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Operating Cashflow Per Share - A Significant Improvement On Current Practice

by
Mahendra Goyal

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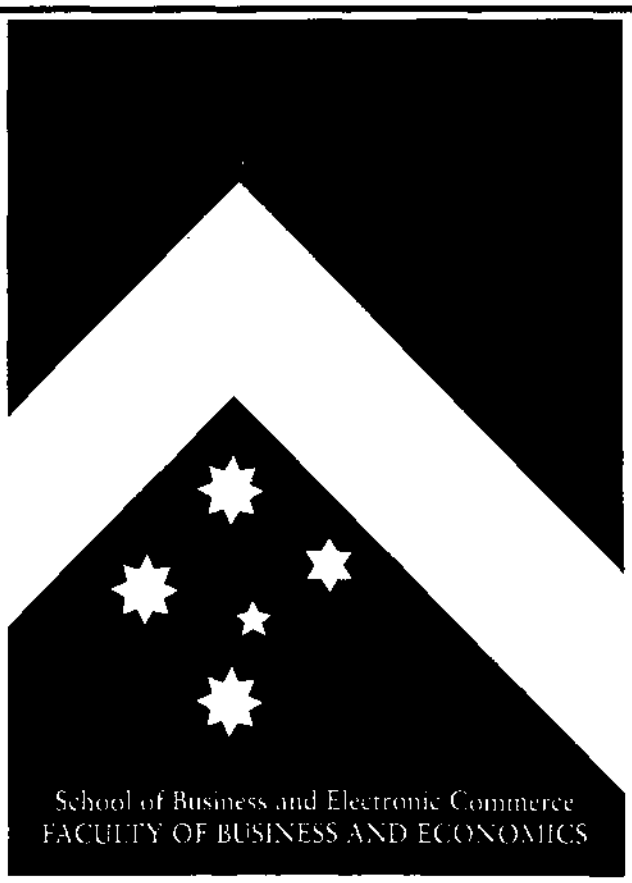

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Abstract

Earnings per Share (EPS) forms the base for the Price/Earning (PE) ratio and is widely reported daily in the financial press for companies. EPS is calculated from the reported earnings. Cashflow statements provide useful information in addition to earnings. Cashflow from operation per share is not commonly reported by companies but is proven to be a very effective analytical tool in financial distress situation of a company. This paper examines such issues: Whether cashflow from operation per share is a better indicator of performance than EPS; Whether cashflow from operation per share would represent a significant improvement on current practice. Two groups ie Chief Executive Officers/Financial Controllers (CEOs/FCs) and Accounting Academics have been selected as subjects. Cross-tab statistics show a slightly difference in their score of perceptions. Where t-test shows there are no significant differences on perceptions between these two groups. However, another t - test was conducted to test of both groups' perceptions on whether there is too much useless regulation in the content and presentation of financial statements in Australia. A significant difference was found.

OPERATING CASHFLOW PER SHARE - A SIGNIFICANT IMPROVEMENT ON CURRENT PRACTICE

Reporting an Earnings per Share (EPS) is mandatory in respect of companies listed on the Australian Stock Exchange for financial years ending on or after 30 June 1993 under the Australian Accounting Standard AASB 1027: Earnings per Share[1] . The main purpose of this standard is to set out requirements for determining amounts of Earnings per Share (EPS)[2] to ensure that such amounts are comparable between companies and over time and, therefore, enhance the usefulness of this performance indicator to users of accounts and consolidated accounts.

In fact, EPS forms the base for calculation of the Price/Earnings (PE) ratio which is widely reported daily in the financial press. PE ratio shows the relationship between the market price of a share and the reported earnings per share. However, both the above ratios are based on a company's reported earnings.

It has been argued that reporting earnings or their ratios are not useful measurements in predicting the ability of a firm's internally cash generation ie from operations (Largay III and Stickney 1980, Lee 1981, Flanagan and Whittred 1992; Sharma 1996). In liquidity crisis period where money is tight and expensive, it is not unusual for some companies to display high earnings but low operating cash flow (Ketz and Largay III 1987). Cashflow reporting provides such additional useful information with

the other financial statements ie Profit and Loss Statement and Balance Sheet (Lee 1981, Bowen, Burgstahler and Daley 1986; Percy and Stokes 1992; Whitis and Smith, 1993, Yap 1996). Ratios based on cashflow figures provide useful information in evaluating a company's financial strength and profitability (Giacomino and Mielke 1993, Sharma 1996).

However, Contrary to this Numberg (1993) found some inconsistencies and ambiguities in cash flow statements under US Accounting Standard FASB Statement No. 95.

Australian Accounting Standard AASB 1026: Statement of Cash Flows operative from 30 June 1992 indicates the importance of Cash Flows in the corporate environment (see commentary (iv) & (v)).

Operating Cashflow per Share (OCF\S)[3] is not commonly used by companies. This ratio is based on cashflow statements. To-date, research has presented mixed results on the usefulness of both ratios ie earnings per share and cashflows per share. Given the importance of cashflow reporting, researchers, Gombola and Ketz 1983; Flanagan and Whittred 1992; Giacomino and Mielke 1993; Whitis and Smith 1993; Garrod and Hadi 1995; and Sharma 1996, are realising to use of cashflow figures for relative performance measures of a company by using the cashflow ratios[4] .

Giacomino and Mielke (1993) have argued that it is important to use cash flow ratios for a company's relative performance evaluation which can be viewed in terms of *sufficiency* and *efficiency*.

> '*Sufficiency* describes the adequacy of cash flows for meeting a company's need; *efficiency* describes how well a company generates cash flows relative both to other years and to other companies.'

They have produced nine cash flow ratios, labelling six as sufficiency and three as efficiency ratios. According to them, these ratios provide additional information (over traditional financial ratios) about the relationship between cash flow from operations and other important operating variables.

A case study by Largay, III and Stickney (1980), on W.T. Grant Company Bankruptcy strongly suggested that it was necessary to find out the company's ability to generate cash internally. Therefore, an analysis of a company's cash flow from operations was important than the company's prospects. The following were the remarks:

> 'The most striking characteristic of the Grant Company during the decade before its bankruptcy was that it generated virtually no cash internally. The company simply lost its ability to derive cash from operations. After exhausting the possibilities of its liquid resources, it had to tap external markets for funds. As the failure to generate cash internally continued, the need for external financing snowballed.'

Similar another case was found in Flanagan & Whittred (1992) study of Hooker Corporation which collapsed in July 1989. The most striking characteristic of Hooker Corporation during the years before its collapse was its inability to generate cash internally - that is, from operations.

Flanagan & Whittred (1992, p50) further reported that "...share-price performance was more consistent with its underlying cashflow experience than its reported profits".

Ratios based on cashflows can provide better and more consistent information about the cash crisis (ability to generate cash internally) of the firm compare to more traditional ratios based on earnings.

A very recent study by Sharma (1996, p 43) analysing Brash Holdings Ltd concludes:

> The proposed cashflow ratios were applied to a recent financial failure which suggested that the company was experiencing a cash crisis as early as four years before voluntary administrators were appointed. This was not sufficiently apparent from the more traditional accrual analysis of financial performance. For instance, only the conventional return ratios indicated any signs of distress, while all three categories of cashflow ratios indicated that Brash was facing a financial crisis. Thus, the message conveyed by cashflow ratios appear to be more consistent than accrual ratios and are likely to lead to better-informed decisions.

Operating Cashflow per Share (given its usefulness based on the above studies) does not appear any where in the financial reports. In fact, it is not mandatory to report OCF\S in the financial statements.[5] It is an issue whether OCF\S is a better indicator of performance than EPS. And also whether OCF\S would represent a significant improvement on current practice. Another issue is also discussed here to find out whether respondents feel too much useless regulation in the content and presentation of financial statements in Australia.

The significance of this study will further enhance when a comparative results are presented from two groups ie the Chief Executive Officers/the Financial Controllers

and the Accounting Academics. This paper examines such issues through a questionnaire to those groups.

RESEARCH METHOD

This study was conducted by means of a simple mail questionnaire which had been pre-tested. The questionnaire was sent to 200 public listed companies selected on random basis, and to 48 Departmental Heads to the Australian universities. The cover letter was addressed to the Chief Executive Officers/Financial Controllers for the companies and to the Head of Departments of Accounting/Finance for universities. A total of 163 useable questionnaires were received comprising 94 from companies and 69 from academics.

The questionnaire required answers to questions in the following areas:

Whether OCF\S is a better indicator of performance measurement than EPS.

Whether OCF\S would represent a significant improvement on current practice.

Whether there is to much useless regulation in the content and presentation of financial statements in Australia.

Following the above discussion three hypotheses have been developed:

Ho_1 = There is no difference between CEOs/FC's and Academic Accountants' perceptions of OCF\S as a better performance indicator of a company than EPS.

Ho_2 = There is no difference between CEOs/FC's and Academic Accountants' perceptions that OCF\S would represent a significant improvement on current practice.

Ho_3 = There is no difference between CEOs/FC's and Academic Accountants' perceptions on whether there is too much useless regulation in the content and presentation of financial statements in Australia.

RESULTS AND DISCUSSION

Respondents were asked to indicate their level of perception on a five point Likert scale by circling the number 1 to 5, 1 represents strongly agree to 5 represents strongly disagree. Cross - tab statistics are presented in Table 1 to 3 for all three variables. The perceptions of OCF\S is a better indicator of performance than EPS by Academics and CEOs/FCs are depicted in Table 1.

Around 29% academics agreed and strongly agreed with the above statement which was not different from CEOs/FCs (27%). Similar percentage of both groups were neutral (32-37 percent). The difference was noted between two groups in Disagreement and Strongly disagreement scales. Twenty five percent of academics disagreed that OCF\S was a better performance indicator than EPS. The CEOs/FCs numbers were greater (37%). Strongly disagree scale was highly weighted by Academics. Respondents who were neutral have mentioned that both OCF\S and EPS should be reported equally.

The next variable which is "perceptions of OCF\S would represent a significant improvement on current practice" by Academics or CEOs/FCs is analysed in Table 2.

It was found that academics weighted their perceptions towards agree and strongly agree scales greater than CEOs/FCs. This was 7% and 28% for academics on strongly agree and agree respectively compare to 4% and 23% by CEOs/FCs. This was expected as academics are more familiar with the trend of education towards cashflow

reporting. Similar percentage were found for the neutral scale. There were differences in disagree and strongly disagree statements. Academic responses were weighted more on strongly disagreement (10%) compare to (4%) but CEOs/FCs were greater in disagree (35%) compare to academics (22%).

A third variable analysing the perceptions on too much useless regulation in the content and presentation of financial statements in Australia by academics vs CEOs/FCs is presented in Table 3.

Differences were noted between the two groups. More academics disagreed and strongly disagreed (40%) and (12%) for the above statement compare to CEOs/FCs (26%) and (2%) respectively. However, similar percentage was found from both groups on neutral scale (11%).

Hypotheses were tested through conducting t - tests for the two independent samples. Tables 4 to 6 show the test results for the Ho_1, Ho_2 and Ho_3 respectively.

OCF\S is a better indicator of performance than EPS, to test the differences between two groups perceptions, a low mean difference -.0663 was found. This indicates that there is little or no difference in the degree of performance between academics and CEOs/FCs perceptions. Thus we might be tempted to accept a null hypothesis. However, we need to extrapolate these results in order to reach a conclusion concerning larger populations of academics and CEOs/FCs. SPSS automatically

performs Levene's test for homogeneity of variance. Provided the F value is not significant ($p > 0.05$), the variances can be assumed to be homogeneous and the Equal Variances line of values for the t-test can be used (Kinnear and Gray, 1995, p 93). In our example, the Levene test is not significant, so the t value calculated with the pooled variance estimate (Equal Variances) is appropriate. With a 2-Tail Sig (ie p-value) of .698 (i.e. 69.8%), the difference between means is not significant.

Table 5 presents the results for the test of Ho_2 which propose that there is no differences between academics and CEOs/FCs perceptions that OCF\S would represent a significant improvement on current practice. The mean differences were -.1205. Levene test is not significant again and therefore, t value calculated with the pooled variance estimate (Equal Variances) is appropriate. In this situation, with a 2-Tail Sig (i.e. p-value) of .478 (i.e. 47.8%), the difference between means is not significant.

The variable, 'there is too much useless regulation in the content and presentation of financial statements in Australia' was tested and results are presented in Table 6. A significant difference, t - value, 3.36, 2-Tail Sig at .001 was noted. This is a controversy issue to discuss, why one group thinks that there is too much useless regulations in the content and presentation of financial statements in Australia as appose to another.

The outcomes of the project are significant in many ways. For example, there were not significant differences on perceptions by academics and CEOs/FCs. Although,

there were slight differences on row scores on their agreement and disagreement. Both groups are realising the importance of OCF\S reporting with EPS but should not be replaced with EPS. This indicates the popularity of EPS which is based on earnings.

There were several limitations of the study. There were no statistics on any demographic figures. A particular age and experience could influence the perceptions which is not reported. Also, we have left the involvement of some other important groups, for example, shareholders, members of stock exchange, standard preparers and professional accountants. The study is limited to observe a particular area, operating cashflow per share, which is not a mandatory to report in financial reports.

However, It is expected that this project will open many other issues to develop further research in this area. For example, future research could involve other groups of participants such as general shareholders, members of stock exchange, standard preparers and professional accountants to analyse their behaviour on EPS and OCF\S. Also further research could look at the affect of these variables on the market share price of the companies.

CONCLUSION

Earnings per Share (EPS) is mandatory for the Australian public listed companies for financial years ending on or after 30 June 1993. EPS forms the base for calculation of the Price/Earnings (PE) ratio which is widely reported daily in the financial press. These ratios are based on a company's reported earnings.

Australian Accounting Standard AASB 1026: Statement of Cash Flows operative from 30 June 1992 indicates the importance of Cash Flows in conjunction to other financial statements. Operating Cashflow per Share (OCF\S) is another ratio which is based on cashflow statements not commonly used by companies. Research showed that this ratio would provide significant improvement on a company's relative performance measures.

To test whether OCF\S is a better indicator of performance than EPS and would represent a significant improvement on current practice, two groups have been selected. CEOs\FCs from selected public listed companies and Accounting Academics from the Australian Universities. It was found (from t-test) that there were no significant differences between the two population samples ie CEOs\FCs and Academics. However, Academics favour slightly more on OCF\S would represent a significant improvement on current practice.

A further test is also conducted to find whether there is too much useless regulation in the content and presentation of financial statements in Australia. A significant difference was noted between the two groups' perceptions.

Further research is suggested to include the behaviour of some other subjects for example, shareholders, members of stock exchange, standard preparers and professional accountants. And also the effect of these variables on market share price of a company.

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NOTES

[1] From an international perspective, it is standard practice for companies in the US, Canada and the UK to calculate and disclose earnings per share as an addendum to the profit and loss statement (Henderson and Peirson, 1995). In the US, the Accounting Principle Board (APB) issued Opinion No. 15, 'Earnings per Share', in May 1969. In the UK, 'Statement of Standard Accounting Practice No. 3 (SSAP No.3) now it is an FRS 3 on Earnings per Share was issued in February 1972. For the Canadian requirements see section 3500, Canadian Institute of Chartered Accountants, Handbook, CICA, Toronto.

[2] Paragraph 10 of AASB 1027 states that basic earnings per share shall be calculated by dividing the earnings of the company for the financial year by the weighted average number of ordinary shares outstanding during the financial year.

[3] Sharma (1996, p. 40) has provided two calculations for operating cashflow per share. Firstly, cashflow from operations, after deducting interest and preference dividend payments, divided by number of ordinary shareholders which represents the efficiency with which shareholders' funds were used to generate cashflow from normal operating activities. Secondly, 'a much less crude measure is cash available after debt repayments and cash reinvestments but not including cash provided by debt funding, share issues and asset disposal'. According to Sharma this ratio would be an indicative of an entity's long-term return on ordinary shares.

[4] Sharma (1996) has developed a series of such ratios in addition to Giacomino and Mielke (1993).

[5] US Accounting Standard SFAS 95 prohibits to report an amount of cash flow per share. As per para 33, 'Financial statements shall not report an amount of cash flow per share. Neither cash flow nor any component of it is an alternative to net income as an indicator of an enterprise's performance, as reporting per share amount might imply.'

Table 1: Perceptions of Cashflow from Operation per Share is a better indicator of performance than EPS by Academics vs CEOs/FCs

	Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree	Row Total
Academics	7 [10.3]	13 [19.1]	25 [36.8]	17 [25.0]	6 [8.8]	68 [42.0]
CEOs\FOs	9 [9.6]	16 [17.0]	30 [31.9]	35 [37.2]	4 [4.3]	94 [58.0]
Column Total	16 [9.9]	29 [17.9]	55 [32.1]	52 [32.1]	10 [6.2]	162 [100.0]

Number of Missing Observations: 1
Note: Percentages are in parentheses.

Table 2: Perceptions of Cashflow from Operation per Share would represent a significant improvement on current practice by Academics vs CEOs/FCs

	Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree	Row Total
Academics	4 [6.7]	17 [28.3]	20 [33.3]	13 [21.7]	6 [10.0]	60 [42.0]
CEOs\FOs	3 [3.6]	19 [22.9]	29 [34.9]	29 [34.9]	3 [3.6]	83 [58.0]
Column Total	7 [4.9]	36 [25.2]	49 [34.3]	42 [29.4]	9 [6.3]	143 [100.0]

Number of Missing Observations: 20
Note: Percentages are in parentheses.

Table 3: Perceptions of too much useless regulation in the content and presentation of financial statements in Australia by Academics vs CEOs/FCs

	Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree	Row Total
Academics	9 [13.4]	15 [22.4]	8 [11.9]	27 [40.3]	8 [11.9]	67 [42.1]
CEOs\FOs	18 [19.6]	38 [41.3]	10 [10.9]	24 [26.1]	2 [2.2]	92 [57.9]
Column Total	27 [17]	53 [33.3]	18 [11.3]	51 [32.1]	10 [6.3]	159 [100.0]

Number of Missing Observations: 4
Note: Percentages are in parentheses.

t - test for Independent Samples of Academics vs CEOs\FCs

Table 4: Cashflow from Operations per Share is a better indicator of Performance than EPS

Group	Number of Cases	Mean	SD	SE of Mean
Academics	68	3.0294	1.106	.134
CEO\FCs	94	3.0957	1.048	.108

t - value, -.39 df, 160, 2 - Tail Sig, .698

Table 5: Cashflow from Operations per Share would represent a significant improvement on current practice

Group	Number of Cases	Mean	SD	SE of Mean
Academics	60	3.0000	1.089	.141
CEO\FCs	83	3.1205	.929	.102

t - value, -.71 df, 141, 2 - Tail Sig, .478

Table 6: There is too much useless regulation in the content and presentation of financial statements in Australia

Group	Number of Cases	Mean	SD	SE of Mean
Academics	67	3.1493	1.282	.157
CEO\FCs	92	2.5000	1.144	.119

t - value, 3.36 df, 157, 2 - Tail Sig, .001