

Key Points

- Actual volatility in the price of Gold has fallen over the past few years and this in turn has brought down the level of implied volatility, which lies at the core of option pricing.
- As a result, options have become cheap historically, providing opportunities for those looking for upside exposure to Gold while limiting their downside to the premium paid for the option.
- This could be attractive to a) those who want to take a fresh long position in Gold or b) those who would like to replace part of their physical Gold holdings with something less risky, while also freeing up cash to pursue additional returns elsewhere.
- Below, we outline some background to the Gold price and also show the PnL diagrams for some simple option structures and how these compare to a physical holding.

Gold implied volatility remains low, providing option opportunities for 2019

The price or cost of an option is primarily affected by the level of implied (or estimated) volatility and in the case of Gold this has fallen in recent years. This can be seen in Chart 1 which shows the movements in implied volatility for 3-month and 1-year.



The reason for this has been the reduction in the actual volatility of the Gold price, which has fallen in recent years compared to the sharp price moves that were seen both before and after the Financial Crisis. Charts 2 and 3 show a comparison of actual and implied volatility for 3-month and 1-year.







The consequence of this long suppression in actual volatility is that it will take some sizeable and sustained price moves to reawaken demand for optionality and higher implied volatility.

Low vols offer low cost, low risk opportunities to buy Gold

Q1 2019 has shown few signs of change in the low vol backdrop. This offers particular opportunities for:

- a) Those mindful of a potential re-rating in Gold during 2019.
- b) Those who merely want to take an alternative (lower risk) position than holding physical Gold.

a) Can Gold re-rate?

There are arguments in Gold's favour.

First, Gold seems under-owned compared to the years around the Financial Crisis.

Second, this is happening at a time when the Fed, US/global economy and risk assets are all at a potential crossroads.

In short, we are entering a period of high uncertainty for fundamentals and risk assets and if this were to heighten further Gold could break out substantially, helped by safe haven flows, lower yields and expectations of an end to QT/possible return to QE.

If the \$1360-75 area were to break the move could be significant (see Chart 4).





For those who hold this belief, low vol offers a low cost entry opportunity, with risk confined to the option premium if risk fundamentals turn out fine.

For example, a 3% out-of-the-money 3-month call option (spot \$1300, strike \$1339) costs 1% upfront. The pay-out diagram is shown below. In the option position no PnL is made until the breakeven price (strike plus cost) of \$1352.5 is exceeded. So, in this example, over the three months the investor would lose 4% of the upside compared to physical, but downside would be limited to just 1%. Note this excludes the additional interest received on the 99% cash unlocked which we estimate at 2% per annum or 0.5% for three months. Hence total loss on downside is reduced to just 0.5%.

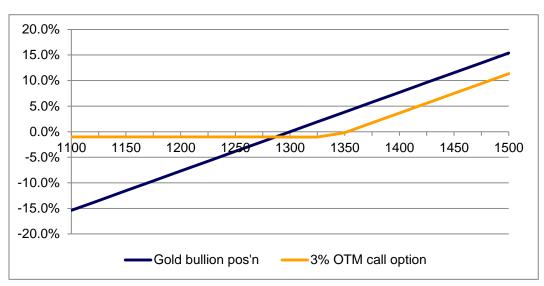


Chart 5: 3-month 3% OTM call with PnL as % of notional

b) Options as a cash replacement trade

In the physical position replacement trade the idea here would be to maintain as much upside as possible whilst limiting some of the downside risk.

Example - a 5% in-the-money 3-month call option (spot \$1300, strike \$1235) costs 6.2% upfront. The pay-out diagram is below. In this instance, PnL is made fairly quickly as the breakeven price (strike plus cost) of \$1311.5 is lower. So, in this example, over the three months the investor would lose only 0.9% of the upside compared to physical, but downside would be limited to the 6.2% cost of the option or 5.7% once interest is added back.

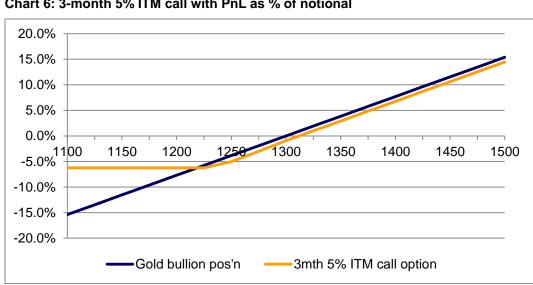


Chart 6: 3-month 5% ITM call with PnL as % of notional



A final example would be to extend the maturity of the 5% in-the-money call to six months.

In this example, a 5% in-the-money 6-month call option (spot \$1300, strike \$1235) costs 7.3% upfront. The pay-out diagram is shown below. In this instance, PnL is made once the breakeven price (strike plus cost) of \$1325 is exceeded. So, in this example, over the six months the investor would lose 2.0% of the upside compared to physical and downside would be the 7.3% cost of the option or 6.4% once interest is added back.

20.0% 15.0% 10.0% 5.0% 0.0% -5.0% 1100 1150 1200 1300 1350 1400 1450 1500 -10.0% -15.0% -20.0% Gold bullion pos'n 6mth 5% ITM call option

Chart 7: 6-month 5% ITM call with PnL as % of notional

Conclusion

All the above examples are just that — examples — and they can be varied in strike and maturity depending upon individual preferences. In each case significant capital is freed up that can be reinvested to receive a yield currently over 2% in US dollars. The more out-of-the-money the strike is, the more upside PnL that will be given away compared to physical, but the cost/downside risk is much reduced and the notional can be scaled higher if necessary to boost PnL. For the in-the-money calls, they would be preferable compared to physical if there is a large sell-off in Gold, while not much upside is given away in the process. In addition, the cash resources freed up by moving from physical to the option could also be deployed to generate additional returns. The 6-month version merely frees up resources and minimises downside risk for a longer period — hence the higher cost.

Disclaimer: This report is prepared by Altana Wealth Ltd ("Altana") authorised and regulated by the Financial Conduct Authority ("FCA") in the United Kingdom. The investment products and services of Altana are only available to persons who are professional clients and eligible counterparties as defined in FCA's rules. They are not available to retail clients. The distribution of this report may be restricted in certain jurisdictions and it is the responsibility of any person or persons in possession of this document to inform themselves of, and to observe, all applicable laws and regulations of any relevant jurisdiction. Past performance is not a guarantee of future results.

For any further information, please contact investorservices@altanawealth.com.