Institute of Trading and Portfolio Management

Professional Options Trading Masterclass Video Series

POTM

Video 22

Long Straddles

Long Straddle

Quick Explanation

Buy 1X At The Money (ATM) Call Option and Buy 1X At The Money (ATM) Put Option with the same Strike and expiration

The Long Straddle is a Non-Directional Strategy and is a bet on Volatility. It is therefore not a bet on whether the underlying Stock will go up or down. It is a bet that the Stock will go up and / or down in a big way. We have marked the Long Straddle Strategy as "Medium Usefulness" for Retail Traders i.e. the Retail Trader Mandate. In reality it should be marked as "Low" usefulness however we have marked it as medium because it helps us to understand more Optimal strategies. We assume throughout the POTM Video Series that you either already have a position in a Stock (Long or Short) or you do not but you already have a Fundamental predisposition in the Stock of either Bullish or Bearish. In either of these cases what is the use of buying a Call and buying a Put at the same time? It neither acts as a Marginal Benefit to owning or shorting stock, nor does it act as an effective Hedge against a Long or Short Stock position i.e. there are better strategies as Hedges using Options to apply. However, we are explaining the Long Straddle Strategy here in the "Useful" PDF because its essential to understand its construction so we can look later at the Strap Straddle and Strip Straddle Strategies that are Directional in nature and are more useful. The only real use that the Long Straddle Strategy has is if you are a Market Maker in Options and you end up getting caught out being Short Volatility in an Asset and you don't want to be Short Volatility in the Asset. In this instance it adds value to a Market Maker BUT it doesn't add any value for those with a Directional predisposition or someone who already has a Stock position and is looking for optimal Hedging strategies i.e. The Retail Trader mandate.

- **Non-Directional Bet**
- **Volatility Bet**
- **Simple**
- **Two Transactions**
- **Debit**
- **Max Risk (Low Defined)**
- **Max Gain (Unlimited)**

When to Use the Strategy

The Long Straddle is actually a very simple strategy to deploy. You buy an ATM Call Option Contract and simultaneously buy an ATM Put Option Contract with the same expiration. It is clearly a debit strategy so risk is limited to the premium you pay. The $ upside is unlimited due the Long Call nature of the positioning. However, in what instance would you put it on as a Retail Trader? Would you put the position on when you are Fundamentally Bullish on the underlying Stock? Would you put it on when you are Fundamentally Bearish? Would you put it on when you already have a Long Stock or Short Stock Position in order to Hedge or to get more leverage to the upside or downside respectively? No! Why? .., because there are multiple strategies that fit this mandate better mentioned previously in this PDF and that will be mentioned. When you put the Long Straddle on you are not expressing a Directional or even Neutral bias. You are expressing a bias of Volatility and basically saying "no matter which Direction the underlying Stock goes I believe it will just be volatile and either go big up or big down." If the Stock just stayed where it is or Near The Money by the time of expiration then the debit would be lost and it is not worth doing. If it goes up big then you make less money on the upside than if you would have spent the same amount of money on Long double the amount of Calls or double the amount of $ Debit on another Bullish Strategy. If the underlying goes down big then you make less money on the downside than if you would have spent the same amount of money on being Long double the amount of Puts or double the amount of $ Debit on another bearish strategy. Also, we have looked at strategies where if you have a directional bias regardless of the $ amount invested as a Debit or received as a Credit..., there can be much higher % ROI i.e. using alternative strategies to the Long Straddle. The Long Straddle is a large debit because you are buying both Calls and Puts at the same time with the same expiration. You are basically paying a large amount out as a debit for the "I don't have a clue where it's going, but I know its going somewhere" trade. Which is pointless! Unless you are a Market Maker. This to a Retail Trader or anyone with a Directional Fundamental predisposition or who already has a Long / Short position is essentially a "boredom trade." The most likely scenario in the vast majority of cases is that the Stock won't move by as much as you thought and by the time of expiration your premium will have eroded to zero due to time decay and both the Call and the Put option you are long will expire worthless.

How to Use the Strategy

As mentioned above the best time to use the Long Straddle strategy is if you are on the defensive as a Market Maker or if you are a Market Maker and you see an Opportunity to buy Volatility "cheaply" because it is mispriced in the very short term. So, for example let's say you are a U.S. Listed Options Market Maker and you are working on the U.S. Equity Options Market Making

Desk at one of the large U.S. Investment Banks / Brokers and you are using a Black Scholes Options Pricing Model or a similar Options Pricing Model or derivative thereof and multiple clients like Hedge Funds come to you and start buying across multiple Stocks lots of Call Options and Put Options across multiple expirations. What Happens? You now have a "negative selection portfolio" of lots of positions you do not necessarily want to have and you are now short Volatility. A "negative selection portfolio" is one in which the positions were chosen for you NOT chosen by yourself. You have ended up with these positions because you have done business with clients with the intention of being involved in the order flow of the Options market and to make commissions. Maybe you have even sold Implied Volatility in all the names at what you consider at the time to be favourable prices. However, now you have Short Volatility risk. If a big event occurs overnight and Volatility goes through the roof and is out of your control, then as the Market Maker you could lose all your Money and more and even blow up your trading book. So, you decide to Hedge your short Volatility position by buying multiple Long Straddle Positions across the whole market. You may even do this at the market level in Index Options to negate the risk. Then you would slowly unwind both sides of the trade i.e. both the long side or the short side by trading out of the positions intraday and legging out of both sides or you could just let everything expire or a mixture of both.

The point here is that the Long Straddle Strategy has its uses BUT not for a Retail Trader mandate. Retail Traders need Directional, high Reward versus Risk / high ROI Options Trading Strategies because they either already have Stock positions or they already have a Fundamental Bullish or Bearish predisposition on a Stock that has been generated by a systematic Idea Generation process like the systematic process we teach in the PTM Video Series. Retail Traders are looking for an edge from the Options Trading Strategy and for it to add value to either current Long or Short Positions in the stock OR their Fundamental Predisposition by it adding a Marginal Benefit to trade structure. Retail Traders are not competing with Market Makers to hedge negative selection portfolios or indeed in order to "nickel and dime" (arbitrage) Market Makers on Options Prices that they believe are either too high due to the market maker models pricing higher implied volatility or too low due to the market maker models pricing lower implied volatility. If you have a fundamental predisposition of Bullish and you believe a Long Call Options trade for example will provide a higher ROI than simply being Long Stock then if Implied Volatility is priced lower than you expected, this will be reflected in the price of the Option and in your risk reward calculations already. This may present an opportunity. But simply buying a Long Straddle because you are bullish the underlying would be foolish because now the $ debit is twice the size and this will change the risk reward and ROI metrics drastically making the trade in the vast vast majority of cases not worth doing. It would also be counterintuitive to your view i.e. if you are Bullish, why bet the same amount of $ on a downside bet as you would on an upside bet and forego all other Bullish strategies? It simply makes no logical sense.

If you have experienced Trading Educators and Brokers that advocate this strategy as a viable and useful strategy for Retail Traders please question their motives for doing so. There may be a conflict of interest somewhere. Most likely it will be commission and / or volume based. Either that or they are just really genuinely dumb and they do not understand the Retail Trader mandate. Which probably means they don't even have their own trading accounts. Otherwise they would know it's a low usefulness strategy and / or they would have the integrity to tell you not to do it!

We do however have to understand the parameters of the Long Straddle here in order to provide perspective on what "Low Usefulness" means at a bare minimum and so we can understand more Optimal Strategies that are Directional in nature.

Break Even

Leg A = Buy 1X ATM Call, Leg B = Buy 1X ATM Put with the same expiration.

There is an upper break-even point and a lower break-even point.

Upper Break-Even Point = **Strike of Leg A + Price of Each Option in Leg A + Price of Each Option in Leg B)**

Lower Break-Even Point = **Strike of Leg B – (Price of Each Option in Leg A + Price of Each Option in Leg B)**

Profit Calculations (Maximum Upside)

Maximum profit is unlimited

Profit is made when **Price of Underlying Security > (Strike of Leg A + Price of Each Option in Leg A + Price of Each Option in Leg B)** or when **Price of Underlying Security < (Strike of Leg B – (Price of Each Option in Leg A + Price of Each Option in Leg B))**

Risk Calculations (Maximum Downside)

Maximum loss is limited to the initial net Debit

The Long Straddle will return a loss any time **Price of Underlying Security < Upper Break-Even Point and > Lower Break-Even Point**

Strategy Example

The longer term the Options contracts the more time the holder of a Call and a Put with the same expiration has to be right. However, this will already be reflected in the Options prices versus shorter term contracts. Longer term Long Straddles cost more than shorter term Long Straddles and Break evens will be higher. So, it is a fallacy to say that because someone puts on a Longer Term Long Straddle that they have a higher chance of making money than buying a shorter term Long Straddle.

However, here is an example of how it would work; -

- Company X stock is trading at $50, and you believe the price will make a significant move, but you are unsure in which direction.
- At The Money Calls (strike $50) are trading at $2. You buy 1 contract of these (1X Contract = 100 shares), at a cost of $200. This is Leg A.
- At The Money Puts (strike $50) are trading at $2. You also buy 1 contract of these (1X Contract = 100 shares), at a further cost of $200. This is Leg B.
- You have created a Long Straddle for a net debit of $400.

If Company X stock is still trading at $50 by the time of expiration

The options in both legs will expire worthless. You will lose your initial investment of $400.

If Company X stock is trading at $52 by the time of expiration

The Calls in Leg A will be worth $2 each ($200 total) while the Puts in Leg B will expire worthless. The $200 value of the Calls will partially offset the $400 initial investment and you'll lose a total of $200.

If Company X stock is trading at $56 by the time of expiration

The Calls in Leg A will be worth $6 each ($600 total) while the Puts in Leg B will expire worthless. The $600 value of the calls will cover the $400 initial investment and return a $200 profit overall.

If Company X stock is trading at $47 by the time of expiration

The Calls in Leg A will expire worthless while the Puts in Leg B will be worth $3 each ($300 total). The $300 value of the Puts will partially offset the $400 initial investment and you will lose a total of $100.

If Company X stock is trading at $42 by the time of expiration

The Calls in Leg A will expire worthless while the Puts in Leg B will be around $8 each ($800 total). The $800 value of the Puts will cover the $400 initial investment and return a $400 profit overall.