

RIA SINHA

TERI University, India, rias.echo@gmail.com

MANIPADMA DATTA

TERI University, India, manipadma.datta@teriuniversity.ac.in

**EMERGING ROLE OF ENVIRONMENTAL, SOCIAL AND
GOVERNANCE FACTORS IN CORPORATE FINANCE AND
INVESTMENT: INDIAN SCENARIO SO FAR AS COMPARED TO
SOME OF THE DEVELOPED ECONOMIES****Abstract:**

Environmental, Social and Governance (ESG) challenges have changed the world of business and investment altogether. The business enterprises the world over have already started to recognize this fact and experimenting in several ways to explore newer business opportunities hidden therein. As a result, sustainability as a concept has gained much importance to business and investment houses nowadays. Several studies and research surveys have been conducted in developed markets relating to the awareness of ESG factors in financial investments. The motivation behind the surveys has been to ascertain the level of ESG consciousness among the asset managers and to find out the relevant gaps in understanding the materiality of ESG factors for the purpose. This paper is an attempt to study the state of ESG Investment in developing economies vis-à-vis the developed ones with a special reference to Indian Financial Sector. The responses of 22 asset managers, i.e. 18 mutual fund managers and 4 Private Equity Managers from a pilot survey conducted in Mumbai, India, have been analyzed. Corporate Governance factors have clearly gained an edge over Environment and Social factors among asset managers surveyed. This study is intended to be carried out on a larger scale to ascertain the level of ESG consciousness among asset managers in their investment decisions. These surveys will undoubtedly highlight the changing investment scenario in India, thereby highlighting the emerging role of ESG factors in corporate finance and Investment in the country.

Keywords:

Environment, Social, Corporate Governance, Corporate Finance, Investment, Asset Management

JEL Classification: O16, C83, G00

1. INTRODUCTION

Environmental and climate change challenges issues are extremely complicated and there is no such single solution to counter the hazards and perils associated with them. Most of the discussions on this topic usually deal with the risks associated failing to identify the opportunities. We need to understand the fact that environmental challenges have changed the world of business altogether. In fact, one of the socio-economic segments affected most by environmental transformations happens to be the business and industry. The business enterprises the world over have already started to recognize this hard fact and experimenting in several ways to explore newer business opportunities hidden therein. Sustainability as a concept has gained much importance to the business houses nowadays. The concept of responsible investments is gaining ground. A host of newer variables have been identified beyond traditional list of considerations in response to the growing efforts to transform business process compatible to sustainability objectives. Some of the studies have shown significant interface between environmental, social and governance (ESG) factors, which were largely considered non-business and non-financial issues hence unrelated. The trend is quite evident in the west. The business world is now in the process of baptizing itself to a newer paradigm of sustainability. It is more in the form of finding opportunities in the changing milieu and adjusting its tune to the newer requirements. That is why as a natural corollary attempts to develop environment related indices all over the globe are evident in recent years that are not only the attempts to gauge the market response to environmental consciousness, but also a solid recognition of the fact that environmental issues are now integral part of business activities too. We could now be hopeful that this change in attitude clubbed with sustained efforts for the paradigm shift would change the business scenario steadily all over the globe including India. In normal business parlance, sustainability refers to the core ability of the enterprise to attain a position that would not dwindle and be short lived, instead would last for a considerable longer time unaltered. But the present developments are changing the paradigm fast. There are cases where we find that all these factors have a great impact on the business performance. However, to ensure that these factors are fully operative, it needs a pre-existence of a market that acknowledges such typically non-financial issues as impacting variables. Hence, market readiness of ESG factors is the pertinent issue. In this context, the perception and awareness of fund managers, investment bankers and other financial institutions towards incorporating ESG factors in investment decisions is extremely pertinent. On the other hand, the role of stock exchanges is extremely crucial, given the fact that many stock exchanges across the globe have been successful enough to launch sustainability indices. These indices are pertinent to understand the market sentiment.

In addition to this, stock exchanges can act as an interface between investors and companies to communicate the materiality of ESG factors. It is a matter of fact that the number of sustainability indices and investment products in developed economies are far more than that of developing and emerging economies. These types of studies in the emerging markets have been limited. It is a matter of fact that the market situation in the developed and emerging markets are significantly different with respect to savings, size, depth of financial markets more precisely stock markets, transaction costs in equity markets, macroeconomic fundamentals, development of asset management industry etc. In most developed economies, capital accumulation occurs due to stock market financing, whereas bank based financing is the dominant source of financing in emerging economies, as the rate of domestic savings entering the capital market is low. Hence, mobilizing the savings into sustainable investing poses a challenge. Several studies and surveys have been conducted in developed markets relating to the awareness of ESG factors in investments. The motivation behind the surveys has been to ascertain the level of ESG consciousness among the asset managers and to find out the relevant gaps in understanding the materiality of ESG factors for the purpose. Here we need to mention that most of the surveys have not defined the specific ESG factors and have incorporated it as a whole. This paper is an attempt to understand the importance and materiality of ESG factors on stock performance and the level of awareness and acceptance of these factors by the institutional investors with special reference to the Indian Financial Sector.

2. REVIEW OF LITERATURE

2.1 INFLUENCE OF ESG FACTORS ON STOCK PERFORMANCE

Sustainable business is gaining ground. From the concept of ethical investment to socially responsible investment in the 1990's, the concepts and definition of sustainable investing is changing. The ESG factors can hardly be ignored by the business any more. They instead constitute the building blocks for a sustainable business strategy. The ESG factors have now attained the status of mainstream investment and business issues which are also substantiated by the emergence of the United Nations (UN) backed investors' initiative of Principles of Responsible Investment (PRI) in recent times. The ramifications of these principles are very expansive and pervasive in character. They are directed towards building a durable and sustainable impact on the nature of investments across the globe. Henceforth the nature of world investments would be more and more ESG focused. This is naturally expected to change the entire global business and economic scenario. Adhering to these principles would definitely percolate down to the level of retail investors too. The process can be genuinely

expected to give a big push to realizing the goal of sustainable economic development as a whole. Applying these principles would better align investors with broader objectives of society. In essence, this is a great recognition to the fact that ESG issues can affect performance of investment portfolios. The highest capital accumulation is perhaps in the hands of these professional investors who do have a great fiduciary relationship with their clients. This fact itself is enough to understand the real strength of such a declaration. McKinsey Global Survey Results (McKinsey & Co, 2010) have also shown that more than 50% of the 1946 business executives under survey considered the ESG issues 'very' or 'extremely' important in a wide range of areas, including new product development, reputation building, and overall corporate strategy. In another recent McKinsey survey it has been found that many companies are actively integrating sustainability principles into their business operations. This online survey conducted by McKinsey was in the field from July 12 to July 22, 2011, and had received responses from 3,203 executives, representing the full range of regions, industries, tenures, company sizes, and functional specialties. This survey explored why and how companies are addressing sustainability and to what extent executives believe it affects their companies' bottom line, now and over the next five years. The survey also highlights the integration of sustainability issues into strategic activities as this plays a very important role in the long run.

Creating value through integration of ESG factors has been well taken by the corporations and investors. Two recent McKinsey studies make clear that many business executives also believe that effective ESG programs can contribute to shareholder value creation. The 2010 study on '*How companies manage sustainability*' indicates that 76 percent of the surveyed executives say sustainability contributes positively to shareholder value in the long term, and 50 percent see short-term value creation. The 2009 study '*Valuing corporate social responsibility*' indicates that most of the surveyed executives' believe that environmental and social programs create value over the long term, and that governance programs create value in both the short and long terms.

Apart from creating value, ESG factors are being increasingly recognized as having a potential impact on financial performance. The UNEP FI Asset Management Working Group commissioned a study into the links between ESG issues, financial value and company profitability. The study is based on 12 broker research reports, the expertise of more than 22 financial services firms and more than 1,000 pages of financial analysis. The main findings of the study are:

- ESG issues are material – there is robust evidence that ESG issues affect shareholder value in both the short and long term.
- The impact of ESG issues on share price can be valued and quantified.

A number of studies have pointed to the fact that there is some sort of correlation between ESG factors and portfolio performance. In 2007, UNEP FI and Mercer reviewed academic and broker research on the relationship between ESG factors and portfolio performance. Of 20 academic studies, it found evidence a positive relationship in half of these, with 7 reporting a neutral effect and 3 a negative association. The negative links were found in studies of screened portfolios rather than studies of ESG integration. Mercer had examined the link between ESG factors and financial performance with the help of 36 studies, out of which 20 studies showed evidence of a positive relationship between ESG factors and financial performance; 2 showed evidence of a neutral-positive relationship; 3 studies reflected evidence of a negative-neutral relationship; 8 provided evidence of a neutral relationship and 3 showed evidence of a negative relationship. The European Centre for Corporate Engagement (ECCE) in the year 2007 had also studied the relationship between ESG factors and financial performance. The results of the studies have been listed in the table below:

Table 1: Different Studies relating to the Influence of ESG factors on Stock Performance

Authors	Year	Market Studied	Period Studied	Outcome
Bauer, Koedijk, Otten	2004	Germany, UK, US	1990-2001	No Difference
Bello	2005	US	1994-2001	No Difference
Boutin-Dufresne, Savaria	2004	Canada	1995-1999	No Difference
Derwall, Guenster, Bauer, Koedijk	2003	US	1997-2002	'Good' Stocks Outperform
Derwall, Guenster, Bauer, Koedijk	2005	US	1995-2003	'Good' Stocks Outperform
Foerster, Asmundson	2001	Canada	1995-1999	No Difference
Gluck, Becker	2004	US	1998-2003	Incorporating SRI higher alpha
Hong, Kasperczyk	2006	US	1962-2003	'Bad' Stocks Outperform

Kempf, Osthoff	2006	US	1991-2004	'Good' Stocks Outperform
Mill	2002	N/A	1982-2002	No Difference
SRI World Group	2002	US	1999-2001	No Difference
Statman	2000	US	1990-1998	No Difference
Statman	2005	US	1990-2004	No Difference
Translating ESG into Sustainable Business Value	2010	Developed Markets	–	'Good' Stocks Outperform
Abramson and Chung	2000	US	1990-2000	'Good' Stocks Outperform
Gompers, Ishii and Metrick	2003	US	1990-1999	'Good' Stocks Outperform
Humphrey, Lee and Shen	2011	UK	2002-2008	No Difference
Matin et. al	2011	Developing	2005	'Good' Stocks Outperform

Note: The performance of 'Good' stocks (i.e. those incorporating ESG factors) have been marked in red

Source: The Value of Environmental, Social and Governance Factors for Foundation Investments (2009), EIRIS Foundation Charity Projects, EIRIS Foundation and compiled from other sources

As we can well observe, most of the studies have been conducted in the developed markets, with little emphasis on the emerging markets. However, a study by Ghosh (2013) examines the company specific characteristics that drive Indian companies to superior sustainability performance and reporting proxied by their presence in the S&P ESG India Index, launched in 2008. The paper further seeks to explain the impact of corporate sustainability on financial performance with the help of probit specification and panel regression. The findings of the study are not only beneficial for the investors and

corporations, but also for policy makers who are trying to create awareness about sustainability, particularly in emerging economies.

2.2 ROLE OF SUSTAINABILITY INDICES IN DEVELOPED AND EMERGING ECONOMIES

Indices are the barometers to access the market sentiments. Several stock exchanges in both the developed and emerging economies have launched sustainability indices to access the market mood of ESG investing. Given the fact that ESG investing can have a positive influence on stock returns, the market is evolving from largely value-oriented investors and now involves a great segment with a growing emphasis on investors seeking long term value. Emerging market's sustainability indices have proliferated in the recent years based on the experiences in developed economies, the time is not yet ripe to measure its success. The role of stock exchanges is not only limited to the launch of sustainability indices but also in bridging the gap between investors, companies and policy makers in understanding the materiality of ESG factors. Stock exchanges in most of the developed economies of UK, USA, Australia, South Africa and France have been instrumental in launching sustainability indices, providing sustainability guidance to listed companies and support the development of carbon markets. Stock exchanges of South Africa and Istanbul have also become signatories to the UN PRI. The Spanish and Hong-Kong Stock Exchanges have also taken efforts to publish sustainability reports. Efforts in India are also in this direction. Apart from launching the ESG India Index in 2008, the Bombay Stock Exchange (BSE) of India also supports the development of carbon markets. According to the World Federation of Exchanges (WFE), the sustainable indices tend to fall under two main categories:

1. Broad-based indices of stocks from all industry sectors, using extensive ESG criteria and scoring systems to select companies that are "leaders" in social and environmental responsibility. Examples include the FTSE4Good series, the **BM&FBOVESPA** Corporate Sustainability Index (ISE), the **Johannesburg Stock Exchange** Socially Responsible Investment Index, the **NASDAQ OMX GES** Sustainability Nordic Index, and the **Wiener Börse VÖNIX** Sustainability Index.
2. Sector-specific indices focusing specifically on companies that provide solutions to sustainability challenges, particularly in relation to clean technology, sustainable energy and environmental services. These are frequently linked to exchange-traded funds (ETFs).

The table below lists the exchanges which have launched sustainability indices.

Table 2: Sustainability indices offered by WFE member exchanges

Exchange	Index	Launch Year
BME	FTSE4Good IBEX Index	2008
BM&FBOVESPA	Corporate Sustainability Index (ISE)	2005
Deutsche Börse	DAXglobal® Alternative Energy Index	2006
	DAXglobal® Sarasin Sustainability Germany Index	2007
	DAXglobal® Sarasin Sustainability Switzerland Index	2007
The Egyptian Exchange	ESG index in development with S&P	2010
Indonesia Stock Exchange	SRI-KEHATI Index	2009
Bursa Malaysia	Bursa Malaysia ESG Index	2011
International Securities Exchange	ISE Water Index	2000
	ISE-CCM Green Energy Index	2001
	ISE Global Wind Energy Index	2005
Johannesburg Stock Exchange	JSE Socially Responsible Investment (SRI) Index	2004
Korea Exchange	Korean SRI Index (in development)	2009
London Stock Exchange Group	FTSE4Good Global Index	2001
	FTSE4Good US Index	2001
	FTSE4Good Europe Index	2001
	FTSE4Good UK Index	2001
	FTSE4Good Global Index	2001
	FTSE4Good US 100 Index	2001
	FTSE4Good Europe 50 Index	2001
	FTSE4 Good UK 50 Index	2001
	FTSE4Good Japan Index	2001
FTSE4Good Environmental Leaders Europe 40 Index	2004	
FTSE4Good Australia 30 Index	2007	

	FTSE4Good IBEX Index	2008
	FTSE KLD Global Sustainability (GSI) Index Series	2008
	FTSE KLD Global Climate 100 Index	2008
	FTSE Environmental Technology Index Series	2008
	The FTSE Environmental Opportunities Index Series	
NASDAQ OMX	NASDAQ Clean Edge US Index	2006
	OMX Clean Edge Global Wind Energy Index	2008
	Wilder NASDAQ OMX Global Energy Efficient Transport Index	2008
	OMX GES Sustainability Nordic Index	2008
	OMX GES Ethical Nordic Index	2008
	OMX GES Ethical Denmark Index	2008
	OMX GES Ethical Finland Index	2008
	OMX GES Ethical Norway Index	2008
	OMX GES Ethical Sweden Index	2008
	OMX GES OMXS30 Ethical Index	2008
	OMX GES Sustainability Sweden Ethical Index	2008
	OMX GES Sustainability Sweden Index	2008
National Stock Exchange of India	S&P ESG India Index	2008
NYSE Euronext	NYSE ArcaCleantech Index	1999
	NYSE Arca Environmental Services Index	2003
	NYSE ArcaWilderHill Clean Energy Index	2004
	NYSE ArcaWilderHill Progressive Energy Index	2006
	Euronext FAS IAS Index	2006
	Low Carbon 100 Europe Index	2006

Shanghai Stock Exchange	SSE Social Responsibility Index	2009
Tel-Aviv Stock Exchange	Maala SRI (Socially Responsible Investing) Index	2005
Wiener Börse	VÖNIX Sustainability Index	2008
	CEE Responsible Investment Universe Index (CEERIUS®)	2009

Source: World Federation of Exchanges

Apart from this, there are several Exchange Traded funds (ETF's) which are also traded through exchanges.

Table 3: Examples of recent Cleantech ETFs

Exchange Traded Fund	Exchange	Launch Year
First Trust NASDAQ Clean Edge Green Energy Index Fund	NASDAQ	2007
PowerShares Global Wind Energy	NASDAQ	2008
Airshares EU Carbon Allowances Fund	NYSE Arca	2008
Claymore S&P Global Water Index ETF	NYSE Arca	2008
Claymore/MAC Global Solar Energy Index ETF	NYSE Arca	2008
First Trust ISE Water Index Fund	NYSE Arca	2008
First Trust ISE Global Wind Energy ETF	NYSE Arca	2008
iShares KLD 400 Social Index Fund	NYSE Arca	2008
iShares KLD Select Social Index Fund	NYSE Arca	2008
Market Vectors Environmental Services Index Fund	NYSE Arca	2008
PowerShares Global Clean Energy	NYSE Arca	2008
Euronext Paris		

PowerShares Global Water Portfolio	NYSE Arca	2008
PowerSharesWilderHill Clean Energy Portfolio	NYSE Arca	2008
PowerSharesWilderHill Progressive Energy Portfolio	NYSE Arca	2008
EasyETF Low Carbon 100 Europe	Euronext Paris	2008
ETFS DAXglobal Alternative Energy Fund	Euronext Amsterdam	2008
London Stock Exchange		
iShares S&P Global Clean Energy Index Fund	NASDAQ	2008
Euronext Amsterdam		
Lyxor ETF New Energy	Euronext Paris	2007
Lyxor World Water	Euronext Paris	2007
EasyETF FTSE ET50 Environment	Euronext Paris	2008
EasyETF Water	Euronext Paris	2008

Source: Exchanges and Sustainable Investment, 2009, Report prepared for the World Federation of Exchanges, Delsus Ltd

In the last year, NYSE Euronext has launched a third variation which is a broad-based (non-sector specific) index oriented around a single ESG issue, in this case climate change. The NYSE Euronext Low Carbon 100 Europe® Index is an index weighted by free-float market capitalization designed to measure the performance of the 100 largest European companies having the lowest carbon (CO₂) intensity in their respective sectors or homogeneous sub-sectors. Similar indices based on free-float market capitalization methodology have also been launched in India in 2012 by the Bombay Stock Exchange (BSE), namely the Greenex and the Carbonex which also focuses solely on Greenhouse Gas emissions (GHG) profile of companies as the single Environmental issue.

The underlying hypothesis behind sustainable investment is that integration of ESG factors can impact shareholder value. Hence, the key players of sustainable investment include the institutional investors, retail investors, high net-worth individuals and the like. In this context, their consciousness and perception about ESG factors play a dominant role in operationalizing these factors. Given the fact that custodial investors have a fiduciary duty to protect their clients' investments, their awareness levels across various asset classes is extremely pertinent to influence the investment atmosphere. Thus, the

subsequent sections provide a brief description of the type of surveys carried in developed and emerging economies and also a pilot survey based in India.

2.3 PRESENT STATUS OF ESG INVESTMENT AND SURVEYS UNDERTAKEN IN DEVELOPED AND EMERGING ECONOMIES

Regarding the materiality of the ESG issues in the developing and emerging markets, several investment houses, private equity (PE) and investment advisory firms have conducted surveys across varied asset classes in both developed and emerging countries. The developed countries are far more explored vis-à-vis the emerging countries, owing to greater consciousness about ESG factors among the investors in developed economies. While some efforts have been put to estimate the market size of sustainable assets, the majority of them have tried to ascertain the consciousness and extent of incorporation of ESG factors by the investors and attain a futuristic view. No concrete efforts have been made to segregate the individual Environmental, Social and Governance factors and derive their order of preference for selection. The subsequent sections provide a brief account of some of the surveys undertaken.

EIRIS conducted a market survey in 2012 based on 20 questions on a range of investment issues related to ESG factors. The report had emphasized that there is a heightened materiality of ESG issues in the emerging markets. In fact, the companies surveyed are addressing the risks of climate change through more and more ESG disclosure. Based on a total of 44 responses, *EIRIS* research showed that investors named strategies ESG-themed funds as the most popular emerging markets investment strategy followed closely by general socially responsible investment (SRI) funds.

International Finance Corporation (IFC) has conducted several studies to understand the state of sustainable investment in key emerging markets. The study conducted in 2009, in collaboration with *TERI Europe* is a pioneering work to estimate the market size of sustainable assets in India. The findings indicate that the total stock of investment in Indian equities incorporating ESG concerns is US 1 \$bn, the most of which is Foreign Institutional Investment. The domestic ESG market in India is almost nil with only one SRI mutual fund launched by ABN-AMRO in 2007 and now managed by Fortis. The performance of the fund has been far from satisfactory. *IFC* has also conducted surveys in emerging markets of India, Brazil, China, Turkey, South Africa, Egypt and Morocco.

On the other hand, in developed economies the survey findings are reflective of the fact that responsible investment is broadening across the finance sector. Investors across all asset classes are very well aware of the fact that ESG factors are material to long term value creation. Private Equity (PE) funds are in a strong position to benefit

from this conversion. A study by *Malk Sustainability Partners* involved senior team members of 13 private equity general partners and 6 limited partners with majority respondents located in US. The study focused on current and anticipated future management of ESG issues. The findings are highly indicative of ESG awareness among fund managers. According to the report, 92% of funds managers expect to increase their attention in the future, 69% of fund managers have observed increasing concern about ESG issues from their investors during the past 3-5 years and 54% of participating funds have or are developing an ESG management program focused on value creation. The report which is majorly based on interviews has revealed a diverse set of ESG practices among fund managers at varying levels of implementation. Most of the management processes like leadership, diligence, communication etc. include ESG factors at differing levels. Most of the fund managers believe that risk management is the utmost important domain to review the materiality of ESG factors for investment. Other studies by *PricewaterhouseCoopers (PwC)* on the role of PE industry's response to ESG factors in investment is based on interviews to 17 PE houses, out of which 10 are headquartered in the Europe and 7 are in the US. According to the report, the main drivers of investment management activities are risk management and investor interest. Based on the survey, 50% of the participants lack a policy on ESG issues and/or responsible investment. Regarding future investments, 94% of the participants have strong faith regarding the materiality of ESG issues to business.

Goldman Sachs, the leading global investment banking, securities and investment management firm has conducted several surveys on ESG research. In an earlier study in 2006, it estimated the sustainable assets under management in the tune of EUR 336 bn. The survey had the following findings:

- 70% believe that the integration of ESG factors into investment analysis will be mainstream within 3-10 years; 5 % predict this in the next 1-2 years
- 50% believe that active ownership will be mainstream within the next 2 years
- 60% believe that screening for ESG factors will be mainstream within 3-10 years
- 35% believe corporate governance, climate change, environmental management, and water use will be important investment themes in 5 years

In 2012, an investment advisory firm, *JANA* undertook an extensive survey of global equity managers to canvass the extent to which they integrate ESG factors into their investment approaches. The survey was based on 122 investment managers who were invited to participate in a self-assessment survey questionnaire. The total responses were 90, representing approximately US\$700bn in funds under management. According to the report, a reasonable number of managers consider ESG research as a means to identify investment opportunities, including mainstream managers. Higher emphasis has been put to Governance factors vis-à-vis Environment and Social factors.

KPMG Luxembourg has conducted a study on responsible investing (RI), based in Europe. The RI fund universe in Europe comprises 1775 funds with total AUM of EUR 237.9 bn. The main findings of the study are:

- The proportion of RI assets compared to the total assets in European funds have increased by 1.6% since 2010
- Almost 2/3 of the RI funds, which represent 83% of RI assets apply either a positive or a negative screening
- Thematic funds based on ESG factors represent 1/3 of the RI funds, which is 12% of AUM
- Funds investing in environmental things comprises biggest portion of thematic funds
- Luxembourg and France dominate the RI fund landscape with about 42.5 % of the total number of funds and 51% of AUM.

BNY Mellon, a global investment company had conducted a survey of 1100 institutions to find out the reason behind incorporating ESG factors in investment processes. The clients belong to the fixed income class and were broken down into sub-categories of corporate pension plans, public pension plans, endowments and foundations. The clients were also segmented region wise into North America, Europe, Middle East and Africa. The results indicate that 24% of the have implemented ESG strategies within their investment process. Regarding, non-implementation of ESG factors into investment analysis, 58% of the clients cited lack of interest as the major hindrance towards it. Yet, majority of the clients are hopeful about ESG implementation into mainstream in the near future. The survey also revealed that clients have implemented many different strategies like portfolio selection and screening, shareholder advocacy and community investing to their ESG framework.

3. ESG INVESTMENT SCENARIO IN INDIA: A PILOT SURVEY

Most of the ESG perception surveys described above have been conducted in the developed economies which face several structural advantages over emerging economies. The point has been to emphasize on the increasing awareness and perception of ESG factors and their incorporation in investment decisions by investors, mostly custodial investors. Some surveys have also highlighted the increasing role of corporations in making their business processes eco-friendly and influence their stock prices, thereby attracting investors. Similarly, developing economies have also started to incorporate ESG factors, though it is only at the inception stage. More surveys are required to access the market conditions prevailing. But, one thing needs clear mention over here. ESG investing scenario in developed countries should not be compared to

developing countries at this stage, given the fact that the latter has not been able to reach economic development at par with the former. Moreover, the individual Environment, Social and Governance factors in both the markets ought to be different. Apart from this, most of the responsible investment in India is backed by Foreign Institutional Investment (FII), as surveyed by TERI Europe in 2009. Hence, this pilot survey conducted in Mumbai, India with 16 asset management firms involving 22 asset managers, out of which 18 are Mutual fund (MF) managers and 4 are Private Equity (PE) Managers, is an effort to understand the ESG investment scenario in the domestic market. Here we must mention that the MF managers are the custodial investors. Hence their risk taking capacity is quite different from the PE managers who chiefly invest in private equity. But for both the asset classes we try to identify the individual Environmental, Social and Governance factors pertinent to the Indian investment market.

3.1 RESEARCH METHODOLOGY

The survey was conducted with the help of questionnaire, which was distributed among fund managers and consisted of their responses to ESG factors apart from financial factors undertaken in investment decisions. The structure of the questionnaire was divided into three parts: Section A consisting of the multiple choice questions with multiple responses, Section B was based of questions on a Likert scale of 1 to 7 to understand the perception of ESG factors among fund managers and Section C was based on subjective questions. The responses have been analyzed with appropriate software and have also been cross-checked by interacting with other members and viewing their reports and factsheets.

The ESG factors selected at different stages of activities undertaken by asset managers are as follows:

Table 4: Survey of ESG Factors

Environmental	Social	Governance
Companies which take measure to reduce carbon footprint	companies with high retention rate of companies	Companies with least legal disputes

Stocks of companies with lower GHG emission	Stocks of companies which has a higher community impact	Stocks of companies which provide disclosure of financial and operational information
Stocks of companies following proper environmental norms	Report factors which have a societal perspective	Effective management
invest in companies which make innovations in environment friendly products and services	Identifying newer opportunities for investments in companies with higher labor intensity of business	invest in companies with sound corporate governance performance
Research related activities in innovating equipment to reduce GHG emission		Research related activities in improving the CSR guidelines
Research related activities in sphere of water management		Research related activities in better disclosure and reporting
Report of environment factors to clients		International partnership with sustainable frameworks
Publish of Sustainability reports		Report of CG factors to clients
Identifying newer opportunities for investments in companies doing well on energy		Publish of Disclosure reports

efficient practices		
		Identifying newer opportunities for investments in companies with better CSR approach
		Identifying newer opportunities for investments in companies with increased proportion of GHG emission disclosure
		Providing pressure on companies to improve their social and environmental performance
		Providing pressure on clients to include ESG criteria in their portfolios
		Screening based on distributing dividends

3.2 SAMPLE OF RESPONDENTS

The sample is a small size one with 16 AMC's involving 22 fund managers based on simple random sampling method. The sample has been again sub-divided into 18 MF managers and 4 PE Firms. The Asset Management Firms surveyed are shown below:

Figure 1: Spread of Asset Management Firms surveyed

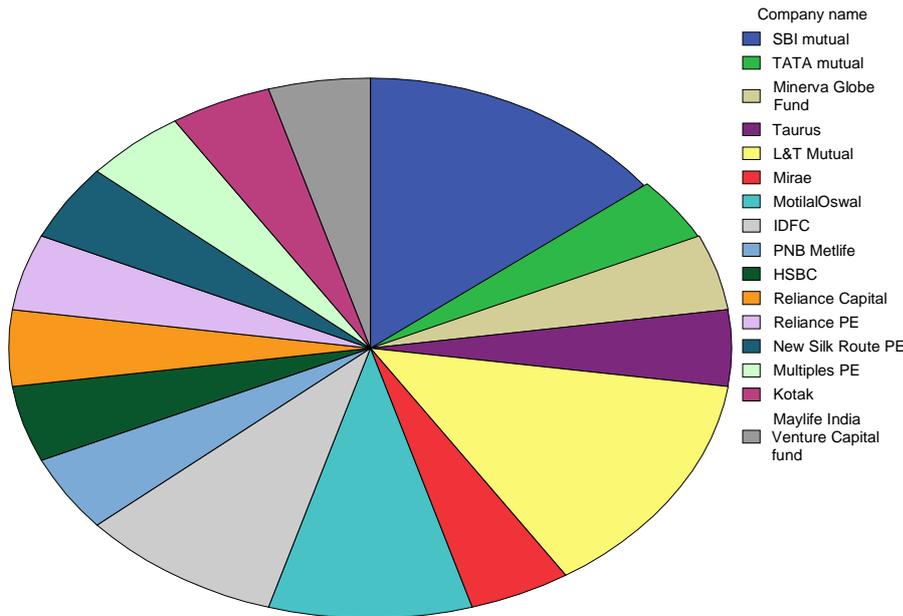
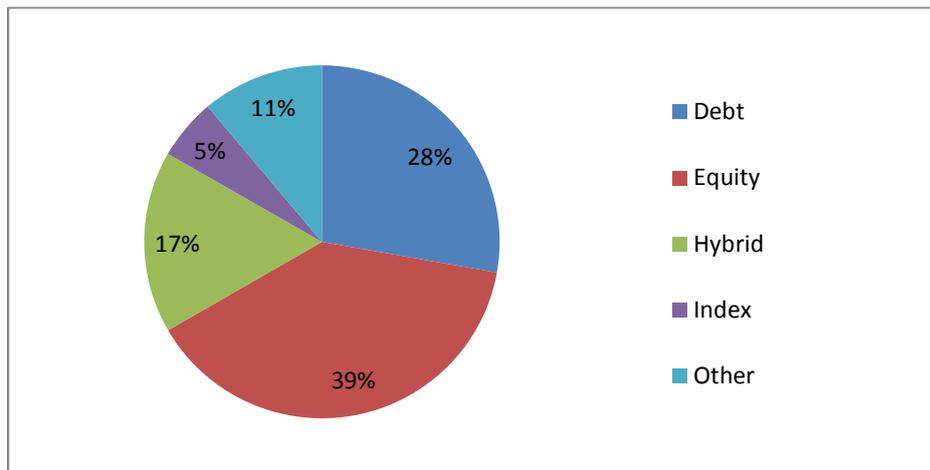


Figure 2: The Mutual Fund structure is classified as follows:



3.3 FINDINGS OF THE SURVEY

- i. Most of the mutual fund managers surveyed considers financial factors like returns, benchmarks, HSES, promoter track records, innovation primarily for their investment decisions, although some of them also take into consideration some of the ESG factors as shown below. Most of the MF managers are concerned with corporate governance factors. As we find from figures 3.1 and 3.2, the extent of environmental factors considered by MF managers is greater than PE managers.

Figure 3.1: Factors considered by MF Managers in investment decisions

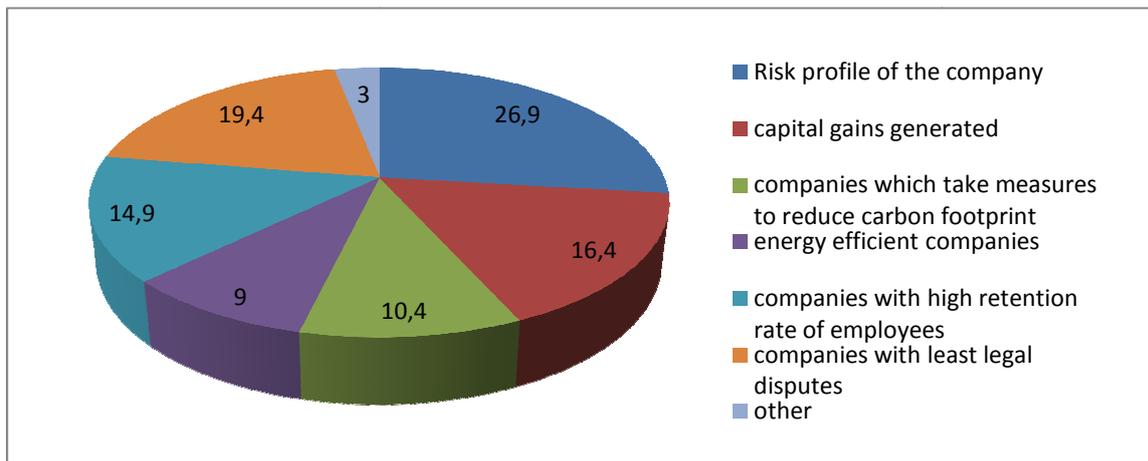
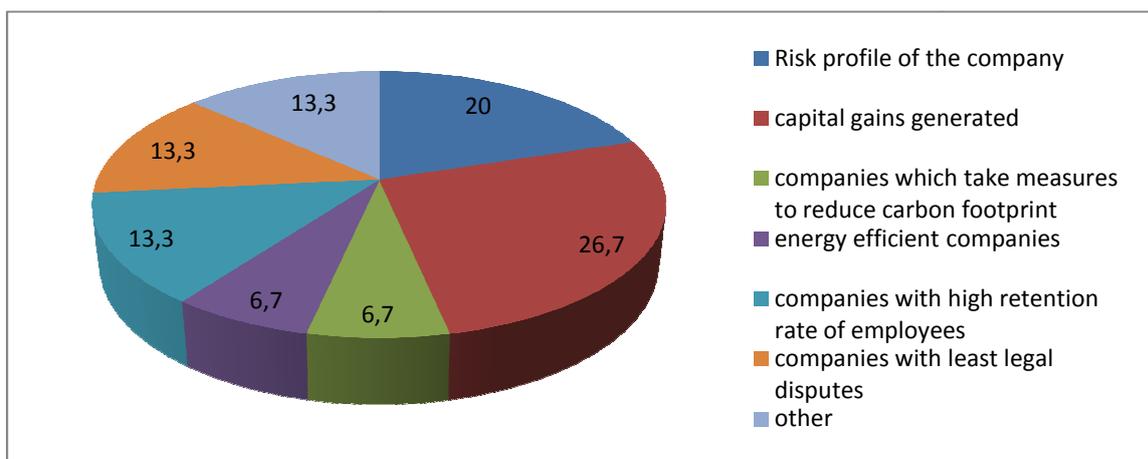


Figure 3.2: Factors considered by PE Managers in investment decisions



ii. In case of portfolio diversification, MF managers often taken into consideration ESG factors apart from the other financial factors as has been represented in the following table below: In this case also the MF managers are much more aware of the environmental and social factors vis-à-vis the PE managers.

Figure 4.1: Factors considered by MF Managers in portfolio diversification

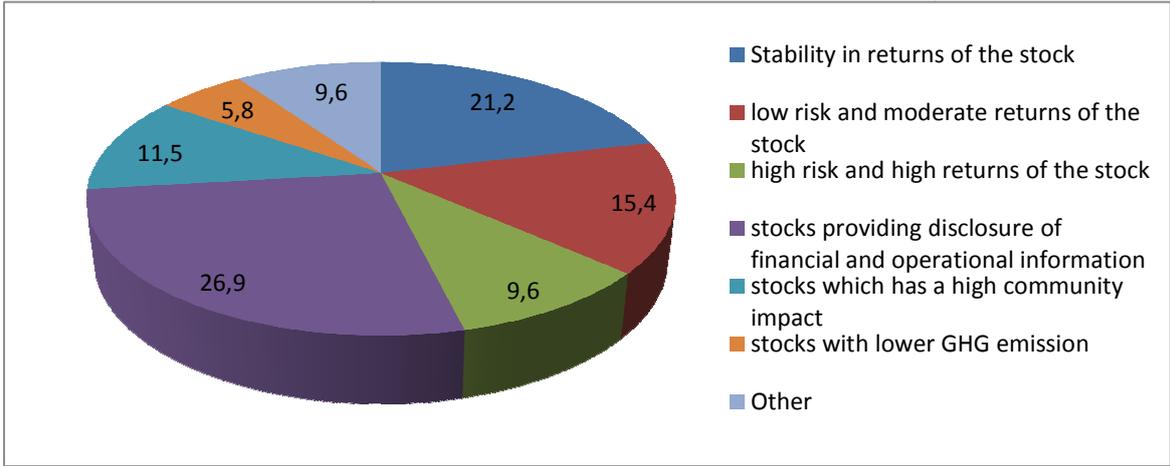
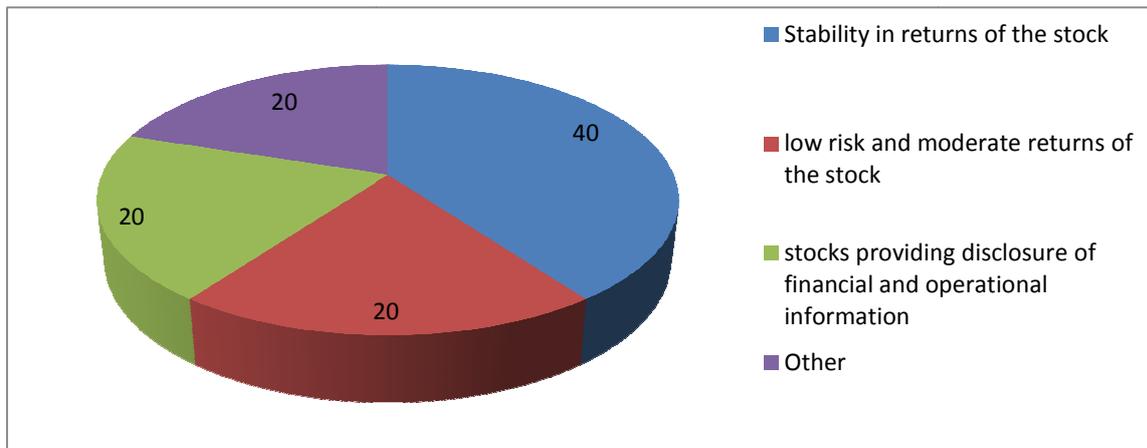


Figure 4.2: Factors considered by PE Managers in portfolio diversification



iii. Asset managers are increasingly considering ESG factors for screening of their portfolios, with greater emphasis on corporate governance factors. However, the MF managers also take into consideration the environmental factors as compared to the PE managers. The following graphs are indicative of the same.

Figure 5.1: Factors considered by MF Managers in screening portfolios

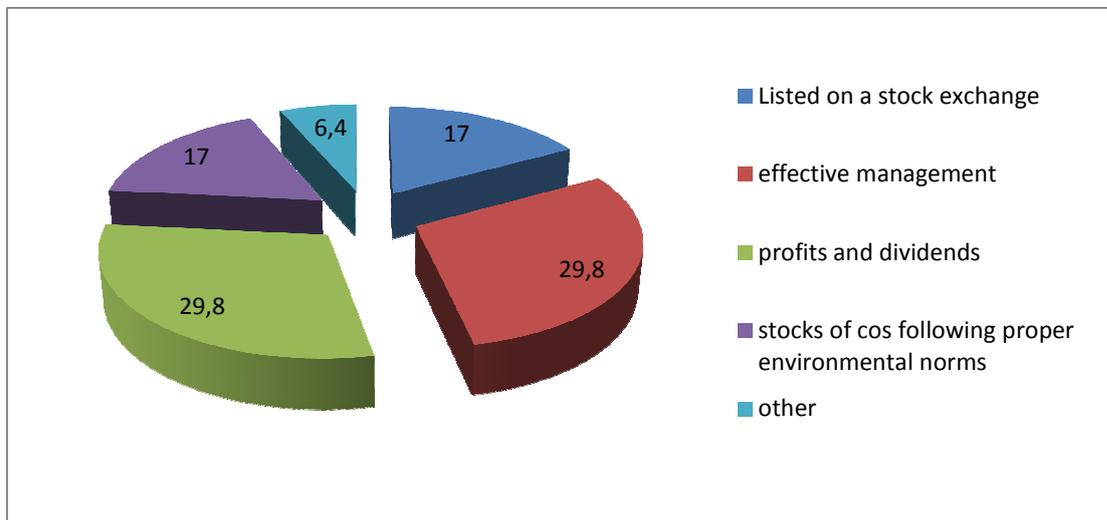
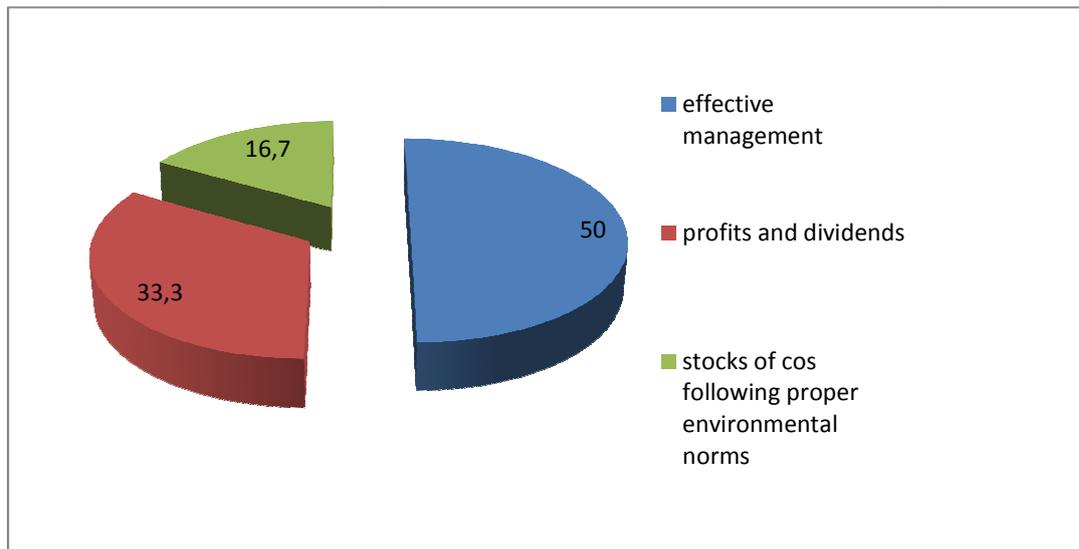


Figure 5.1: Factors considered by PE Managers in screening companies



iv. In terms of research related activities of companies, fund managers consider investing in companies with research conducted in the domain of corporate governance. The following chart is highly indicative of the same.

Figure 6.1: Factors considered by MF managers for investment in terms of research related activities

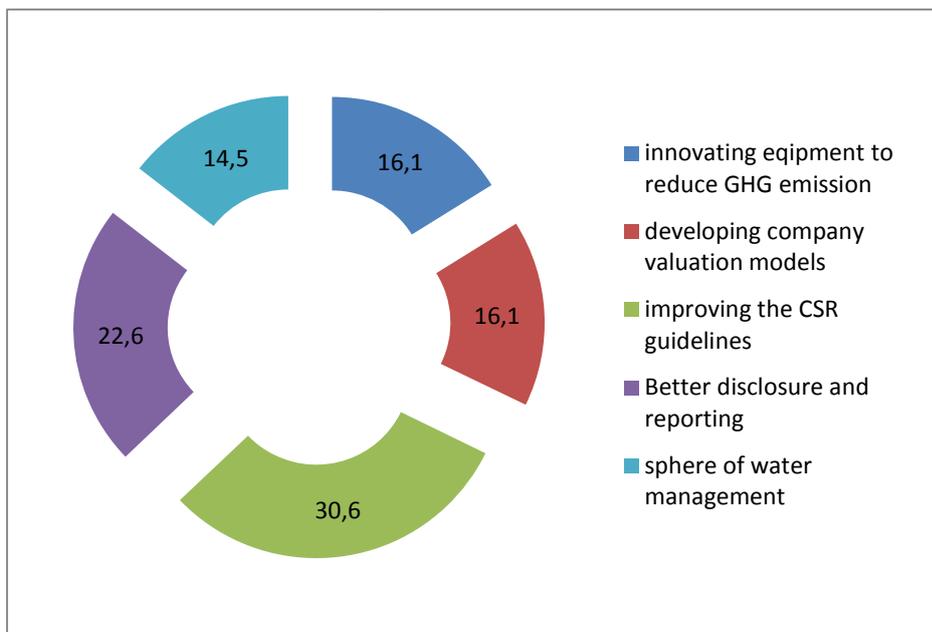
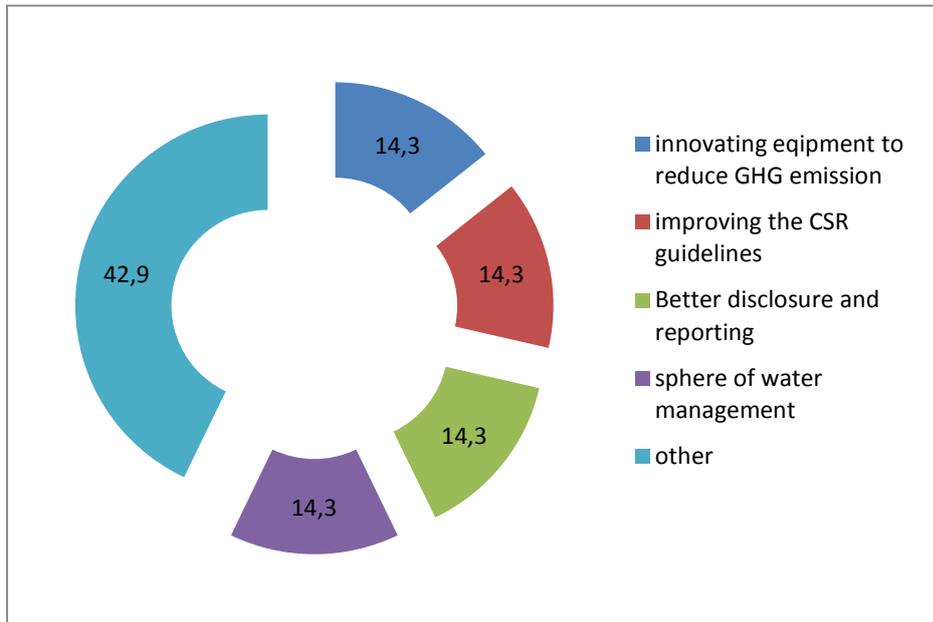


Figure 6.1: Factors considered by PE managers for investment in terms of research related activities



v. Although the fund managers are becoming aware of ESG factors in their investment decisions, rarely few of them have international partnership with sustainable framework. Only three of the asset managing firms namely, HSBC, SBI and Multiples PE consider partnerships with UNPRI, Auto Euro III Emission norms and Equator principles respectively.

vi. MF and PE managers mostly report financial and corporate governance factors to their clients as is shown below:

Figure 7.1: Factors reported by MF Managers to their clients

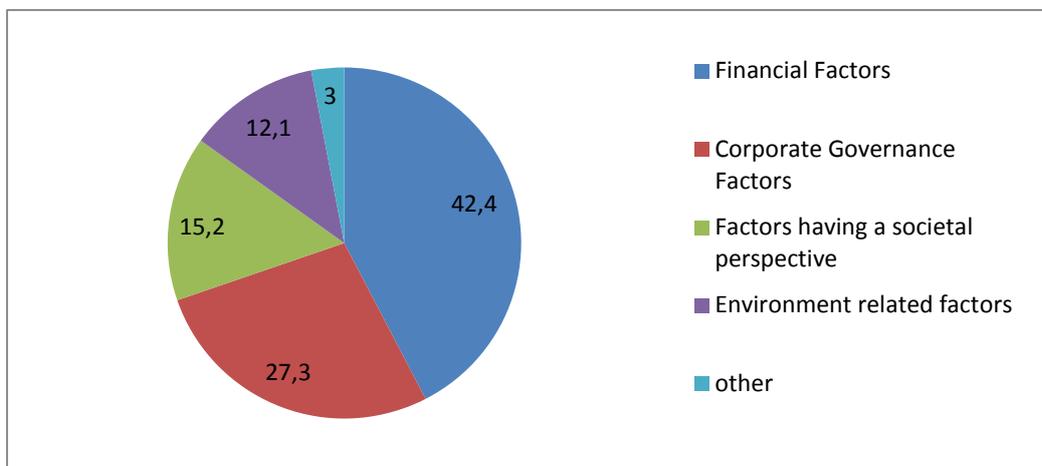
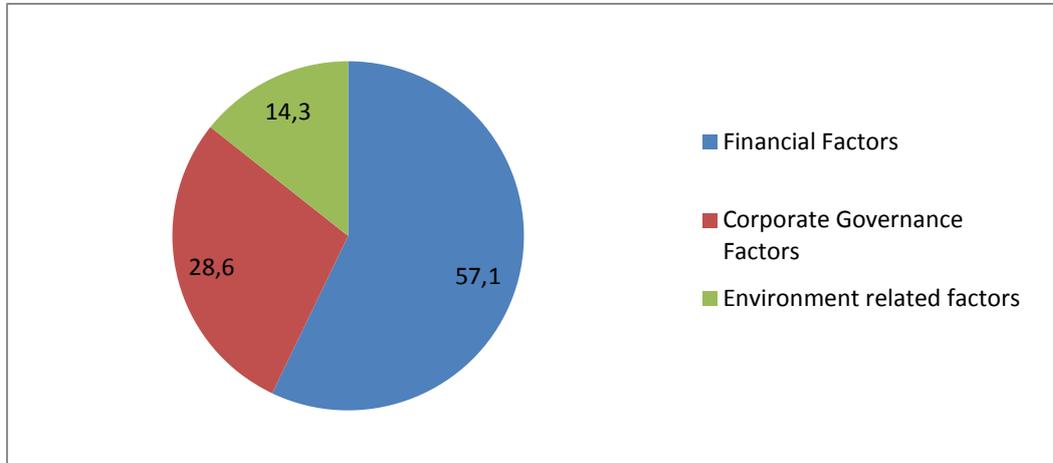


Figure 7.2: Factors reported by PE Managers to their clients



vii. Most of the MF firms surveyed publish annual and financial reports, although some like L&T are also publishing sustainability and disclosure reports.

Figure 8.1: Reports published by MF management firms

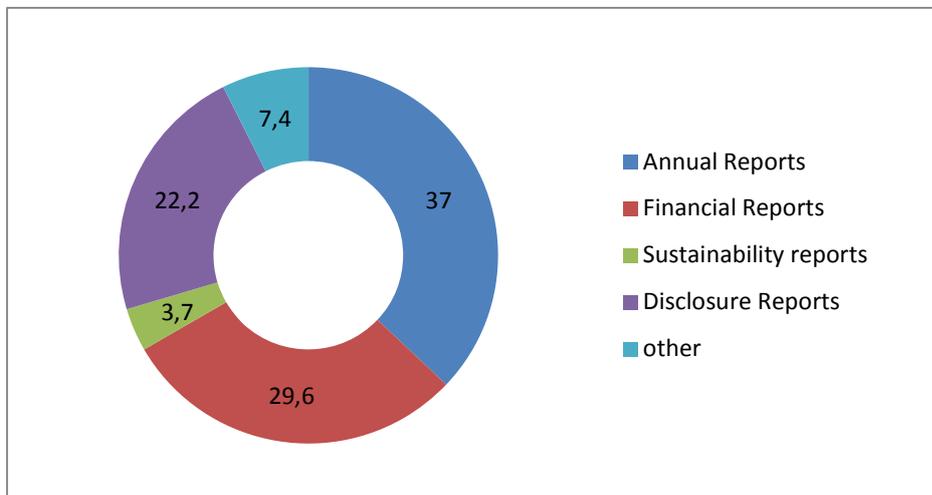
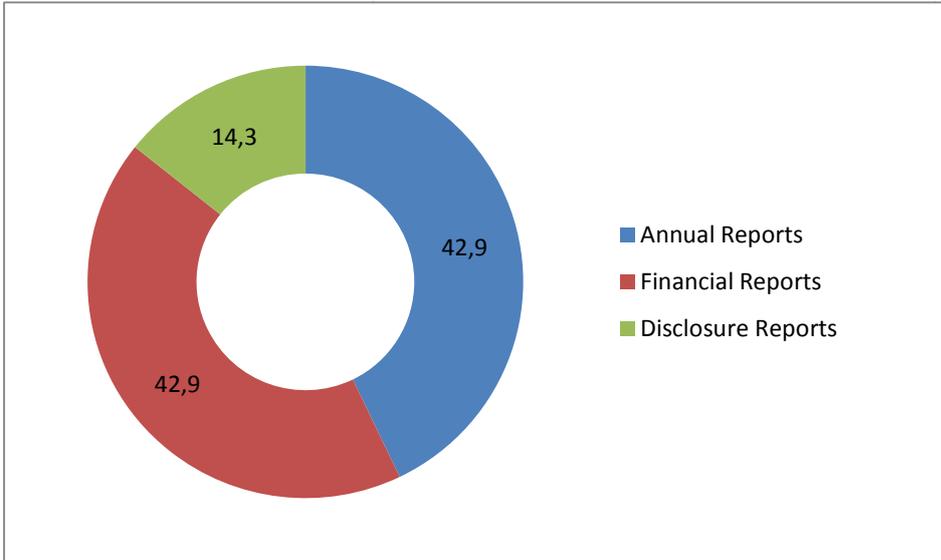
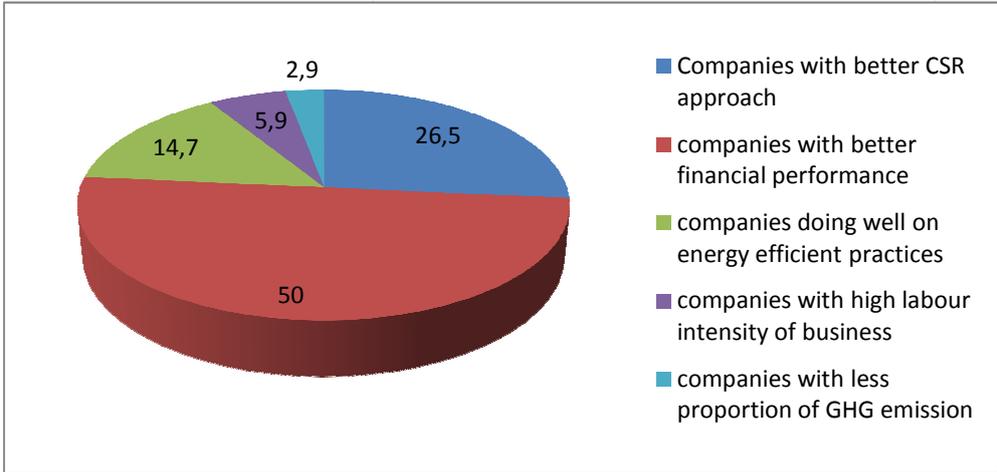


Figure 8.2: Reports published by PE management firms



viii. While trying to identify newer opportunities for investments, MF managers are highly concentrating on companies having good corporate governance. On the other hand, PE managers surveyed only consider financial factors for newer investments.

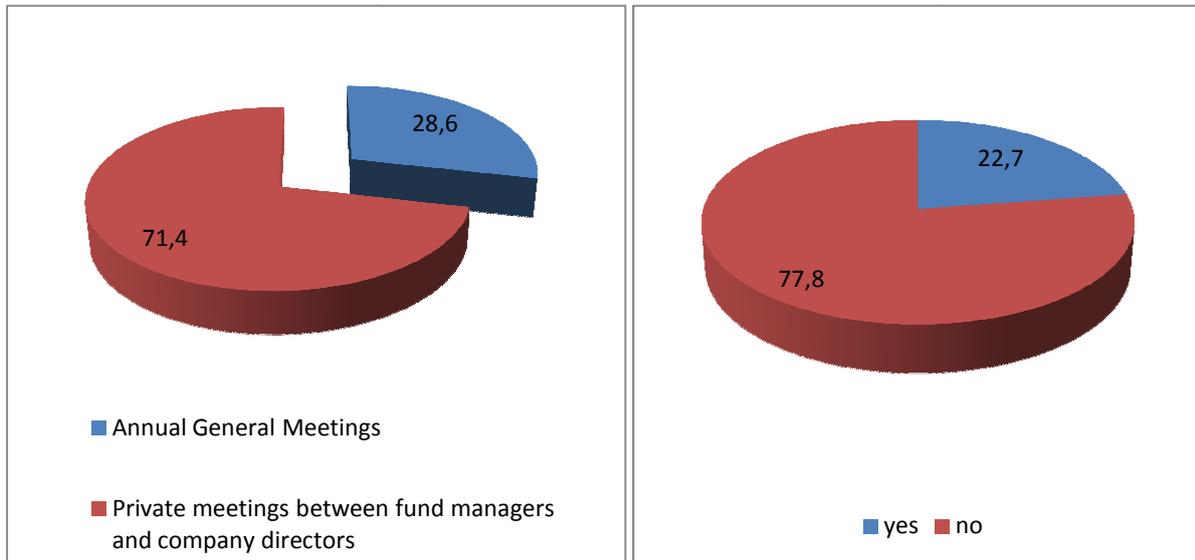
Figure 9: Factors considered by MF managers for newer investment opportunities



ix. Regarding mode of applying pressure on individual companies to improve their ESG performance, most of fund managers do not apply pressure, as is shown in the figure 11. In case they apply, the general mode is private meetings between fund managers

and company directors. On the other hand, PE managers surveyed usually conduct only private meetings between fund managers and company directors.

Figure 10: Mode of applying pressure on companies Figure 11: MF managers applying pressure on companies



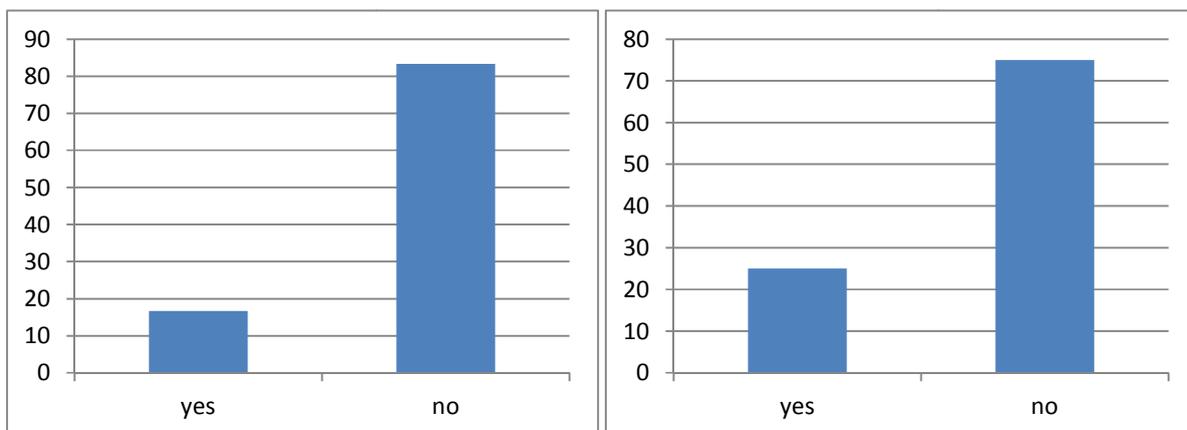
x. According to the MF and PE managers surveyed, majority of their clients do not place importance to include ESG in their portfolios.

Figure 12.1: Clients place importance to ESG

Factors
ESG

Figure 12.2: Clients place importance to ESG

Factors



xi. Most of the MF managers and PE managers do not have an adequate ESG management system at present, but are quite hopeful about having a rigorous ESG mechanism in the future. Given the fact that the risk taking capacity of these two asset classes are different, yet most of the asset managers are assertive that investment tools such as company valuation models need to be developed further to adequately capture ESG data. In fact, according to some MF managers, one needs to see whether that would lead to strengthening the business model of the company. In this context, it is also pertinent to mention that none of the asset management companies have calculated their sustainable AUM.

xii. Taking into consideration, all the responses of the mutual fund managers, their ESG preference is provided below:

Table 5: Response rate of ESG Factors by MF Managers

Environmental factors	% of Responses
Invest in companies with sound environmental performance	16.9
Invest in companies with Research in innovating equipment to reduce GHG emission	15.4
Invest in companies with Research in sphere of water management	13.8
Screening of companies based on proper environmental norms	12.3
Invest in companies which take measures to reduce carbon footprint	10.8
Invest in energy efficient companies	9.2
Consider companies doing well on energy efficient practices	7.7
Report of Environment related factors	6.2
Diversification based on companies with lower GHG emission	4.6
Publish of Sustainability reports	1.5
Consider companies with less proportion of GHG emission in indentifying new opportunities for investment	1.5
TOTAL	100

Social Factors	% of Responses
Invest in companies with high retention rate of employees	43.5
Diversification based on companies with a higher community impact	26.1
Invest in companies having a societal perspective	21.7
Consider companies with higher labor intensity of business in identifying new opportunities for investment	8.7
TOTAL	100
Governance Factors	% of Responses
Invest in companies with sound corporate governance	12.9
Screen companies with effective management	10.6
Diversification based on companies which provide disclosure of financial and operational information	10.6
Screen companies which distribute dividends	10.6
Invest in companies with research activities in improving CSR guidelines	10.6
Invest in companies with research activities in better disclosure and reporting	10.6
Invest in companies with least legal disputes	9.8
Report Corporate Governance Factors to clients	6.8
invest in Companies with better CSR approach	6.8
Publish Disclosure Reports	4.5
Putting pressure on companies to improve ESG performance	3
Consider partnership with sustainable frameworks	1.5
Putting pressure on clients to include ESG in their portfolios	1.5
TOTAL	100

xiii. Extent of Similarity in Responses within AMC's

As we had multiple respondents from SBI mutual Fund and the PE Industry, we had checked for the similarity of responses within the group. We have used the Kendall's tau correlation coefficient to check their similarity in perception of ESG factors. In case of SBI mutual fund, two out of three senior-most respondents have shown a positive and significant correlation coefficient, indicating their same line of thought regarding sustainable investing. Table 6.1 highlights the same.

Table 6.1: Correlation Coefficient matrix of SBI Mutual Fund Managers

			Participant One	Participant Two	Participant Three
Kendall's tau_b	Participant One	Correlation Coefficient	1.000	.076	.695(**)
		Sig. (2-tailed)	.	.748	.003
		N	14	14	14
	Participant Two	Correlation Coefficient	.076	1.000	-.128
		Sig. (2-tailed)	.748	.	.600
		N	14	14	14
	Participant Three	Correlation Coefficient	.695(**)	-.128	1.000
		Sig. (2-tailed)	.003	.600	.
		N	14	14	14

**Correlation is significant at the 0.01 level (2-tailed)

Similarly, out of 4 respondents from the PE industry, 2 of them were found to be having similar perception and awareness about ESG factors. Table 6.2 is indicative of the same.

Table 6.2: Correlation Coefficient matrix of PE Fund Managers

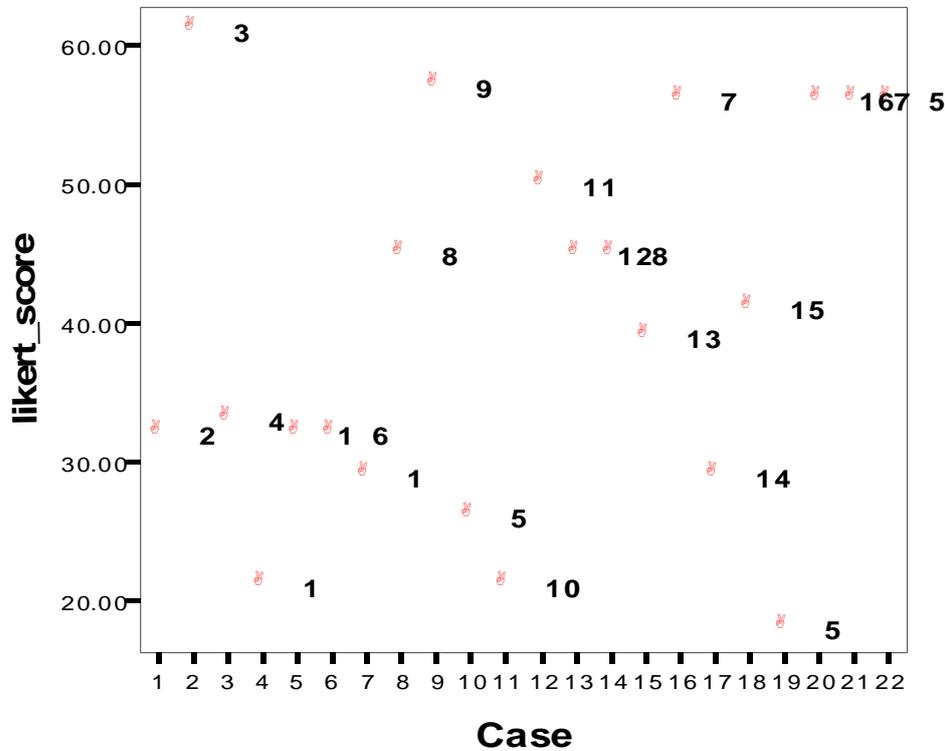
			Participant one	Participant two	Participant three	Participant four
Kendall's tau_b	Participant one	Correlation Coefficient	1.000	.167	.710(**)	.

		Sig. (2-tailed)	.	.502	.003	.
		N	14	14	14	14
Participant two		Correlation Coefficient	.167	1.000	.105	.
		Sig. (2-tailed)	.502	.	.656	.
		N	14	14	14	14
Participant three		Correlation Coefficient	.710(**)	.105	1.000	.
		Sig. (2-tailed)	.003	.656	.	.
		N	14	14	14	14
Participant four		Correlation Coefficient
		Sig. (2-tailed)
		N	14	14	14	14

** Correlation is significant at the 0.01 level (2-tailed)

xiv. The Graph below shows the perception and awareness of the 22 asset managers surveyed. The asset managers with lower scores are the ones the ones who have a strong perception and understanding of the ESG factors and their role in investment decision. They are also much more hopeful about the ESG market in India. Here composite indexing has been done based on responses on the likert scale ranging from 1-7.

Figure 13: Composite Index Scoring of MF and PE Fund Managers



Note: 1=SBI MF; 2=TATA MF; 3=Minerva Globe Fund; 4=Taurus MF; 5=L&T MF; 6=Mirae AMC; 7=MotilalOswal AMC; 8=IDFC MF; 9=PNB Metlife; 10=HSBC AMC; 11=Reliance Capital; 12=Reliance PE; 13=New Silk Route; 14=Multiples PE; 15=Kotak AMC; 16=Maylife Venture Capital Fund

4. BARRIERS TO SUSTAINABLE INVESTING AND CHALLENGES WITH MEASURING THE ESG MARKET

The previous sections reflect the state of ESG investment in several developed and emerging economies including a pilot survey conducted in India. One cannot contradict the fact that investors around the world are considering ESG factors in their mainstream investment analysis. The ones that are not considering at present also hold a favorable opinion about incorporating ESG factors. Whatsoever, the slow but steady change towards responsible investment scenario in several emerging nation face a lot of challenges. Here we must consider the fact that developed economies are ahead of

emerging economies in terms of sustainable investment due to several factors, stock market penetration being one of them. Thus the challenges faced by both the developed and developing economies are somewhat different.

The following table lists the perceived barriers to sustainable investing faced by investors in both developed and emerging categories.

Table 7: Barriers to Sustainable Investing in Developed and Developing Economies

	Developed Economies	Developing Economies
1	Absence of an ESG matrix, due to which direct comparison is not possible and investors are unable to recognize the potential ESG factors	Absence of an ESG matrix, due to which direct comparison is not possible and investors are unable to recognize the potential ESG factors
2	There are several challenges related to stock market sustainability indices. First of all, here is no uniformity related to construction of sustainability indices. Apart from this, the methodology used does not include financial parameters along with ESG parameters. If this is done, stock exchanges can screen companies who not only perform well on the financial front but also on the ESG front. Secondly, the level of understanding of the index providers to the new investor segments and communicating about the index construction and intent is low.	There are several challenges related to stock market sustainability indices. First of all, there is no uniformity related to construction of sustainability indices. Apart from this, the methodology used does not include financial parameters along with ESG parameters. If this is done, stock exchanges can screen companies who not only perform well on the financial front but also on the ESG front. Secondly, the level of understanding of the index providers to the new investor segments and communicating about the index construction and intent is low. Thirdly, the availability of authentic ESG data sources is limited. Fourthly, more data analysis is required in developing markets to understand how a company's sustainability efforts can enhance its financial performance
3		Depth of penetration of stock markets in developing economies is low. More to this, the level of domestic savings is

		insufficient. Hence it is a big challenge to mobilize the savings into investments, particularly responsible investments. The first and foremost precondition of ESG investing in any developing country is to first improve its economic conditions and macroeconomic parameters.
4		Volatile economic framework and unpredictable speculation in the economic market and macroeconomic environment

There exist a lot of challenges in measuring the ESG market. According to EuroSIF (European Sustainable Investment Forum, it is nearly impossible to consistently quantify the market size and track changes over time. Fully integrated ESG investments that simply use ESG criteria as part of overall analysis are often not categorized or tracked separately from other mainstream investments. In fact, the whole point of such integration is that it is not separated out, and by its nature, cannot be tracked. This would be similar to trying to identify what percentage of investments look at management quality. Furthermore, for years, ESG integration was erroneously regarded as synonymous with Socially Responsible Investing (SRI), and much of the current market research still includes both SRI and ESG integrated investments. In addition, the approaches to ESG still vary widely, making it hard to define what should be included in a market size calculation. Many approaches are passive, and there is also skepticism that investors are talking more about ESG than they are actively integrating it. Even if a firm commits to integrating ESG criteria, there are questions as to whether to include all of their assets in the market size, or just the smaller percentage where ESG criteria are systemically being used. The lack of standardization and definition around ESG criteria makes it challenging to use market size as a key indicator of the integration of ESG criteria.

5. CONCLUSION

From the previous discussions, we can surely arrive at the conclusion that ESG investing or sustainable investment is not only a catchphrase but asset managers are quite aware of its potential benefits. Although the development in terms of sustainable investing has already gained ground in the developed countries, the developing or emerging economies are not left back. As has been previously stated, studies have not

only pointed to the positive correlation between ESG factors and stock prices, but several analytics firms are also working on it by creating alternative scenarios. In this context, the perception and awareness levels of institutional investors are extremely pertinent. Market surveys of the several asset classes have been carried out in developed countries wherein the surveys have highly emphasized on increased attention by investors on ESG factors. The small sample pilot survey carried out in India is also indicative of the growing awareness of fund managers and PE managers towards sustainable investing. Although, the sample size has been a small one, it can be used as a way forward to conducting larger sample size surveys. Surveys of different asset classes need to be conducted as their risk taking capacity varies across classes, type of operations undertaken and objectives of the fund. The major thrust of this paper has been to provide an overview of sustainable investing and its spread across the world. However we do not intend to directly compare the ESG investment scenario in the developed and developing economies, given their different microstructures. Instead we can highlight the type of surveys undertaken, which can show us a pathway towards conducting surveys in emerging economies. As has been thoroughly discussed in this paper, fund managers form an integral part of the ESG decision making in investments. Being custodial in nature, they will always try to minimize the risk associated with their clients' portfolios. In this regard some of them believe that ESG investments can indeed help in diversifying risks. However, apart from the fund managers, the other major players in the investment market are the investment bankers. They have the capacity to drive investments towards sustainable ones by incorporating Environmental, Social and Governance factors, through their advisory role. Hence intensive surveys are required to ascertain their level of consciousness towards ESG factors in investments. However, lack of a globally accepted ESG framework and practices have always played a severe barrier of comparing investment portfolios. Apart from this, estimating actual size of ESG assets has also not been on the minds of several investment managers across the world, particularly in India. The survey in India is also indicative of the same.

Businesses and investments being at the very core of our economic activities, act as strong change agents in the social process. The need of the hour is to channelize all efforts to the cause of sustainability. Although there is no one formula to effectively handle ESG issues, but a serious drive towards sustainability can be brought by the investments players in the market, as financial markets are always impacted by a majority opinion. A genuine level of concern and consciousness is required to understand that efforts are not only required to make our planet a worthy place to live but also the fact that ESG factors can indeed add value to our investments.

Hence we are hopeful that ESG investments will gain momentum in the days to come and these efforts will also play a major role in bringing a remarkable change in the domain of sustainable investments across the world, particularly in the Asian economies.

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