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# The Incremental Information Content of Net Value Added An Empirical study on Amman Stock Exchange

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#### Abstract

The aim of this study is to examine the information content of net value added in regard to enterprise profitability and its market value. Moreover, the study attempts to examine whether net value added information has incremental information content above that of earnings figure and the enterprise book value. (40) Industrial and service companies listed in Amman Stock Exchange represent the study sample during the period 2001-2010.

Regression analysis is employed to examine the study's hypotheses. The study reached to the following results: 1- There is a significant and positive relationship between earnings figure of the current year and earnings figure of the next year. 2. Net value added does not have an incremental information content regarding future profitability above that of current profitability. 3. There is positive significant relationship between market value of common equity and book value of common equity. 4. The earnings figure provides incremental information content regarding market value above that of book value. 5. Net value added does not have an incremental information content regarding market value above that of book value and earnings figure.

Keywords: Net Value Added, return on equity, Information Content, Jordan.

#### Preface

A huge portion of the current research that is published in the leading academic accounting journals, study the relationship that is found between the capital markets variables and financial statement information. The large amount of published research shows that there is a need for capital markets research. For the past thirty years all research has heavily scrutinized the relationship that is found between returns and earnings.

Any discussion of the return-earnings relation, as it is called, must go back at least as far as 1968. That year two papers were published, one by Ball and Brown and other by Beaver. The former study related earnings information to abnormal returns from 12 months before to 6 months after an earnings announcement, while the latter related it to share price volatility and trading volume in the weeks surrounding the announcement of earnings.

While the evidence of an association between returns and earnings is statically compelling, the exploratory power of earnings, in the typical study, has been weak. The weakness of the association between an individual security's accounting earnings and its stock market returns was highlighted by (Lev, 1989). He argued that a perfect correlation between earnings information and abnormal returns would be guaranteed only if earnings were the sole information source within the period over which returns were measured, if expected earnings were measured correctly, and if investors reacted identically to the earnings releases of all firms.

This study focuses on net value added and examines its role in the prediction of future profitability and firm value. If it is found that net value added information has incremental content, then that would increase our ability of explaining market variables changes. Furthermore, it would affect disclosure requirement rated to net value added.

Net value added is chosen for the following reasons: Firstly, there is a few previous international accounting research in this field Secondly, accountants and economists praise its importance valuation of companies and efficient management.

This study aims to achieve the following goals; firstly, increase the expletory power for the earning and nonearning variables to the stock return variable; this is will happen by add net value added variable to the stockreturn model. Second, introduce the evidence about the information content for net value added from the Jordanian market. Finally, this study tries to decrease the shortage in studying net value added in the capital market research. The impact of net value added on future ROE is studied and then net value added is investigated to see if it net value can explain the market value variances incremental to current return on equity the book value.

#### Literature Survey

The work of Ball and Brown (1968) is considered as the first scientific study in the capital markets research. Ball and Brown asked the following question: are abnormal returns on the share market associated with the release of the preliminary annual EPS number?

The answer to their question was as follows. Investors found earnings numbers "useful", in that earnings forecast errors, or earnings innovations, were significantly related to abnormal returns. Many following studies assert the existence of this relationship between earnings and stock return.<sup>8</sup>

(Lev, 1989) found in his evaluation that the explanatory power of the relationship that is found between the earnings and the stock return does not surpass 10%. The literature gives numerous reasons for the weak relationship for returns and earnings. Several ideas on how to develop the estimation of returns-relation have been identified, such as (Ou and Penman, 1989) who pioneered the present financial data other than earnings in to the R-E relation.

(Lipe, 1986) examined the relationship that is found between the different parts of the accounting earnings and stock returns. The research looks at whether the six most commonly reported modules of earnings can give supplementary information that isn't found in the earnings figure. The six modules that were examined in the study include the following: gross profit, general and administrative expense, depreciation expense, interest expense, income taxes, and such other articles. The conclusions of the investigation show that all the modules explain the deviations found in returns and that earnings alone could not explain it.

Easton and Harris, (1991) investigate whether the level of earnings divided by price at the beginning of the stock return period is relevant for evaluating return-earning association. They found that the main explanatory variable for stock return window is the level of earnings divided by price at the beginning of the stock return window instead of the earnings divided by the change in price at the beginning of the stock return window.

Easton, et al., (1991) increased the strength of this association by increasing the length of the study window, they found a higher correlation between earnings and return when longer interval over is used.

Alkhalialeh, (2008) gives proof from the Jordanian market on the topic of traditional accounting measures forecasting ability to clarify stock returns variances that had become reduced in the 1990s. The findings have revealed that conventional, accounting performance measures have lost their once strong link with the stock returns during the 1990s, and that is in comparison to the 1980s. On the other hand, findings have also revealed that accounting based performance measures are still relevant because they can explain of the variances in stock. Those accounting based performance measures that are most relevant include earnings. The findings propose that it might not be a good idea to discontinue the use of traditional performance measures.

Dimitropoulos and Dimitrios, (2009) studied the relationship that is found between stock returns and earnings figures in the Greek capital market. The findings reveal that there is a strong value relevancy for accounting earnings. The results also show that using time-series aggregated data and cross-sectional data resulted in a great increase of the forecasting ability of earnings for returns. This was for the return and differenced model that yielded a lot more significant earnings response coefficients.

Beisland, (2011) studied the statistical link that is found between the stock returns and the income statement information. This was done on a pool of listed Norwegian companies. The study revealed that the value relevance that was measured by using the forecasting ability of regression analysis does in fact double if both disaggregation effect and the sign included in the analysis.

Regarding net value added, Karpik and Belkaoui (1989) follow work previously done that show the empirical/theoretical relationship that is found between the accounting variables and market risk. It examined the incremental abilities of value added measures to clarify the cross-sectional variation in market betas that go beyond what is provided by the risk measures.

<sup>&</sup>lt;sup>8</sup> See for example: Amir and Lev, (1996), Ball and Kothari, (1991), Wilson, (1986), and Beaver, (1968).

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Bao and Bao (1996) investigation is in harmony with other investigations that look at time series properties of accounting earnings. It studies the properties of time series and the value added based measures through using four very well acknowledged time series models. Through the use of a sample of firms in the U.S. the results reveal that the value added based measures can be considered, a random-walk process. That showed that it had the lowest predictability errors, in the sense of the two error metrics.

Kim et. al., (1996) studied if and to what degree, is the net value added information used in the market and if it is helpful as a forecasting measure. It was discovered that the net value added has information content. All this implies that the net value added that is used as a performance metric, does merit more notice by security analysts and financial managers.

Belkaoui, (1999), studies the responsibility of the net value added in the forecasting of the outlook for profitability and firm valuation. The findings reveal that the net value added doesn't offer a large amount of information about the potential profitability incremental. That is in comparison to the information that is provided by the current profit rate.

#### **Research Hypothesis**

 $H_01$ : There is no statistical positive relationship between current ROE and future ROE.

 $H_02$ : Net value added does not provide additional information content beyond future ROE more than current ROE.

 $H_03$ : There is no statistical positive relationship between common stock book value and common stock market value.

 $H_04$ : Current ROE does not provide additional information content beyond common stock market value more than common stock book value.

 $H_05$ : Net value added does not provide additional information content beyond common stock market value more than common stock book value and current ROE.

#### **Research variables and models**

To test the first hypothesis, the first model is used.

$$ROE^{9}_{it+1} = a_0 + a_1 ROE_{it} + e_{1it}$$

Where: **ROE**  $_{it+1} = X_{it+1}/BV_{it}$  **ROE**  $_{it+1} =$  return on equity.  $X_{it+1} =$  net income. **BV**<sub>it</sub> = book value of common equity at the end of year. **ROE**<sub>it</sub> = Return on equity. **a**<sub>0</sub>, **a**<sub>1</sub> = Statistical model coefficients. t: year, i: firm **e**<sub>1it</sub> = Statistical model error.

Model (1) is used to investigate the role of current ROE in forecasting future ROE. To test the second hypothesis, I will run the following model.

## $ROE_{it+1} = b_0 + b_1 ROE_{it} + b_2 NVA_{it} + e_{2it}$

Where: **NVA**<sub>it</sub> = net value added.

 $\mathbf{b}_0, \mathbf{b}_1$  = Statistical model coefficients.

 $\mathbf{e}_{2it}$  = Statistical model error.

Model (2) study the impact of the net value added in the relationship that is found between the current and the future profitability.

The net value added is one of the probable performance measures that could be calculated fairly easily, from published accounting numbers (Bao and Bao, 1989).

We can calculate net value added from the left or right side from the following two equations (Kim, et al., 1996 and (Belkaoui, 1999)).

S - P = W + I + D + Di + R + T

(2)

(1)

<sup>&</sup>lt;sup>9</sup> I use ROE as an indicator for firm profitability

Research Journal of Finance and Accounting ISSN 2222-1697 (Paper) ISSN 2222-2847 (Online) Vol.4, No.10, 2013

S - P - D = W + I + Di + R + T4 Where: S= Sales. P= purchases. W= Wages. I= Interest. D= Depreciation. Di= dividends. T= Taxes. D= Depreciation. R= Retained earnings. The gross value added is expressed in Equation (3); while after subtracting depreciation the result represent net value added as Equation (4). To test the third hypothesis, I will use model (3): 5

$$\begin{split} \mathbf{MV}_{it} = &\alpha + \beta \ \mathbf{BV}_{it} + \mathbf{e}_{3i} \\ \text{Where:} \\ \mathbf{MV}_{it} = & \text{Market value per share.} \\ \mathbf{BV}_{it} = & \text{book value of equity per share.} \\ \mathbf{a}, \beta = & \text{Statistical model coefficients.} \\ \mathbf{e}_{3it} = & \text{Statistical model error.} \end{split}$$

Model (3) is used to study the relationship between firm market value and firm book value.

To test the fourth hypothesis, I will use model (4)  

$$MV_{it} = y_0 + (y_1 + y_2 ROE_{it}) * BV_{it} + e_{4it}$$
  
Where:

 $y_0$ ,  $y_1$  and  $y_2$ = Statistical model coefficients.  $e_{4it}$ = Statistical model error. I add ROE to examine its ability with share book value in explaining the change in share market value.

To test the fifth hypothesis, I will use the following model  $MV_{it} = v_0 + (v_1 + v_2 ROE_{it} + v_3 NVA_{it}) * BV_{it} + e_{5it}$  7 Where:  $v_0$ , v1 and  $v_2$ = Statistical model coefficients.

 $\mathbf{e}_{5it}$ = Statistical model error.

In this model, I add net value added to study its ability with ROE and share book value in explaining the change in share market value.

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#### Statistical analysis tools

We will use many statistical tools in this research. Firstly, deceptive analysis will be used. Next, I will use simple and multi regression for test the study hypotheses. Lastly, I will use (Adjusted- $R^2$ ) for indicate the incremental information content for the study variables.

#### **Data Sources**

For collecting the data that you have it's to compute research variables, we use the following resources:

1- Amman Stock Exchange companies guide.

2- Financial reports from Jordanian shareholding companies.

#### Sample

We will take all the Industrial Jordanian shareholding companies that satisfy the following conditions:

1- The company should not have unmoral events such as consolidation or distribute free shares to the shareholders or stock split....

2- The company must trade in the exchange in whole study period (2001-2010).

The total companies that have satisfied the conditions were forty companies; Thirty-two companies were from industrial sector and eight companies were from service sector.

#### Statistical Analysis Descriptive Analyses

Table 1 shows descriptive analyses measures for our main variables (386 year-observations), and for removing outliers observations we exclude what is less than percentile 1 and what is more than percentile 99 for each variable. Table 2 shows descriptive analyses measures for our main variables after exclude the outliers. The statistical measures includes: minimum, maximum, mean, median and the standard deviation. We notice that the  $(ROE_{it+1})$  mean = 0.07, and the  $(ROE_{it})$  mean =0.07, and the  $(NVA_{it}/TA_{it})$ = 0.11 and the  $(MV_{it})$  mean =3.53, and lastly the mean of  $(BV_{it})$ = 2.21. We notice that all main variables mean are close to their medians which give indication that these variables are normally distributed. It is observed that the standard deviations of the variables in fact have a lower value in comparison to before excluding the outliers' observations and this show that it is in the accepted range.

(40 mausi	(40 industrial and services Jordanian companies, 2001-2010, 386 company-year observations)									
Variable	Maximum	Percentile 99	STD.	Median	Mean	Percentile 1	Minimum			
ROE <sub>it+1</sub>	0.73	0.42	0.15	0.08	0.071	-0.40	-0.80			
ROE <sub>it</sub>	0.54	0.35	0.15	0.08	0.065	-0.39	-1.38			
NVA	149,169,995	142,245,118	15,755,309	884,019	4,145,684	-89,932,671	-91,426,020			
MV	24	16.25	3.33	2.71	3.63	0.28	0.14			
BV	10.85	9.25	1.71	1.64	2.25	0.34	0.31			

 Table 1: Descriptive measures before deleting outliers' observations

 (40 Industrial and services Lordenian companies 2001 2010 386 company year observations)

#### Descriptive measures after deleting outliers' observations

 sures unter actering sumers observations							
Variable	Maximum	STD.	Median	Mean	Minimum		
ROE <sub>it+1</sub>	0.38	0.13	0.08	0.07	-0.72		
ROE <sub>it</sub>	0.34	0.12	0.08	0.07	-0.35		
NVA	141,381,245	12,871,231	801,274	4,023,317	-89,142,302		
MV	16.2	2.99	2.71	3.53	0.28		
BV	9.23	1.56	1.64	2.21	0.34		

Note:

This table shows the statistical descriptive measures before and after deleting the outliers. Variables definitions:

ROE <sub>it+1</sub>. = return on equity(future)

 $ROE_{it}$  = return on equity (current)

NVA =net value added..

MV<sub>it</sub>= Market value per share.

 $BV_{it}$ = book value of equity per share.

i=firm, t=year

We see from table 3 Spearman matrix correlation factors between study main variables. We saw that all the factors are statistically significant at  $\alpha$ = 0.01 except that between BV and NVA. The highest factor was as expected between BV and MV (0.71) then between ROEit<sub>+1</sub> and ROE<sub>it</sub> (0.59).

#### Table 3

Spearman correlation factors matrix between the study variables

ma	an conclution factors matrix between the study variables								
	Variable	BV	MV	NVA	ROE <sub>it</sub>				
	ROE <sub>it+1</sub>	0.19*	0.36*	0.27*	0.59*				
	ROE <sub>it</sub>	0.26*	0.43*	0.35*					
	NVA/TA	0.08	0.18*						
	MV	0.71*							

This table shows Spearman matrix correlation factors between study main variables.

 $ROE_{it+1}$ . = return on equity(future),  $ROE_{it}$  = return on equity (current), NVA = net value added...

MV<sub>it</sub>= Market value per share., BV<sub>it</sub>= book value of equity per share., i=firm, t=year

\* Factors are statistically significant at  $\alpha = 0.01$ 

#### Hypotheses testing results

#### **Model 1:** ROE $_{it+1} = a_0 + a_1 ROE_{it} + e_{1it}$

Table 4 shows the model factors values and the Adjusted-R<sup>2</sup> coefficients that refer to the expletory power for the model. We see that the vales of a<sub>1</sub> factors which refer to ROE<sub>it</sub> and Adjusted-R<sup>2</sup> values are positive for all study years which means that there is a positive relationship between ROE<sub>it</sub> and ROE it+1, so we refuse the null hypothesis and accept the alternative hypothesis so There is statistical positive relationship between current ROE and future ROE. This result fits with the previous studies and asserts the companies concentration on to portability as an indicator to efficiency, and the investors' attention to the companies previous earning for investing; that will increase the companies' future earnings.

		del 1 regression resu	ılts	
Year	Adjusted R <sup>2</sup>	Factor $\mathbf{a_1}$	Factor $\mathbf{a}_0$	Observations
2001	.313	.641	.628	34
	*(16.02)	*(4.00)	**(2.52)	
2002	.356	.7	.045	34
	*(19.28)	*(4.39)	***(1.72)	
2003	.244	.511	.057	37
	*(12.56)	*(3.56)	(2.62)	
2004	.543	1.007	.002	39
	*(44.56)	*(6.68)	(-1.0)	
2005	.538	1.01	134	39
	*(45.16)	*(6.72)	(81)	
2006	.457	.709	.02	39
	*(32.95)	*(5.74)	(1.28)	
2007	.815	.928	006	40
	*(172.39)	*(13.13)	(71)	
2008	.658	.879	008	40
	*(76.18)	*(8.73)	(64)	
2009	.456	1.189	005	39
	*(32.85)	*(5.73)	(21)	
2010	.398	.615	.028	35
	*(23.45)	*(4.84)	(1.45)	
All Years	.507	.834	.01	376
	*(386.56)	*(19.66)	***(1.80)	

		1 able 4	
Model	1	regression	resu

\*\*\* The factor is significantly at 0.1

\*\* The factor is significantly at 0.05

\* The factor is significantly at 0.01

#### Model 2: ROE<sub>it+1</sub> =b<sub>0</sub>+b<sub>1</sub>ROE<sub>it</sub>+b<sub>2</sub>NVA<sub>it</sub> +e<sub>2it</sub>

Table 5 shows the second model coefficients values and the Adjusted- $R^2$  values that refer to the expletory power for the model. To test the second hypothesis, we compare Adjusted-  $R^2$  for models 1 &2, the differences between the two models show at table 6. From this table we show that there isn't any significant difference between the two models, In addition net value added coefficient factors are not significant for all years, so we accept the null hypothesis which means that Net value added does not provide additional information content beyond future ROE more than current ROE. Finally the results of Vuong's Z-test between model (1) and model (2) verify that the variances between the adjusted  $R^2$ s aren't statistically significant with value equal to 1.30.

The reason for this result is the low attention from the investors to the companies' net value added that they do not suppose that the increase in net value added will lead to increase in companies' profitability.

#### Model 3: $MV_{it} = \alpha + \beta BV_{it} + e_{3i}$

Table 7 shows the model factors coefficients values and the Adjusted-R<sup>2</sup> amounts. We see that the vales of  $\beta$ factors which refer to  $BV_{it}$  and Adjusted-R<sup>2</sup> values are positive for all study years this mean that there is positive relationship between BV<sub>it</sub> and MV<sub>it</sub> so we refuse the null hypothesis variable and accept the alternative hypothesis so There is statistical positive relationship between common stock book value and common stock market value.

This result fits with the previous studies and asserts the strong relationship between the shares book value and market value in the Jordanian shareholding companies.

	Model 2 regression results								
Year	Adjusted-R <sup>2</sup>	b <sub>2</sub> Factor	Factor b <sub>1</sub>	Factor b <sub>0</sub>	Observations				
2001	.292	04	.667	.0654	34				
	*(7.8)	(23)	*(3.35)	**(2.36)					
2002	.361	.139	.596	.043	34				
	*(10.33)	1.11	*(3.23)	(1.64)					
2003	.236	071	.571	.061	35				
	*(6.25)	(58)	*(3.46)	(2.49)					
2004	.536	.0945	.971	028	39				
	*(22.93)	(1.06)	*(6.29)	(-1.31)					
2005	.527	048	1.056	013	39				
	*(22.18)	(43)	*(5.69)	(70)					
2006	.461	.144	.685	.009	37				
	*(99.64)	(1.19)	*(5.1)	(.49)					
2007	.838	.17	.844	019	39				
	*(99.64)	*(2.91)	*(12.02)	***(-1.92)					
2008	.679	.207	.789	025	40				
	*(42.28)	***(1.86)	*(7.25)	(-1.60)					
2009	.475	414	1.436	.028	38				
	*(17.76)	(-1.34)	*(5.3)	(1.16)					
2010	.379	003	.617	.028	35				
	*(11.36)	(01)	*(3.36)	(1.16)					
All years	.507	.052	.81	.008	370				
-	*(190.51)	(1.23)	*(16.83)	(1.15)					

	Table 5	
Model 2	regression	resul

\*\*\* The factor is significantly at 0.1 \*\* The factor is significantly at 0.05 \* The factor is significantly at 0.01

Adjusted-R <sup>2</sup> between model 1 and model 2						
Year	Adjusted-R <sup>2</sup> Model 2	Adjusted-R <sup>2</sup> Model 1	The difference			
2001	.292	.313	021			
2002	.361	.356	.005			
2003	.236	.244	008			
2004	.536	.543	007			
2005	.527	.538	.011			
2006	.461	.457	.004			
2007	.838	.815	.023			
2008	.679	.658	.021			
2009	.475	.456	.019			
2010	.379	.398	019			
All years	.507	.507	0			

Table 6

Year	Adjusted-R <sup>2</sup>	β Factor	a Factor	Observations
2001	.484	1.397	.746	36
	*(33.78)	*(5.81)	(1.23)	
2002	.314	1.287	2.215	35
	*(16.54)	*(4.07)	*(2.86)	
2003	.5	1.605	1.492	37
	*(37.07)	*(6.09)	**(2.17)	
2004	.598	1.58	.635	38
	*(55.96)	*(7.84)	(1.10)	
2005	.673	1.556	.370	40
	*(81.37)	*(9.02)	(.77)	
2006	.716	1.319	.0934	39
	*(97.03)	*(9.9)	(.24)	
2007	.757	1.335	009	39
	*(119.37)	*(10.93)	(03)	
2008	.608	1.329	354	38
	*(58.3)	*(7.64)	(80)	
2009	.667	1.223	202	38
	*(78.67)	*(8.87)	(592)	
2010	.637	1.062	110	36
	*(62.54)	*(7.91)	(33)	
All years	.517	1.362	.498	376
5	*(402.06)	*(20.05)	*(2.74)	

Table 7Model 3 regression results

\*\*\* The factor is significantly at 0.1

\*\* The factor is significantly at 0.05

 $\ast$  The factor is significantly at 0.01

#### Model 4: $MV_{it} = y_0 + (y_1 + y_2 ROE_{it}) * BV_{it} + e_{4it}$

The fourth model regression results are shown in table 8. Table 9 in other hand compares Adjusted-  $R^2$  coefficients between models 3 and 4. From this table we show that there is significant difference between the two variables. The results of Vuong's Z-test between model (3) and model (4) verify that the variances between the adjusted  $R^2$ s are statistically significant at 0.01 level with value equal to 3.72. so we refuse the fourth null hypothesis and accept the alternative one, which means that Current ROE provides additional information content beyond common stock market value more than common stock book value. This asserts what we said previously about the inventories concentration to earnings figures.

	Model 4 regression results							
Year	Adjusted R <sup>2</sup>	y <sub>2</sub> Factor	y <sub>1</sub> Factor	$\mathbf{y}_{0}$ Factor	Observations #			
2001	.833	5.888	.623	.520	35			
	*(85.88)	*(9.07)	*(5.02)	***(1.84)				
2002	.755	9.178	.638	1.076	35			
	*(53.44)	*(7.78)	*(3.29)	**(2.22)				
2003	.729	8.534	.893	.724	36			
	*(48.08)	*(4.66)	*(3.27)	(1.37)				
2004	.71	5.701	.947	.651	38			
	*(46.28)	*(3.87)	*(3.9)	(1.33)				
2005	.727	3.838	1.003	.815	40			
	*(52.87)	*(2.91)	*(4.05)	***(1.75)				
2006	.791	4.047	.707	.72	39			
	*(72.75)	*(3.76)	*(3.59)	***(1.91)				
2007	.77	1.787	1.048	.327	39			
	*(64.6)	*(1.76)	*(5.2)	(.80)				
2008	.622	1.903	1.017	.0312	38			
	*(31.44)	(1.54)	*(3.84)	(.06)				
2009	.794	3.956	.644	.495	37			
	*(70.47)	*(4.15)	*(3.4)	(1.5)				
2010	.551	2.16	.645	.375	34			
	*(21.27)	**(2.1)	*(2.97)	*(.96)				
All years	.663	5.234	.684	.871	371			
	*(364.78)	*(12.72)	*(8.78)	*(5.70)				

Table 8 ~I 4 .

\*\*\* The factor is significantly at 0.1 \*\* The factor is significantly at 0.05

\* The factor is significantly at 0.01

#### Table 9: Adjusted-R<sup>2</sup> between model 3 and model 4

Year	The difference	Adjusted-R <sup>2</sup>	Adjusted-R <sup>2</sup>
1041		Model 4	Model 3
2001	.349	.833	.484
2002	.441	.755	.314
2003	.229	.729	.5
2004	.112	.71	.598
2005	.054	.727	.673
2006	.075	.791	.716
2007	.013	.77	.757
2008	.014	.622	.608
2009	.127	.794	.667
2010	086	.551	.637
All years	.146	.663	.517

Model 5

 $\mathbf{MV}_{it} = \mathbf{v}_0 + (\mathbf{v}_1 + \mathbf{v}_2 \mathbf{ROE}_{it} + \mathbf{v}_3 \mathbf{NVA}_{it} / \mathbf{TA}_{it})^* \mathbf{BV}_{it} + \mathbf{e}_{5it}$ 

Table 10 shows the model 5 regression results. For testing hypothesis 4, we should compare Adjusted-  $R^2$  for models 4 and 5. The differences between the two models show at table 11. From this table we show that there is not any significant difference between the two variables, the results of Vuong's Z-test between model (4) and model (5) verify that the variances between the adjusted  $R^2$ s aren't statistically significant with value equal to 1.09. So we accept the null hypothesis, which means Net value added, does not provide additional information content beyond common stock market value more than common stock book value and current ROE. The reason for this result is the low attention from the investors to the companies' net value added that they do not suppose that the increase in net value added will lead to any increase in companies' profitability.

Model 5 regression results								
Year	Adjusted R <sup>2</sup>	Factor v <sub>3</sub>	Factor v <sub>2</sub>	v <sub>1</sub> Factor	v <sub>0</sub> Factor	Observations #		
2001	.806	.399	4.101	.737	.637	34		
	*(46.59)	(.04)	*(3.66)	*(6.16)	**(2.4)			
2002	.753	-10.325	10.109	.575	1.226	35		
	*(35.56)	(85)	*(6.26)	**(2.6)	**(2.36)			
2003	.763	-20.038	11.521	.591	1.012	35		
	*(37.53)	(-1.42)	*(5.05)	***(2)	**(1.87)			
2004	.702	-2.019	5.846	.931	.683	38		
	*(29.99)	(10)	*(2.83)	*(3.18)	(1.17)			
2005	.711	5.767	3.213	1.080	.695	39		
	*(32.14)	(.36)	(1.59)	*(3.38)	(1.16)			
2006	.792	-1.972	5.143	.577	.879	38		
	*(47.99)	(14)	*(3.16)	**(2.35)	***(2)			
2007	.781	17.812	.518	1.208	.006	38		
	*(46)	(1.68)	(.38)	*(5.12)	(.01)			
2008	.63	22.494	.176	1.206	346	38		
	*(22)	(1.33)	(.01)	*(4.06)	(61)			
2009	.802	20.259	2.335	.809	.156	37		
	*(49.5)	(1.53)	(1.64)	*(3.75)	(.4)			
2010	.542	6.233	1.806	.692	.244	34		
	*(13.99)	(.58)	(1.5)	*(2.96)	(.54)			
All years	.659	4.357	4.906	.724	.782	366		
	*(236.54)	(.88)	*(8.38)	*(8.02)	*(4.43)			

 Table 10

 Model 5 regression results

\*\*\* The factor is significantly at 0.1

\*\* The factor is significantly at 0.05

\* The factor is significantly at 0.01

### Table 11: Adjusted-R<sup>2</sup> between model 4 and model 5

Year	The difference	Adjusted R <sup>2</sup>	Adjusted R <sup>2</sup>
1 cui		Model 5	Model 4
2001	027	.806	.833
2002	002	.753	.755
2003	.034	.763	.729
2004	008	.702	.71
2005	016	.711	.727
2006	.001	.792	.791
2007	.011	.781	.77
2008	.008	.63	.622
2009	.008	.802	.794
2010	009	.542	.551
All years	004	.659	.663

#### **Conclusion and Recommendations**

The main point that is concluded from this study is that investors, creditors, and other external financial information users interest in accounting profits, as the unique element in the investment and financial decisions.

The main objectives of this study, is to deliver evidence to Jordanians, on the content of value added. The second is to form a comparison between the predicting ability between value added in one hand and earnings and book value in the other hand.

The findings indicate that there is statistical positive relationship between current ROE and future ROE. This result fits with the previous studies and asserts the companies attention to the portability which refer to theirs efficiency, and the investor's attention to the companies previous earning for investing; Net value added does not provide additional information content beyond future ROE more than current ROE. The reason for this result is the low attention from the investors to the companies' net value added that they do not suppose that the increase in net value added will lead to increase in companies' profitability.

Then the study reach that There is statistical positive relationship between common stock book value and common stock market value which fits with the previous studies and asserts the strong relationship between the shares book value and market value in the Jordanian shareholding companies.

After that the findings indicate that current ROE provides additional information content beyond common stock market value more than common stock book value. Which assert the important of profitability in our companies. Finally the results show that net value added does not provide additional information content beyond common stock market value more than common stock book value and current ROE. The reason for this result as we said is the low attention from the investors to the companies' net value added that they do not suppose that the increase in net value added will lead to increase in companies' profitability.

Based on these results we recommend the following:

- 1- The Jordanian shareholding companies should disclose the full data that we need to calculate net value added.
- 2- The Amman Stock Exchange must start building a data base that incorporates all the significant information that any researcher would need. That will lead to an improvement in the scientific research in Jordan.
- 3- The researchers should do more studies in this important variable in the future.

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