

HERAEUS PRECIOUS APPRAISAL

Heraeus

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MARKET SPOTLIGHT

Precious metal seasonality shows prices typically rise in Q1

Q1 is a seasonally strong period for all precious metal prices. Are the metals set to repeat this in 2019? Outlined below is what could happen:

Au **Ag** **Gold and also silver could have some more near-term upside** as their prices are little changed this month. On average over the last 10 years, the gold price has risen by around 5% in the first couple of months of the year as rallies that started in December have continued into Q1. There are plenty of reasons for people to look for a safe haven, from global stock market volatility to a partial government shutdown in the US and the 'gilets jaunes' in France, along with slowing economic growth. Silver has generally outperformed gold on average in Q1.

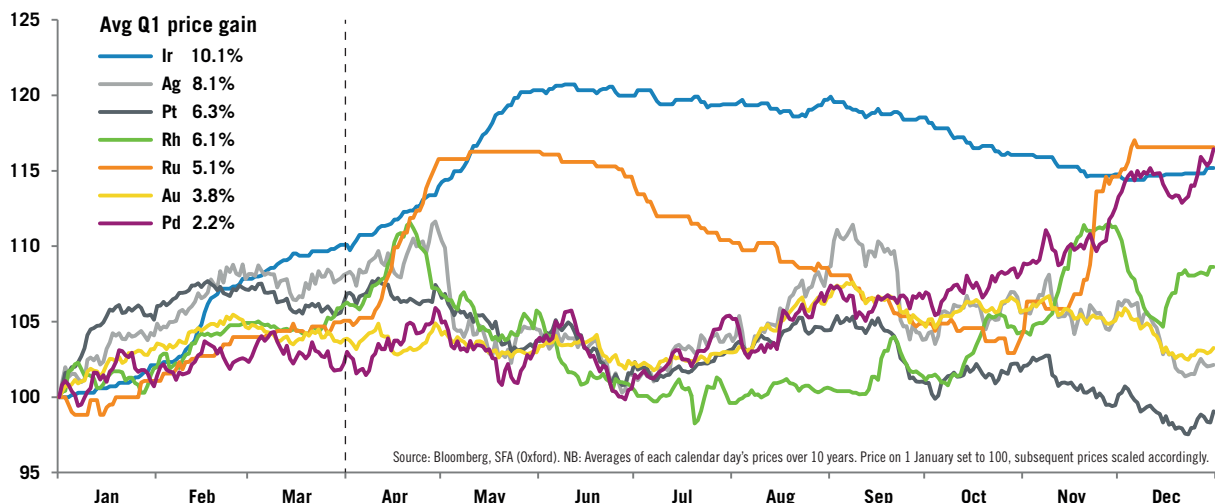
Pt **Platinum has been the best performer in January** on average in the past, although other metals have been stronger through the first quarter. Although the demand outlook for the year is not expected to improve much from 2018, the price was oversold and could rebound in sympathy with the other metals.

Pd **The palladium price looks exposed** as it is at a record high and already up over 6% in January. The typical rise in January is 3%. However, those gains could continue as the market remains tight with very high lease rates, and another year with a market deficit is expected.

Ir **Iridium is the best performing metal on average in Q1** over the last 10 years. The price takes a while to gain momentum but ends the quarter strongly. **Ru** **Ruthenium tends to dip in January before climbing.** Perhaps industrial users take an extended holiday over the New Year. **Rh** **Rhodium tends to make similar progress to gold in the first quarter.** Rhodium also has elevated lease rates, signalling a tight market, so with not much movement in the price in early January further upside seems possible.

Price seasonality

10 year average prices indexed to 100 1st Jan





PRECIOUS METALS REVIEW

79 Au Gold

	Close	Weekly change	High	Date	Low	Date
\$/oz	1,289	0.29%	1,297	10/01/2019	1,279	08/01/2019
€/oz	1,123	-0.32%	1,131	07/01/2019	1,117	09/01/2019

Equities' volatility from the economic slowdown is supporting safe haven gold demand. A sharp reduction in investors' expectations of economic performance in 2019 led to the S&P 500 Index undergoing the worst December performance since the Great Depression. As a result, a move to less risky assets saw the gold price increase by 5% over the month, corroborated by ETF holdings which grew by 2.2 moz to 71.1 moz. US bond yields also fell 0.30 percentage points to 2.69% in December. Market expectations of further rate increases by the Federal Reserve have correspondingly dropped. Stock market volatility looks likely to remain in the short term, which should support gold safe haven demand.

China has added to its gold reserves for first time in over two years. The state added 320 koz to bring the total to 59.56 moz of metal. China is sixth in gold holdings after the US, Germany, Italy, France, and Russia which owns 67.6 moz and added a cumulative 8.5 moz in 2018 by November. Latest estimates from the IMF put global central bank gold reserves at 1,089 moz. China's gold purchasing may have been to diversify its large amount of dollar holdings in response to the trade war. Regardless of the cause, central bank buying could be a larger factor for gold demand in 2019, as others, such as Hungary and Poland, also added to gold reserves after a long break towards the end of last year.

47 Ag Silver

	Close	Weekly change	High	Date	Low	Date
\$/oz	15.64	-0.70%	15.82	07/01/2019	15.51	08/01/2019
€/oz	13.63	-1.31%	14.03	07/01/2019	13.24	09/01/2019

Silver demand from electronics impacted by the slowing Chinese economy. Poor sales reports/outlooks from the two largest mobile phone manufacturers, Apple and Samsung, suggest weaker electronic demand for silver. China accounts for approximately a third of the global smartphone market and a fifth of global silver demand. Electrical and electronic manufacturing constituted almost a quarter of total silver consumption in 2017 (~1,000 moz). Apple lowered Q4'18 revenue guidance, citing the unforeseen rate of economic decline in China.

Samsung and LG also reported disappointing Q4 phone sales in China but attributed this to greater competition. However, a shift to cheaper local phones would be expected if overall spending is lower. Between the three companies, sales have disappointed by the equivalent of several hundred koz of silver demand and the economic slowdown has broader implications for other sources of silver demand. The drop in ETF holdings of 3.1% (16.6 moz) since the start of December demonstrates a lack of faith in a further price rally.

78 Pt Platinum

	Close	Weekly change	High	Date	Low	Date
\$/oz	814	-0.94%	832	07/01/2019	813	11/01/2019
€/oz	708	-1.59%	727	07/01/2019	708	11/01/2019

China's support of fuel cells vehicles should be a good test of their viability, with millions of ounces of potential platinum demand over the next decade if they are successful. It is estimated that China put \$12.4 bn of subsidies into the local fuel-cell industry last year and plans to continue support to 2025. This shows clear intent from the government as China's high standing in the electric car industry is the result of an estimated \$58.8 bn of support over the last decade. These subsidies mean that the manufacture of commercial

fuel cell vehicles is guaranteed to be profitable: up to \$30,000 per vehicle can be claimed from the central government with additional local subsidies available. Current fuel-cell vehicle production is only in the thousands but the subsidies have attracted major auto manufacturers such as SAIC. The company plans to use economies of scale to bring down the high production cost of fuel cells in order to compete with electric vehicles. Hydrogen is also subsidised in China which makes fuel costs similar to those of diesel.



PRECIOUS METALS REVIEW

⁴⁶Pd **Palladium**

	Close	Weekly change	High	Date	Low	Date
\$/oz	1,325	1.40%	1,344	09/01/2019	1,297	07/01/2019
€/oz	1,153	0.73%	1,174	09/01/2019	1,131	07/01/2019

Is peak combustion engine demand peak palladium demand? Global car sales performed poorly in the second half of 2018 and full-year numbers were disappointing in all regions. In particular, China's passenger car sales dropped 6% (to 22.7 million) in 2018, the first decline in over 20 years. Growth forecasts for 2019 are also lower. The China auto association, CAAM, is expecting 2019 to be flat on 2018. Additionally, LMC Automotive expects only 0.8% growth in Western Europe, and Toyota and Morgan Stanley predict that US sales will decline. With the rise of electric vehicles, sales of ICE vehicles might have peaked. That said, with wider adoption of hybrids and stricter emissions standards increasing PGM loadings, automotive palladium demand (8.4 moz in 2018) remains firm as the global parc in vehicles expands.

Palladium price reaches new highs. The 1-month and 3-month palladium lease rates moved well into the 30%+ range over the winter holidays. Difficulty securing metal during the holiday may have been a factor as lease rates have pulled back in January. There is also a high level of backwardation in the backend of the forward curve, resulting in high lease rates for periods over 12 months. This indicates tightness in the market, which also saw the palladium price rally to a new record of \$1,344/oz last week (establishing a \$500/oz premium over platinum) and there is little sign of it letting up yet.

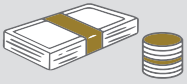
⁴⁵Rh ⁴⁴Ru ⁷⁷Ir **Rhodium, Ruthenium, Iridium**

	Rhodium	Ruthenium	Iridium
Reporting week	\$2,440/oz	\$280/oz	\$1,470/oz
Previous week	\$2,450/oz	\$280/oz	\$1,470/oz

Iridium was the best performing precious metal in 2018. A great deal of attention has been focused on palladium recently but, looking back at the year as a whole, it gained only 19% (to \$1,264/oz) compared to iridium's 51% (to \$1,470/oz). In fact, all the "small" PGMs performed better, with rhodium and ruthenium posting 44% and 40% gains, respectively, to reach \$2,465/oz and \$280/oz. Generally, these markets are close to balance or in deficit, with liquidity being constrained

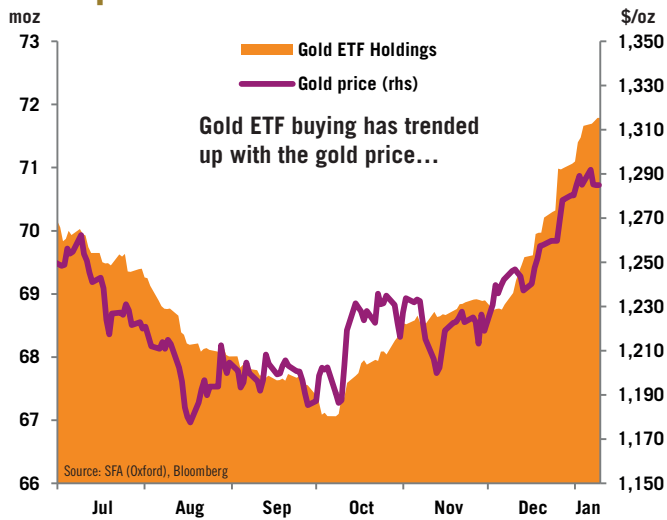
by South African producer cuts. However, most of these gains were made in the first half of 2018, with all three small PGMs maintaining relatively flat prices in the final three months of the year.

The rhodium price fell \$10/oz towards the end of last week but there was no change in the ruthenium and iridium prices from the previous week.

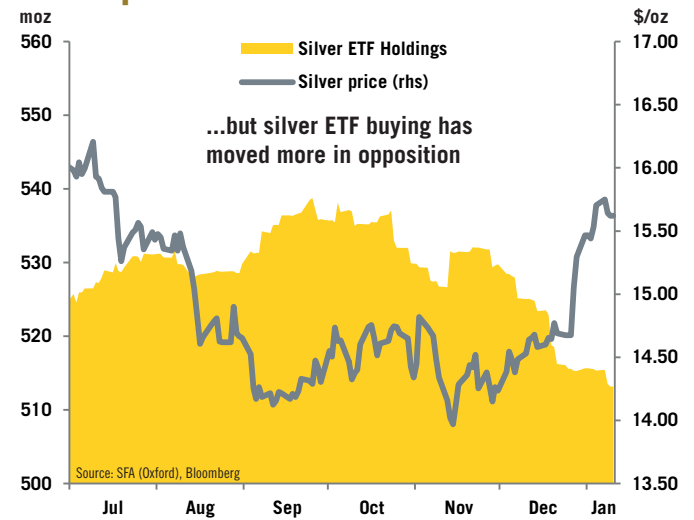


TRENDS AND INVESTMENTS

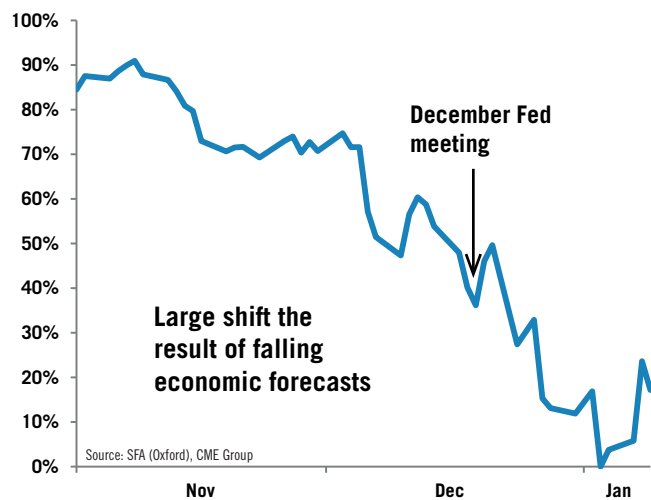
Gold price and ETFs



Silver price and ETFs



Expectations of ≥1 Fed rate rise in 2019



Pd price and lease rates indicator



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