

Corporate Finance Principles and Wood Industry Growth: Empirical Evidence from Bosnia and Herzegovina

Jasmina Džafić¹, Nedžad Polić¹

¹Faculty of Economics, Zenica University, Zenica, Bosnia & Herzegovina

Correspondence: Jasmina Džafić, Faculty of Economics, Zenica University, Zenica, Bosnia & Herzegovina.

Received: September 10, 2018

Accepted: October 9, 2018

Online Published: October 11, 2018

doi:10.5539/ibr.v11n11p74

URL: <https://doi.org/10.5539/ibr.v11n11p74>

Abstract

The use of fundamental corporate finance principles as well as the combination of their effects does not always contribute to the same performance effects and firms' growth. It can considerably vary in certain periods, market turbulences and various industries. Referring to the permanent need for exploration of the individual and integrated effects of the corporate finance principles on firms' growth in specific circumstances, on the one hand, and particular importance of wood industry in Bosnia and Herzegovina (B&H), on the other, in this paper we examine the extent to which corporate finance principles support wood industry growth in B&H.

Specifically, the aim of this research is to investigate the contribution of investments, financial leverage and dividend policy to the growth of firms in this particular industry. Furthermore, the compliance of the paper findings with theoretical concepts and expectations of corporate finance principles role arises as the additional research challenge. Finally, we are interested to find out if the empirical results provide a solid base to apply consistent incentives policy that may further stimulate wood industry growth in B&H.

We select all wood-processing firms in B&H from 2008 to 2016. Stata 15 is applied in the empirical analyses and calculations.

Keywords: corporate finance principles, wood industry, Bosnia & Herzegovina, growth

1. Introduction

Internal potentials of firms' growth generally deserve particular research and practical focus. However, during implications of financial crises or similar negative external trends the effects of these potentials are considered more comprehensive. Corporate finance principles are among the most widely used internal growth potentials of the firms in various industries.

The combining use of the corporate finance principles generate particular performance growth effects, although their application is expected to reflect significant growth potential and return on investments.

Therefore, permanent research efforts are needed to evaluate the fundamental corporate finance principles use on growth of firms. In turn, if findings require determined reaction it is necessary to adapt the use of the fundamental corporate finance principles to specific firms, industries, times etc.

Although similar research is required in every industry of particular importance we focus the wood-processing. B & H is a country with relatively largest forests area and greatest diversity of forests types in the Western Balkans. The forests are significant natural resource in the country. Forests cover 63% of the total country surface, with the highest quality of wood. The wood industry is the only major manufacturing field with a multiple positive foreign trade balance.

In this paper we develop and examine three major hypotheses referring the wood processing industry in B&H:

H.1. Investing in advanced technologies does contribute to the growth of firms.

H.2. The financial structure and debt policy provide distinctive effects on the operating activities.

H.3. Dividend policy has no impact on the main growth performance of firms.

2. Theoretical Framework

According to (Damodaran, 2011), (Brealy, Myers, & Marcus, 2007), (Ross, Westerfield, Jaffe, & Jordan, 2010) and other sources, there are three fundamental corporate finance principles: the investment principle, the

financing principle, and the dividend principle. Investment principle is closely related to the firm investment portfolio able to provide business' goals in the long term. Thus, the ultimate effects of capital budgeting process combined with the activities that are carried out by applying the other two principles should provide the potential for long-term firms' growth.

Researches that have resulted in setting the traditional theory suggest that managers, acting in the best interests of owners, i.e. trying to maximize their wealth, undertake such projects to generate positive net present value. Accordingly, the traditional theory predicts a positive correlation between capital expenditures and future returns on the investment.

The Agency Theory, (Jensen & Meckling, 1976), suggests that agency costs may arise when managers and owners support conflicting interests. Sometimes managers conduct investment projects with dubious outcomes. Accordingly, the hypothesis of Agency Theory suggests not always positive correlation between capital expenditures and future returns. In addition to agency theory, Echevarria (Echevarria, 1998) emphasizes other factors that can lead to investment failures, such as unexpected changes in market conditions in the context of consumer preference changes, ultimately threatening the opportunities for growth.

The use of the financing principle refers to firms' financial structure optimization. It seems obvious that value and growth are not only determined by the investments itself. The combination of external and internal financial sources used plays special role too. While this seems simple, significant theoretical discussions have developed theoretical principles on whether the firms' capital structure does impact the growth. Distinctive theories, as a result of seminal papers in the domain of financing principle, are: Traditional theory of capital structure, Modigliani and Miller's Capital Structure Theories, The pecking orders theory etc.

By looking into theories, one may conclude that some are mutually exclusive in certain segments, while others are complementary and not surprisingly the extent and ways of their application depend on circumstances in which firms do businesses. Apart from that, the effectiveness of their application differs among the various fields of operation, firm size, property structure, internal performance etc.

Similar to previously described two corporate finance principles, researches across history have generated the different theories about dividend principle, such as: Theory of the Dividend Payment Preference, Dividend-Irrelevance Theory, Models of Tax and Clients' Effects, Dividends Clientele Models. Each theory explains the policy of earnings share between the owners and reinvestment purposes with specific factors determining that policy.

Contrary to the theoretical fundamentals, latest knowledge and best practices, some deviations from the application of the corporate finance principles even in sophisticated firms are recently identified. Innovative policies arise due to many motives in the domain of investments, financial structure or dividend payments, and even the lack of financial literacy of decision makers (Adomako, Danso, & Damoah, 2016) (Greenspan, 2002) (Drexler, Fischer, & Schoar, 2014).

3. Review of Previous Research

Theoretical affirmation of the corporate finance principles knowledge and understanding of the practical need to adapt these principles in different times and circumstances of business operations; have contributed to a significant number of researches in this area. Previous empirical results on the association between capital expenditures and corporate earnings as potential indicators for firm growth are not conclusive. On the one hand, researchers have documented a positive relation between capital expenditures and current corporate earnings (Callen, Livnat, & Rayan, 1998) (Lev & Thiagarajan, 1993). On the other hand, the association between current capital expenditures and future earnings is less conclusive.

In addition Kim (Kim, 2001) finds that "winner" firms exhibit positive while "loser" firms exhibit negative correlation between capital expenditures and future earnings. When "losers" are excluded from the sample, Kim finds that capital expenditures generally provide positive information about future earnings.

In attempts to extend knowledge of financial leverage, firm growth and financial strength some authors (Beia & Wijewardana, 2012) identify a positive rather than negative relationship between financial leverage and firm growth.

When considering the impact of the capital structure on the firm's growth, it is worth mentioning that the researchers (Antoni & Chinaemerem, 2012) examined the impact of capital structure on the financial performance of Nigerian firms over a period of 7 years, i.e. from 2004. to 2010. They have revealed that capital structure represented by the debt ratio has a significant negative impact on the firms' financial performance. This is in line with the conclusions of researchers (Soumadi & Hayajneh, 2012), who examined public firms.

On the other hand, the results of a similar study, (Ebaid- El-Said, 2009) in Egypt have indicated weak influence of the capital structure on the firms' financial performance while hypothesis of the positive impact of capital structure on firm performance could not be rejected in some other papers (Salehi & Moradi, 2015), (Fosu, 2013). Also, the results of a recent research about the impact of financial leverage on the firms' growth in Romania (Anton, 2016) undoubtedly point out importance of the integral approach to the principles of corporate finance.

Considering dividend principle, there are more researches which have been conducted for developed capital markets. Nevertheless, an interesting finding for the purpose of this overview is the case of non-listed firms on the African stock exchange in Cameroon. Django & Tsapi (Django & Tsapi, 2013) have investigated the determinants of dividend distribution for unlisted firms in Cameroon. They have revealed that shareholding concentration, the investment level and the total debt affect the frequency of dividend distribution negatively. At the same time, profitability plays a key role on dividend distribution.

In addition, exploring the dividend policy and performance of firms in 34 emerging market countries during 17 years, researchers (Abor & Bokpin, 2010) have revealed profitable firms significantly supporting higher dividend payout compared to those relatively well-developed firms supporting weak dividend payment policy. Furthermore, recent 20 year long research of the dividend policy determinants in Indian firms (Labhane & Mahakud, 2016), illuminates larger, more profitable, mature and high-solvency firms with higher dividend payments ratio, while those with higher investment opportunities, greater financial leverage and greater business risk exhibit lower dividends payout ratio.

Similar conclusions are drawn for dividend policies for firms in Greece (Patra, Poshakwale, & Ow-Yong, 2012), where the size, profitability and liquidity increase the likelihood of dividend payments, while investment opportunities, leverage and business risk reduce the probability of dividend payments. Finally, a comprehensive survey of 17.000 firms in 33 countries over the 20 years period (Fatemi & Bildik, 2012) examining patterns in dividend policy across the globe, have demonstrated a significant decrease in the firm's willingness to pay dividends.

When it comes to growth measures, Delmar (Delmar, 2007) emphasizes five-year, three-year and one-year periods as the most commonly used, depending on whether the goal is to examine growth opportunities in the short or long term. The choice of absolute or relative growth is especially important for the relationship between size and anything correlated with size and growth. Absolute measures are more frequently used for measuring the growth of smaller firms, while relative measures are used in case of larger ones. However, the most commonly used proportional growth measures are logarithmic values. By using logarithmic values, econometric results are less exposed to the problem of heteroskedasticity. In addition, the measurement of absolute measures can lead to different results, which is in line with other researches (Almus, 2002), (Stepherd & Wiklund, 2009).

Examining alternative proxies for firm's growth estimates Mamudar (Majmudar, 2013) points out two groups of empirical proxies used in econometric models: market measures and measures based on the financial statements. The author points out that market measures are only available for listed firms while measures based on the financial statements are very practical for unlisted firms.

The research results of growth determinants (Aggarwal, 2015) show the necessity to consider size, age, profitability, solvency, leverage and nature of industry. Anderson & Yoshihiro (Anderson & Yoshihiro, 2013) emphasize the importance of control variables, and when explaining firm's growth, they recommend use of firm's size, age and industry as control variables.

This brief overview of the researches presents more than a sufficient basis for consistent research of integral investment, financing structure and dividend policy impacts in various industries and specific times. In this regard, the text to follow should be considered as an attempt for a further contribution to this research field.

4. Methodology of the Empirical Research and Discussion of the Results

4.1 Sample and Data

This research was carried out by using data for a total of 431 firms in Bosnia and Herzegovina whose core business is wood-processing and which were operating permanently from 2008 till 2016. Data from the financial statements in both Entities in Bosnia and Herzegovina are provided by the Financial Information Agency (for Federacija Bosna i Hercegovina) and the Bottom of Form LRC BIS - Business Intelligence System (for Republika Srpska.)

Table 1. Number of firms by size and entity

SIZE	ENTITY		TOTAL
	FBiH	RS	
Small	190	177	367
Medium	22	35	57
Large	3	4	7
TOTAL	215	216	431

Note. Fib= Federacija Bosna i Hercegovina; RS= Republika Srpska.

The total number of observations is 1.433 due to logarithmic data use as they comprise only non-negative values of individual variables. Data are structured as a panel providing 9-year time-series for the same firms.

4.2 Description of the Variables

Considering the main purpose of this research, the dependent variable is firm growth whereas the key independent variables are the investments, financial leverage and dividend policy. Functional forms of variable indicators are logarithmic and ratios values. Namely, growth variable of firms (logarithmic value of sales revenue), investments variable (logarithmic value of fixed assets difference), variable of financial leverage (logarithmic value of total debt and ratio of indebtedness), dividend policy variable (logarithmic values of dividends paid). The choice of logarithmic values use is obvious as we cover firms of three different size types.

In addition to the abovementioned structural variables, the model also deploys several control variables. These are: current assets (represented by logarithmic values of current assets), profitability (separating firms that generated profit and those with a negative result), entity origin (to display differences between firms from two entities of Bosnia and Herzegovina), financial crises influence, as we have option to identify side effect of the financial crises, firm size, to identify differences in variations between three sizes categories (large, middle and small). The table below (Table 2) provides the summary of the variables descriptive statistics.

Table 2. Descriptive statistics for variables used in the regression model

Variable	Obs	Mean	Std. Dev.	Min	Max
LogINC	3. 608	12. 54204	2. 185961	1. 386294	17. 28267
LogFA	3. 776	11. 63386	2. 233333	. 6931472	16. 42772
LogTD	3. 715	11. 99468	1. 806081	2. 564949	17. 19261
IND	3. 719	14. 29827	95. 71989	0	1000
LogDiv	1. 627	9. 381254	3. 636415	0	16. 1057
LogCA	3. 732	12. 30076	1. 508058	0	17. 03258
PRFT	3. 879	. 7076566	. 4548979	0	1
FED	3. 879	. 4988399	. 5000631	0	1
FinCr	3. 879	. 4444444	. 4969681	0	1
MDDL	3. 879	. 1322506	. 3388067	0	1
LRG	3. 879	. 0162413	. 1264185	0	1

4.3 Econometric Model

The following equation contains related model specification structure.

$$\text{LogINC}_{it} = \beta_0 + \beta_1 * \text{LogFA}_{it} + \beta_2 * \text{LogTD}_{it} + \beta_3 * \text{IND}_{it} + \beta_4 * \text{LogDiv}_{it} + \beta_5 * \text{LogCA}_{it} + \beta_6 * \text{PRFT}_t + \beta_7 * \text{FED} + \beta_8 * \text{FinCr} + \beta_9 * \text{MDDL} + \beta_{10} * \text{LRG} + e_i + u_{it}. \quad (1)$$

LogFA: logarithmic values of fixed assets

LogTD: logarithmic values of total debts

IND: ratio of indebtedness

LogDiv: logarithmic value of dividends

LogCA: logarithmic value of current assets

PRFT: profitability

FED: Federation (Entity)

FinCr: financial crisis

MDDL: middle enterprises

LRG: large enterprises

i: number of observations

t: number of years from 2008 to 2016.

4.4 Model Estimations, Results and Quality

In order to proceed with the findings discussion we present some of the comments related to the model quality. Regarding the type of the panel regression model, Hausman test provides evidence against fixed effect model use. In addition, all interactions that relate critical variances of the model with size or entity-origin effect provide no evidence of significance. Corresponding F-test reveals that list of interactive variables is no relevant for the model. Therefore, only structural and control variables are applied in the model.

Model explains around 23,6% of the within variations, 53,5% of the between variations and almost 42,5% of the overall variations what turns out to be the model with significant explanatory power.

Table 4. Random effect model regression output

Random-effects GLS regression Group variable: ID R-sq: within = 0.2357 between = 0.5351 overall = 0.4245 corr(u_i, X) = 0 (assumed)			Number of orbs = 1.433 Number of groups = 393 Ops per group: min = 1 avg = 3.6 max = 8 Wald chi2(10) = 795.28 Prob > chi2 = 0.0000			
LogINC	Coef.	Std. Err	z	p>lzl	95% Conf. Interval	
LogFA	.2142854	.0254795	8.41	0.000	.1643464	.2642243
LogTD	.0490863	.0407047	1.21	0.228	(.0306935)	.1288661
IND	.0075948	.0011654	6.52	0.000	.0053107	.0098788
LogDiv	.0178879	.0136346	1.31	0.190	(.0088354)	.0446111
LogCA	.5754513	.0522497	11.01	0.000	.4730438	.6778587
PRFT	.8185909	.1276688	6.41	0.000	.5683647	1.068817
FED	.3816852	.122085	3.13	0.002	.1424029	.6209675
FinCr	(.260113)	.0852575	(3.05)	0.002	(.4272343)	(.0929917)
MDDL	.3215496	.1611537	2.00	0.064	.0056943	.637405
LRG	.4572564	.4090223	1.12	0.264	(.3444127)	1.258925
_cons	1.50019	.4804666	3.12	0.002	.558493	2.441888
sigma_u	.75413707					
sigma_e	1.4827648					
rho	.20551433 (fraction of variance due to u_i)					

Heteroscedasticity, as expected, is of no concern due to the data structure. When performing regression with robust standard error as general remedy for this assumption, regression output is pretty the same as the standard procedure. Also, no serial correlation has been identified with respect to residuals. The findings of the model exhibit reduced predictive power only, except for the influence of investments on income growth generation. This finding provides solid base for incentives policy. All parameters are linear while independent nature of the regressor's value is provided (data are structured as time-series). There is no perfect correlation between them (Table 3 below) while correlation between residuals and regressors close to zero.

Table 3. Correlation between independent variables

Variable	LogFA	LogTD	IND	LogDiv	LogCA	PRFT	Ent	FinCr	MDDL	LRG	Residual
LogFA	1.0000										
LogTD	0.5108	1.0000									
IND	(0.0917)	(0.0234)	1.0000								
LogDiv	0.1450	0.1352	0.0513	1.0000							
LogCA	0.4974	0.6496	(0.2003)	0.2233	1.0000						
PRFT	0.1609	0.1437	(0.0138)	0.0920	0.2579	1.0000					
Ent	0.0985	0.0965	(0.1495)	(0.3707)	0.0208	0.0495	1.0000				
FinCr	(0.0776)	(0.1182)	0.0569	(0.0688)	(0.0715)	0.0536	(0.0000)	1.0000			
MDDL	0.1731	0.1558	(0.0097)	0.1590	0.2613	0.1137	(0.0881)	0.0000	1.0000		
LRG	0.1449	0.1556	0.0218	0.1020	0.1617	0.0467	(0.0181)	(0.0000)	0.0502	1.0000	
Residual	0.0000	(0.0000)	(0.0000)	(0.0000)	0.0000	0.0000	0.0000	(0.0000)	0.0000	0.0000	1.0000

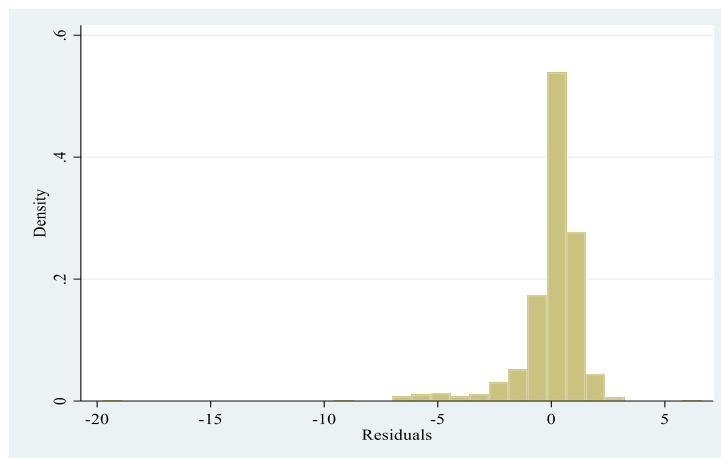


Figure 2. Residuals distribution

Zero mean, (almost) normally distributed residuals assumption is satisfied (obvious from the upper histogram), and normality distribution of structural regressors is clearly visible (Figure 3, 4, 5).

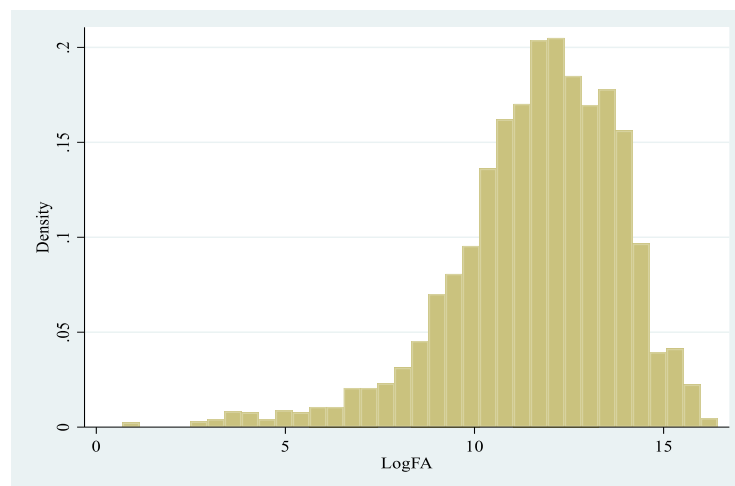


Figure 3. Logarithm values of Fixed Assets distribution

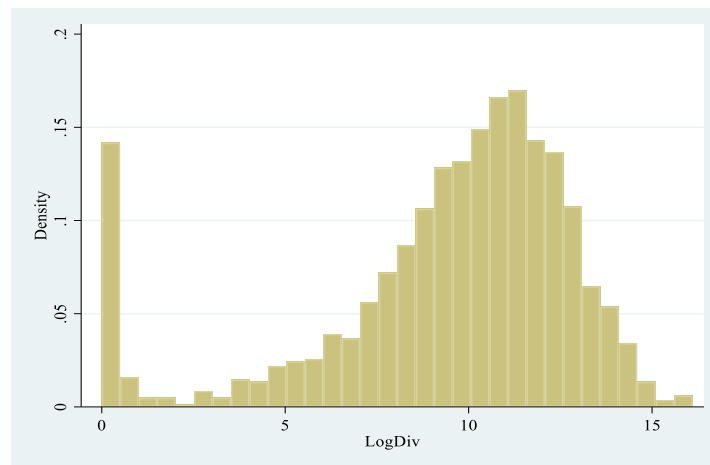


Figure 4. Logarithmic values of Dividends distribution

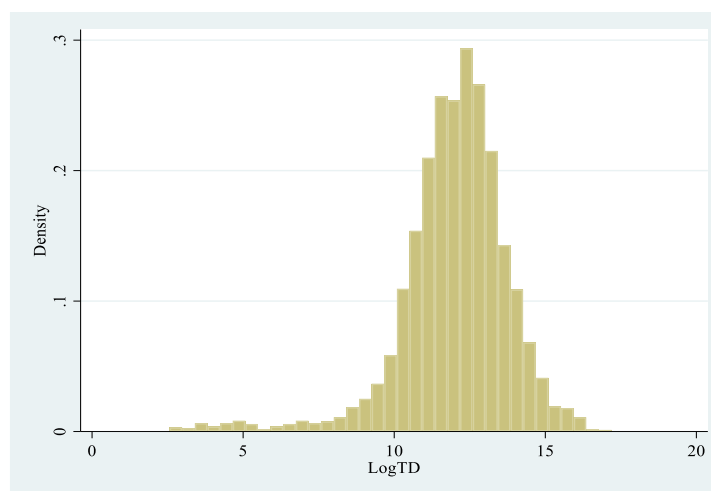


Figure 5. Logarithmic values of Total Debts distribution

Considering the main features of the regressors and residuals, linear regression model is the best possible estimate for this type of regression. Functional form with logs application proves to be the best concept of explanation referring to the variety of firms with respect to their size and entity origin.

4.6 Results Discussion and Practical Essence of Findings

Seven out of ten independent variables are set to be significant. Among the four variables of special interest, total debts and dividends are not influential on firm's income growth. This suggests that debts are used for purposes other than to developed projects, while dividend policy has no effect on the firms growth trends, i.e. distribution of profit is not related to the growth potentials tools.

In addition, the variable reflecting the financial crisis lasting provides evidence of certain effect of the crisis on firms under research. Furthermore, profitability in general affects the growth of sales income. This suggests a necessity for predetermined conditions in case of implementing investments incentives policy.

Middle size firms do have different impact on the sales growth compared to small ones while large firms perform the same sales growth pattern as small firms. The latter can be explained due to very small number of large firms exhibiting the same pattern compared to small ones. Both findings fit to the expectations of the influences and encourage the use of the findings that provide significant impact on the income growth of the wood processing industry in B&H.

Practical essence of the findings:

$$\begin{aligned} \text{LogINC}_{it} = & 1,5 + 0,214 * \text{LogFA}_{it} + 0,049 * \text{LogTD}_{it} + 0,0076 * \text{IND}_{it} + 0,018 * \text{LogDiv}_{it} + 0,575 * \\ & \text{LogCA}_{it} + 0,818 * \text{PRFT}_t + 0,381 * \text{FED} - 0,26 * \text{FinCr}_t + 0,321 * \text{MDDL} + 0,457 * \text{LRG} + e_i + u_{it}. \end{aligned} \quad (2)$$

Fixed assets and current assets increase have not only statistical but also essential impact on sales growth. The conclusion comes out from values associated to the respected regressors. Both finding deserve particular focus. The former suggests clear incentive policy to facilitate further growth while the latter provides not only evidence of the necessity to bring this variable under control but also its huge effect on the sales growth performance.

Although from the theoretical perspective total debts are expected to have impact on the firms growth, this finding reveals the use of debts in purposes other than those related to firm's growth.

The ratio of indebtedness although statistically significant is not that essential. Namely one unit point of this ratio, with other factors being unchanged, affects the income growth by only 0,76%. This corresponds to the latest finding on the total debts use affect. Dividend policy on its own is obviously not in use in respect of firm's value and other growth performances and it does not affect firm's sales income in any systemic and positive effect.

Profitable firms do generate huge impact on sales growth unlike those in the loss zone. This finding deserves particular attention of the decision makers when creating the investments incentive measures. Namely, profitability is to be set as a precondition to be satisfied in order to apply investment incentives policy program.

Furthermore, firms originated in Federacija Bosna i Hercegovina perform better than those in Republika Srpska. This finding justifies the application of the dummy variable suggesting entity origin of firms being examined.

Finally, years of the financial crises had a significant impact on wood processing firms in B&H. It affects the intercept variable negatively by almost 17%. It makes no sense to comment the intercept in this case while it shows what would be the log value of sales income in case when all variables are set to zero. However measuring it up by 17% and adding to other values does sound practically worth to be pointed out.

Taking into account the results of this research we cannot reject the first hypothesis. Therefore, investing in technologies and related assets contributes to firm's growth. It is necessary to implement investment incentives in order to facilitate further firm's income growth.

Hypothesis two is rejected. Financing structure, with an emphasis on borrowing policy, do not contribute to the operating activities growth. Education and trainings are needed to widespread awareness of the financial leverage potentials on firm growth.

Finally, hypothesis three is not rejected i.e. dividend policy has no impact on the main growth performance of the firm.

5. Conclusions and Recommendations

The findings of this research are very important and suggestive. The common impact of the investments into firm assets determines steady growth of the sales income. This finding justifies consequent investment incentive policy measures in the wood processing field in Bosnia & Herzegovina. Clear incentives policy for investments in wood industry assets is recommended.

Profitability affects the growth of sales income and therefore we suggest using this condition for implementing investments incentives policy.

Debts are used for purposes other than those related to the development projects. Attention should be focused on the proper education of the decision makers to understand how the leverage can be effectively used as a tool to prosper and what the consequences are when the external funding is misused or used for the short term purposes. Also, abovementioned investment incentives policy should account for reimbursement of debt costs incurred to finance fixed assets investments.

Dividend policy has no effect on the firm growth trends, i.e. distribution of profit is no under scrutiny of growth triggers potentials. This in turn reveals that firm's owners lack understanding of dividend policy role on firm value and growth performance. Attention should be focused on the proper education of the decision makers on how earnings reinvestment might impact firm's value and growth.

We recommend further researches by including more explanatory variables since the lack of some significant variables affecting the sales income is obvious for deepening the capacity of the existing model findings. Furthermore, inclusion of start-ups and firms with discontinued business history may strengthen the findings on

the way towards consistent incentives policy. To conclude, we believe that similar researches in other industries with potentials of added value creation deserve focus and findings to shape respective industry growth strategies.

References

- Abor, J., & Bokpin, G. (2010). Investment opportunities, corporate finance and dividend payout policy Evidence from emerging markets. *Studies in Economics and Finance*, 27(3), 180-194. <https://doi.org/10.1108/10867371011060018>
- Adomako, S., Danso, A., & Damoah, J. O. (2016). The moderating influence of financial literacy on the relationship between access to finance and firm growth in Ghana. *Venture capital*, 18(1), 43-61. <https://doi.org/10.1080/13691066.2015.1079952>
- Aggarwal, P. (2015). An Empirical Evidence of Measuring Growth Determinants of Indian Firms. *Journal of Applied Finance & Banking*, 5(2), 45-66.
- Almus, M. (2002). What characterizes a fast-growing firm? *Applied Economics*, 12, 1.497-1.508.
- Anderson, B. S., & Yoshihiro, E. (2013). The influence of firm age and intangible resources on the relationship between entrepreneurial orientation and firm growth among Japanese SMEs. *Journal of Business Venturing*, 28(3), 413-429. <https://doi.org/10.1016/j.jbusvent.2011.10.001>
- Anton, S. G. (2016). The impact of leverage on firm growth. Empirical evidence from Romanian listed firms. *Review of Economic & Business Studies*, 9(2), 147-158. <https://doi.org/10.1515/rebs-2016-0039>
- Antoni, O., & Chinaemerem, C. O. (2012). Impact of Capital Structure on the Financial Performance of Nigerian Firms. *Arabian Journal of Business and Management Review (OMAN Chapter)*, 43-61.
- Beia, Z., & Wijewardana, W. P. (2012). Financial leverage, firm growth and financial strength in the listed firms in Sri Lanka. *The 2012 International (spring) Conference on Asia Pacific Business Innovation & Technology Management, Procedia- Social and Behavioral Sciences*, (pp. 709-715).
- Brealy, R. A., Myers, S. C., & Marcus, A. J. (2007). *Osnove korporativnih finansija*. Zagreb: MATE d.o.o. Zagreb.
- Callen, J., Livnat, J., & Rayan, S. (1998). Capital expenditure: value-relevance and fourth-quarter effects. *The Journal of Financial Statement Analysis*, 13-24.
- Damodaran, A. (2011). *Applied Corporate Finance, 3rd Edition*. New York: John Wiley & Sons.
- Delmar, F. (2007). Measuring growth: Methodological considerations and empirical results. *Donckels, R. & A. Miettinen Entrepreneurship and SME Research: On its Way to the Next Millennium*, 199-216.
- Django, T. M., & Tsapi, V. (2013). Determinants of dividend distribution in Cameroonian firms. *African Journal of Business Management*, 7(7), 579-590.
- Drexler, A., Fischer, G., & Schoar, A. (2014). Keeping It Simple: Financial Literacy and Rules of Thumb. *American Economic Journal: Applied Economics*, 6(2), 1-11. <https://doi.org/10.1257/app.6.2.1>
- Ebaid- El-Said, I. (2009). The impact of capital-structure choice on firm performance: empirical evidence from Egypt. *The Journal of Risk Finance*, 10(5), 477-487. <https://doi.org/10.1108/15265940911001385>
- Echevarria, D. (1998). Capital investment and the profitability of fortune 500 industrials:1971-1990. *Studies in Economics and Finance*, 18(1), 3-35. <https://doi.org/10.1108/eb028740>
- Fatemi, A., & Bildik, R. (2012). Yes, dividends are disappearing: Worldwide evidence. *Journal of Banking & Finance*, 36(3), 662-667. <https://doi.org/10.1016/j.jbankfin.2011.10.008>
- Fosu, S. (2013). Capital structure , product market competition and firm performance: Evidence from South Africa. *The Quarterly Review of Economics and Finance*, 53, 140-151. <https://doi.org/10.1016/j.qref.2013.02.004>
- Greenspan, A. (2002). Financial Literacy:A Tool for Economic Progress. *The Futurist*, 36(4), 37-41.
- Jensen, M., & Meckling, W. (1976). Theory of the firm: Managerial behavior, agency costs and ownership structure. *Journal of Financial Economics*, 3(4), 305-306. [https://doi.org/10.1016/0304-405X\(76\)90026-X](https://doi.org/10.1016/0304-405X(76)90026-X)
- Kim, S. (2001). The near-term financial performance of capital expenditure: a managerial perspective. *Managerial Finance*, 27, 48-62. <https://doi.org/10.1108/03074350110767330>
- Labhane, N. B., & Mahakud, J. (2016). Determinants of Dividend Policy of Indian Firms: A Panel Data Analysis. *Paradigm, SAGE Publications*, 20(1), 36-55.

- Lev, B., & Thiagarajan, S. (1993). Fundamental information analysis. *Journal of Accounting Research*, 190-215. <https://doi.org/10.2307/2491270>
- Majmudar, R. (2013). Alternative Proxies for Estimating Firm Growth in Empirical Corporate Finance Literature: Evidence from Indian Manufacturing Sector. *MPRA Paper, University Library of Munich*.
- Patra, T., Poshakwale, S., & Ow-Yong, K. (2012). Determinants of corporate dividend policy in Greece. *Applied Financial Economics*, 22(13), 1079-1087. <https://doi.org/10.1080/09603107.2011.639734>
- Ross, S., Westerfield, R., Jaffe, J., & Jordan, B. (2010). *Corporate Finance: Core Principles and Applications 3rd Edition*. McGraw-Hill/Irwin.
- Salehi, K. A., & Moradi, M. (2015). The Effect Of Capital Structure and Product Market Competition on the Financial Performance among the Firms Listed in Teheran Stock Exchange. *European Online Journal of Natural and Social Sciences*, 4(1), 512-521.
- Soumadi, M. M., & Hayajneh, S. O. (2012). Capital structure and corporate performance empirical study on the public Jordanian shareholdings firms listed in the Amman stock market. *European Scientific Journal*, 8(22), 173-189.
- Stepherd, D., & Wiklund, J. (2009). Are we comparing apples with apples or apples with oranges? Appropriateness of knowledge acumulation across growth studies. *Entrepreneurship Theory and Practice*, 33(1), 105-103. <https://doi.org/10.1111/j.1540-6520.2008.00282.x>

Copyrights

Copyright for this article is retained by the author(s), with first publication rights granted to the journal.

This is an open-access article distributed under the terms and conditions of the Creative Commons Attribution license (<http://creativecommons.org/licenses/by/4.0/>).