DYSFUNCTIONAL BEHAVIOUR IN PERFORMANCE MEASUREMENT PROCESS: THE INFLUENCE OF ETHICAL WORK CLIMATE, MORAL AWARENESS AND LOCUS OF CONTROL

NOOR LIZA ADNAN

Faculty of Accountancy, Universiti Teknologi MARA noorliza@tganu.uitm.edu.my

ABSTRACT

Although performance measurement system (PMS) has been implemented in many organizations to improve their performance, somehow the unintended consequences of the system may outweigh its benefits. To paint a better picture of their performance for evaluation purposes, employees may resort to measures manipulation or distortion, gaming, smoothing or budgetary slack, even if it results to sub-optimization, or the decline in the organization's overall performance. Managers may also become short-term oriented at the expenses of long term profitability. Since ethical work climate is believed to guide the employees' behavior in an organization, then instilling and managing a strong ethical climate would surely discourage such dysfunctional behaviors. At the same time, would climate also influence the ability of the employees to recognize the moral issues and treated them as ones? On the other hand, how would locus of control interact with ethical climate to affect such dysfunctional behavior in the context of performance measurement system? These issues are certainly interesting and worth further investigation, especially in the period of rising unethical scandals worldwide.

Keywords: Dysfunctional behaviour, Performance Measurement Process, Ethical work climate, moral awareness, locus of control

Introduction

"What gets measured gets watched, and what gets watched gets managed and done" is a general belief in many organizations that might shed some light on why organizations place a great emphasis on their performance measurement system. Spitzer (2007) posits that performance measurement system actually forms the bottom line of every

organization's failure or success. Many firms have achieved improved performance due to the implementation of performance measurement system which increases efficiency and effectiveness by encouraging and motivating employees towards accomplishing the organizational goals. However, Spitzer (2007) cautions that performance measurement system may also create dysfunction. Ridgway (1956) attributes it to the unhealthy competition arises in the performance measurement system which may indirectly encourage personal gain, besides creating internal conflict and breeding distrust. Since achieving the target set has become the main emphasize in a performance measurement system, employees are often compelled to paint a better picture of themselves when they are assessed (Jaworski, & Young, 1992). Contrary to the desire of management, they may deliberately try to improve the measures of their performance, especially when they fail to meet the target (Fry, 1995). They would falsify measurement information that will lead to improvement in one department but deterioration in another and eventually causes a decline in the organization's overall performance. This is especially true when some kind of reward is attached to the evaluation report (Argyris, 1953). To make the matter worse, the same information will be used by other employees in the organization, including the top management team, in making various decisions. Such decisions made would put the organization in an uncompetitive state while at the same time, harming other stakeholders as well.

Drongelen and Fisscher (2003) attribute these undesired behavioural consequences to the unethical practices of the employees in the organization which might explain the lower than expected effectiveness of performance measurement system. This contention seems founded as the managers, in their strive to compete and the desire to be known as efficient and effective, would tempt to violate the standard of honesty and fair competition, which is becoming stronger each day (Gupta, & Sulaiman, 1996). They must make certain that their daily, weekly, monthly and quarterly results compare favourably with the predicted results defined by the standard (Argyris, 1953). When career advancement depends highly on the evaluation report, distortion of certain information could be regarded as norms and even encouraged by top management in certain organizations (Flamholtz, 1996).

Perhaps this ethical dimension could explain the downfall of Enron, the seventh-largest firm in the United States, which filed for bankruptcy after only six months being named the "most innovative company" in America; or the inflated profit of \$9 billion by World-Com; or the shutting down of Author-Anderson for shredding evidence of accounting frauds

(Velasquez, 2006) or Eric Chia's mismanagement of Perwaja Steel. In Malaysia, fraud continues to be a serious threat within corporate Malaysia with 49% of Malaysian companies surveyed experiencing at least one incident of fraud with a total loss of RM63.95 million (KPMG, 2010). In the period of rising crises of accounting ethical conducts, it is surprising that researches on ethics in accounting is still insufficient and fail to attract the main stream attention (Bernardi, 2004), making it still a novel area of scholarly interest (Bernardi, 2004; Buchan, 2005).

While ethics has captured wide attention of many researchers, and despite the consensus on the importance of performance measurement system, it has come to a great surprise that no empirical study has been conducted to investigate ethics in the area of performance measurement system and how it would influence the effectiveness of the performance measurement system employed (Drongelen, & Fisscher, 2003). This study will try to look at this issue by investigating if the social context, within which the employees work, specifically the ethical work climate, would influence their propensity to engage in dysfunctional behaviour and if it would promote certain characteristics to enable them to recognize the issues as moral issues and subsequently be treated as one. It is also interesting to relate it to one aspect of personality trait, namely locus of control, and how it would interact to influence the employees' dysfunctional behaviour. Using the setting of a construction industry, where ethical standard is considered low and is often tainted by unethical conducts among construction players (Abdul-Rahman, Wang, & Yap, 2010), it is hoped that this study will shed some light into the effect of ethics on the dysfunctional behaviour, which in turn, impacts the effectiveness of the performance measurement system implemented and hence, the quality of work. If it is so, it would seem that to have an effective performance measurement system, not only must the format and function of the measurement procedures themselves be correct, but also the people involved should demonstrate ethical behaviour.

Problem Statement

Dysfunctional behaviour, which is to use the rules and procedures to one's perceived advantage (Jaworski & Young, 1992), actually originates from the work of Argyris (1953) through its seminal case study oriented paper. Argyris's study illustrates how budget process leads to negative perception among employees, which in the end, leads to the unintended behaviour that would not only negatively affect the employees but also the overall health of the organization. Budgets clearly affects employees so directly that they frequently perceive it as a basis for rewarding,

when the target can be met; and penalizing, when failure to do so would invite much punishment. In 1956, Ridgway makes another seminal contribution that further supports Argyris's work. Ridgway proposes that these unintended behaviour, or dysfunctional behaviour, actually stems from the lack of understanding of motivational and behavioural consequences of performance measurement system (Ridgway, 1956). He postulates that insufficient knowledge of its full effects and reactions will lead to indiscriminate use and undue confidence and reliance in performance measurement which may eventually result in side effects and reactions outweighing the benefits. Hence, he calls for further research to be conducted in this area hoping that it will shed some light of how behaviour may be oriented towards optimizing the accomplishment of organizational goals and objectives. Since performance measurement system, like the budgetary system, is one of the elements that forms the management control system (MCS), then any study within the context of management control system which is related to the dysfunctional behaviour, is considered to fall within the ambit of this study.

Up until now, despite various arguments about its effectiveness, performance measurement has been a widely used management tool that has delivered successful and well-documented results (Fisher & Downes, 2008). However, to this extent, the bulk of research is solely concentrated on the technical aspects towards the betterment of performance measurement system which are assumed to be solved through introduction of more sophisticated performance measurement methodologies and techniques, standards and indicators for a specific situation (Vakkuri & Meklin, 2006; Drongelen & Fisscher, 2003). Unfortunately, this assumption is not always true. As Drongelen and Fisscher (2003) argue, not all firms that practiced performance measurement system achieves the same level of profitability improvement. In fact, many have failed and the costs of implementing the performance measurement system far out-weight its benefit. Furthermore, the effectiveness of performance measurement in certain aspects like, in the betterment of personnel motivation, in promoting more goal-directed behaviour, or in making better decision, is still not clear where both positive and negative effects have been reported. As such, why the impact of certain type of performance measurement is positive in one particular situation, but negative in another is still yet to be solved. For this reason, Drongelen and Fisscher (2003) imply that even with a good design, effective implementation is still not guaranteed, pointing to the missing link that lies in the behavioural and motivational consequences in performance measurement system that needs further study.

Several studies have been conducted to better understand the motivational and behavioural consequences of performance measurement system (like Burney, Henle & Widener, 2009; de Waal, 2003; Fisher, McPhail & Menghetti, 2010; Hall, 2008; Moers, 2005; Mohamed et al., 2009; Sturman, Cheramie & Cashen, 2005; van Dooren, 2005). Unfortunately, these studies have been generally biased towards its positive consequences, such as performance, satisfaction, attitude or motivation, while negative consequences have been less considered empirically (Soobaroyen, 2007). As such, researches focusing solely on motivational and behavioural aspects are seen as inadequate to address the more sensitive issue of dysfunctional behaviour that puts the limitation to the success or effectiveness of the performance measurement system. Hence, studies focusing on the dysfunctional behaviour in relation to performance measurement system are conducted (Brown & Stilwell, 2005; Chow, Kato & Merchant, 1996; Courty & Marschke, 2008; Fisher & Downes, 2008; Hirst, 1983; Hopwood, 1972; Jaworski & Young, 1992; Keasey, Moon & Duxbury, 2000; Merchant, 1990; Otley, 1978; Soobaroyen, 2007; Vakkuri & Meklin, 2006; van Rinsum, 2007; to name a few) to better understand this issue. However, studies that have linked dysfunctional behaviour and control system have not been conclusive and principally associated with budgetary slack or psychology-based concepts such as job-related tension (Hirst, 1981).

Drongelen and Fisscher (2003) contend that it is highly questionable if managers have exercised their roles in designing and implementing the performance measurement system in a morally responsible manner. There would always be a moral dilemma between doing what is right for them, or what is best for the employees, or for the organization as a whole. The ethical dilemma is rather complex and can open up multiple alternatives for actions that managers tend to experience considerable tension in discriminating 'right' from 'wrong' or 'ethical' from 'unethical' and in translating into action what they consider 'right' (Gupta & Sulaiman, 1996). As such, an individual often finds him/herself forced to choose among personal values and his loyalties towards organizational goals. Hence, dealing with ambiguity and complexities in designing and implementing a performance measurement system is not easy and requires a manager with a higher order of cognitive moral development (Vakkuri, & Meklin, 2006). Brown and Stilwell (2005), though assert that performance measures and ethics are both key focuses and are intimately related in an effective performance measurement system, admit that they are not often "discussed in the same sentence", implying the lack of study relating performance measurement system to ethics.

Obviously, previous studies on dysfunctional behaviour fail to acknowledge the ethical components of the problem. Logically, to maximize the positive outcomes of the performance measurement system, employees should play their role in an ethical manner. Since organizations are social actors believed to be responsible for the ethical and unethical behaviours of their employees (Wimbush, Shepard, & Markham, 1997), understanding and managing organizational normative system that may guide the ethical behaviours of employees, known as ethical work climate, would form the most basic requirement for the success of the performance measurement system implemented. As such, employees in a strong ethical climate are believed to be more responsible to conform to the ethical standard as compared to employees in a relatively low ethical climate (Victor and Cullen, 1988). If this contention is true, then dysfunctional behaviour would be less rampant in companies with strong ethical climate, but unfortunately, no empirical study has been conducted to confirm it. So far, studies on ethical climate have only linked it to the unethical behaviour of lower order, like stealing, lying, disobeying rules and being an accomplice (Peterson, 2002; Wimbush et al., 1997) but none tries to link it to higher order of dysfunctional behaviour, like metric manipulation, gaming, or management myopia.

Somehow, even the best-intentioned organizational members being immersed in a strong ethical climate still tend to organize information into cognitive structures or schemas that serve as mental templates as guides for handling incoming information and acting upon it (Gioia, 1992). Since decision making is a function of individual values as well as organizational factors (Trevino, 1986), each manager might approach an issue differently depending on the templates formed and their social cognitive context (Butterfield et al., 2000). Gioia (1992), recalling his own experience, admit that many times, managers are not being even aware that they are dealing with a problem that might have ethical overtones. In this case, they are not necessarily lacking in ethical standards, but just simply fallible information processors, who consciously fail to notice the ethical implications and the harm that their action may cause (Butterfield et al., 2000).

Somehow, moral awareness is an individual-level phenomenon and everyone will not have the same ability to recognize the moral issue (Reynold, 2006) though improving it could avoid future ethical catastrophes. However, despite its importance, moral awareness has not received the same attention as other aspects in ethical decision making

(Butterfield et al., 2000) as majority of research in this area has assumed that the research participants have already recognized the moral issue (Gammie & Gammie, 2009), leaving a gap that needs further research.

Somehow, it is not just the moral awareness that influences the ethical behaviour of an individual. Even if a manager can recognize the moral issue, but his/her locus of control might influence him/her to decide against the appropriate decision. Locus of control, which characterizes individuals into internals or externals, has been extensively researched in behavioural study to explain human behaviour in organizational setting with some showing a strong correlation between locus of control and individual's willingness to use deception or manipulation (Gable & Dangello, 1994; Comer, 1985; Solar & Bruehl, 1971). Externals may use deception, manipulation, or ingratiation tactics in an attempt to assert some influence over a hostile or stressful environment (Mudrack, 1989) or as a necessary defence when reinforcement needed for survival are not obtainable (Solar & Bruehl, 1971). Still, no studies have tried to look at this issue in the Malaysian business context.

Prof. Neely (personal communication, November 12, 2010) argues that though the number of publications relating to performance measurement keeps increasing, there has been no significant new breakthrough or no new dominant ideas that have recently emerged in this field. As such, the work that links performance measurement system to ethics is highly encouraged as it can fill one big gap in this area, especially as more data on individuals is becoming available, making it more important than ever. Prof. Widener (personal communication, November 15, 2010) also expresses agreement over this issue and further adds that this is also a very interesting area that has been understudied, leaving it still wideopen. Hence any effort to shed some light on this issue would contribute to some new knowledge.

To improve the effectiveness of a measurement system, the ability to detect when a performance measure is distorted becomes fundamental. However, gaming behaviour, metric manipulations, management myopia, distortion and other forms of dysfunctional behaviour are difficult to identify because it is typically hidden from the researcher (Soobaroyen, 2007; Courty and Marschke, 2008) and in many cases, from the organization as well (Courty and Marschke, 2008). In addition, gaining honest responses from the respondents also proves difficult due to the sensitive and illicit nature of dysfunctional behaviour (Hirst, 1983; Merchant, 1990), making the call to research into dysfunctional behaviour fails to attract as much attention. Prof. Widener (personal

communication, November 15, 2010) argues that "it is difficult to get employees to accurately respond or describe their experiences with manipulating behaviors in order to "game" performance measures. How to get people to talk about their dysfunction behavior? Or how do you measure that?", causing this area to be understudied.

Nevertheless, despite this difficulty, a growing literature has documented the existence of dysfunctional behaviour in several organizational contexts. With the intense competition and uncertain economic condition nowadays, manipulations, distortion or gaming activities are expected to keep on rising.

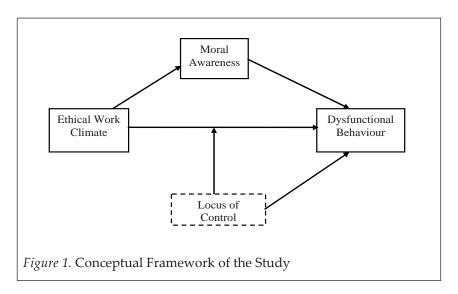
Hence, it can be concluded that in spite of a long standing and regular attention given to some of the consequences of performance measurement system, there has been very little focus and empirical research on managers' dysfunctional behaviour in the context of ethical climate and cognitive development. Responses from the two prominent professors above also provide strong arguments that there is still a wide gap in both theoretical and methodological aspect that needs to be filled in researching for dysfunctional behaviour as a consequence of performance measurement system.

With this gap exposed, this research will strive to answer a few questions namely: 1) Would ethical work climate affect the propensity of managers to engage in dysfunctional behaviour? 2) Are the managers aware of the moral issue in engaging in dysfunctional behaviour; and how would the moral awareness affect the relationship of ethical work climate and dysfunctional behaviour? 3) How would locus of control affect the managers' tendency to engage in dysfunctional behaviour and its relationship with ethical work climate? By answering these questions, this study is expected to achieve the following objectives:

- a. To examine the relationship of ethical work climate and dysfunctional behaviour;
- b. To examine the relationship of moral awareness and dysfunctional behaviour;
- c. To investigate the relationship of locus of control and dysfunctional behaviour:
- d. To examine the mediating effect of moral awareness on the relationship of ethical work climate and dysfunctional behaviour; and
- e. To investigate the moderating effect of locus of control on the relationship of ethical work climate and dysfunctional behaviour.

Conceptual Framework

The proposed model links ethical work climate, as an independent variable, to the propensity of managers to engage in dysfunctional behaviour, as a dependent variable, in a context of performance measurement system. This proposed model is based on previous researches (Peterson, 2002; Trevino, Butterfield, & McCabe, 1988; Wimbush et al., 1997; Wimbush, & Shepard, 1994) on how ethical work climate would influence ethical or unethical behaviour in an organization. Though a number of researches had been conducted on dysfunctional behaviour in performance measurement system, but to the knowledge of the author, none had linked it to ethics. Besides the social organizational context through ethical work climate, moral awareness or individual's ability to recognize the issue as a moral issue, is also said to influence the manager's ethical decision making (Gioia, 1992). Therefore, based on the empirical studies on the relationship of ethical work climate and moral awareness (Butterfield et al., 2000; VanSandt, Shepard, & Zappe, 2006), the model will try to determine the extent of the role of moral awareness, as a mediator, in the relationship of ethical work climate and dysfunctional behaviour.



As managers' moral awareness decreases, it is expected that he/she will resort to decisions that would lead to dysfunctional behaviour (Butterfield et al., 2000) even in a strong ethical work climate environment. However, as Victor and Cullen (1988) discover, a strong ethical climate would foster a more ethical culture, hence promoting more ethical conducts among the employees, as opposed to a weak ethical climate. Hence it can be speculated that a strong ethical climate would promote a higher level of moral awareness which would reduce the occurrence of dysfunctional behaviour. A personal trait commonly being empirically tested in the behavioural studies, locus of control, is also believed to play a role in moderating the relationship of ethical work climate and dysfunctional behaviour (Cherry, & Fraedrich, 2000; Donnelly, Quirin, & O'Bryan, 2003; Forte, 2005). Internal locus managers exhibit less intention to engage in dysfunctional behaviour even if they are not as susceptible to be influenced by the ethical work climate as compared to externals (Cherry, & Fraedrich, 2000).

In order to build the model, the literature on dysfunctional behaviour will be reviewed first. Ethical work climate is then presented along with a discussion of its effects on both moral awareness and locus of control. Following this, it is argued that both moral awareness and locus of control will influence, to some extent, the managers' propensity to engage in dysfunctional behaviour in the performance measurement system adopted in an organization. This conceptual framework is depicted in Figure 1, as shown above.

Methods

Construction industry will be chosen since it is regarded as the most unethical industry with the players commonly exhibiting unethical conducts (Abdul-Rahman et al., 2010; Parson, 2005). Moreover, the use of performance measurement system in the construction industry is also very crucial in managing separate multiple projects especially in meeting the datelines (Syuhaida, & Aminah, 2009). Since this study will attempt to investigate the perception of ethical work climate in the organization, the level of moral awareness and the locus of control of an individual in the organization, the unit of analysis will be the middle level managers of these construction companies who will become the population of this study. Middle level managers are often confronted with magnitude of ethical dilemmas in their daily routines and the temptation to impress their superior and at the same time to manage their subordinates (Argyris, 1953; Sulaiman, & Gupta, 1997). This will make them as suitable population in this survey.

A survey will be conducted to measure the variables using structured questionnaire in order to elicit relevant information. To capture responses on the dependent variable, the propensity to engage in dysfunctional behaviour, an instrument originally developed by Jaworski and Young (1992) and later adapted by Soobaroyen (2007) will be employed with some modification to suit the local industry. Two dimensions of dysfunctional behaviour will be investigated namely, information manipulation and gaming. For the independent variables, Victor and Cullen's (1988) Ethical Climate Questionnaire (ECQ) will be adapted to obtain respondents' perception of ethical work climate in their respective organizations. To measure moral awareness, two case studies used in Butterfield et al. (2000) will be adapted to suit the industry and local context. Finally, to elicit respondents' internal or external locus of control, an instrument developed by Spector (1988) will be adapted as it possesses a stronger fit to work-related outcome.

As survey on ethics revealed a high degree of sensitivity, a more pragmatic approach would be necessary. Instead of mailing questionnaire to identified respondents, a seminar on performance measurement pertaining to construction industry will be held. All construction companies listed on the Kuala Lumpur Stock Exchange and also all members of Master Builders Association Malaysia (MBAM) will be contacted and invited to send the middle managers involved in performance measurement process to the seminar, gratis. Top management of the companies will first be contacted and informed of the purpose of study. Supervisor's agreement has been obtained to act as the speaker at the seminar. In the period when performance measurement system is considered more pertinent than ever, the seminar is hoped to attract as many attention from the sample. This avenue will provide a good opportunity to distribute the questionnaire and to solicit agreement from those interested for further research as this study will require the mixed method of quantitative and qualitative approach. The same practice had also been done by Victor & Cullen (1988).

Conclusion

In the drive to outperform others, managers are frequently tempted to sacrifice their ethical values and engage in dysfunctional behaviour. Though in the context of performance measurement system, dysfunctional behaviours like budgetary slack, management myopia or short-termism, manipulation or distortion of measures may be encouraged and seen as acceptable norm, but such mere acts might undeniably produce detrimental effects to an organization where such acts are quite rampant. As information produced in the performance measurement process will be used by various parties in an organization for various reasons, inaccurate information generated by such dysfunctional acts may lead to sub-optimal decisions that might jeopardize the overall health of an organization.

However, an organization may curb such dysfunctional behaviour by creating a climate highly embedded with ethical values as it provides the cues to employees in guiding them when they are faced with certain dilemmas (Wimbush, Shepard, & Markham, 1997), rather than the belief of some managers that they are expected to do anything to further their organizations' interest, regardless of ethical implications. Previous studies (like Victor and Cullen, 1988) have reported more ethical behaviour of the employees working in such an environment, thus reducing the occurrence of dysfunctional behaviour. However, an employee's individual trait through their locus of control is also believed to give powerful effects on employees' ethical behaviour (Trevino, 1986). Hence, a highly ethical work climate would not automatically hinder an employee from committing a dysfunctional act. As their locus of control might overshadow the highly ethical climate, an employee might try to justify their dysfunctional act based on the internal or external locus orientation.

On the other hand, being deeply rooted in a particular ethical climate would lead employees to become used to the climate, resulting to the failure to see the incoming issue as different, thus requiring different treatment (Gioia, 1992). This would lead to a new issue of moral awareness. Though it is undeniable that some managers are indeed unethical, but it is hard to undermine that due to simply being fallible information processors, many fail to notice the ethical implications, thus unconscious with the fact that they are actually dealing with moral issues (Gioia, 1992). Hence, is the claim that practices perceived unethical some time ago and now accepted as moral acts (Brenner & Molander, 1977; Zabid & Alsagoff, 1993) could really be true, or is it just the failure to recognize the issue as a moral issue? Thus, these perspectives would lead to a new issue that need further probe of to what extent would ethical work climate affect the dysfunctional behaviours of managers in performance measurement system, when it is intervened by the managers' moral awareness and moderated by the locus of control?

References

Abdul-Rahman, H., Wang, C., & Yap, X.W. (2010). How professional ethics impact construction quality: Perception and evidence in a fast developing economy. *Scientific Research and Essays*, 5, 3742-3749.

Argyris, C. (1953). Human problems with budgets. *Harvard Business Review*, 31, 97-110.

- Bernardi, R.A. (2004). A commentary on suggestions for providing legitimacy to ethics research in accounting education. *Issues in Accounting Education*, 18, 145-146.
- Brenner, S., & Molander, E. (1977). Is the ethics of business changing? Harvard Business Review, LV, 55-71.
- Brown, M.F., & Stilwell, J. (2005). The ethical foundation of performance measurement and management. *Public Management, June*, 22-25.
- Buchan, H. F. (2005). Ethical Decision Making in the Public Accounting Profession: An Extension of Ajzen's Theory of Planned Behavior. *Journal of Business Ethics*, *61*, 165–181.
- Burney, L.L., Henle, C.A., & Widener, S.K. (2009). A path model examining the relations among strategic performance measurement system characteristics, organizational justice, and extra- and in-role performance. *Accounting, Organizations and Society, 34, 305-321.*
- Butterfield, K.D., Trevino, L.K., & Weaver, G.R. (2000). Moral awareness in business organizations: Influences of issue-related and social context factors. *Human, Relations*, *53*, 981-1018.
- Cherry, J., & Fraedrich, J. (2000). An empirical investigation of locus of control and the structure of moral reasoning: Examining the ethical decision-making processes of sales managers. *Journal of Personal Selling & Sales Management*, XX, 173-188.
- Chow, C.H., Kato, Y., & Merchant, K.A. (1996). The use of organizational controls and their effects on data manipulation and management myopia: A Japan vs US comparison. *Accounting, Organizations and Society, 21, 175-192.*
- Comer, J.M. (1985). Machiavellianism and inner vs outer directedness: A study of sales managers. *Psychological Reports*, *56*, 81-82.
- Courty, P., & Marschke, G. (2008). A general test for distortion in performance measures. *The Review of Economics and Statistics*, 90, 428-441.
- de Waal, A.A. (2003). Behavioural factors important for the successful implementation and use of performance measurement system. *Management Decision*, 41, 688-697.

- Donnelly, D.P., Quirin, J.J., & O'Bryan, D. (2003). Attitude towards dysfunctional audit behaviour: The effect of locus of control, organizational commitment and position. *The Journal of Applied Business Research*, 19, 95-107.
- Fisher, C., & Downes, B. (2008). Performance measurement and metric manipulation in the public sector. *Business Ethics: A European Review*, 17, 245-258.
- Fisher, R., McPhail, R., & Menghetti, G. (2010). Linking employee attitudes and behaviours with business performance: A comparative analysis of hotels in Mexico and China. *International Journal of Hospitality Management*, 29, 397-404.
- Forte, A. (2005). Locus of control and the moral reasoning of managers. *Journal of Business Ethics*, 58, 65-77.
- Fry, T.D. (1995). Japanese manufacturing performance criteria. *International Journal of Production Research*, 33, 933-954.
- Gable, M. & Dangello, F. (1994). Locus of control, machiavellianism, and managerial job performance. *The Journal of Psychology*, 128, 599-608.
- Gammie, E., & Gammie, B. (2009). The moral awareness of future accounting and business professionals: the implications of a gender divide. *Pacific Accounting Review*, 21, 48-73.
- Gioia, D.A. (1992). Pinto fires and personal ethics: A script analysis of missed opportunities. *Journal of Business Ethics*, 11, 379-389.
- Gupta, J.L., & Sulaiman, M. (1996). Ethical orientations of managers in Malaysia. *Journal of Business Ethics*, 15, 735-748.
- Hall, M. (2008). The effect of comprehensive performance measurement systems on role clarity, psychological empowerment and managerial performance. *Accounting, Organizations and Society, 33,* 141-163.
- Hirst, M.K. (1981). Accounting information and the evaluation of subordinate performance: A situational approach. *The Accounting Review, LVI,* 771-784.
- 42 IPBJ Vol. 2 (2), 29 45 (2010)

- Hirst, M.K. (1983). Reliance on accounting performance measures, task uncertainty and dysfunctional behaviour: Some extensions. *Journal of Accounting Research*, 21, 596-605.
- Hopwood, A.G. (1972). An empirical study of the role of accounting data in performance evaluation. *Journal of Accounting Research*, 10, S156-S182.
- Jaworski, B.J., & Young, S.M. (1992). Dysfunctional behaviour and management control: An empirical study of marketing managers. *Accounting, Organizations and Society, 17, 17-35.*
- Keasey, K., Moon, P., & Duxbury, D. (2000). Performance measurement and the use of league tables: some experimental evidence of dysfunctional consequences. *Accounting and Business Research*, 30, 275-286.
- KPMG. (2010). KPMG Malaysia Fraud Survey Report 2009. Kuala Lumpur: KPMG.
- Merchant, K.A. (1990). The effects of financial controls on data manipulation and management myopia. *Accounting, Organizations and Society, 15,* 297-313.
- Moers, F. (2005). Discretion and bias in performance evaluation: The impact of diversity and objectivity. *Accounting, Organizations and Society, 30, 67-80*.
- Mohamed, R., Hui, W.S., Abdul Rahman, I.K., & Abdul Aziz, R. (2009). Strategic performance measurement design and organizational capabilities. *Asia-Pacific Management Journal*, 4, 35-63.
- Mudrack, P.E. (1989). Machiavellianism and locus of control: A metaanalytic review. *The Journal of Social Psychology*, 130, 125-126.
- Otley, D. (1978). Budget use and managerial performance. *Journal of Accounting Research*, 16, 122-149.
- Parson, E. (2005). *The construction industry's ethical dilemma* Retrieved on 2 February 2011 from http://ecmweb.com/mag/electric_construction_industrys_ethical/

- Peterson, D.K. (2002). The relationship between unethical behaviour and the dimensions of the ethical climate questionnaire. *Journal of Business Ethics*, 41, 313-326.
- Reynolds, S.J. (2006). Moral awareness and ethical predispositions: Investigating the role of individual differences in the recognition of moral issues. *Journal of Applied Psychology*, 91, 233-243.
- Ridgway, V.F. (1956). Dysfunctional consequences of performance measurement. *Administrative Science Quarterly*, *1*, 240-247.
- Solar, D., & Bruehl, D. (1971). Machiavellianism and locus of control: Two conceptions of interpersonal power. *Psychological Reports*, 29, 1079-1082.
- Soobaroyen, T. (2007). Management control systems and manager dysfunctional behaviour: An empirical study of direct, intervening and moderating effects. (Doctoral Thesis, The University of Wales, Aberystwyth, UK). Retrieved from http://cadair.aber.ac.uk/dspace/bitstream/2160/567/1
- Spitzer, D.R. (2007). Transforming Performance Measurement: Rethinking the Way We Measure and Drive Organizational Success. New York: American Management Association.
- Sturman, M.C., Cheramie, R.A., & Cashen, L.H. (2005). The impact of job complexity and performance measurement on the temporal consistency, stability, and test-retest reliability of employee job performance ratings. *Journal of Applied Psychology*, 90, 269-283.
- Syuhaida, I., & Aminah, M.Y. (2009). Benchmarking the performance of Malaysia's construction industry. *Management research and practice*, 1, 1-13.
- Trevino, L.K., & Nelson, K.A. (2004). *Managing Business Ethics: Straight talk about how to do it right* (3rd ed.). Danvers: John Wiley & Sons.
- Trevino, L.K., Butterfield, K.D., & McCabe, D.L. (1988). The thical context in organizations: Influences in employee attitudes and behaviours. *Business Ethics Quarterly*, *8*, 447-476.
- Trevino, L.K. (1986). Ethical decision making in organizations: A personsituation interactionist model. *Academy of Management Review*, 11, 601-617.
- 44 IPBJ Vol. 2 (2), 29 45 (2010)

- Vakkuri, J., & Meklin, P. (2006). Ambiguity in performance measurement: A theoretical approach to organizational uses of performance measurement. Financial Accountability & Management, 22, 0267-4424.
- Van Dooren, W. (2005). What makes organizations measure? Hypotheses on the causes and conditions for performance measurement. Financial Accountability, 21, 363-383.
- Van-Kressen Drongelen, I.C., & Fisscher, O.A.M. (2003). Ethical Dilemmas in performance measurement. Journal of Business Ethics, 45, 51-63.
- van Rinsum, M. (2007). The effects of performance measurement system properties and individual characteristics on dysfunctional managerial behaviour. Paper presented at ARCA Seminar at the Free University, Amsterdam, on Feb, 2007. Retrieved from http:// papers.ssrn.com/sol3/papers.cfm?abstract_id=1003981
- VanSandt, C.V., Shepard, J.M., & Zappe, S.M. (2006). An examination of the relationship between ethical work climate and moral awareness. Journal of Business Ethics, 68, 409-432.
- Velasquez, M.G. (2006). Business Ethics: Concepts and Cases (6th Ed.). Upper Sadle River: Pearson International.
- Victor, B., & Cullen, J.B. (1988). The organizational bases of ethical work climates. Administrative Science Quarterly, 33, 101-125.
- Wimbush, J.C., Shepard, J.M., & Markham, S.E. (1997). An empirical examination of the relationship between ethical climate and ethical behaviour from multiple levels of analysis. Journal of Business Ethics, 16, 1705-1716.
- Wimbush, J.C. & Shepard, J.M. (1994). Toward an understanding of ethical climate: Its relationship to ethical behaviour and supervisory influence. Journal of Business Ethics, 13, 637-647.
- Zabid, A.R.M., & Alsagoff, S.K. (1993). Perceived ethical values of Malaysian managers. *Journal of Business Ethics*, 12, 331-337.