

A Critical Analysis of Literature on Earnings Management Control Mechanism

Dr. Abdul Naser. V,

Assistant Professor,
Department of Commerce,
P.S.M.O. College, Tirurangadi, University of
Calicut, Malappuram, Kerala, India.

Dr. P. Natarajan,

Professor,
Department of Commerce,
School of Management, Pondicherry
University, Pondicherry, India.

ABSTRACT

This paper critically analyses the literatures on earnings management control mechanisms. Earnings management control mechanism are broadly divided in to corporate governance, audit quality and accounting standards. Literatures on various factors under each category have been analysed extensively to understand the effects of these factors on earnings management. It is found from the literatures that corporate governance factors are most effective earnings management control mechanisms and audit quality also helps to control earnings management. The other major conclusion from the literature is that the accounting standards are not effective and adoption of IFRS has further deteriorated earnings quality.

Keywords: Accounting standards, Audit quality, Corporate governance, Earnings management. Earnings management.

INTRODUCTION:

Earnings management control mechanism are the measures or mechanisms to control all kinds of opportunist behaviour of corporates to present the financial records to create an overly positive view on company performance among stakeholders. The mechanisms to control practices of earnings management have been implemented time to time by the authorities concerned. In the literature regarding earnings management, influence of such controlling mechanisms are widely and intensively discussed from various angles. The literatures are mainly focused on influence of internal corporate governance on earnings management, influence on audit quality on earnings management and influence of accounting standards on earnings management. Thus the paper discusses the literatures on earnings management control mechanisms under three sections. The first section discusses various literatures on impact of corporate governance mechanisms such as board independence, board size, board meetings, CEO duality, nomination and remuneration committee, audit committee independence, audit committee size and audit committee meetings on earnings management. The second section discusses the literatures on impact of external audit mechanisms such as auditor brand name, industry specialist auditors and auditor opinion. The last section discusses the literatures on impact of accounting standard factors on earnings management.

CORPORATE GOVERNANCE AND EARNINGS MANAGEMENT:

A corporate governance mechanism of a firm should be designed in a way to control management activities and make a balance between the interests of owners and all other parties who may be affected by the activities of business and to ensure maximum efficiency and profitability of the concern. Since the financial crisis shattered the world economy, corporate governance mechanism was the major concern of debates. Moreover, recent development in technology, liberalisation of economy and freeing up of financial markets demanded a

comprehensive framework of corporate governance mechanism (Claessens 2000).

Adrian Cadbury in his speech at Global Corporate Governance forum 2000 cited in Cadbury (2002) define the objective of corporate governance as “The corporate governance framework is there to encourage the efficient use of resources and equally to require accountability for the stewardship of those resources. The aim is to align as nearly as possible the interests of individuals, corporations and society”.

OECD (1999) define corporate governance as “The system by which business corporations are directed and controlled. The corporate governance structure specifies the distribution of rights and responsibilities among different participants in the corporation, such as the board, managers, shareholders and other stakeholders and spells out the rules and procedures for making decisions on corporate affairs. By doing this, it also provides the structure through which the company objectives are set, and the means of attaining those objectives and monitoring performance”.

There are substantial studies focus the relationship of earnings management with corporate governance factors such as:-

- Effectiveness of board Characteristics
- Board independence
- Board Size
- Board Meetings
- CEO Duality
- Nomination and remuneration committee
- Audit committee independence
- Audit Committee Size
- Audit Committee Meetings

The following section gives review of important literature related with effect of corporate governance on earnings management.

Klein (2002) examined the influence of audit committee and board characteristics on earnings management and the result of his study shows that there is a negative association between independence of audit or board and abnormal accruals. But he states that there is no cross sectional association between more stringent i.e. cent percent independence of audit committee and earnings management. But according to Xie et al (2003) board independence and proportion of shares of directors are not related with earnings management. They also examined the role of board of directors, role of audit committee and role of executive committee in constraining earnings management and opined that duality of CEO is unrelated with current discretionary accruals.

Anderson et al (2004) examined differently from Xie et al (2003) the relationship between integrity of accounting report and board characteristics. They analysed 1052 firm years the period from 1993 to 1998. Board characteristics they considered as independent variables are number of inside directors, board independence, number of inside directors, board size, tenure of board, age of directors and occupation of independent board members. They have also considered characteristics of audit committee independence, size of audit committee, audit committee meeting and financial experts on audit committee. They found that size of the board and audit committee are inversely related with cost of debt and states that bigger audit committee and board provides better financial report monitoring. They also found that employment characteristics are negatively related with cost of debt.

The findings of Niu (2006) is contrary to the results discussed above. He analysed association between quality of earnings and corporate governance mechanism using firm and corporate governance data for 519 firm years of firms listed on S&P /TSX composite index during 2002 to 2005. They measured quality of accruals through accounting based earnings management applying Modified Jones Model (1995) and market based measure of earnings informativeness. i.e. return earnings association. Corporate governance factors considered in his study are board composition, shareholding and compensation of management and directors, shareholders rights and disclosure practices.

He found that over all governance quality is negatively related with discretionary accruals and positively associated with earnings return association. He suggests that better corporate governance mechanism provide greater monitoring and better informative accounting earnings.

The study by Rahman and Ali (2006) give more precise and meaningful results. They examined how effective the monitoring functions of audit committee, board of directors in constraining earnings management. They analysed 97 top firm listed in Bursa Malaysia Main Board during 2002 to 2003. They used working capital accruals to find earnings management and applied Jones (1991) model to detect discretionary accruals. Board characteristics they considered are board independence, CEO duality and board size. Audit committee

independence and competence of audit committee. They found that all the variable related with corporate governance except board size have influence on earnings management.

Relationship between activities of board of directors and earnings management is again analysed by Ebrahim (2007) using 2360 firm as sample. He applied Modified Jones Model (1995) to measure earnings management through discretionary accruals. He also applied portfolio adjusted technique to measure discretionary accruals. He found that board independence is negatively related with absolute value of discretionary accruals. He states that the absolute value of discretionary accruals are very lower for the firms in which independent directors are more active. Though the result of this study shows a negative relationship between earnings management and institutional ownership, he did not find any relationship between CEO duality and earnings management.

Relationship between corporate governance and earnings management is analysed by w. Epps and Ismail (2007) examined relationship between management and corporate governance in US context. They analysed 523 firms with target positive accruals, 487 firms with small positive target negative accruals, 506 firm with small positive and negative firms. They applied cross sectional version of Modified Jones Model (1995) to measure earnings management. They found that negative accruals are associated cent percent independence of nominating and compensation committee and small size of board. Positive discretionary accruals are directly related with 75 percent to 90 percent independence of board. But according to Gerald Alves, S. M. (2011) board characteristics like size of the board and board composition are related with earnings management while the audit committee does not have any influence on earnings management examined the effect of board structure on the magnitude of earnings management. The board characteristics she considered for the analysis are board monitoring committee, board size and board composition. She analysed 34 non-financial companies for a period of five years from 2002 to 2007 and applied cross sectional modified jones model to measure discretionary accruals.

Iqbal and strong (2010) is another important findings in this area. They examined the effect of corporate governance mechanism on earnings management. They analysed role of board, ownership structure and capital structure in controlling earnings management. They measure earnings management discretionary current accruals. They found that board independence and earnings management are inversely related and also found that Big 6 auditors, institutional ownership play no significant role in reducing earnings management.

Audit related characteristics of corporate governance is the focus point of Alkdai, H. K. H., & Hanefah, M. M. (2012). They examined the impact of corporate governance mechanism on earnings management taking Malaysian government linked companies as sample. They measure earnings management through discretionary accruals by applying Modified Jones Model(1995). The corporate governance variables they considered for analysis are board independence, CEO duality , board size, board meetings, audit committee independence, audit committee meetings and financial expertise of audit committee. They found that corporate governance variable have no influence on earnings management except CEO non duality and board meetings. They found CEO non duality and board meetings negatively associated with earnings management.

The findings of Hashim and Devi (2015) also a affirmation of the results of the previous studies. They examined the relationship between board characteristics such as independence of board, size of board, duality of CEO, tenure of board and board meeting and quality of earnings. They analysed data for 280 companies for the 2004. They applied Dechow and Dichev (2002) model to measure earnings quality. They found that earnings quality is positively associated with tenure of board and outside board ownership. But they did not any significant relationship between earnings quality and board independence.

But results of Al-Thuneibat, A. A., Al-Angari, H. A., and Al-Saad, S. A. (2016) gives a contradictory result. They examined the impact of corporate governance mechanism on earnings management. They used both primary data and secondary data for analysis. Primary data are related to compliance of Saudi companies and corporate governance and were collected from financial managers and Saudi auditors. Secondary financial statement data were collected for companies who responded for the questionnaire. They applied modified Jones Model suggested Dechow et al (1995) to measure discretionary accruals/ they found that corporate governance and earnings management are independent each other.

Jouber and Fakhfakh (2017) is the another study opined that corporate governance factors and earnings management are independent each other. They investigated the relationship earnings management and board characteristics between earnings management and board characteristics in France and Canada. They measured earnings management through discretionary accruals by applying Kothari(2005) model. Corporate governance variables they considered are board independence, CEO duality, board size, manager's ownership, Institutional ownership. Their analysis of 720 firm year observations during 2006-2008 found that CEO ownership independent monitoring are earnings management determinant in both countries and board size do not influence on earnings management.

EXTERNAL AUDITING AND EARNINGS MANAGEMENT:

The previous section discussed impact of corporate governance on earnings management. The earnings management activities are curtailed when the accounts of the firms are audited by an external auditors (Becker, 1998). This section gives an overview of the literatures related with earnings management and external audit factors. The important external audit factors widely studied in the literature are brand name, industry specialist auditors and auditor opinion.

Becker (1998) examined effects of audit quality on earnings management. They estimated earnings management through discretionary accruals by cross sectional version of Jones (1991) model and the quality of audit is measured as dichotomous variable accounts audited with Big 6 are considered as higher quality than that of the firms audited by non-Big6 auditors. They analysed 2179 firm years audited by non-Big6 auditors and 10397 firm years audited by Big6 auditors and found that quality of audit is associated with earnings quality. Specifically that state that the quality of earnings is higher for the firms audited by Big6 auditors than that of non-Big6 auditors. The result of their study is supported by many other studies like Bedard et al. (2004). They investigated the effect of expertise, independence and activities of audit committee on earnings quality of firm. They measured earnings management through abnormal accruals by applying Modified Jones (1995) model. They found from their analysis of 3947 observations that audit committee expertise and independence are negatively associated with earnings management.

There are yet another studies like Chen et al. (2005), Piot and Janin (2007), Rusmin (2010) and Sun and Lin (2012). All these studies reinstate that the earnings management can be reduced by increasing the quality of auditing. The most important factor which most of the studies found negative relationship with earnings management. Chen et al. (2005) examined relationship between quality of auditor relationship between quality of auditor and earnings management in Taiwan IPO firms. They analysed 367 new issues between 1999 and 2002. They measured earnings management through discretionary accruals cross sectional version of Modified Jones (1995) model. The quality of the auditor was measured by size of auditor firm and industry specialisation. Their study found that earnings management is less in the firms which are audited by Big5 auditors than that of non-Big5 auditors.

In Chen et al, (2005) audit quality was measured only through the size of audit firm, but Piot and Janin (2007) considered auditor expectation, existence and independence of audit committee as the measures of audit quality. They examined influence of audit quality variables on earnings management in France taking 102 non-financial companies for a period of four years from 1998 to 2002 as their sample. Earnings management is measured through discretionary accruals by applying cross sectional Jones (1991) model as suggested in Jambalvo (1994). They found that existence of audit committee reduces upward earnings management. But they state in contrary to other studies that the earnings management of firms audited by Big5 auditors are not significantly different from that of audited by non-Big5 auditors. But in Rusmin (2010) considered industry specialist auditors as the proxy of audit quality. They analysed 260 companies audited by Big4 and 41 companies audited by non-Big4 auditors. They measured earnings management through cross sectional Modified Jones Model (1995). They found that auditor quality and earnings management are negatively associated. Earnings management of firms audited by industry specialist's auditor are less than that of the firms audited by non-specialists auditor.

Sun and Lin (2012) is another important study examined the impact of audit quality on earnings management. They also have included corporate governance factors as exogenous factors along auditor specialisation. They analysed 18513 firm years during 1996 to 2000. They measured earnings management by applying performance matched discretionary accrual model suggested by Kothari (2005). They document that the earnings management is less for the firms with independent board and audited by auditor with industry specialisation.

From all the studies it is established that audit quality is important control mechanism of earnings management. To effectively curtail the practices of the earnings management, audit of accounts of the companies should be made by big auditor, industry specialists and independent auditors.

ACCOUNTING STANDARDS AND EARNINGS MANAGEMENT:

Earnings Management activities are taken place in a firm is due to discretionary power of managers over the accounting standards. Ewert and Wagenhofer (2005) explains that the earnings management is less when accounting standards are made more clear with less chance of managerial discretion for interpreting numbers. This section gives an overview of literatures analysed the relationship between earnings management and accounting standards.

Ewert and Wagenhofer (2005) investigated effects of tighter accounting standards on earnings management. They states that tightening accounting standards reduces earnings management. Hence the accounting quality is

improved. They measured earnings quality as the variability of reported earnings. But, they gives evidence that though the tighter accounting standards reduces the opportunity to manage earnings through accounting accruals, managers do engage in real activity manipulations to get marginal benefit of earnings management.

Chen et al. (2007) investigated the role of conservative accounting standards in controlling earnings manipulation. They found that when accounting information serves both stewardship role and valuation role, owners have incentives to manage earnings and introducing conservative accounting standards reduces the incentives for manipulating earnings.

There are number of literatures discussing the effect of adoption of IFRS on earnings management. As IFRS is worldly accepted accounting standards and almost all countries implemented IFRS repealing country specific accounting standards, it is believed that the transparency nature of IFRS would definitely control earnings management. But in literature it is evident that, instead of controlling earnings management, implementation of IFRS deteriorated earnings quality. JeanJean and stolowy (2008) analysed whether the accounting standards have any impact on earnings management. They analysed impact of adoption of IFRS on earnings management in France, Australia and UK. To measure earnings management they applied earnings distribution model as suggested by Burgstahler and Dichev (1997). They found that adoption of IFRS do not have any controlling effect on earnings management. Instead they found that after the adoption of IFRS earnings management has increased in France.

In the same way Tendeloo and Vanstaelen (2011) investigated 636 firm years during 1999 to 2001 to understand weather the improved accounting standards are related with higher accounting quality or less earnings management. They analysed companies in Germany which voluntarily adopted IFRS and companies which still adopting GAAP to report their accounting information. They found that the companies which adopted IFRS voluntarily and reported their accounting information according to IFRS standards do not show a higher quality of earnings or lesser earnings management than that of the companies which still follow GAAP to report their accounting information.

Another studies like Ahmed et al (2012) and Paananen and Lin (2009) also analysed the effect of improved accounting standards on earnings management. But the result of both studies are affirming that implementation of IFRS has not improved earnings quality. Ahmed, A.S., Neel, M. and Wang, D., (2013) investigated whether the adoption of IFRS improves accounting quality. They analysed companies from 20 countries which adopted IFRS in 2005 and companies from 15 countries which do not adopted IFRS. They measured accounting quality through earnings smoothness which was measured as in Barth et al (2006). They found that IFRS adopted firms' income smoothing are higher than that of IFRS not adopted firms. They state the accounting quality of firms have deteriorated after mandatory adoption of IFRS. Paananen and Lin (2009) investigated accounting quality of German companies during international accounting standard period, IFRS voluntary period IFRS mandatory period. They selected sample of 187 firm year during 2000 to 2002 for IAS period, 204 firm years for IFRS voluntary period and 448 firm years for IFRS mandatory period. They used four measures of earnings smoothing as in Barth et al (2006). They found that earnings quality are getting deteriorated over years. They state that adoption of IFRS voluntarily or mandatory do not improve the quality of accounting information.

Contrary to all other literatures Chen et al. (2010) found that implementation of IFRS has reduced earnings management. Chen et al. (2010) investigated impact of implementing IFRS on accounting quality and earnings management. They analysed publically listed companies in the EU before and after adoption of IFRS. They compared earnings quality of IFRS pre adoption period i.e. 2000 to 2004 with IFRS post adoption period i.e. 2005 to 2007. They estimated earnings management through absolute discretionary accruals by cross sectional version of Modified Jones (1995) Model. They found that accounting standards improves the quality of earnings. They state that IFRS reduces earnings management of companies by limiting opportunities discretion in accounting numbers.

Table 1: Summary of Literature on earnings management control mechanism

Study details	Focus of study	Conclusions
Klein (2002), Anderson et al (2004), Niu (2006), Rahman Ali (2006), Ebrahim (2007), Epps and Ismail (2007), Iqbal and strong (2010)	Relationship of audit committee independence, board characteristics on earnings management.	Audit committee and board characteristics are negatively related with Earnings management
Xie et al (2003), Geraldles Alves, S. M.(2011), Alkdai, H. K. H., & Hanefah, M. M. (2012), Hashim and Devi (2015), Al-Thuneibat, A. A., Al-Angari, H. A., and Al-Saad, S. A. (2016), Joubert and Fakhfakh (2017)	Role of audit committee and Board on EM	Audit committee and role of board are not related with EM

Study details	Focus of study	Conclusions
Becker (1998), Chen et al. (2005), Piot and Janin (2007), Rusmin (2010) and Sun and Lin (2012)	Influence of external audit on Earnings management	External audits reduces earnings management
Bedard et al. (2004).	Effect of expertise, independence and activities of audit committee on earnings quality of firm	expertise, independence and activities of audit committee increases earnings quality of firm
Ewert and Wagenhofer (2005)	Influence of accounting standards on Earnings management	Tighter accounting standards reduces the opportunity to manage earnings through accounting accruals, but managers do engage in real activity manipulations to get marginal benefit of earnings management
Chen et al. (2007)	Role of conservative accounting standards in controlling earnings manipulation.	Conservative accounting standards reduces the incentives for manipulating earnings.
JeanJean and stolowy (2008) Tendeloo and Vanstaelen (2011), Ahmed et al (2012), Paananen and Lin (2009), Ahmed, A.S., Neel, M. and Wang, D., (2013)	Impact of adoption of IFRS on earnings management	IFRS do not have any controlling effect on earnings management. Instead, after the adoption of IFRS earnings management has increased
Chen et al. (2010)	Impact of adoption of IFRS on earnings management	Adoption of IFRS reduces earnings management

CONCLUSION:

The earnings management control mechanism has been widely discussed in the literature and are discussed in various heads like earnings management and corporate governance, earnings management and audit quality and earnings management and accounting standards. Effect of corporate governance factors like effectiveness of board characteristics, board independence, board size, board meetings, CEO duality, nomination and remuneration committee, audit committee independence, audit committee size and audit committee meetings are extensively studied in the literature. Most of the studies found that corporate governance factors negatively influence earnings management. Thus from the literature it can be found that corporate governance is an important mechanism to control earnings management.

Another earnings management control mechanism is audit quality. All the studies in the literature opined that audit quality is an important mechanism to control earnings management. Audit quality, in the literature has been proxied by various audit related factors like audit committee independence, auditing by industry specialist auditors, auditing by Big 4 auditors etc. Finally, literatures on accounting standards and earnings management have analysed. In the literature, it is seen that accounting standards and adoption of IFRS do not control earnings management. Thus from the analysis of the earnings management literatures, it is evident that corporate governance factors and audit quality are effective mechanism to control earnings management and accounting standards are not effective in controlling earnings management.

REFERENCES:

Abdul Rahman, R., & Haneem Mohamed Ali, F. (2006). Board, audit committee, culture and earnings management: Malaysian evidence. *Managerial Auditing Journal*, 21(7), 783-804.

Ahmed, A.S., Neel, M. and Wang, D., (2013). Does mandatory adoption of IFRS improve accounting quality? Preliminary evidence, *Contemporary Accounting Research*, 30(4), pp.1344-1372.

Alkdai, H. K. H., & Hanefah, M. M. (2012). Audit committee characteristics and earnings management in Malaysian Shariah-compliant companies, *Business and Management Review*, 2(2), 52-61.

Al-Thuneibat, A. A., Al-Angari, H. A., & Al-Saad, S. A. (2016). The effect of corporate governance mechanisms on earnings management: Evidence from Saudi Arabia, *Review of International Business*

- and Strategy*, 26(1), 2-32.
- Anderson, R. C., Mansi, S. A., & Reeb, D. M. (2004). Board characteristics, accounting report integrity, and the cost of debt, *Journal of accounting and economics*, 37(3), 315-342.
- Barth, M. E., Elliott, J. A., & Finn, M. W. (1999). Market rewards associated with patterns of increasing earnings, *Journal of Accounting Research*, 37(2), 387-413.
- Bedard, J., Chtourou, S. M., & Courteau, L. (2004). The effect of audit committee expertise, independence, and activity on aggressive earnings management, *Auditing: A Journal of Practice & Theory*, 23(2), 13-35.
- Chen, H., Tang, Q., Jiang, Y., & Lin, Z. (2010). The role of international financial reporting standards in accounting quality: Evidence from the European Union, *Journal of International Financial Management & Accounting*, 21(3), 220-278.
- Chen, K. Y., Lin, K. L., & Zhou, J. (2005). Audit quality and earnings management for Taiwan IPO firms, *Managerial Auditing Journal*, 20(1), 86-104.
- Chen, Q., Hemmer, T. and Zhang, Y., (2007). On the relation between conservatism in accounting standards and incentives for earnings management, *Journal of Accounting Research*, 45(3), pp.541-565.
- Claessens, S., Djankov, S., & Lang, L. H. (2000). The separation of ownership and control in East Asian corporations, *Journal of financial Economics*, 58(1-2), 81-112.
- Ebrahim, A. (2007). Earnings management and board activity: an additional evidence, *Review of Accounting and Finance*, 6(1), 42-58.
- Epps, R.W. and Ismail, T.H., (2009). Board of directors' governance challenges and earnings management, *Journal of Accounting & Organizational Change*, 5(3), pp.390-416.
- Ewert, R. and Wagenhofer, A., (2005). Economic effects of tightening accounting standards to restrict earnings management, *The Accounting Review*, 80(4), pp.1101-1124.
- Geraldes Alves, S. M. (2011). The effect of the board structure on earnings management: evidence from Portugal, *Journal of Financial Reporting and Accounting*, 9(2), 141-160.
- Hashim, H.A. and Devi, S., (2008). Board characteristics, ownership structure and earnings quality: Malaysian evidence, *Research in Accounting in Emerging Economies*, 8(97), pp.97-123.
- Iqbal, A. and Strong, N., (2010). The effect of corporate governance on earnings management around UK rights issues, *International Journal of Managerial Finance*, 6(3), pp.168-189.
- Jeanjean, T., & Stolowy, H. (2008). Do accounting standards matter? An exploratory analysis of earnings management before and after IFRS adoption, *Journal of accounting and public policy*, 27(6), 480-494.
- Jouber, H., & Fakhfakh, H. (2011). Earnings management and board oversight: an international comparison, *Managerial Auditing Journal*, 27(1), 66-86.
- Klein, A. (2002). Economic determinants of audit committee independence, *The Accounting Review*, 77(2), 435-452.
- Niu, F. F. (2006). Corporate governance and the quality of accounting earnings: a Canadian perspective, *International Journal of Managerial Finance*, 2(4), 302-327.
- Paananen, M. and Lin, H., (2009). The development of accounting quality of IAS and IFRS over time: The case of Germany, *Journal of International accounting research*, 8(1), pp.31-55.
- Piot, C. and Janin, R., (2007). External auditors, audit committees and earnings management in France, *European accounting review*, 16(2), pp.429-454.
- Rusmin, R. (2010). Auditor quality and earnings management: Singaporean evidence, *Managerial Auditing Journal*, 25(7), 618-638.
- Sun, J., & Liu, G. (2012). Auditor industry specialization, board governance, and earnings management, *Managerial Auditing Journal*, 28(1), 45-64.
- Sun, J., & Liu, G. (2012). Auditor industry specialization, board governance, and earnings management, *Managerial Auditing Journal*, 28(1), 45-64.
- Van Tendeloo, B. and Vanstraelen, A., (2005). Earnings management under German GAAP versus IFRS, *European Accounting Review*, 14(1), pp.155-180.
- Xie, B., Davidson III, W. N., & DaDalt, P. J. (2003). Earnings management and corporate governance: the role of the board and the audit committee, *Journal of corporate finance*, 9(3), 295-316.
