



# Polygon Investment Partners

Approaching convertibles from a different angle

MIKE HUMPHRIES

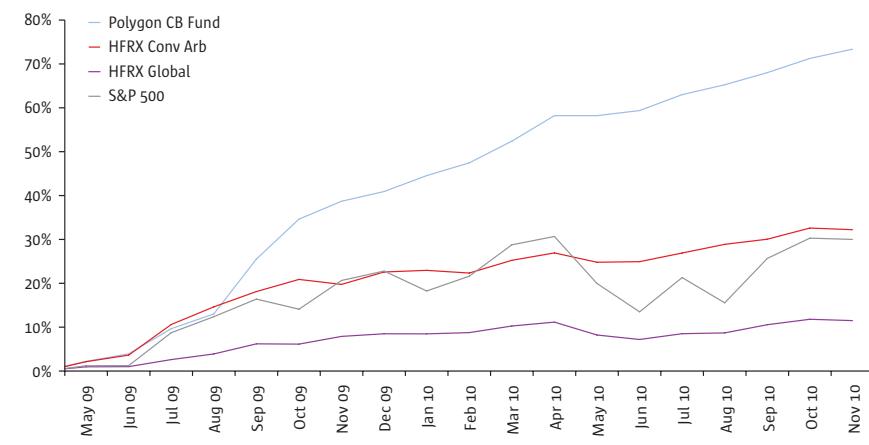
The failure of Lehman Brothers doesn't conjure up many images of salvation but the aftermath did throw a lifeline to the surviving members of the convertible arbitrage strategy. The fallout resulted in a significant loss of capital and the closure of numerous hedge funds and prop desks and restored a favourable competitive dynamic to the convertible market that I have not seen since the 1990s. Many investors have underestimated the extent of these changes and the likely duration and attractiveness of the opportunity within the convertible markets as a result. Investors bypassing the sector also risk overlooking a new breed of niche funds which are not reliant on traditional convertible arbitrage for their returns.

In its most simple form a convertible bond (CB) pays a fixed coupon and provides the holder with either a return of principal at maturity or the option to convert into a fixed number of common shares underlying the bond. It isn't hard to imagine that this package might be misvalued and from the inception of the product there have been investors focused on exploiting that opportunity. In the realm of "once upon a time" it was possible in the product's infancy to buy a convertible bond for less than the value of the underlying equity, convert the security and realise an arbitrage profit. That strategy was a close fit with the academic definition of arbitrage (a risk-free profit at zero cost) and convertible arbitrage was born.

The markets evolved dramatically in the ensuing decades and with greater efficiency the simple arbitrage disappeared; however, the convertible arbitrage moniker remained. Ironically, it wasn't until the maturity of the market for credit default swaps (CDS) that managers had a broad enough range of tools to engage in anything closely resembling true arbitrage. This evolution was accompanied by healthy growth in the market for single stock options and advances in the modelling of convertible bonds (and the availability of those models). These factors contributed to a convergence in the investment approach employed by CB arbitrage funds and to an attendant rise in correlations as a result.

**Fig.1 Cumulative Performance from Inception**

Source: Hedge Fund Research, Bloomberg, and Eurohedge



Convertible funds would also become a victim of their own success with capital flows chasing performance and the market becoming progressively more crowded. Years of compelling returns came to an end and along with them any ideas of a "happily ever after" for the majority of convertible arbitrage funds.

The convertible market cheapened very significantly in the fall of 2008 and although it has retraced some of that move, it still trades at an attractive discount to fair value. The opportunity for investors is further enhanced by a dramatically improved competitive landscape with prop desks nearly eliminated and hedge funds still a fraction of their former presence. However, the commonality of approach amongst the majority of arbitrage funds acts as a deterrent to many alternatives investors looking at the space and it seems reasonable (as they fear) to presume the market will again trade in a broadly efficient manner. For this reason, and because the hedge funds active in the space are almost exclusively focused on traditional convertible arbitrage, the market is often overlooked as a source of opportunity by alternatives investors (i.e. there is no "box" in which to place convertible focused funds with a different mandate).

The convertible bond is seldom used outside the arbitrage community - this is nearly astonishing for an instrument with such powerful characteristics: it straddles the

capital structure, has valuable optionality, and contains terms and conditions which vary widely from one bond to the next (and are frequently the source of significant opportunity). A simple security like common equity has attracted countless hedge fund strategies and yet a product with far greater versatility remains almost exclusively an instrument of favour with convertible arbitrageurs. There is ample opportunity for a thoughtfully structured fund with the right combination of skills and strategy to exploit this inefficiency, targeting situations outside the expertise or scope of traditional arbitrage players. To better understand the extent of this opportunity an examination of the history of CB arbitrage and the many formative changes it has witnessed is a prerequisite.

## A brief history

The advancement of the methodology and tools used to model a convertible bond greatly unified the perception of relative value within the arbitrage community. It was, however, the development of the market for single stock options and credit default swaps which radically changed the investment approach itself and was to have a more profound impact on convertible arbitrage. Those two securities provided a separate market for the constituent pieces of a convertible bond, simultaneously shedding light on the appropriate assumptions to use in valuing a convertible and enabling an actual arbitrage between those markets and the convertible bond. It had previously been

necessary to deduce, through analysis and experience, the fair volatility and credit to use when valuing a bond. A thoughtful model was of no use if the inputs weren't well informed. Convertible arbitrage at that time consisted of owning a bond that was significantly cheaper than suggested by the combination of credit work and the optionality of the security. Although a short stock position was maintained to hedge the optionality (and some credit risk) the investment was more a value proposition than an arbitrage. The strategy was successful because funds were able to own bonds at discounts that made them profitable in all but extreme scenarios. For years the discount to "fair value" at which the market traded ranged from 2 to 3% and the convertible arbitrage strategy produced consistent and uncorrelated mid-teens returns.

The adoption of the ISDA standard master agreement facilitated uniform trading of contracts and ultimately led to explosive growth in the CDS market. This was the final piece of the puzzle enabling convertible arbitrageurs to effectively arbitrage a convertible bond position. Prior to this development, the only observable metrics for the credit of a particular issuer had come from the cash bond market. In the circumstances where there was no straight debt for a company (frequently the case for convertible issuers), or the bonds were illiquid or a poor benchmark for other reasons, funds had to rely on their own credit analysis to gauge the fair value of a convertible bond. With the expansion of the CDS market, credit for any issuer could be traded by dedicated credit players, irrespective of which securities were outstanding. The credit market was motivated to trade CDS on the majority of convertible names because the CB arbitrage community was a natural buyer of credit protection to hedge those names. Once-opaque credits became subsequently transparent and hedgeable, and the analysis of credit risk for a majority of the convertible market was undertaken by pure credit players and not the CB arbitrage community.

Crowded conditions and fully developed markets for credit and volatility greatly simplified the identification and hedging of mispriced bonds and in 2004 the long run

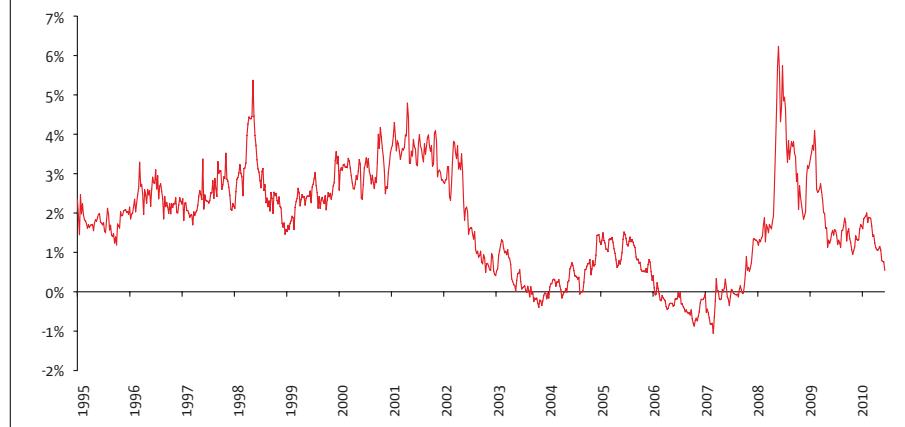
**Table 1 Contrasting CB Arb return environments**

	1994 - 2002	2003 - 2008
Median Annual CB Arbitrage Return	14.6%	3.6%
Annualized CB Arb Return over Period	10.2%	-1.3%
Correlation to Richening/Cheapening of CB Mkt	6.4%	55.6%
Correlation to CS/Tremont Main HF Index Return	20.0%	77.3%
Correlation to S&P 500 Returns	2.7%	34.8%

Source: CS/Dow Jones Indices, BofA/ML Convertible Research, Bloomberg

**Fig.2 Historical Average US Convertible Market Discount to Fair Value**

Source: BofA/ML Global Research



**Table 2 Polygon Convertible Opportunity Fund Net Performance - Class A Shares\***

Source: EuroHedge

	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	YEAR
2010	2.57%	2.01%	3.36%	3.81%	0.00%	0.74%	2.28%	1.38%	1.67%	1.92%	1.23%	-	23.03%
2009	-	-	-	-	2.21%	1.68%	5.51%	3.07%	11.07%	7.24%	3.03%	1.60%	40.92%

\*Fund began trading 20th May 2009

Inception to date 73.37%

Annualised to date 43.17%

of good fortune for investors in convertible arbitrage came to an end. The skill set, and focus, of convertible arbitrageurs moved significantly away from the fundamental analysis that had enabled early funds to assess credit quality and fair volatility. Increasingly, traders became reliant on the market for CDS as their insight into credit and became more focused on CB modelling theory and in understanding and trading volatility. With so many funds looking at the same metrics and using the same tools to extract value the overlap in holdings (and correlations) amongst convertible funds became very pronounced. The cheapness of the convertible market varied (often significantly) in response to capital flows and in reaction to market cycles - as did the attractiveness of the opportunity. An

investment in a multi-strategy fund, with a flexible allocation to CB arbitrage, was seen by many as the preferred means by which to invest in the strategy.

### Returning to the present

Despite the current cheapness of the asset class and the very favourable competitive landscape it is clear that a number of obstacles must be overcome by any hedge fund looking for a sustainable opportunity in the convertible markets. Our chosen route is most similar to the general approach of many event-driven or long/short equity managers. The objective is to build a concentrated book of heavily researched names with specific catalysts by which we can foresee the names trading to fair value (instead of patiently waiting for mean reversion) and to avoid the names and

situations common amongst other hedge funds. We prefer bonds where the credit and optionality are not easily understood by arbitrageurs and favour strategies tied to events and corporate actions or where the terms of a specific security are confused, unknown or misvalued. To succeed across market cycles requires a strategy and expertise which is differentiated from typical arbitrage funds and is sufficiently flexible and diverse to react to an evolving opportunity set. Perhaps most importantly: the fund must be thoughtfully sized.

The 1,500+ bonds which comprise the US and European convertible markets have a combined convertible bond market capitalisation of approximately \$400 billion. This is less than 2% of the size of the equity markets in those same regions and has broad implications for fund sizing. Liquidity in the convertible markets is significantly lower in an absolute sense than in equities (trading volumes are around \$30 billion a month for US converts versus closer to \$600 billion per month for the S&P500) but the convertible markets are relatively more liquid and turnover in the US convertible markets as a percentage of outstanding value is nearly twice that of the US equity markets. To put that in context \$1 billion of convertible debt equates to the same relative proportion of the convertible market as \$50 billion of equities represents in relation to the equity market (or to \$25 billion of equities on the basis of turnover). These metrics suggest obvious size constraints for convertible funds.

We target the situations in which the convertible bond is the most attractive part of a company's capital structure or is a powerful instrument with which to invest in the outcome of an event or corporate action. Our fundamental research is focused on sectors in which we specialise and we seek to understand both the aggregate value of a company and the relative valuation of the constituent stakes (equity, convertible, or debt). In addition to the 14 years over which I have traded convertibles I've written equity research, toiled in investment banking, and also managed event driven and long/short equity portfolios. That diverse expertise has enabled me to focus effectively on

equity and credit fundamentals, events, and corporate actions and I have a strong and complementary team. We are physically present in the markets which we trade, which I feel is crucial, and I have a strong partner in Rob Dorfman in NYC which facilitates the free movement of capital across regions. This combination allows us to pursue a differentiated and concentrated strategy that overlaps minimally with traditional arbitrageurs.

"Follow the money", that memorable piece of advice given to Bob Woodward in All the President's Men, has broad applicability for our industry. The dollars and excesses of the past decade cut a clear path to the events which forced Lehman's demise and I'm sure the next crisis will have similar tracks. To literally "follow the money" in the alternatives universe would lead you to the doorsteps of a hedge fund with at least \$1 billion of assets under management as investors overwhelmingly opt for the "safety" of the very largest and most recognisable names in the industry. The club of managers with greater than \$1 billion of assets represents just 3% of active funds yet holds 87% of all assets invested with hedge funds. The 15 largest hedge funds control a staggering \$368 billion of the \$1.7 trillion universe<sup>1</sup>. Can "too big to fail" be far behind?

We believe that the most compelling opportunities lie instead in the places to which the money is not going and that more crowded conditions will always provide an unfavourable headwind for performance. We thrive on our niche approach to the convertible market. We thank legislators that cash is not flowing back into the proprietary trading desks which once controlled 20% of the convertible market (and proved awkward competition with their far greater leverage and better access to funding). We're also thankful that convertible arbitrage remains unpopular amongst investors and that little money is finding its way into convertible hedge funds of the more traditional variety. The fundraising may prove difficult but the opportunity is heartening. **THF**

(1) Bank of America Merrill Lynch Global Hedge Fund Industry Overview Q3 2010

## ABOUT THE AUTHOR

### MIKE HUMPHRIES

Mike Humphries is the CIO of the Polygon Convertible Opportunity Fund, launched in May 2009, and has been involved in the convertible markets since 1994; as a founding principal of MKM Longboat, as the head of Sagamore Hill UK, and through the eight years spent in proprietary trading and investment banking at Goldman Sachs.