What are Stock Warrants? How do they Work?

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Often you might come across stock warrants and you might have wondered what does it mean. Even if you are not interested in buying the warrants, it is important to know if the company that you are interested in buying the stock in also has outstanding warrants, as the warrants can have disproportionate effect on the returns you may be able to realize from the stock itself. To understand why this is the case, it is critical to understandwhat is a stock warrant and how it works. There are similarities between warrants and options but they also differ in some key respects

Difference between Stock Warrants and Options

If you have stock options awarded to you through your employer, you have the basic idea of how these options work. If you invest in publicly traded options then you have even better idea of how the options work. Warrants are similar to the options, but with one critical difference.

Just like an option, a stock warrant is issued with a "strike price" and an expiration date. The strike price is the price at which the warrant becomes exercisable or "in the money". Both the warrants and the options eventually expire, if they are not exercised by a certain date.

The Key Difference Between Warrants and Options

Publicly traded options are created by the exchanges and are backed by the stock that already trades in the secondary market (the stock that is already issued that most of us buy and sell – as opposed to the primary market stock issue such as an IPO). When a Call Option is exercised, for example, the required amount of stock from the secondary market is purchased at the strike price.

Stock warrants on the other hand are issued directly by the company and they may trade on the exchanges or over the counter. When a warrant is exercised, the stock that is purchased upon exercising the warrants needs to be issued new by the company. These are not the shares that trade on the secondary market.

So you can see, exercising an option has no effect on the total number of common stock shares outstanding, whereas exercising a warrant *increases*the total number of common stock shares outstanding.

Stock warrants can also be long term, expiring far in the future while the options are typically short term instruments, expiring within the year (LEAPS are long term options but they are typically only available for a few selected stocks).

If you own common stock in a company that also has warrants outstanding, any exercise of the warrants will increase the number of outstanding shares thereby diluting the existing shareholders. This dilution is more pronounced when warrants are exercised, compared to say, the company issuing new shares on a follow on offering since any follow on offering is typically done close to the market price of the shares, while the exercise of the warrants are typically done below the market price of the shares.

Example of a Warrant

Consider a hypothetical warrant with a strike price of $25 and an expiration date of June 1, 2020. Let's say the shares of the company currently trade at $5/share. We will take 3 dates with hypothetical stock prices and review how the warrants will behave on those dates and prices.

Situation 1: Today, Stock Price = $5/share

Since the stock price today is $5 and the warrants have a strike price of $25, exercising the warrants today does not make sense. It will force the warrant holder to purchase new stock at $25/share while the stock can just be bought in the secondary market at $5/share. Therefore, the warrants will not be exercised. The warrants will also have very little value because they are so far "out of money".

The warrants will still have some value. This value comes from the fact that the warrant does not expire for another 8 years and it is likely that the stock price might exceed $25/share at some point during the next 8 years. Just like options, the value of the warrants can be calculated by using the Black Scholes method. Let's assume, for the sake of the example, that the value of the warrants is $0.25

Situation 2: June 1 2016, Stock Price = $30/share

If the stock price has risen to $30/share by June 1, 2016 the value of the warrants is at least $5. This is because the warrant holders are now able to exercise the warrants, buy the stock at $25 and sell it back in the market at $30 for a $5 profit. Knowing this the market moves to bid up the price of the warrant until the possibility of profiting by just buying the warrant and exercising it right away disappears.

Note that if an investor buys the warrant on June 1 2016, and immediately flips it by exercising it and selling the resulting stock, he will not make any profit. In fact, he may end up with a loss since the price of the warrant is likely to be more than $5 (there are 4 more years remaining before the warrants expire and the probability that the stock price might move higher than $30 in that time gives the warrant additional value).

However, if the investor bought the warrants 4 years ago and paid very little for it, this is a great time to sell the warrants or exercise them. In this scenario, the investor in the warrants may end up with a profit of $5 – $0.25 = $4.75 or 1900%. The stock only went up by $30 – $5 = $25 or 500%.

Situation 3: June 1 2020, Stock Price = $25 or less

The warrants will expire worthless since there is no possibility of profiting by exercising the warrants. Note that the stock may have fallen only 17% since June 1, 2016 but the value of the warrants have declined by 100%.

As this example shows, the Warrants are highly leveraged and magnify the gains or losses on the stock. Therefore they should be used with care and unless you are a professional options trader and are comfortable with the risk, you should keep your exposure to the warrants to a small part of yourportfolio.

That being said, warrants do have a role to play in an investor's portfolio. They can be a way of controlling larger amount of stock with using a less capital than if you buy the stock directly. They can also be used for hedging purposes, similar to options.

And sometimes, the stock may not be undervalued but the stock warrants may be since warrants are not as popular with investors as the common stock. In those situations, it may offer the possibility of a risk free arbitrage.

Here is a real life example of a stock warrant that we bought and sold over the course of 1 year. These warrants were originally issued by Real Opportunity Investments Corp as an incentive for the investors to purchase their stock. The warrants have now expired.