

## **Chapter 2 Literature Review**

With progressing transparency of investment activity and structure flexibility, hedge fund has provided investors an attractive investment option. The hedge fund investment objective of “make absolute return” is rather different from traditional asset management of “seek relative return or beat the benchmark”. The investment strategies are a lot more flexible than traditional mutual funds or other investment structures, which makes them an especially suitable option in volatile or falling markets. Chapter 2 of this thesis provides an introduction of hedge funds. This chapter also provides some results from industry surveys conducted by well-known hedge fund advisories and previous researches on the factors influencing hedge fund choices.

### **2.1 About Hedge Funds**

It is important for investors to learn about hedge funds. Hedge funds differ than other investment vehicles in many ways and therefore it is crucial to understand the return and risk characteristics, different strategies associated with investment decisions and the role hedge funds play in the market. This section has provided basic information related to hedge fund investment for investor’s reference, including the definition and history of hedge funds, types of hedge fund strategies, current market conditions with legal and regulatory issues and lastly, the differences between hedge funds and mutual funds.

### 2.1.1. Definition of Hedge Funds

There is no simple definition of hedge funds and Beverly Chandler (2002) says, “A hedge fund is defined by its common characteristics, rather than by one simple definition”. Legally, it may take the form of a limited partnership, corporation, trust or mutual fund depending on where the fund is domiciled and the type of investors it seeks to attract. The domicile or legal location of the hedge fund determines the structure. Most U.S.-based hedge funds are structured as limited partnerships while hedge funds outside the U.S., or offshore funds, are typically structured as limited liability companies. A pragmatic definition has been adopted by Francois-Serge Lhabitant (2004), “Hedge funds are privately organized, loosely regulated and professionally managed tools of capital not widely available to the public”. According to the report “Understanding Hedge Fund Performance” written by Thomas Schneeweis, Hossein Kazemi and George Martin (Nov, 2001):

*“As many definitions for hedge fund exist, they are basically loosely regulated private pools of investment capital that can invest in both cash and derivative markets on a levered basis for the benefits of their investors.”*

As with more traditional styles of management, investor funds are allocated either in a separate account or, more typically, in a commingled fund. The hedge fund structure gives investors access to hedge fund managers with specialized investment skills. Unlike traditional asset managers, many hedge fund managers try to create value primarily through positions uncorrelated with systematic exposure to capital markets. Instead, they seek to generate portfolio performance regardless of the direction of the capital markets.

Return opportunities come from two sources: an expanded universe of securities from which to trade; and a wider array of trading strategies implemented without the constraints of regulation common to most traditional products. For example, hedge fund strategies may access financial and commodity markets and may take long, short, spread, option and levered positions in any of these markets. Therefore, hedge funds provide unique risk and return characteristics that are not accessible by traditional asset management strategies. The hedge fund structure encompasses a diverse set of strategies that attempt to create value by exploiting specific arbitrage opportunities. Investment objectives vary widely among hedge fund managers. Some hedge fund strategies, such as market neutral, attempt to avoid systematic exposure to the capital markets and are true diversifiers. Other hedge fund strategies, such as equity long/short, are more sensitive to the same market factors as traditional stock strategies. More investment strategies are discussed later in this chapter.

### **2.1.2. History of Hedge Funds**

Hedge fund perhaps has been made famous by a couple of media favorites - George Soros' currency plays on billions of British pound and the Japanese yen in the 1990s, and later by the collapse of the Long-Term Capital Management in 1998. Investors are often surprised to learn that the very first hedge fund was founded more than 50 years ago as a conservative investment approach designed to protect capital from market downturns. The fund has derived its nickname from its strategy of taking long and short positions in the stock of companies - a strategy which continues to be central to many hedge fund managers. It has provided risk management to hedge against macro-economic factors, while at the same time benefiting from the individual performance of specific companies.

**In the 1940's:** Many have believed that Alfred Winslow Jones was the first manager to combine a leveraged long stock position with a portfolio of short stock positions in an investment fund. Jones was paid on an incentive fee basis by using a private limited partnership structure to suit his investment strategy. Francois-Serge Lhabitant (2004) has believed Alfred Winslow Jones was credited with establishing the first hedge fund as a general partnership in 1949.

**1960's to 1970's:** The prospect of better returns increased the popularity of hedge funds in the 60s. With the greater popularity, hedge fund managers changed their approach. The nature of hedge fund management was shifting and managers were taking more risk by leveraging instead of hedging their positions. When markets took a turn for the worst, these riskier strategies did not pay off and hedge funds hit a difficult period from the mid 60s to the end of the 70s. Famous participants during this period include Warren Buffet and George Soros according to Robert Jagger (2003).

**1970's-1980's:** Futures trading has started to become more familiar by the investors. The futures trading accounts has gradually evolved into the futures fund, or commodity pool. According to Robert Jagger (2003), investors could gain access to diversified futures portfolio that could take short positions against rising inflation and interest rate.

**From 1980 to 1990:** Derivative products are gaining popularity in the market and new styles of management were developed. Hedge funds became a more heterogeneous group. The hedge fund industry started to offer a greater selection of products, using more sophisticated strategies. This was the start of a growth industry

where hedge fund became the most popular investment vehicle. According to Francois-Serge Lhabitant (2004), “The expanded base of “sophisticated” investors, especially the high net worth private investors are seeking hedge funds and other alternative investments which generally targeted higher absolute returns for their flexibility and lack of constraints”.

**From 1990 to 1999:** Over the years, hedge funds have become significant participants in most global futures exchanges. According to William Fung and David Hsieh (1999), there were 231 hedge funds with US\$6.5 billion of assets under management in 1990 and the industry has grown to 987 hedge funds with around US\$65 billion of assets under management at the end of 1997. The development of hedge funds was at its prime and the great bull market was pushing returns to record highs. Many traditional money managers were becoming hedge fund managers.

**In year 2000:** The Technology Bubble burst in 2000 and reality struck. The subsequent market meltdown separated the true hedge fund managers from the improvised managers. The industry had too many players at the time. Many important groups such as George Soros' Quantum Funds or Julian Robertson's Tiger Fund had to withdraw. The nature of a good hedge fund is to perform well in all market conditions. Many funds were too directional and it became their downfall. According to Francois-Serge Lhabitant (2004), the motives of investing has changed drastically, investors have been looking for an effective means of diversification to protect their capital from falling equity markets and depressed bond yields.

**Today:** With more refined regulatory framework and increased transparency to hedge funds, investors have easier access to a healthier hedge fund industry. The business of

hedge fund during this period is to generate absolute returns through shifting market conditions. According to Francois-Serge Lhabitant (2004), many hedge funds became more mature, and put in place stable investment process, lower leverage, improved transparency and effective risk management to satisfy the high standards and rigorous selection process.

### 2.1.3. Types of Hedge Funds and Strategies

There are many different hedge fund strategies being practiced through out the world today. In this financial climate, fund managers are evolving and becoming more knowledgeable, using more complex tools, and improving their strategies to outperform the competition. The types of hedge fund are categorized from the strategies the hedge fund managers use. The following table is a summary of the different hedge fund strategies. Refer to *Table 2* as follows:

**Table 1: Descriptions of Hedge Fund Strategies**

| Style                   | Strategy  | Description  |
|-------------------------|---|--|
| <b>Tactical Trading</b> | <b>Global Macro</b>                                   | Make leveraged, directional, opportunistic investments in global currency, equity, bond, and commodity markets on a discretionary basis. Usually rely on a top-down global approach and base trading views on fundamental economics, political and market factors. The portfolios rely heavily on derivatives.   |
|                         | <b>Managed Futures and Commodity Trading Advisors</b> | Primarily trades listed commodity and financial futures contracts on behalf of their clients. The trader groups split into systematic and discretionary. Systematic traders believe that future price movements in all markets may be more accurately anticipated by analyzing historical movements within a quantitative framework. Discretionary traders base trading decisions on fundamental and technical market analysis, as well as experiences and trading skills. |

| Style   | Strategy                                    | Description  |
|---|---|--|
| <b>Equity Long/Short or Directional Trading</b> | <b>Global</b>                               | Invest in equities worldwide   |
|   | <b>Regional</b>                             | Invest in equities of a specific region. (i.e. Asia Pacific)   |
|   | <b>Sector</b>                               | Invest in equities of a specific sector. (i.e. Technology)   |
|   | <b>Emerging Markets</b>                     | Invest in all types of securities in emerging countries, including equities, bonds and sovereign debt. Tend to employ a long-based strategy.   |
|   | <b>Short-Selling</b>                        | Invest in equities only use short positions.   |
|   | <b>Market Timing</b>                        | Vary long/short exposure in response to market factors within a short period of time. A variety of asset classes may be used, such as mutual funds and money market funds.   |
|   | <b>Futures</b>                              | Invest primarily in futures, which are financial contracts for the buying and selling of an index or commodity at some future date.  |
| <b>Event-Driven</b>                             | <b>Event-Driven or Corporate Life Cycle</b> | Focus on debt, equity or trade claims from companies that are in a particular stage of their life cycle, such as spin-offs, merger and acquisitions, bankruptcy, reorganizations, re-capitalization and share buy-back. The portfolio of some Event-Driven managers may shift in majority weighting between Risk Arbitrage and Distressed Securities, while others may take a broader scope.   |
|   | <b>Distressed Securities</b>                | Focus on debt or equity of companies that are or are expected to be in financial or operational difficulties. Such as reorganizations, bankruptcies, distressed sales and other corporate structuring. These securities often trade at substantial discounts. It is normally long-term in nature and have long redemption periods. Depending on the manager's style, investments may be in bank debt, corporate debt, trade claims, common stock, preferred stock, and warrants. |
|   | <b>Risk Arbitrage or Merger Arbitrage</b>   | Involves investment in event-driven situations that include a merger or acquisition, such as leveraged buy-outs, mergers, and hostile takeovers. These strategies generate returns by purchasing stock of the company being acquired, and in some instances,   |

| Style                           | Strategy                                   | Description  |
|---------------------------------|--|--|
|                                 |  | selling short the stock of the acquiring company.  |
|                                 | <b>Event-Driven Multi-Strategy</b>         | Draw upon multiple themes, such as risk arbitrage, distressed securities. Occasionally other themes such as investments in micro and small capitalization public companies that are raising money in private capital markets (Regulation D in the U.S.A.)  |
| <b>Relative Value Arbitrage</b> | <b>Convertible Arbitrage</b>               | Seek to exploit pricing anomalies between convertible bonds and the underlying equity. A typical investment is to long the convertible bond and to hedge a portion of the equity risk by selling short the underlying common stock. Most managers employ leverage, ranging up from zero to 6:1. (i.e. for every \$1 of investor capital, \$6 is invested in securities using a margin account)   |
|                                 | <b>Fixed Income Arbitrage</b>              | Employ a variety of strategies that seek to exploit pricing anomalies within and across global fixed income markets, involving investment in fixed income instruments, hedged to eliminate or reduce exposure to changes in the yield curve. The pricing anomalies are due to factors such as investor preferences, exogenous shock to supply or demand, or structural features of the fixed income market. Typical strategies are yield curve arbitrage, sovereign debt arbitrage, corporate versus Treasury yield spreads, municipal bond versus Treasury yield spreads, cash versus futures and mortgage-backed securities arbitrage. |
|                                 | <b>Market Neutral - Arbitrage</b>          | Exploit pricing inefficiencies between related equity securities and simultaneously neutralizing exposure to market risk. Neutrality is achieved by exactly offsetting long positions in undervalued equities and short positions in overvalued equities, usually on an equal dollar or zero beta basis.   |
|                                 | <b>Market Neutral - Securities Hedging</b> | Invests equally in long and short equity portfolios generally in the same sectors of the market. Leverage may be used to enhance returns. Usually low or no correlation to the market. Sometimes uses market index futures to hedge out systematic risk.   |



| Style               | Strategy                     | Description  |
|---------------------|------------------------------|--|
|                     | <b>Statistical Arbitrage</b> | Exploit pricing inefficiencies between related equity securities, neutralizing exposure to market risk by combining long and short positions and utilize quantitative analysis of technical factors to. Portfolios are usually structured to be market, industry, sector, and dollar neutral.  |
| <b>Fixed Income</b> | <b>Convertible Bonds</b>     | Focus on yield or current income rather than solely on capital gains. Primarily include long only convertible bonds.   |
|                     | <b>Diversified</b>           | Invest in a variety of fixed income strategies, including municipal bonds, corporate bonds, and global fixed income securities.  |
|                     | <b>High-Yield</b>            | Invest in non-investment-grade debt  |
|                     | <b>Mortgage-Backed</b>       | Invest in mortgage-backed securities, including government agency, government-sponsored enterprise, private-label fixed- or adjustable-rate mortgage pass-through securities, fixed or adjustable-rate collateralized mortgage obligation (CMOs), real estate mortgage investment conduits (REMICs), and stripped mortgage-backed securities (SMBs). Funds may look to capitalize on security-specific pricing inefficiencies. |
| <b>Others</b>       | <b>Funds of Funds</b>        | Invest with multiple managers through a fund or a managed account. A Fund of Funds manager has discretion in choosing which strategies to invest in, and may allocate funds to numerous managers within a single strategy or to numerous managers in multiple strategies.  |
|                     | <b>Multi-Strategy</b>        | Employ various strategies simultaneously to realize short and long-term gains. Other strategies may include systems trading such as trend following and various diversified technical strategies.  |

Compiled by the researcher, from Edwards and Gaon (2003) and Lhabitant (2004)

## 2.1.4. Current Market Conditions

It is relatively difficult to gather overall hedge fund industry statistics, as marketing of hedge fund information is restricted by the Securities and Exchanges Commission in the U.S.A or by regulatory authorities in most countries. As mentioned previously in the thesis, the number of hedge funds in the U.S.A. is estimated to be more than 6000 today, these hedge funds operate in the United States managing approximately US\$600 to US\$650 billion in assets. Asia has also experience rapid growth with 162 hedge funds in 2002 to 413 hedge funds in April 2004 and assets under management from US\$14 billion to US\$48.5 billion. In 2003 alone, 97 new funds have been established. These are funds based in Asia with a global investment mandate or those from outside the region with a significant allocation to Asia.

Also mentioned previously in the thesis, Asia-focused hedge funds comprise about 6% of global hedge funds by number and value, even though Asia-Pacific stock markets represent 14% of market capitalization world-wide. According to Francois-Serge Lhabitant (2004), the number of hedge funds worldwide is estimated to be over 7000, managed total assets of around US\$800 billion. The book has also mentioned that:

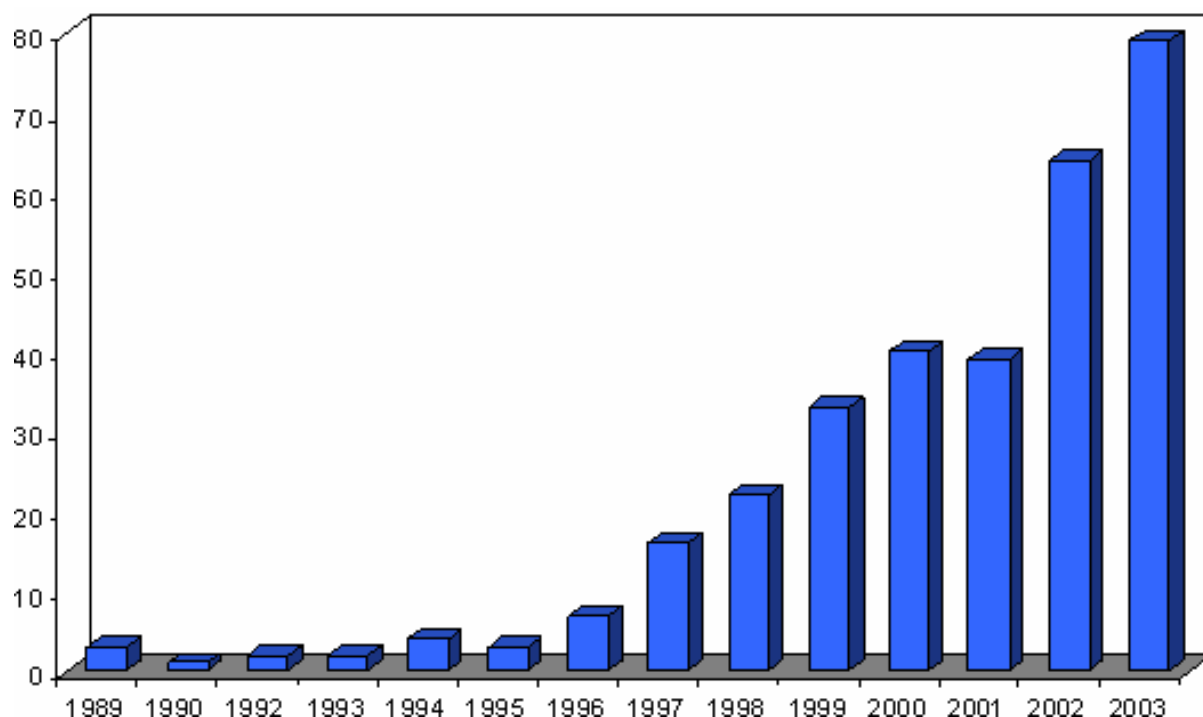
*“Most of the hedge funds are effectively managed from the United States (New York). Although around 70% are administered and registered in offshore locations. Europe (London) and Asia (Hong Kong and Singapore) are experiencing strong growth.”*

There is limited exposure of hedge funds in Asia primarily due to the lack of regulations. The sales of hedge fund often have been made on a private placement basis rather than through the region's major distributors like the retail or commercial banks. Many independent financial advisers have been targeting expatriate clients, rather than the local investors to offer hedge funds. The availability of hedge funds has mainly been of unauthorized products introduced from fund managers based in Europe or the U.S. For the hedge fund size in Asia from 1989 to 2003, refer to *Figure 1: Number of Hedge Funds Launched in Asia*. According to the report written by Steward Aldcroft (2002) of Investec Asset Management in Hong Kong:

*“The fund buyers in Asia are mainly consisted of retail, private banks/high-net-worth individuals, institutional and pension fund buyers. There has been a major explosion in the growth of private banks and bankers in Asia over the last 10-15 years. In Singapore and Hong Kong, there are approximately over 100 banking organizations offering private banking services. Customers of these organizations could have a net worth that is estimated to range from US\$150,000 to US\$1bn.”*

He has further concluded in his report that:

*“In Hong Kong, the retail banks are responsible for around 85% of all sales of mutual funds in 2001 as recorded by the Hong Kong Investment Funds Association. In Taiwan, the banks have a market share of 70%. As a result of the regulations, banks are obliged to make available only the funds that have been authorized by the local regulator.”*



Source: EurekaHedge Database (2003)

**Figure 1: Number of Hedge Funds Launched in Asia**

## 2.1.5. Legal and Regulatory Issues

Most Asian hedge funds, while they may have an onshore advisor conforming to local regulations, offer offshore and largely unregulated products. Australia, Japan, Singapore and Hong Kong all allow retail offerings of hedged product, whilst South Korea and Taiwan remain unclear of the timeframe towards the permit. A current reflection on the regulatory environment of Hong Kong and Taiwan is provided for investors' reference.

### 2.1.5.1 Hong Kong

In October 2001, the Hong Kong Securities and Futures Commission (SFC) published a consultation paper on the public offering of hedge funds and invited comments from the public and the industry in particular. According to the paper by Rory Gallaher (2003), the level of response demonstrated the high degree of interest

in this area, with 36 individual submissions and a group response coordinated by Deacons (a large business law firm headquartered in Hong Kong) on behalf of 24 industry practitioners. The SFC published its conclusions on 2 May 2002, together with the revised guidelines on the authorization of hedge funds which became effective on 17 May 2002. This is a major development for the fund management industry in Hong Kong and potentially for the hedge fund globally, as the SFC has created what appears to be a valid working model for regulators in other jurisdictions to permit access to hedge funds for the retail market. From the press release of the SFC on 2 May, 2004:

*“A majority of the respondents supported a market segmentation approach via the setting up of minimum subscription thresholds for different types of hedge funds. That said, respondents recognized that investor protection could not be achieved by merely setting minimum subscription thresholds. Most respondents agreed on the need to set sufficiently high entry standards to ensure suitability of fund managers but considered that some flexibility should be allowed given that the hedge fund industry is still in its early stage of development in Hong Kong.”*

Alexa Lam, SFC's Executive Director of Intermediaries and Investment Products, said:

*"The SFC is committed to accommodating market changes and facilitating investors' access to a wider range of investment products. Hong Kong will be one of the first few jurisdictions in the world to allow public offering of hedge funds."*

Rory Gallaher (2003) has indicated that restrictions deal with manager qualifications), calculation of fees, fund liquidity and redemption, anticipated retail client base and investor communication. Corporate hedge fund manager must have a minimum of US\$100 million in assets under management pursuing hedge funds strategies. Up to November 2004, there are eight authorized hedge funds managed by larger firms. The corporate hedge fund manager must have at least two investment executives, each with five years' general experience in hedge funds strategies, including at least two years' experience in the same strategy as that of the fund. There must be appropriate internal controls and risk management systems and no independent third-party verification is required at this stage.

According to the SFC Press Release on 2 May, 2002 of Hedge Funds Guidelines (reference website [www.sfc.hk](http://www.sfc.hk)), the SFC specifies that performance fees can be paid no more frequently than yearly subject to meeting their relevant high water mark. There must be at least one regular dealing day per month, and redemption payment proceeds must be paid within 90 calendar days of redemption requests. To restrict the investor base appropriately, minimum subscriptions for hedge funds are US\$50,000 and US\$10,000 for funds-of-hedge-funds. An authorized hedge fund must report quarterly within one month of the quarter-end and 60 days of the quarter end in the case of a funds-of-hedge-funds. Among disclosures, that must be included are performance commentary, changes in key personnel, level of leverage, connected persons transactions and interest, and details of illiquid holdings.

The SCF has indicated that it will have emphasis on the importance of the education process for the buyers and sellers of hedge funds. The SFC will launch a series of investor education programs in the coming months to enhance investors' understanding of hedge funds. More importantly, there is increasing retail interest in

alternative investments in Hong Kong. A wider choice of products could be offered provided there are adequate structural safeguards and proper disclosures. Investors should understand the facts before making investment decision. Informed choices for investors will bring forth a broader and deeper market for the benefit of all.

#### **2.1.5.2 Taiwan**

Under current law, mutual funds issued by a mutual fund company established in Taiwan (for example, a securities investment trust company in Taiwan) may not invest in derivatives except for limited products permitted by the Financial Supervisory Commission (FSC) (reference website [www.sclaw.com.tw](http://www.sclaw.com.tw)). Taiwan mutual fund companies are prohibited from issuing any hedge funds, distributing or marketing any foreign funds. According to the FSC's "Guidelines for Use of Securities Investment Trust Funds for Trading of Securities-Related Products by Securities Investment Trust Enterprises" which has been amended on 14 Oct, 2003 Article 4 and Article 6:

*"The total market value of non-offset long positions in futures contracts held by a securities investment trust fund on any given business day, plus the total value of the strike prices on the call options purchased and the put options written multiplied by the contract multiplier or the contract units, may not exceed 15 percent of the fund's net asset value."*

*"A securities investment trust enterprise may not, in any advertising or any other business promotion activities, characterize a given securities investment trust fund as being "low risk" because it engages in hedge trading of securities-related products."*

## 2.1.6. Hedge Funds versus Mutual Funds

A lot of the times, hedge funds are compared to mutual funds. Refer to *Table 3: Differences between Hedge Funds and Mutual Funds*. These two investment vehicles differ in many different ways. Hedge funds are extremely flexible in their investment options because they use financial instruments generally beyond the reach of mutual funds, which have regulations and disclosure requirements that prohibit the use of short selling, leverage, concentrated investments, and derivatives. This flexibility, which includes use of hedging strategies to protect downside risk, gives hedge funds the ability to best manage investment risks. On the other hand, many might say mutual funds are therefore less risky than hedge funds because of the regulations and disclosure requirements. Bing Liang (1998) concluded in his working paper “On the performance of Hedge Fund” research:

*“In the period of January 1994 to December 1996, most hedge funds provide positive abnormal returns. Overall, hedge fund strategies dominate mutual fund strategies, hence provide a more efficient investment opportunity set for investors.”*

**Table 2: Differences between Hedge Funds and Mutual Funds**

| Category                  | Hedge Funds  | Mutual Funds   |
|---------------------------|--|--|
| <b>Regulations</b>        | Less regulated, therefore more flexibility and associated with higher risk.  | Highly regulated, therefore less flexibility and associated with lower risk. |
| <b>Minimal Investment</b> | Once regarded exclusively for high net worth or institutional investors. Today, due to the market growth and development, lower minimums are allowed for many off-shore hedge funds. | Very small amount of investment required.                                    |
| <b>Availability</b>       | Under U.S. SEC regulation, the   | Available to the general investing   |



| Category                               | Hedge Funds   | Mutual Funds   |
|--|---|--|
|  | individual must be an accredited investor (net worth exceed US\$1 million 噠 Or income in excess of US\$200,000, or joint income in excess of US\$300,000 in the past two years, and expect the same level of income in the current year)<br>However, as mentioned above, more funds are available in the off-shore basis. | public.  |
| <b>Performance</b>                     | Aim to deliver absolute returns by attempting to make profits under all circumstances, even when the relative indices are down. Performance often has low correlation to the market.  | Measured on relative performance compared to a relevant index such as the S&P 500 Index or to other mutual funds. Often has high correlation to the market.  |
| <b>Protection Against Down Markets</b> | Offers protection against declining markets by utilizing various hedging strategies. The strategies vary depending on the investment style and type of hedge fund. Able to generate positive returns even in down markets.  | Unable to offer effective protections against declining markets due to regulations. Could only go into cash or by shorting a limited amount of stock index futures. Unable to generate positive returns in down markets. |
| <b>Investment Portfolio</b>            | Very versatile investment options   | Invest in securities, bonds and cash   |
| <b>Investment Style</b>                | Success determined by manager skill<br>Adopt more flexible, opportunistic style.<br>Manage risk rather than avoid risk.   | Success determined by the market direction. Long-only strategies and directionally dependent. Adopt a more rigid style. Often try to avoid risk than manage risk.  |
| <b>Liquidity</b>                       | Liquidity varies from monthly to annually   | Daily liquidity and redemption   |
| <b>Fees</b>                            | Performance-based fees (“1 and 20” fee structure, 1% of the assets plus 20% of the profit)  | Asset-based fees (usually 50-75 basis points)  |
| <b>Marketing</b>                       | Very limited communications and avoid the media. Often recommended by financial advisors or referred by others.   | Seek maximum media exposure  |

| Category | Hedge Funds   | Mutual Funds |
|----------|---|--------------|
|          | Regulations do not allow marketing in a lot of countries. |              |

Compiled by the researcher, from Owen (2000)

For the comparison of the overall performance of hedge fund and mutual fund during the falling equity markets, the Hedge Fund Association has measured the VAN U.S. Hedge Fund Index and the Morningstar Average Equity Mutual Fund to the S&P 500. Refer to *Table 4: Hedge Funds Outperform Mutual Funds in Falling Equity Markets*. From the paper written by Dion Friedland for the Hedge Fund Association (2002):

*“During the last 15.5 years, the S&P 500 Index has had 15 negative quarters, totaling a negative return of 108.1%. During those negative quarters, the average U.S. equity mutual fund had a total negative return of 111.8%, while the average hedge fund had a total negative return of only 9.2%, displaying the ability of hedge funds to preserve capital in falling equity markets.”*

**Table 3: Hedge Funds Outperform Mutual Funds in Falling Equity Markets.**

| Period | S & P 500 | Van U.S. Hedge Fund Index | Morningstar Average Equity Mutual Funds |
|--------|-----------|---------------------------|---|
| 1Q90   | -3%       | 2.20%                     | -2.80%                                  |
| 3Q90   | -13.70%   | -3.70%                    | -15.40%                                 |
| 2Q91   | -0.20%    | 2.30%                     | -0.90%                                  |
| 1Q92   | -2.50%    | 5.00%                     | -0.70%                                  |
| 1Q94   | -3.80%    | -0.80%                    | -3.20%                                  |
| 4Q94   | -0.02%    | -1.20%                    | -2.60%                                  |
| 3Q98   | -9.90%    | -6.10%                    | -15.00%                                 |
| 3Q99   | -6.20%    | 2.10%                     | -3.20%                                  |
| 2Q00   | -2.70%    | 0.30%                     | -3.60%                                  |
| 3Q00   | -1.00%    | 3.00%                     | 0.60%                                   |

| Period        | S & P 500 | Van U.S. Hedge Fund Index | Morningstar Average Equity Mutual Funds |
|---------------|-----------|---------------------------|---|
| 4Q00          | -7.80%    | -2.40%                    | -7.80%                                  |
| 1Q01          | -11.90%   | -1.10%                    | -12.70%                                 |
| 3Q01          | -14.70%   | -3.80%                    | -17.20%                                 |
| 2Q02          | -13.40%   | -1.40%                    | -10.70%                                 |
| 3Q02          | -17.30%   | -3.60%                    | -16.60%                                 |
| Total Average | -108.12%  | -9.20%                    | -111.80%                                |

Sourced from the Hedge Fund Association (2002)

## 2.2 Previous Research

In the previous researches section, a discussion on a number of the most relevant papers regarding factors influencing investment decisions will be provided. The research conducted by Gordon Alexander, Jonathan Jones and Peter Nigro (1998) “Mutual Fund Shareholders: Characteristics, Investor Knowledge, and Sources of Information” has provided a thorough methodology reflecting the nature of the research of this hedge fund thesis. The paper written by Rajeswari and Moorthy (2001) has studied the “An Empirical Study on Factors Influencing the Mutual Fund/Scheme Selection by Retail Investors”. Another paper written by Malloy and Zhu (2004) has investigated in the relationship of “Mutual Fund Choices and Investor Demographics”. One other comprehensive research conducted by Barber, Odean and Zheng (2000), the unpublished paper titled “The Behavior of Mutual Fund Investors”. Another journal papers that has been written by BARRA RogersCasey (2001) “An Introduction to Hedge Funds” has provided various possible explanations of factors. In September 2003, at the request of the U.S. Securities and Exchanges Commission, the staff of the Commission has conducted a study of hedge funds, including their investment advisers and other service providers and their investors, titled “Implications of Growth of Hedge Funds”.

### **2.2.1. Mutual Fund Shareholders and Characteristics**

The research conducted by Gordon Alexander, Jonathan Jones and Peter Nigro (1998) "Mutual Fund Shareholders: Characteristics, Investor Knowledge, And Sources of Information" carried out a survey research to determine the factors influencing mutual fund investors. The researchers conducted a nationwide telephone survey of 2,000 randomly selected mutual fund investors in the U.S.A. They have provided an analysis of the respondents who purchased shares using the services of six different distribution channels: brokers, banks, mutual fund companies, insurance companies, employer-sponsored pension plans, and others such as financial planners. The survey has provided data on the demographic, financial, and fund ownership characteristics of mutual fund investors.

The results, given in Congressional testimony by the Office of the Comptroller of the Currency (OCC) and Securities and Exchange Commission (SEC) officials in the U.S., discussed by the popular press, and cited in a recent SEC rule proposal, suggest that there is room for improvement in investor knowledge of the expenses and risks associated with mutual funds and that more can be done to make mutual fund prospectuses more useful to investors. The result has concluded the following:

*"The results of the research have indicated that the typical mutual fund investor surveyed is older, wealthier, and better educated than the average American. The results of the survey suggest that investor knowledge of the expenses and risks associated with mutual funds can be improved."*

This survey research has also provided some valuable information to the industry

with suggestions. From the results, most fund shareholders do not appear to appreciate the relationship between fund expenses and performance. This might suggest that more can be done to make mutual fund prospectuses more useful to investors, since over 40% of those surveyed stated that they never used the prospectus.

The research has concluded that it is likely that investors self-select into the various distribution channels. For example, more knowledgeable investors may be more comfortable with the idea of purchasing from a fund company or a broker. As a result, salespeople at banks and insurance companies may face greater challenges in educating their typical mutual fund buyers. The result has indicated that the plan sponsors, brokers, fund companies, and governmental regulatory agencies should offer joint effort to reach the goal of having better educated investors.

### **2.2.2. Factors Influencing Mutual Fund Selection**

The paper “An Empirical Study on Factors Influencing the Mutual Fund/Scheme Selection by Retail Investors” written by T.R. Rajeswari and V.E. Rama Moorthy (2001), has targeted the retail investors for the survey research. A survey has been conducted among 350 mutual fund Investors in 10 urban and semi-urban centers across India to study the factors influencing the fund/scheme selection behavior of retail investors. The necessity of the asset management companies to understand the fund/scheme selection/switching behavior of the investors to design suitable products to meet the changing financial needs of the investors was the fundamental concept. The research also aims to provide the industry some useful managerial implication in product designing and marketing.

From the findings of this research, the survey has revealed that the most preferred investment vehicle is bank deposits. The investors look for safety first in mutual fund products, followed by good returns, tax benefits, liquidity and capital appreciation. The survey has indicated that the investors are basically influenced by the intrinsic qualities of the product followed by efficient fund management and general image of the fund/scheme in their selection of fund schemes.

The survey has revealed that the scheme selection decision is made by respondents individually. Other sources influencing their selection decision are newspapers and magazines, brokers and agents, television, suggestions from friends and direct mail in this particular order. Further 44% of the respondents reported that they use internet facility to acquire information regarding mutual funds.

### **2.2.3. Mutual Fund Choices and Investor Demographics**

The paper written by Christopher J. Malloy and Ning Zhu (2004), has aimed to test the hypothesis developed in Gruber (1996) that less sophisticated investors will direct their money to funds based on advertising and brokerage advice, rather than based on performance. The research has been conducted using secondary data from a major U.S. discount brokerage firm and from the research, the anecdotal evidence has suggested that mutual fund marketing managers use demographic information to attract clients and structure clients and the zip code of potential investors is a commonly used input. The paper indicated:

*“In line with the Gruber (1996) theory, the results suggest that less sophisticated neighborhoods may be faced with an inferior investment opportunity set. This paper has documented that*

*individual investors located in less affluent, less educated, and ethnic minority neighborhoods invest more in funds with expensive load fees. They also tend to invest a disproportionate amount in funds with no minimum-balance requirements, and find fewer funds and (fewer no-load funds in particular) to invest in.”*

#### **2.2.4. The Behavior of Mutual Fund Investors**

Brad. Barber, Terrance Odean and Lu Zheng (2000) have conducted a comprehensive research “The Behavior of Mutual Fund Investors”. An analysis of the relationship between mutual fund purchase and the investor decision has been provided. The researchers have analyzed over 30,000 households with accounts at a large U.S. discount broker for mutual fund purchase and investors sale decision.

Based on the finding, three primary results have been documented. (1) Investors are likely to buy funds with strong past performance and over half of all fund purchases occur in funds ranked in the top ranking of past annual returns. (2) Investors are likely to sell funds with strong past performance and are reluctant to sell their losing fund investments (3) Investors are likely to be more sensitive to the form in which fund expenses are charged; though investors are less likely to buy funds with high transaction fees.

#### **2.2.5. BARRA RogersCasey: Introduction to Hedge Funds**

According to the paper written by BARRA RogerCasey in 2001, alternative investments have primarily been focused on private equity and real estate with

institutional investors hesitant to invest in hedge funds. This paper has stated a number of possible explanations for this resistance. Firstly, the lack of transparency has been a main concern since most investors perceive hedge funds as private investment vehicles that have not met traditional institutional levels of transparency and accountability. In recent years, institutional investors and funds of hedge funds have exerted enormous pressure on hedge funds to provide greater transparency. Insufficient diversification and headline risk are concerns to investors as well. Some well-known examples of hedge fund implosions include the Manhattan Fund and Long Term Capital Management. The report also indicated that the higher fees charged by hedge fund managers have been an additional deterrent to institutional investors. Lastly, the liquidity perceptions of hedge funds are relatively illiquid investments with lockup and liquidity provisions.

## **2.2.6. Implications of the Growth of Hedge Funds**

In September 2003, at the request of the U.S. Securities and Exchanges Commission, the staff has conducted a study of hedge funds, including their investment advisers and other service providers and their investors. The staff of the Commission has expressed concerns over the investor education issue.

*“Improvements in disclosure practices of hedge fund advisers is desirable to help investors make more informed investment decisions regarding hedge fund securities.”*

*“These issues run the gamut from understanding the costs associated with investing in hedge fund or registered FOHF securities, to understanding any limitations on an investor’s ability*



*to liquidate the investment to understanding how the lack of transparency affects the investor's personal investment needs (e.g. diversification)."*

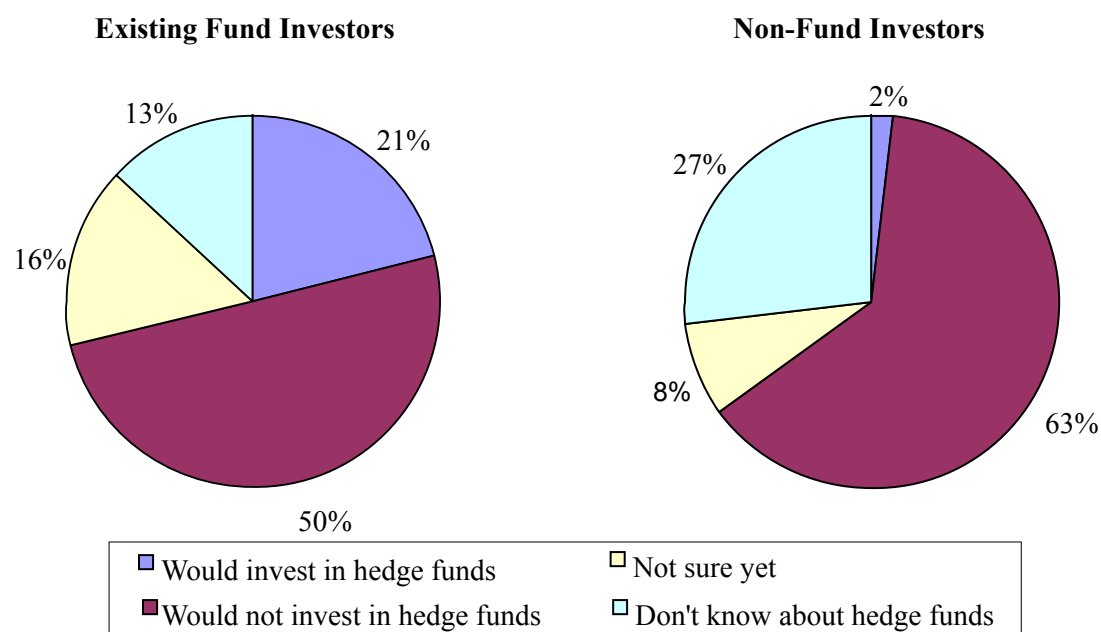
## **2.3 Industry Surveys**

A few industry market survey results are selected to accentuate the relevance of the research. The Hong Kong Investment Funds Association 2002 Survey is directly related to the research aim of this thesis. The Hennessee Group 2000 Survey and the Hedge Fund Center 2002 Survey provide other important results from the investors globally.

### **2.3.1. Hong Kong Investment Funds Association 2002 Survey**

The Hong Kong Investment Funds Association (HKIFA) commissioned NFO WorldGroup - Hong Kong to conduct a telephone survey in June 2002. 1,000 fund investors and 500 non-fund-investors were interviewed. The purpose of the survey was to track the local population's attitude towards hedge funds, in the wake of the release of the Hedge Fund Guidelines by the Securities and Futures Commission in May 2002. About one-fifth of fund investors who currently invest in traditional funds may buy hedge funds. The findings indicate that a key reason why people would consider hedge funds is that they believe they can produce higher returns than traditional funds. Experience from overseas markets indicates that the early adopters are usually the more informed and sophisticated investors; and the rate of take-up is usually measured. The HKIFA believed that with more investor education, interest in hedge funds will steadily increase. It was also important for investors to understand the investment strategies that hedge funds employ and their risk/return characteristics.

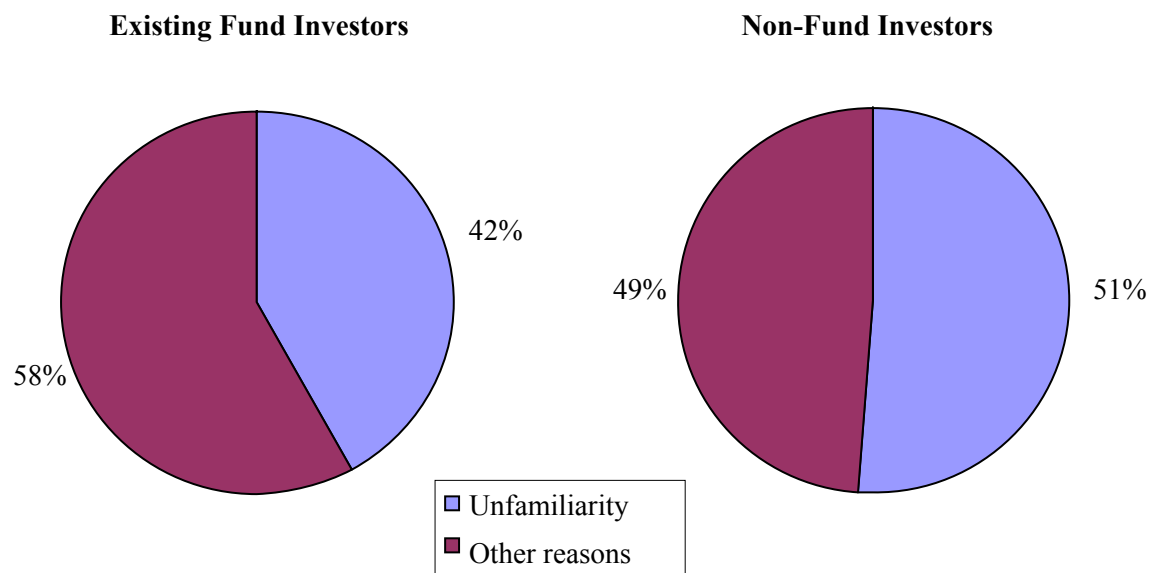
For existing fund investors, 21% of existing fund investors may buy hedge funds, 50% will not and 16% are not sure yet and 13% cannot comment because they don't have any knowledge about hedge funds. As for non-fund-investors, 2% indicate they may buy hedge funds, 63% will not and 8% are not sure. Twenty-seven percent cannot answer because they do not have any knowledge about hedge funds. Refer to *Figure 2: Investors' Investment Decision on Hedge Funds*. There is generally a high level of awareness of hedge funds amongst fund investors. Out of the fund investors interviewed, 63% indicate they have heard about hedge funds, whereas only 37% of non-fund-investors have heard about these products.



**Figure 2: Investors' Investment Decision on Hedge Funds**

As to why people are not interested in buying hedge funds, unfamiliarity is cited as the key factor, 51% of non-fund-investors and 42% of fund investors are not interested in hedge funds because they are not familiar with the operation of these products. Refer to *Figure 3: Reasons of Investors Not Interested in Hedge Funds*.

More people tend to associate hedge funds with high risks and high returns. Amongst fund investors who have heard about hedge funds, 54% believe that hedge funds are “high” or “very high” risk products. Twenty-four percent believe they have “medium” risks. Eight percent think the risk level is “low” or “very low”. In respect of investment returns, 44% think that hedge funds can bring “high” or “very high” level of return. Twenty-nine percent believe they can bring “medium” return. Ten percent think the return level is “low” or “very low”.



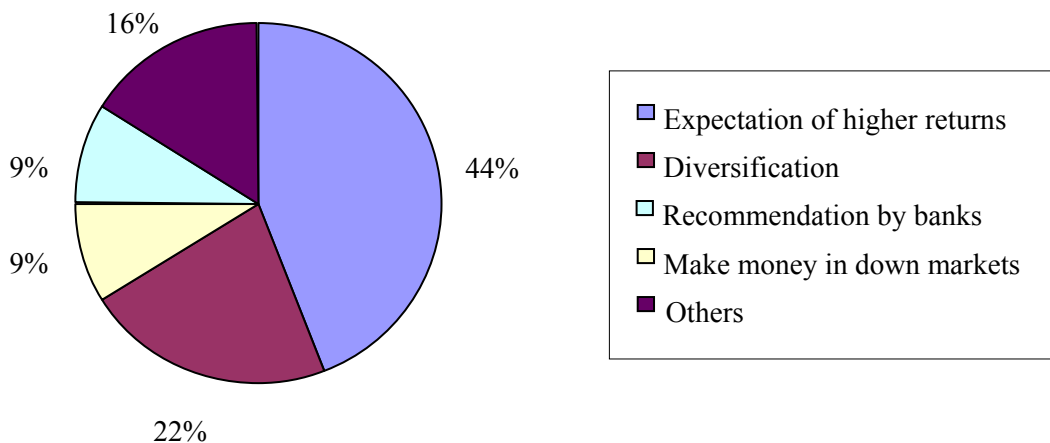
**Figure 3: Reasons of Investors Not Interested in Hedge Funds**

Amongst non-fund-investors who have heard about hedge funds, a high percentage, 41% do not have any idea about their risk/reward characteristics. Thirty-five percent believe that hedge funds are “very high” or “high” risk products. 16% believe they are of “medium” risk. 8% think the risk level is “low” or “very low”. As for investment returns, 25% expect that hedge funds can bring “high” or “very high” levels of return. Nineteen percent believe they can bring “medium” return. Fifteen percent think the return level is “low” or “very low”. In fact, ‘too risky’ is one of the most commonly cited reasons for not buying hedge funds, 39% of fund

investors and 20% of non-fund investors indicate so.

Amongst all investors who may buy hedge funds, the main reason cited for the interest is that they expect that the returns are higher than traditional unit trusts/mutual funds with 44%. In addition, 22% of the investors reckon hedge funds can provide diversification to the investment portfolio. Nine percent are of the view that hedge funds can make money no matter whether the market is up or down. Nine percent indicate they may buy if banks recommend these products. The rest 22% of investors had other reasons. Refer to *Figure 4: Reasons of Investors Making Hedge Fund Investment*.

**Investors Who May Buy Hedge Funds**



**Figure 4: Reasons of Investors Making Hedge Fund Investment**

### **2.3.2. Hennessee Group 2000 Survey**

The Hennessee Hedge Fund Advisory Group, a global hedge fund investment advisory firm, that advises individuals and institutions on over \$1 billion in hedge fund assets, conducted its year 2000 Annual Hennessee Hedge Fund Investor Survey.

The Annual Hennessee Hedge Fund Investor Survey has been conducted annually to analyze investors' preferences towards hedge funds and understand the underlying factors that affect investor decisions. The survey has been sent to over 2500 known hedge fund investors who are veterans of hedge fund investing for over 5 years. From the survey result, 91% of the participants stated that transparency is important or mandatory. Additionally, as investors increase their time horizons within hedge funds, their allocations, number of managers and their confidence in hedge funds increases. Ninety-seven percent of respondents require some level of transparency from hedge fund managers, with hedge funds who invest in other managers and funds of funds the most likely to require full transparency. Fifty-five percent of investor's managers do not have websites, and 45% of investors would like their manager to have a website. When assessing a hedge fund manager, investors are overwhelmingly focused on three issues in order of importance: investment philosophy, manager pedigree and investment performance. Mature hedge fund investors say that performance and downside risk protection are the most important factors when evaluating hedge fund manager portfolios.

### **2.3.3. Hedge Fund Center 2002 Survey**

Hedge Fund Center is an online platform that provides objective, educational information about hedge funds, surveyed its membership comprised of accredited investors and financial professionals in January 2002. The survey focused on the respondents' awareness of hedge fund information on the Internet and the degree to which that data influences their investment decisions. More than 67% of affluent investors indicated that the Internet is fostering greater transparency in the hedge fund industry. Sixty-one percent indicated they are more likely to invest in a hedge fund

after accessing hedge fund data on the Internet and 81% believe professional and personal relationships play a greater role in hedge fund investing than the Internet.

## 2.4 Summary of Literature Review

From previous research and industry surveys, the factors that influence mutual funds and hedge funds investment decisions have been discussed. The conclusions of the academic research and the result of business industry surveys have some important factors in common. These factors include the investors understanding and knowledge of the funds, investors' demographics, investment return and risk expectations. Other factors include transparency, the Internet access to fund information and skills and experience of fund managers. The findings of the literature review section are organized as follows according to their titles. For the overall summarized result, refer to *Table 3: Summary of Previous Research and Industry Survey*.

**Mutual Fund Shareholders and Characteristics:** A typical mutual fund investor surveyed is older, wealthier, and better educated than the average American. The results of the survey suggest that investor knowledge of the expenses and risks associated with mutual funds can be improved

**Factors Influencing Mutual Fund Selections:** The investors look for safety first in mutual fund products, followed by good returns, tax benefits, liquidity and capital appreciation. The investors are basically influenced by the intrinsic qualities of the product followed by efficient fund management and general image of the fund/scheme in their selection of fund schemes.

**Mutual Fund Choices and Investor Demographics:** Less sophisticated neighborhoods may be faced with an inferior investment opportunity set. Mutual fund marketing managers use demographic information to attract clients.

**The Behavior of Mutual Fund Investors:** Investors are likely to buy funds with strong past performance. Investors are likely to sell funds with strong past performance and are reluctant to sell their losing fund investments. Investors are likely to be more sensitive to the form in which fund expenses are charged; though investors are less likely to buy funds with high transaction fees.

**BARRA RogersCasey: An Introduction to Hedge Funds:** Possible explanations for investors' resistance for hedge fund investment include lack of transparency, insufficient diversification, headline risk, fees and liquidity issues.

**Implications of the Growth of Hedge Funds:** The Staff of the Commission have expressed concerns on investor education and lack of transparency.

**Hong Kong Investment Funds Association 2000 Survey:** The HKIFA believed key factor is that investors believe hedge funds produce higher returns than traditional funds. The HKIFA believed that with more investor education, interest in hedge funds will steadily increase. It was also important for investors to understand the investment strategies that hedge funds employ and their risk/return characteristics.

**Hennessee Group 2000 Survey:** More experienced investors that have invested in hedge fund for more than 5 years believe transparency is the most important factor. Most investors prefer the hedge fund manager to establish websites on the Internet.

When assessing a hedge fund manager: investment philosophy, manager pedigree and investment performance are the most focused issues.

**Hedge Fund Center 2002 Survey:** Most affluent investors indicated that the Internet is fostering greater transparency in the hedge fund industry. More likely to invest in a hedge fund after accessing hedge fund data on the Internet. Most investors believe professional and personal relationships play a greater role in hedge fund investing than the Internet.

**Table 4: Summary of Previous Research and Industry Survey**

| <b>Research Paper/Industry Survey</b>  | <b>Authors</b>                    | <b>Factors Influencing Fund Investment Choices (Partial Conclusions/Results)</b>   |
|--|-----------------------------------|--|
| “Mutual Fund Shareholders: Characteristics, Investor Knowledge, and Sources of Information”      | Alexander, Jones and Nigro (1998) | <ul style="list-style-type: none"> <li>• Investor demographics - older, wealthier, and better educated</li> <li>• Investor knowledge</li> </ul>  |
| “An Empirical Study on Factors Influencing the Mutual Fund/Scheme Selection by Retail Investors” | Rajeswari and Moorthy (2001)      | <ul style="list-style-type: none"> <li>• Investment Safety (Lower Risk)</li> <li>• Good returns</li> <li>• Tax benefits</li> <li>• Liquidity</li> <li>• Capital appreciation</li> <li>• Intrinsic qualities of the product</li> <li>• Efficient fund management</li> <li>• General image of the fund/scheme</li> </ul> |
| “Mutual Fund Choices and Investor Demographics”  | Malloy and Zhu (2004)             | <ul style="list-style-type: none"> <li>• Investor demographics - less sophisticated neighborhoods may be faced with an inferior investment opportunity set</li> </ul>  |
| “The Behavior of Mutual Fund Investors”  | Barber, Odean and Zheng (2000)    | <ul style="list-style-type: none"> <li>• Strong past performance</li> <li>• Fees</li> </ul>  |
| “An Introduction to Hedge Funds”   | BARRA RogersCasey (2001)          | <ul style="list-style-type: none"> <li>• Lack of Transparency</li> <li>• Insufficient Diversification</li> </ul>   |



| Research Paper/Industry Survey              | Authors   | Factors Influencing Fund Investment Choices (Partial Conclusions/Results)   |
|---|---|---|
|   |   | <ul style="list-style-type: none"> <li>• Headline Risk</li> <li>• Fees</li> <li>• Liquidity</li> </ul>  |
| “Implications of Growth of Hedge Funds”     | The Staff Report of the U.S. Securities and Exchanges Commission (2003) | <ul style="list-style-type: none"> <li>• Investor education</li> <li>• Lack of transparency</li> </ul>  |
| Hedge Fund Investor Survey                  | Hong Kong Investment Funds Association 2002                             | <ul style="list-style-type: none"> <li>• Higher returns</li> <li>• Investor education</li> <li>• Understand the investment strategies</li> </ul>            |
| Annual Hennessee Hedge Fund Investor Survey | The Hennessee Group 2000 Survey   | <ul style="list-style-type: none"> <li>• Transparency</li> <li>• Establish websites on the Internet</li> <li>• Fund manager skill and experience</li> </ul> |
| Hedge Fund Survey                           | Hedge Fund Center 2002  | <ul style="list-style-type: none"> <li>• The Internet fosters greater transparency</li> <li>• Internet access to hedge fund data</li> </ul>                 |

## 2.5 Hypotheses

Hypotheses 1 to 6 are formulated to test the whether the factors identified from previous findings actually influence hedge fund investment decision. These factors include “investor’s understanding”, “investment return”, “investment risk”, “past performance”, “transparency”, and “skill and experience of fund managers”.

H1: There is a positive correlation between the factor “investor’s understanding” and the hedge fund investment decisions

- H2: There is a positive correlation between the factor “investment return” and the hedge fund investment decisions
- H3: There is a positive correlation between the factor “investment risk” and the hedge fund investment decisions
- H4: There is a positive correlation between the factor “past performance” and the hedge fund investment decisions
- H5: There is a positive correlation between the factor “transparency” and the hedge fund investment decisions
- H6: There is a positive correlation between the factor “skill and experience of fund managers” and the hedge fund investment decisions

Hypotheses 7 to 12 are formulated to test whether the multi-dimension construct measurement of the factors for current hedge fund investors are greater than non-hedge fund investors.

- H7: The multi-dimension construct measurement of “investor’s understanding” for current hedge fund investors is greater than non hedge fund investors
- H8: The multi-dimension construct measurement of “investment return” for current hedge fund investors is greater than non hedge fund investors
- H9: The multi-dimension construct measurement of “investment risk” for current hedge fund investors is greater than non hedge fund investors
- H10: The multi-dimension construct measurement of “past performance” for current hedge fund investors is greater than non hedge fund investors

H11: The multi-dimension construct measurement of “transparency” for current hedge fund investors is greater than non hedge fund investors

H12: The multi-dimension construct measurement of “skill and experience” for current hedge fund investors is greater than non hedge fund investors

Hypotheses 13-17 are formulated to investigate in the investor’s profile. How do investors rank the factors and which is the most important to their hedge fund investment decision. How do investors rank the factors and which is the most important aspect that needs most improvement. And what consist of the investor’s investment allocation to hedge funds and consider to invest in hedge funds.

H13: The most important factor influencing hedge fund investment decisions is “investor’s understanding” of hedge funds

H14: The most important aspect that needs to be improved by the hedge fund industry is to increase “investor’s understanding” of hedge funds

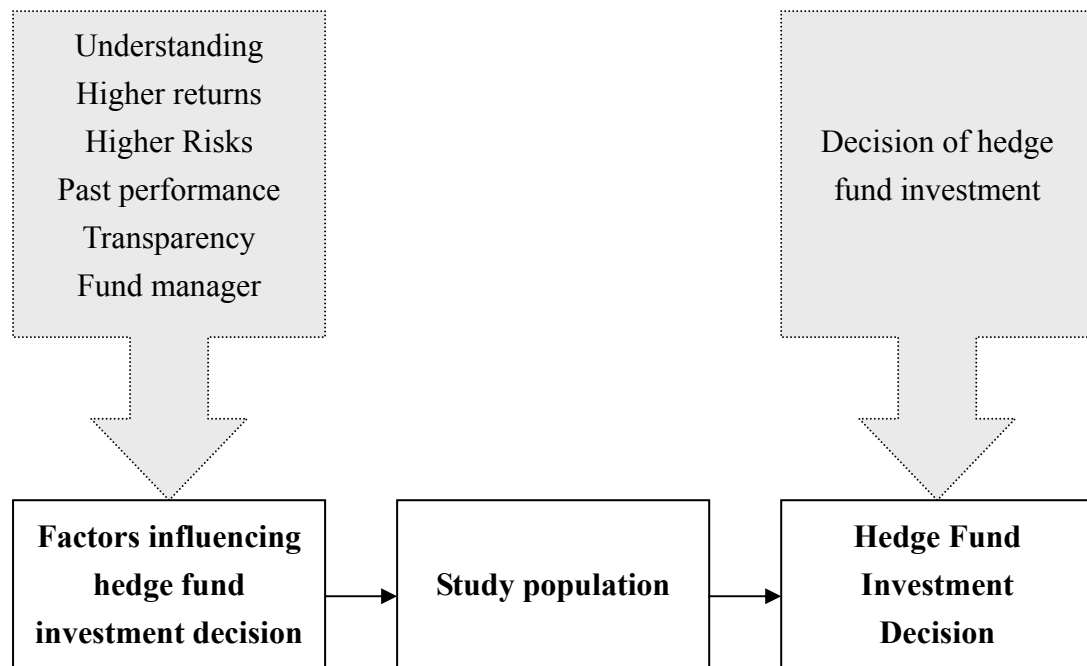
H15: More than 30% of current hedge fund investors are likely to invest more than 15% of their total net worth of investment assets in hedge fund

H16: More than 50% of current hedge fund investors are likely to increase their investment allocations to hedge funds

H17: For investors who do not invest in hedge funds currently, more than 50% will consider to invest in hedge funds

## 2.6 Research Design

The sophisticated investors most accessible to the researcher will be contacted to explain the purpose of this research and its relevance, and to seek their agreement to participate in this research. This research is based on purposive sampling technique. Please refer to 3.1 Sampling for more information. Due to the constraints of time and resources, it is proposed to obtain at least 30 surveys from the sophisticated investors in Hong Kong with the proposed sampling strategy. It is through the researchers personal and work relationships with the sophisticated investors to ensure the participation and completion of this survey. Most of them are financial professionals and executives of foreign brokerage firms or asset management companies. The survey with a supporting letter from the researcher will be distributed to investors via the use of email. The respondents will be requested to return the survey by 31 December, 2004. The letter from the researcher attached to the survey will explain the research objective and related to the thesis. Contact information of the researcher will be provided in case a respondent has any questions. Refer to *Figure 5: The Association between Factors Influencing Investors and the Hedge Fund Investment Decision*.



**Figure 5: The Association between Factors Influencing Investors and the Hedge Fund Investment Decision**