Convertible Arbitrage offers an attractive long-term risk/reward profile, a lack of correlation to most major asset classes, a structure that allows one to monetize volatility, and exposure to a liquid but niche asset class that enjoys a risk premium.

Convertible arbitrage portfolios have three primary sources of return.

Convertible Arbitrage – Still Holding Strong

By: Dagney Hollander, Portfolio Manager

Sources of Return

There are **three primary sources of return** in a convertible arbitrage portfolio. The first is the **income component.** This consists of the current yield on the portfolio and the rebate earned on the underlying equity short positions. The current yield on SSI's Convertible Income portfolio is presently 3%*. The effective duration of our portfolio is two years, and empirically it tends to be lower. In addition to the coupon earned on the convertible bond, the investor also earns a rebate on the underlying short position. ZIRP (Zero Interest-Rate Policy) made the short rebate slightly negative for many years, but with the Fed raising rates, the rebate on our underlying short positions now contributes approximately 1% on an annualized basis. This is taking into account the rebate earned and the cash-on-cash hedge ratio of the portfolio. *The short rebate is one reason why convertible arbitrage benefits from rising interest rates*.

The second element of return comes from the SSI team's **ability to identify undervalued securities.** This can be either systematic or company specific, and varies over time depending on dislocations in both the convertible market and the broader markets. While it would be safe to say that dislocation is not high at present, it is challenging to predict when dislocation might resurface. When considering an allocation to convertible arbitrage, SSI's long term track record and merits of the strategy – a lack of correlation to most major asset classes, low duration, an ability to monetize volatility, and exposure to a liquid but niche asset class that enjoys some risk premium – make a compelling case for a permanent allocation. Additionally, the underlying dynamics in the convertible market are quite healthy.

Two important aspects to consider when analyzing the health of the convertible market are the investor base and trading activity. It is important to monitor the composition of investors and the leverage utilized by convertible arbitrage funds because in the past skewing in the investor base towards highly leveraged hedge funds has caused drawdowns. The investor mix has been healthy for many years, with a relatively equal split between outright and convertible arbitrage investors in terms of both positioning

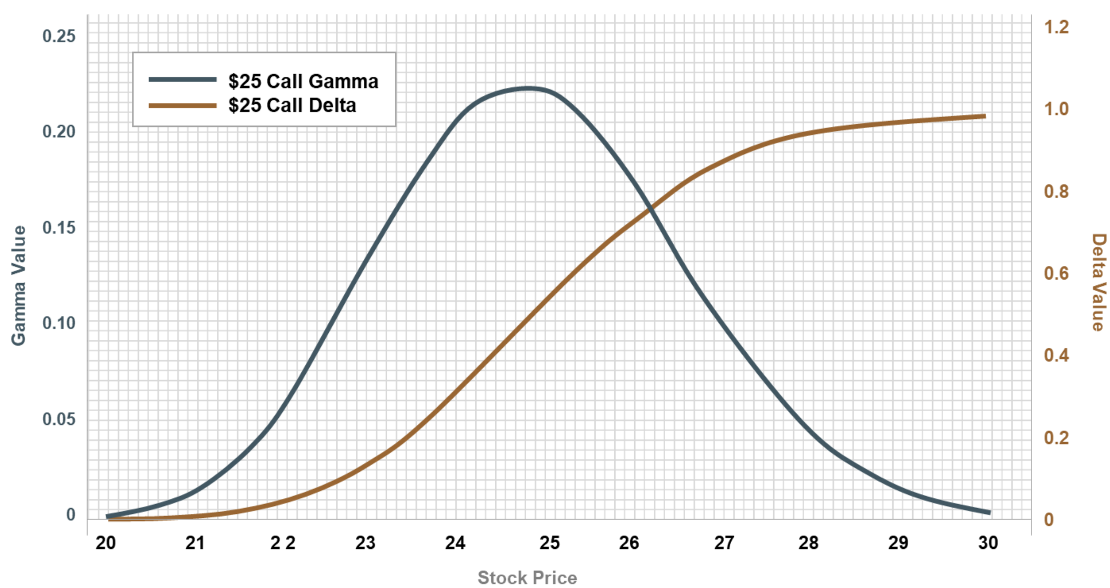
9440 Santa Monica Blvd. | 8th Floor | Beverly Hills, CA 90210 | tel: (310) 595-2000 | fax: (310) 595-2089 | www.ssi-invest.com

and the trading activity. The leverage utilized by hedge fund or arb investors is low when compared to past periods and prop desks are not relevant post-Dodd Frank. These factors make SSI's team comfortable that the market is healthy and well-positioned from an investor-base standpoint. Additionally, trading activity (as measured by turnover) in the convertible market is actually higher than the high yield market, a fact that surprises some.

The third source of return is **gamma trading**. When SSI's team meets with prospective investors, gamma trading is the element of the strategy that causes the most consternation. It helps to remember that a convertible bond consists of two components: 1) a straight bond and 2) a call option on the underlying equity (because the bond can be converted into stock at a set price). In a convertible arbitrage portfolio, the stock is sold short to protect against, or hedge out, movements in the underlying equity. It is this short position in conjunction with the long call option that creates the gamma trading opportunity.

When we short the stock as a hedge against equity price movements, we use the delta and the conversion ratio to determine how much stock to short. Delta is a measure of how sensitive the call option is to movements in the underlying equity. Gamma is simply the rate of change of delta. As the underlying equity approaches the strike price on the call option, the delta increases. As the equity moves away from the strike price (in either direction), the gamma decreases. Gamma is highest when the stock is near the strike price (see Chart A below).

Chart A: Gamma vs. Call Delta



Above chart for illustration purposes only.

9440 Santa Monica Blvd. | 8th Floor | Beverly Hills, CA 90210 | tel: (310) 595-2000 | fax: (310) 595-2089 | www.ssi-invest.com

SSI profits from these movements by adjusting the short equity position as the delta changes. As the price of the stock goes up, the delta moves higher and we must short more stock. As the price of the stock goes down, the delta moves lower and we decrease the short position. Another way to think about it is that as the stock is moving higher, we are not short enough stock which creates a profit and as the stock is moving lower, we are short too much stock which also creates a profit. On average, gamma trading has contributed 1.5% on an annualized basis over the last several years.

Another element worth pointing out, as we discuss gamma trading, is volatility. While volatility as measured by the VIX Index has been historically low, convertibles tend to be issued by growth companies, often in the Healthcare and Technology sectors. These companies tend to have equities with higher underlying volatility. The average three-month implied volatility of the underlying shorts in the SSI Convertible Income portfolio is 35, which is significantly higher than the VIX.

As we consider the sources of return that do not require mispricing or dislocation – a current yield of approximately 3%, a short rebate of 1%, gamma trading of 1.5%* - and measure them against a duration of two years, a strategy largely uncorrelated to other asset classes and a track record that spans almost a quarter of a century, we think that the case for convertible arbitrage as a core holding is strong.

**Statistics presented are SSI's representative account for the Convertible Income Strategy as of 8/22/2018.*

About SSI Investment Management		
▪ Headquartered in Los Angeles, CA	▪ Founded in 1973	▪ 13 Investment Professionals
▪ 100% Employee Owned	▪ $1.8 Billion AUM	▪ 37 Employees

9440 Santa Monica Blvd. | 8th Floor | Beverly Hills, CA 90210 | tel: (310) 595-2000 | fax: (310) 595-2089 | www.ssi-invest.com

Compliance Statement

SSI Investment Management, Inc. ("SSI") claims compliance with the Global Investment Performance Standards (GIPS®).

Definition of the Firm

SSI was established in 1973 and is a Registered Investment Advisor based in Los Angeles, CA. SSI manages assets in domestic and global capital markets. SSI acquired the assets of Froley, Revy Investment Co., Inc. ("Froley Revy") and its composites as of March 1, 2009. SSI is 100% employee owned and is not affiliated with any parent organization nor does SSI have any subsidiaries. SSI applies quantitative disciplines and fundamental research in its management of alternative and traditional portfolios for institutional and high net-worth investors. SSI manages separate accounts, limited partnerships and acts as sub-advisor to mutual funds.

Policies

SSI's policies for valuing portfolios, calculating performance, and preparing compliant presentations is available upon request.

The Composite & Benchmark

The SSI Convertible Income Strategy (composite created January 1, 1995) invests long in a diversified portfolio of convertible bonds/preferreds and short the underlying common stocks to attempt to achieve an absolute return. The composite contains fully discretionary accounts including those no longer with the firm. With interest rebates on short sales and coupon interest on convertible bonds comprising a consistent and important component of the return of the SSI Convertible Income Strategy, SSI believes a performance comparison versus the 90-Day Treasury Bill is appropriate. The volatility of this strategy is expected to be greater than the volatility of the 90-Day Treasury Bill due to the inclusion of convertible and equity positions. The return, if any, above the 90-Day Treasury Bill is dependent upon higher interest income available in the convertible market and SSI's discretionary management. Any other indices shown are not necessarily comparable to SSI's Convertible Income Strategy. These are widely recognized market indices that are shown for informational purposes only. The composite name was formally known as SSI Hedged Convertible Income Strategy from 1/1/1995 – 6/30/2008 and on 7/1/2008 the new composite name became the SSI Convertible Income Strategy.

Use of Leverage, Derivatives, and Shorts

Leverage is not used in SSI's Convertible Income Strategy and the use of derivatives is not material. The Strategy is generally fully hedged and involves buying a convertible bond/preferred and shorting the underlying common stock in order to reduce the equity exposure. Every long position is hedged with an offsetting short.

Investment Management Fees

Returns are presented gross and net of management fee. Actual results of an individual account may be materially different from the performance shown herein because of differences in inception date, transaction and related costs, restrictions, fees and other factors. All performance is based in U.S. dollars and reflect, on a percentage basis for each of the periods indicated: (a) the net increase (decrease) of all SSI Convertible Income Strategy portfolios, dollar-weighted, including adjustments for unrealized gains and losses, the reinvestment of dividends and other earnings, the deduction of investment costs, the deduction of limited partnership and/or mutual fund costs (if any), time-weighted to adjust for additions and withdrawals, and (b) the net increase (decrease) of the 90-Day Treasury bill.

Net performance is reduced by SSI's actual investment management fees and model fees (1995-2014). 1% annual fee is used for any model fees. Gross performance does not include deduction of SSI's investment management fees.

If performance is gross of management fees, client's actual return will be reduced by the management fees and any other expenses which may be incurred in the management of an investment advisory account. See SSI's Form ADV, Part 2A for a complete description of the investment advisory fees customarily charged by SSI. As an example, an account with an initial $1,000,000 investment on January 1, 2003, earning a recurring 5% semi-annual gross return (10.25% annualized), and paying a .5% semi-annual management fee (1% annual fee) would have grown to $1,340,096 on a gross of fees basis and $1,300,392 on a net of fees basis by December 31, 2005 (3 years).

List of Composites

A list of the Firm's composite descriptions and/or compliant presentations are available upon request. Please contact juliea@ssi-invest.com.

Additional Disclosure

When representative portfolio information is shown the representative portfolio is selected by comparing any one (but not limited to) the following criteria: most in line with composite investment objectives /consistency of investment strategy, investment restrictions, fee structure, time frame managed, type of client, size of account.

SSI acquired Froley Revy and its composites as of March 1, 2009. Prior to the acquisition, Froley Revy claimed GIPS compliance for the periods of 1983-2008 and was independently verified by Ashland Partners & Co.

Investors must assess the suitability of any particular investment opportunity and carry out any due diligence that they require in relation to the strategy or investments or individual holdings of the strategies that SSI manages. In doing this, investors should seek separate advice. It should not be assumed that recommendations made will be profitable and any investment is at risk of loss. This summary represents the views of the portfolio managers as of the date noted at the beginning of this document. Any holdings mentioned in the accompanying summary are from its stated strategy. Portfolio holdings are subject to change without notice and are not intended as recommendations of individual securities. The information in this article is not intended to be personalized recommendations to buy, hold or sell investments. The information, statements, views and opinions included in this article are based on sources (both internal and external sources) considered to be reliable, but no representation or warranty, express or implied, is made as to their accuracy, completeness or correctness. Such information, statements, views and opinions are expressed as of the date of this article, are subject to change without further notice and do not constitute a solicitation for the purchase or sale of any investment referenced in the article.

THIS MATERIAL IS INTENDED ONLY FOR QUALIFIED INVESTORS. IT DOES NOT CONSTITUTE AN OFFER TO PURCHASE AN INTEREST IN ANY PRIVATELY OFFERED FUND MANAGED BY SSI. SSI BELIEVES THAT RESULTS WERE GENERATED WITH AN INVESTMENT PHILOSOPHY AND METHODOLOGY SIMILAR TO THAT DESCRIBED HEREIN. FURTHERMORE, THE PERFORMANCE DISCUSSED HEREIN REFLECTS INVESTMENT OF LIMITED FUNDS FOR A LIMITED PERIOD OF TIME AND DOES NOT REFLECT PERFORMANCE IN DIFFERENT ECONOMIC OR MARKET CYCLES. FUTURE INVESTMENTS, HOWEVER, WILL BE MADE UNDER DIFFERENT ECONOMIC CONDITIONS, IN DIFFERENT SECURITIES AND USING DIFFERENT INVESTMENT STRATEGIES. IT SHOULD NOT BE ASSUMED THAT FUTURE INVESTORS WILL EXPERIENCE RETURNS, IF ANY, COMPARABLE TO THOSE DISCLOSED HEREIN. THE INFORMATION GIVEN IS HISTORIC AND SHOULD NOT BE TAKEN AS ANY INDICATION OF FUTURE PERFORMANCE. THE PERFORMANCE DATA WAS PREPARED BY SSI AND WAS NOT COMPILED, REVIEWED OR AUDITED BY AN INDEPENDENT ACCOUNTANT. BEING REGISTERED AS A REGISTERED INVESTMENT ADVISOR DOES NOT IMPLY A CERTAIN LEVEL OF SKILL OR TRAINING. ANY INVESTMENT IS SUBJECT TO RISK OF LOSS. ANY USE OF LEVERAGE INCREASES THE INVESTMENT GAIN OR LOSS IN DIRECT PROPORTION TO THE DEGREE OF LEVERAGE USED.