia would prove insufficient were the main influence on the markets, while platinum was also bolstered by continued physical demand.

Prices for both metals jumped higher at the start of **August**, triggered by a lack of Russian metal in the spot market. Palladium recorded a new all-time high of \$855 on the 2nd, lifting platinum to a peak of \$612 – its highest fixing since December 1988. The rally ended abruptly, however, with reports that Norilsk Nickel expected contract shipments to Japan to commence in September or October. Platinum dropped swiftly to \$564 on the 7th, before trading around \$570 for the next three weeks. These lower prices stimulated strong buying from consumers, causing the price to recover to \$598 on the 30th.

Platinum continued to make gains in

Platinum Prices in 2000

London am and pm fixings

\$ per oz	High	Low	Average
January	495.00	414.00	441.36
February	573.00	465.00	516.33
March	496.00	463.00	480.03
April	525.00	470.00	498.50
May	563.00	502.00	526.10
June	580.00	540.00	558.88
July	583.00	532.00	560.00
August	612.00	564.00	577.80
September	612.00	565.00	592.40
October	588.00	568.00	579.42
November	605.00	586.00	593.42
December	625.00	599.00	610.50



early **September**, revisiting its high of \$612 on several occasions. However, the price began to weaken from mid month, despite the start of strike action at Anglo Platinum's mines on the 18th. The decline appeared to be triggered by concern over rising fuel prices and the potential impact on the world economy; this encouraged some investors to liquidate long positions on NYMEX and TOCOM. As a result, platinum sank to a low of \$565 on the 27th.

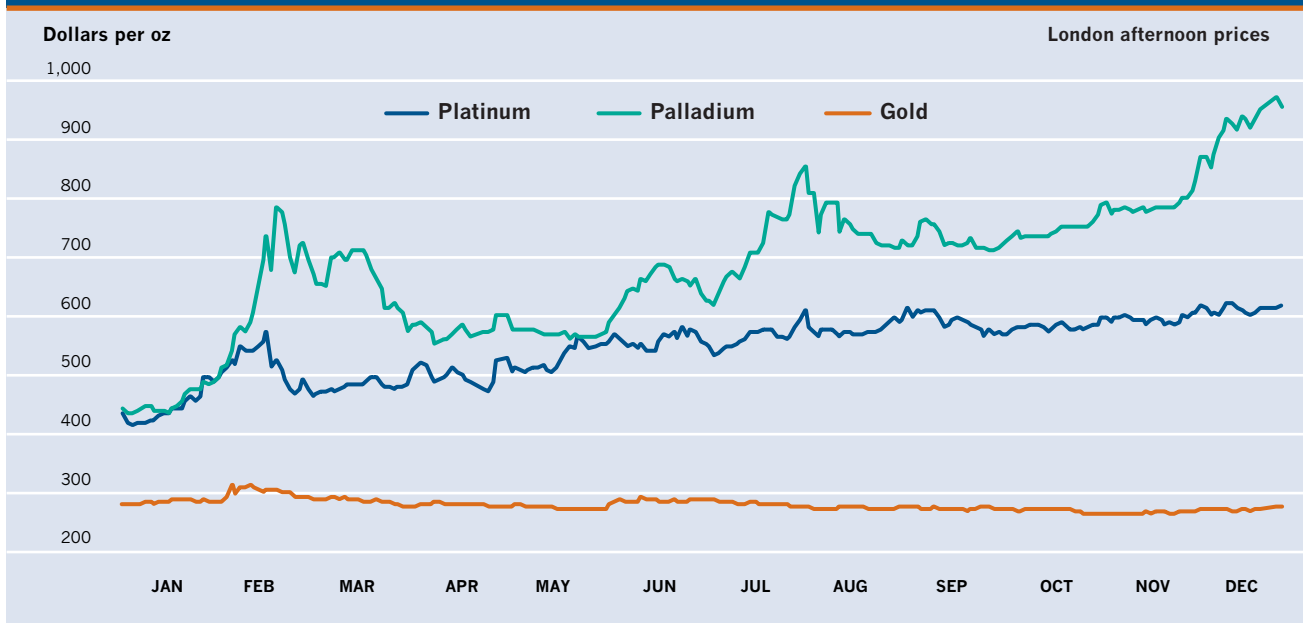
The price stabilised temporarily during **October**, trading in a \$575 to \$585 range for most of the month. Further speculative selling was deterred by the strike at Anglo Platinum, which caused a reduction in mine output over a period of four weeks before coming to an end on the 16th. It was subsequently reported that the group's platinum production would fall below 2 million oz in 2000.

Platinum rallied in early **November**, reaching \$600 on the 3rd and trading close to this level until the 13th. The gains were generally attributed to reports quoting Russia's Deputy Finance Minister Rudakov, suggesting that Gokhran did not plan to export any pgm in 2001.

Market sentiment was also affected by an announcement by Anglo Platinum, stating that 55,000 oz of production had been lost due to the strike and that the group's platinum output would fall to 1.9 million oz in 2000. Although the price edged down to \$586 on the 16th, following reports that tax inspections in China had caused a dip in buying by local jewellery companies, it climbed back above \$600 at the month end in the wake of fund buying on NYMEX.

The ascent continued during the first few days of **December**, with platinum touching \$625 on the 4th. The rise was driven by speculation about a possible shortage of Russian pgm supplies in 2001, which encouraged continued purchasing by investors. TOCOM was the main focus of activity, with the general public said to hold long positions of around 500,000 oz. After dipping briefly to \$599 on the 6th, platinum continued its rally, reaching a new peak of \$625 on the 13th – its highest price since August 1987. It continued to trade above \$600 for the rest of the month, recording \$611 at the year's final London fixing on the 29th.

Daily Platinum, Palladium and Gold Prices in 2000



Palladium

The palladium price set a series of all-time records in 2000, culminating in a fixing of \$972 on 27th December. After starting January at \$440, palladium began to rally later that month, stimulated by strong industrial demand and a shortage of metal from Russia. The rally was given impetus by investors scrambling to cover short positions on TOCOM, and the price spiked to \$800 on 21st February. After retreating to \$600 in April, palladium reached a new peak of \$855 in August following a lull in sales by Almaz. This record was exceeded in December, when concern about Russian supplies in 2001 triggered heavy buying. After trading at around \$440 during the first two weeks of **January**, palladium began to rally strongly during the second half of the month. Driven by strong consumer demand and a shortage of metal from Russia, the price rose steadily to reach \$488 on the 28th.

Palladium's ascent steepened during **February**, and the price rose to a high of

\$800 in London on the 21st. This remarkable gain was largely due to panic buying on TOCOM, where private investors were reported to hold short positions totalling around 650,000 oz. Attempts at short covering only added to the rally's momentum, causing palladium to repeatedly open limit-up on TOCOM and making it impossible for investors to close out their positions. On the 23rd, the exchange authorities suspended trading of palladium futures, and froze prices in order to prompt the orderly liquidation of contracts. The following day, Japanese traders closed out 225,000 oz of their long positions, and the palladium price fell abruptly to \$700.

The decline was arrested by continuing shortages of physical metal, which helped to support palladium at around \$700 for much of the first three weeks of **March**. From the 20th onwards, the price fell steeply, sinking to \$575 on the 31st in line with a significant improvement in physical availability. Initially, Russia was rumoured to be the source of the additional metal, but news that Tiger Management was to close its largest fund led to speculation that it had liquidated

its remaining palladium holdings.

The price continued to retreat in early **April**, dipping to \$555 on the 11th. It recovered to \$600 on the 28th, but lost ground again during **May**, falling to \$560 on the 22nd. This decline was mainly due to increased liquidity in the market, although sentiment was also affected by Swiss trade data showing the import of just over 1 million oz of Russian palladium in March. Market rumour suggested that this metal may have been used as collateral for a loan, rather than being sold.

Palladium staged a recovery during **June**. It reached \$691 on the 19th, boosted by strong physical demand, a jump in lease rates, and a bout of short covering on TOCOM (which in April had lifted trading restrictions on palladium contracts with delivery months of February 2001 or later). The price then began to drift lower, weakening to a fix of \$635 on 30th June.

This retreat was short-lived, with the rally finding renewed impetus during **July**. Once again, the triggers were a combination of consumer purchasing and a lull in Russian sales; as the price climbed, short covering added to the momentum.

On the 17th, palladium breached the \$700 level for the first time since March, and it continued steeply upwards to a peak of \$822 on the 31st.

The rally culminated on 2nd **August**, with palladium spiking to a new record fix of \$855. After reaching this peak, the price immediately went into a steep decline, plunging to \$716 by the month end. Sentiment was affected by press reports indicating that Russian exports to Japan could commence the following month, and by news that the US Defense Logistics Agency planned to sell an additional 100,000 oz of palladium from its stockpile before the end of September.

Palladium rebounded briefly to \$765 on 8th **September**, responding to heavy industrial buying and a continued shortage of metal. But in the second half of the month, more Russian palladium came onto the market, and the price drifted down to \$711 on the 28th.

The rate of Russian selling eased in early **October**, and with consumer demand remaining strong, palladium recouped its losses of the previous month. After rallying sharply to \$742 on the 6th, the price stabilised temporarily before making further gains towards the month end, fixing at \$758 on the 31st.

The rally gathered pace during early **November**, following reports that Gokhran did not expect any pgm to be

Palladium Prices in 2000 London am and pm fixings			
\$ per oz	High	Low	Average
January	488.00	433.00	452.09
February	800.00	483.00	635.69
March	718.00	573.00	665.93
April	600.00	553.00	573.08
May	605.00	560.00	571.17
June	691.00	572.00	647.09
July	822.00	616.00	702.94
August	855.00	710.00	760.38
September	765.00	708.00	728.38
October	758.00	712.00	739.65
November	811.00	772.00	783.99
December	972.00	818.00	914.03

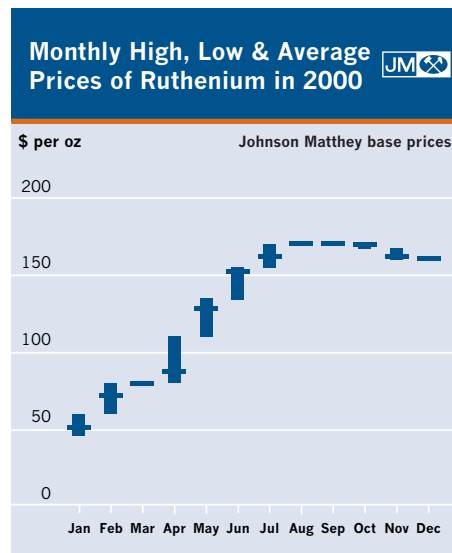
sold from Russian state stockpiles in 2001. This triggered a rush of short covering, and palladium jumped by nearly \$40 to reach \$794 on the 3rd. Over the next three weeks, strong consumer demand supported the price in a \$775-\$785 trading range, despite the sale of large volumes of metal – possibly of Russian origin – on the London fixings. In the final days of November, the level of physical selling waned significantly; there was an immediate reaction in the price, which leapt to \$811 on the 30th.

Palladium made further dramatic gains in **December**. It was reported that Norilsk Nickel had exhausted its palladium export quota for 2000, while the Russian government had no plans to sell more metal; this suggested that there would be no substantial deliveries of metal from Russia before the year end. The market was also concerned about another interruption to supplies in early 2001, despite assurances from Norilsk that its long term quota for palladium would enable it to continue shipments in the New Year. The price climbed rapidly to \$940 on the 12th, and remained close to this level during the next week, despite

evidence that consumer demand had begun to ease. With price movements exaggerated by thin trading conditions over the Christmas period, palladium set a new all-time high of \$972 on 27th December, before retreating to \$954 at the year's final London fixing.

Other PGM

Strong consumer demand and tight physical supply boosted rhodium to an eight year peak of \$2,600 in August 2000. The price



weakened to \$1,625 in October, in line with increased sales from Russia, before recovering to \$2,025 at the year end. Industrial and speculative buying propelled ruthenium to a high of \$170 in August, but iridium was unchanged at \$415 throughout the year.

The Johnson Matthey base price for rhodium climbed steeply from \$1,000 at the start of 2000 to \$2,525 in February. The rally was underpinned by strong demand from Asia, particularly from car companies, coupled with a lack of physical availability. There were also

reports of speculative purchasing.

These gains were eroded during March and April, with the price slipping back to \$1,600. However, strong consumer demand combined with a shortage of metal subsequently led rhodium higher. The price peaked at \$2,600 in August but in late September, there was a significant increase in Russian selling and rhodium sank to \$1,625 on 4th October.

Sales of rhodium by Almaz began to ebb in mid October, and the price stabilised before beginning to climb again the following month. Reports that Gokhran did not intend to sell any pgm in 2001

also stimulated the market, and rhodium reached \$2,200 on 8th November. It subsequently drifted lower, despite sporadic offers of Russian material, to end the year at a JM base price of \$2,025.

While the JM base price for iridium was unchanged at \$415 throughout 2000, ruthenium saw some significant gains. Propelled by buying from consumers and speculators, the price rose from \$46 at the beginning of the year to reach \$170 in July. It stabilised at this level until late October, when the market began to ease slightly. The price edged down to \$160, where it remained until the end of the year.

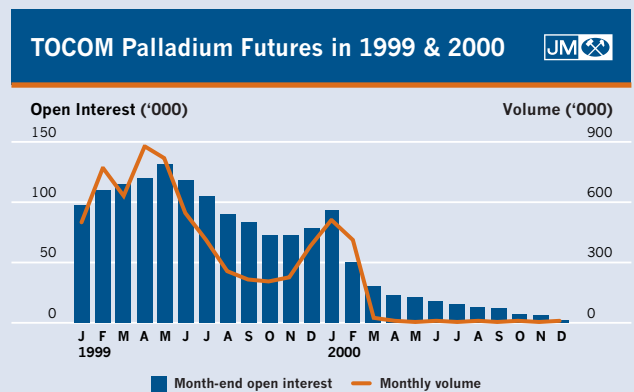
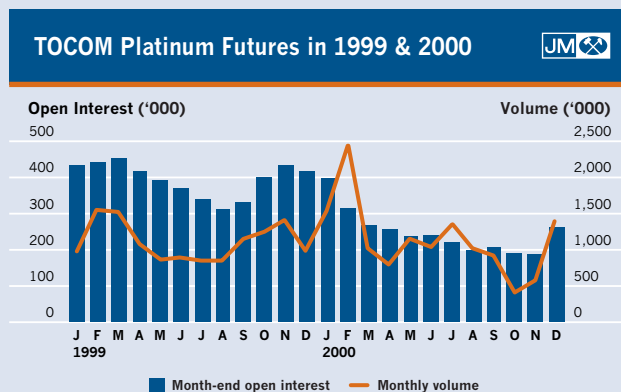
Futures Markets

Platinum

The platinum futures contract on TOCOM was actively traded during 2000, with annual turnover up 2 per cent at 15.6 million lots. The most active month was February, when over 2.4 million contracts changed hands, as platinum prices spiked briefly to over ¥2,000 per gram. Open interest also peaked in this month, reaching 425,189 contracts on the 8th before falling to 316,657 lots at the month end.

Volumes remained high until September, due to continued price volatility combined with restrictions on trading in palladium futures; these motivated some investors to switch to platinum instead. Although activity then declined, December saw a surge of activity, with 1.4 million contracts changing hands as the platinum price rose to almost ¥2,500 per gram. Open interest also increased, from the year's low of 180,216 contracts on 29th November to 262,150 contracts a month later.

In contrast, activity on NYMEX was subdued, with annual volume falling by 44 per cent to 319,924 contracts. Open interest also declined, from 11,953 contracts at the end of 1999 to 8,429 lots a year later.



Palladium

Trading of the palladium futures contract on TOCOM was particularly active during January and February 2000, with nearly 1 million contracts changing hands. Japanese investors had built up substantial short positions in the expectation that a resumption of Russian sales would drive prices lower. When the palladium price began to climb steeply during February, investors were unable to cover their positions due to limits on daily price movements imposed by TOCOM. The exchange introduced emergency measures on 23rd February, effectively suspending free market trading and freezing prices.

Volumes on TOCOM subsequently collapsed, with only 82,525 contracts being traded between March and December. Open interest declined from a peak of 98,665 contracts on 9th February to just 2,099 lots at the year end.

Trading volumes on NYMEX declined sharply in 2000, down 35 per cent to 50,766 contracts for the year. There was a surge of activity in February, when nearly 14,000 contracts changed hands. Open interest also peaked in February, reaching 3,543 on the 7th; it had declined to just 1,848 contracts by the year end.