

*Full Length Research Paper*

# Corporate perceptions of climate change in Malaysia

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Accepted 7 December, 2010

The paper discusses how corporate managers in Malaysia view climate change which would provide an insight of the level of awareness and perception regarding climate change in this sector. It also attempts to make a comparison between outcomes of the survey to that of past studies in other countries. The survey reflects that corporate managers in Malaysia are concerned about climate change, demonstrating a wide general awareness of the issue. In the context of climate change and company's profit, a majority of the corporate managers perceived that climate change will affect the company's operation and profits while a lesser percentage expressed 'no affect' on these and also viewed climate change as a serious problem that should be addressed at the global level. In addressing climate change issues of the country, most of the corporate managers perceived that the government should take responsibility while half of them were of the opinion that the business and corporate sector should also take responsibility. The important distinction is the strategic scope regarding climate change, as corporate managers in Malaysia have been shown to exhibit differences concerning the extent to which they feel responsibility for tackling climate change issues. The paper also suggested corporate sectors in Malaysia to pay attention in making inventories and setting targets with respect to GHG emissions that will lead the Malaysian government's commitment of a voluntary reduction of up to 40 percent in terms of emissions intensity of GDP by the year 2020 compared to 2005 levels, in cooperation with the public and private agencies, industry, community as well as other stakeholders.

**Key words:** Corporate sector, climate change, awareness, perceptions, policy, Malaysia.

## INTRODUCTION

Changing climate is one of the most critical challenges facing the world. There is a concern for socio-economic issues related to climate change including business opportunities and threats, vulnerability of economies and market conditions as well as co-benefits and risks of climate change mitigation actions. Adaptation to these changes needs to be advanced faster through appropriate financing, technology and capacity building, if particular high risk and vulnerable groups are not to be significantly disadvantaged in the future. With increasing public awareness and concern, taking action on climate change is also starting to become a reputational and strategic issue for businesses. There is a wealth of literature concerning public awareness or perceptions of climate change (DEFRA, 2002; BBC, 2004; Poortinga

and Pidgeon, 2003; Hillman, 1998), but behavioral responses are limited (Lorenzoni et al., 2007). In the context of other environmental issues, climate change appears to have a low priority (Poortinga and Pidgeon, 2003). In recent years, the potential implications of climate change on business are receiving greater attention and recognition, with investors and other stakeholders in the business sector (Kolk and Pinkse, 2004). For example, the Carbon Disclosure Project (CDP) operates worldwide to collect and distribute high quality information that motivates investors, corporations and governments to take action to prevent dangerous climate change (CDP, 2009). It has shown that the risks from climate change can be significant and that not all companies in the same sector will be affected to the same degree. It has also raised concerns over the potential for litigation if business and financial organisations fail to consider the impacts of climate change (POST, 2004).

Malaysia has experienced a rapid industrialization and

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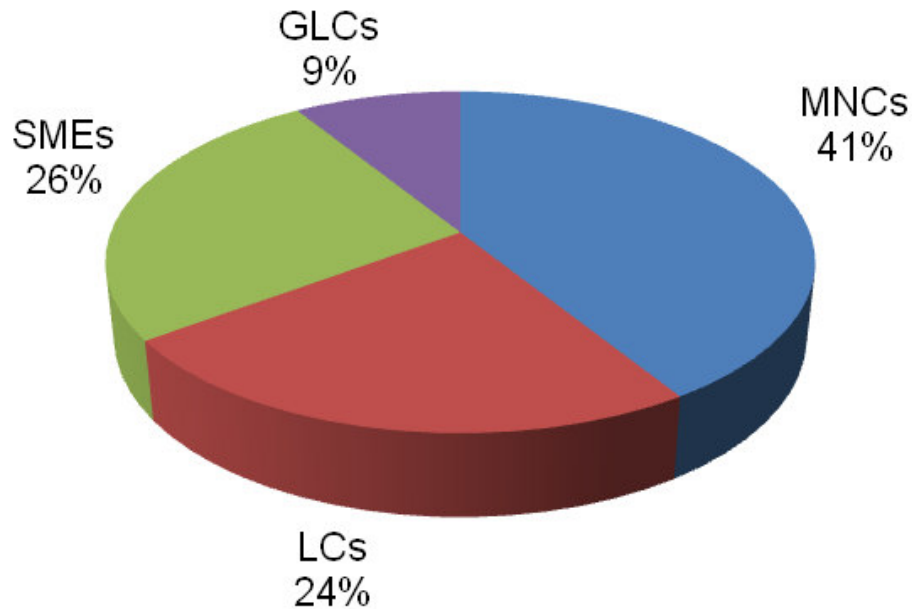


Figure 1. A general profile of the respondents

economic growth accompanied by escalating energy demand and consumption that heavily relied on fossil fuels had resulted a significant increment in emission of greenhouse gas mainly carbon dioxide. Malaysia like other countries is also experiencing adverse effects of climate change on key economic sectors such as energy, industries, transport, forestry, agriculture, water and coastal resources, public health and waste sector (INC, 2000). With the emergence of climate change as concern, Malaysian government has been made various efforts and commitments by ratifying UNFCCC and Kyoto Protocol in 1994 and 2002 respectively. During the 15<sup>th</sup> Conference of Parties at Copenhagen in 2009, the Prime Minister of Malaysia, Datuk Seri Najib Tun Abdul Razak stated that:

"I would like to announce here in Copenhagen that Malaysia is adopting an indicator of a voluntary reduction of up to 40% in terms of emissions intensity of GDP (gross domestic product) by the year 2020 compared to 2005 levels" (GreenTech Malaysia, 2010).

Appropriate strategic responses and actions *from all the stakeholders* either from government, private or corporate sector or civil society, are necessary to reduce the impact of climate change and GHG emissions in this country. This paper is part of a survey on the issue of climate change, business and sustainability, conducted by the Institute for Environment and Development (LESTARI) through Malaysian Network for Research on Climate, Environment and Development (MyCLIMATE), with support from the Ministry of Natural Resources and Environment. The paper discusses how corporate managers

in Malaysia view climate change which would provide an insight of the level of awareness and perception regarding climate change in this sector. It also attempts to make a comparison between outcomes of the survey to that of past studies in other countries.

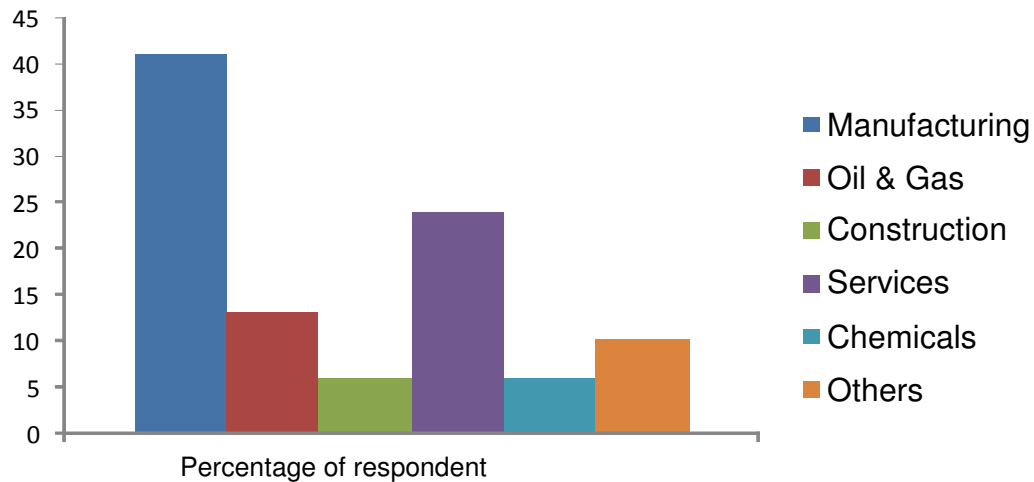
## METHODS

The survey aims to assess the views of the corporate sector on climate change and identify issues and priorities for future actions in terms of business and sustainability. Data was collected through interviews with senior managers and management officers of the respective companies, who are members of the Malaysian International Chambers and Commerce Industry (MICCI) and Federation of Malaysia Manufacturers (FMM). Interviews were based on a set of questionnaires comprising the issue of business, awareness and perception of climate change as well as other environmental concerns. Purposive random sampling method was used for the survey. The final survey was based on 54 samples of senior managers and management officers from July to September 2008. Simple descriptive statistics such as averages, ranges and percentages were used to analyze the data obtained. The Statistical Package for Social Sciences (SPSS) software was used for this purpose.

## RESULTS

### Profile of respondents

The survey respondents reflect a wide range of corporate types and size as well as sectoral businesses. Figure 1 presents a general profile of the respondents in which 41% of them are from multi-national companies (MNCs), 26% from small and medium enterprises (SMEs) and 24% from large corporations (LCs). About 9% of the



**Figure 2:** Respondents representative to the sectoral business

**Table 1.** Sources of awareness about climate change.

Sources	Aware of climate change	
	Number of respondents	Percentage of respondents
Newspapers	47	87
Television	44	82
Seminars, conferences and workshops	37	69
Internet	35	65
Own company	30	56
Radio	18	33
Industry Association	12	22
Others sources	9	17
Other companies	3	6

respondents represent the government-linked companies (GLCs). Figure 2 also finds out more about the respondents in order to better understanding of what types of sectoral businesses they are representing. A majority of them (41%) represents manufacturing sectors including electrical and electronics industry, food processing & beverages, rubber processing and products, wood and plastic products while 24, 13 and 10% consist of services (that is, hotel and resorts, environmental management or pollution control, recycling and recovery), oil and gas and other sectors such as banking, finance and insurance, respectively. As the survey samples represented to the members of MICCI and FMM, it may also influence to the respondent's profile. The survey allowed this due to see a quick corporate view on climate change by a pilot study.

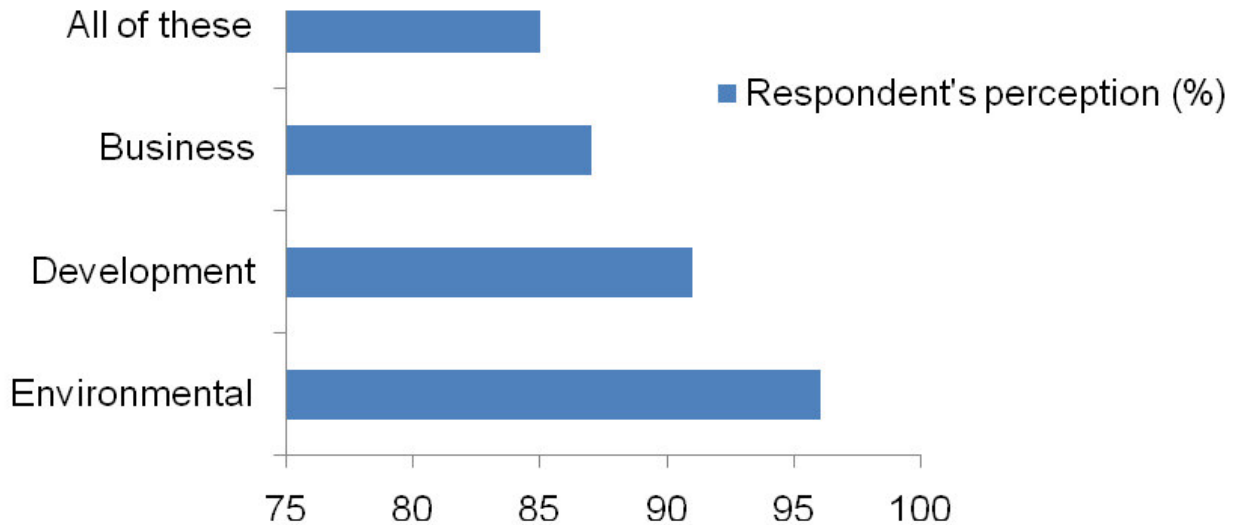
### Awareness of climate change

The survey reveals that all the respondents are generally aware of climate change issues. All of them have heard of either 'climate change', 'global warming' 'greenhouse

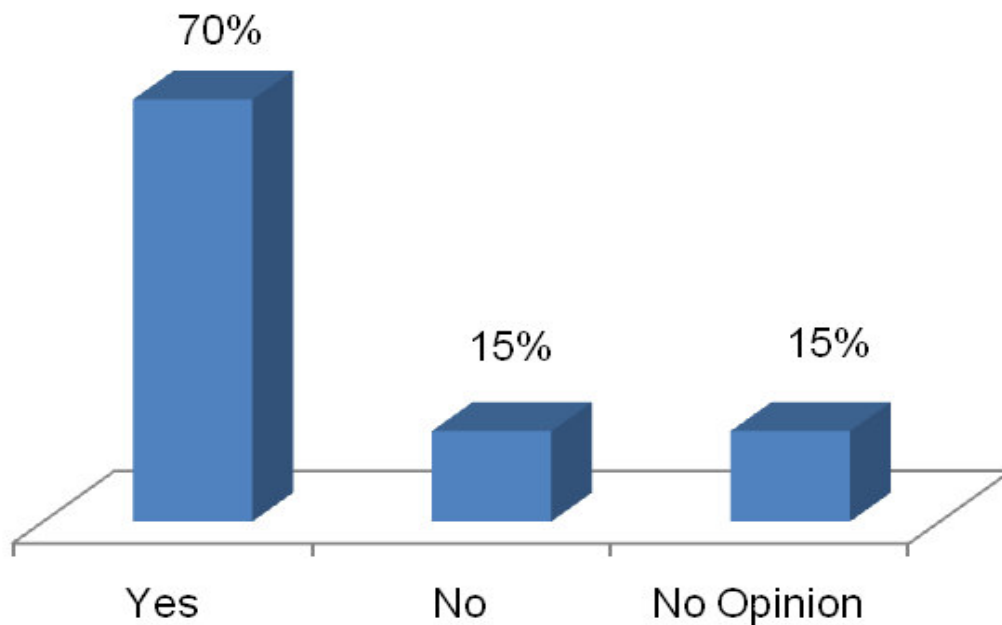
effect' or 'sea level rising' and are concerned about it. The survey shows that the two most common sources of awareness are newspapers (87%) and television (82%) (Table 1). Other sources include seminars, conferences and workshops (69%); internet (65%); own company (56%); and radio (33%); followed by the industry association (22%), among others.

### Perception of climate change as different issues

A majority of corporate officers viewed climate change as an environmental issue (96%) (Figure 3). Almost an equal proportion viewed it as a development (91%) and business (87%) issue. Climate change is an economic development issue and not just an environmental issue (John, 2008). Not only can climate change affect an area's economic patterns; it can also affect costs of business operation and the competitive position of its markets and competitors, and thus affect prospects for local employment and individual livelihoods (Wilbanks et al., 2007). About 85% of the respondents opined that



**Figure 3.** Perception of climate change as different issues.



**Figure 4.** Climate change affects the company profit

climate change is a collective issue of environmental, development and business. This indicates that, in their opinion, climate change is no longer only an issue of environment or development or business.

However, in the context of climate change and company profit, 70% of the respondents perceived that climate change will affect the company's profit while 15% of them expressed that climate change will have 'no affect' on their operations (Figure 4). Increasingly, climate change is framed as an opportunity rather than a burden (Jones and Levy, 2007). A good example is the rapid growth of markets for renewable and clean energy, as

well as energy efficiency (Makower et al., 2006). Much of the corporate activity on climate change is stimulated by the perception of long-term market opportunities in new high-margin, low-emission products and technologies, as well as cost savings from lower energy use (Begg et al., 2005; Margolick and Russell, 2004; Reinhardt, 2000; Romm, 1999). Such awareness has yet to reach a significant proportion of the corporate sector in Malaysia.

The survey revealed that 70% of corporate managers believe that climate change is a serious problem that needs to be addressed now. This is in line with Jones and Levy's (2007) study. The study found that senior

**Table 2.** Opinion to the level of addressing climate change.

Items	Level of addressing climate change					
	Global	Regional	National	Local	Individual and community	All of these level
Percentage of respondents	82	43	56	44	59	37

managers of European companies viewed climate change as a serious problem and regulation of emissions as inevitable, but they were more optimistic about the prospect for new technologies.

In Malaysia, a majority of the respondents (82%) who viewed climate change as a serious problem were of the opinion that it should be addressed at the global level (Table 2). On the other hand, about half of them thought that the issue should also be addressed at the individual and community, as well as the national level. Darier and Schule (1999) found that many people in the UK want their government to impose regulations to make them act, because they consider only collective action to be effective in response to climate change.

In terms of addressing climate change issues in the country, most of the corporate managers (89%) perceived that the government should take the responsibility while 74% of them thought that the business and corporate sector should also take responsibility. Recently, many businesses have adopted a more constructive stance that acknowledges the reality of climate change and its responsibility for addressing the issue (Margolick and Russell, 2004). Yet it has been a relatively recent phenomenon that the public-private partnership model has been applied to help local governments and private businesses combine efforts and expertise to fight climate change and promote environmental sustainability (Climate Group, 2007).

## DISCUSSION AND CONCLUSION

Corporate managers in Malaysia are concerned about climate change, demonstrating a wide general awareness of the issue. In the context of climate change and company's profit, a majority of the corporate managers perceived that climate change will affect the company's operation and profits while a lesser percentage expressed 'no affect' on these and also viewed climate change as a serious problem that should be addressed at the global level. The implications of climate change may vary across different types of corporate and business sectors as well as geographical location. Some sectors and individual companies may face increasing threats, while others may be less affected and some may even get opportunities and benefits. From a business perspective, climate change is likely to affect the location, design, operation and marketing of infrastructure, products and services. In addressing climate change

issues of the country, most of the corporate managers perceived that the government should take responsibility while half of them were of the opinion that the business and corporate sector should also take responsibility. In line with this, Radovi et al. (2010) also emphasized corporation's harmonization with various interests of ethical, responsible and profitable in order to fulfill economic purposes. The important distinction is the strategic scope regarding climate change, as corporate managers in Malaysia have been shown to exhibit differences concerning the extent to which they feel responsibility for tackling climate change issues.

As the issues of climate change matured, many companies from European countries adopted proactive climate strategies. Due to the limited numbers of survey respondents, the results could not show the different views between wide range of corporate size and sectoral businesses, but it can be assumed that climate change may pose strategic dilemmas for corporate sectors across a range of industries, affecting those that produce fossil fuels examples oil and gas or those that depend on these fuels directly such as manufacturing, chemicals and indirectly such as construction and services, and those that develop new market opportunities arising from risk coverage or emerging emission trading systems such as banks or insurance companies. Corporate support for mitigation and adaptation measures became evident to the initiatives and activities of reducing GHG emissions through product and process improvements, cooperation with other companies, government and non-government agencies to exchange technologies and expertise, and the exploration of options such as emission trading (Kolk and Pinkse, 2004; Dunn, 2002; Rosenzweig et al., 2002; Whittaker et al., 2003). One example is the effort of YTL Corporation in building capacity of Malaysian corporate sector with respect to disseminating information on business strategies for managing climate change and sustainability (Tang and Yeoh, 2007). However, such effort needs to be mainstreamed in the country. The government can play an important role in ensuring a stable investment climate that encourages corporate sector efforts to deal with climate change and its consequences; the domestic rules that allow the country to take better advantage of international financing opportunities; and managing available policy, economic and financial instruments to integrate climate change adaptation and mitigation into economic and development planning of the country. To address climate change, private or corporate sector can spur new businesses,

lessen liabilities for climate damage, and preserve their role in wealth and capital formation.

The authors expressed that development cannot confer lasting benefits unless environmental considerations and climate and ecosystem related changes are protected as integral parts of the development planning and decision making. This can only be done through implementation of the recent formulated policies by the Malaysian government such as National Green Technology Policy and National Policy on Climate Change to accelerate the national economy and to ensure climate resilient development in promoting sustainable development (Ministry of Energy, Green Technology and Water, Malaysia, 2009; Ministry of Natural Resources and Environment Malaysia, 2009). As there is a sizeable private and corporate sector presence in Malaysia, public-private partnership could play a significant role to the climate action that allows government to implement policies. Both policies would also allow corporate sectors to strengthen their capacity by reducing its vulnerability to climate change and seeking business opportunities beyond the borders of their internal organizations and supply chain. This shows the potentiality of the Malaysian government to be able to achieve their commitment of 40% emission intensity reductions, in cooperation with the public and private agencies, industry, community as well as other stakeholders. So this is the time for corporate sectors in Malaysia to pay attention in making inventories and setting targets with respect to GHG emissions that lead to a first step of climate change strategies and actions. This study could be useful for policy and decision makers in implementing national policy and action plans to tackle climate change issues. There is also a scope for further research on business approaches to identify effective strategies and proactive practices of corporate responses to the climate change issues in Malaysia.

## ACKNOWLEDGEMENTS

The authors are grateful to the Malaysian International Chambers and Commerce Industry and Federation of Malaysia Manufacturers for their assistance during data collection. Respondents of the survey are also acknowledged for their cooperation. The support of Tan Ching Tiong and Shahrman bin Samsudin in the research is gratefully acknowledged. A very earlier draft of this article was presented at the Annual Global Business, Information Technology and Management for Economic Development Conference (BITMED, 2009) in Beijing, China, 22 to 24 October 2009.

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