



**International Journal of Biology, Pharmacy  
and Allied Sciences (IJBPAS)**

*'A Bridge Between Laboratory and Reader'*

[www.ijbpas.com](http://www.ijbpas.com)

---

**IDENTIFICATION AND ANALYSIS OF EFFECTIVE FACTORS ON  
UNDERDEVELOPMENT OF PROCESSING AND COMPLETE AGRICULTURAL  
INDUSTRIES (CASE STUDY: SHIRAZ)**

**MOHAMMAD MEHDI GHIASI<sup>1</sup>, SEYYED NEMAT MOUSAVI<sup>2\*</sup>**

1- Department of Agricultural development, Marvdasht Branch, Islamic Azad University, Marvdasht, Iran

2- Department of Agricultural development, Marvdasht Branch, Islamic Azad University, Marvdasht, Iran

**\*Corresponding Author: E Mail: [mousavi\\_sn@yahoo.com](mailto:mousavi_sn@yahoo.com)**

**ABSTRACT**

Food processing industry is one of the most important sections of industry in all countries which is related to food safety. In the recent years, due to working under their expected and nominal capacity, many costs have been imposed on these industries. In the respect of reducing losses of agricultural products processing and complementary industries have a crucial role and impact on the increase of added value, increase of efficiency of agricultural section, creation of sustainable occupation, helping the nonoil exportation to increase, achieving food safety and generally sustainable development of agricultural section. The present study was done with the purpose of identifying and analyzing the effective factors on the underdevelopment of processing and complementary industries in the city of Shiraz. The research is applied and in order to achieve this purpose, the Logit model has been used. The results of the study showed that the rate of government's support of production of the factory and lending low-interest loans is considered to be one of the most important priorities in the respect of creating and developing processing and complementary industries in terms of the owners of processing industries. Also the research findings showed that variables of shortage of providing packaging tools, type of ownership and difficult conditions of loan payment, age, flowing capital and old equipments, taxes and subsidies, highness of the final costs and high-interest paid loans have been significant in percentage.

**Keywords: Agricultural Development, Processing and Complementary industries, Logit Model, Shiraz City**

---

**INTRODUCTION**

Nowadays, keeping the general benefits, stockholder equities benefits, advancing transparency data and requirement companies to perform social responsible is the most important ideals that are considered about companies. Ownership system can effect on type of earnings management, so selecting suitable ownership system can be effective on increasing company's profitability. Desired ownership system caused companies use of their benefits effectively, considered profits of owners and societies that are active on them, they should be responsive to other companies, attract confidence of investors and also obtained caused of long term investments.

According to importance of regulatory mechanisms and quality of financial reporting for creditors and stock buyers of companies for the purpose of deciding financing and stock buyers as regards to shareholders will not have any direct supervision on the company managing so it fears that provided credits spends for personal interest or effectively don't spend for serving the interests of shareholder (as increasing shareholders wealth). Investors to gain confidence in investing in the future, tend to have more reliable information (Duc Hong Vo and Van Thanh-Yen, 2014). On the

other hand, inappropriate ownership system caused losses of company and finally destroyed the company. For this reason doing practical researches about effect of ownership system on financial leverage and stock dividend policy that are listed in stock exchange can obtain this possibility to use of suitable ownership system for increasing profits. It seems that suitable ownership system can guarantee the life of company in long time by prevention of corruption and increasing of benefit, support of stockholder equities benefits in front of managers' companies and prevent of undesirable transference of wealth between difference groups and right violation of minority shareholders. The interest of managers to applying profit management and misuse of it as a result presenting wrong information to shareholders damage the trust shareholders and harmed thousands of shareholders and escaped them from stock market.

**Review of the Related Literature**

Previous research showed the effect of ownership system kind on the financial leverage and policy sharing benefits of companies. Naceur et al(2006) conveyed on the sharing profit policy and effective factors on the stock exchange in Tunisia. The findings of present study show that

profitability and its consistency directly and stock market liquidity and its size indirectly affected on interest sharing paid. Cheung and Kim(2009) studied on the relation between corporate governance and liquidity tools and got to this result that good government, financial and operational performance, increase capital structure and liquidity, so decrease information asymmetry between domestic and foreign investment.

Duc Hong Vo and Van Thanh-Yen (2014) in their researches found that ownership management had negative effect on the penetrating power. These findings support theory of enterprise, this subject shows that a negative relation is between penetrating power and stock profit, on the basis of these researches ownership management has positive effect on the stock benefit. Marrakchi and et al. (2001) found that there is negative relation between independence of the Board and earnings management level. Also their researches show in those companies which manager director is chairman of the board, increased possibility of accusation to corruption of accepted accounting principles. Kumar (2003) conveyed on the relation of ownership system and benefit sharing policy on Indian companies. There is no evidence for significant relationship between external

ownership and dividend policy. Stouraitis and Wu (2004) conveyed on the effect of ownership system on the sharing benefit of Japanese companies. The findings from regression for data between 1992 to 2000 said that effect of managerial and bank ownership on the benefit sharing specially for low growing companies is positive. Guo and Ni(2008) find these results in their researches that more return on equity and institutional ownership stock more benefit. Moreover, there is no significant relationship between composition of the board and sharing benefit policy. Harada and Nguyen(2006) conveyed on the effect of the ownership system on the sharing benefit policy of Japanese companies. The findings show that there is an inverse relation between ownership concentration and dividend payout.

### **The Agency Theory**

According to agency model that introduced by Jensen and Meclin, companies are exposed to agency conflict. These conflicts exist by separation of ownership and management. In such an environment, managers instead of maximizing equity of the shareholders, they have motivation for using of accidental extra incomes. The agency theory proposed some mechanisms for decreasing the agency problem. Three of them are related to this study. The first

mechanism which was proposed by Jensen and Meclin is the increased of ownership managers in company. On the basis of this mechanism managers have to be responsible for their activities. As a result ownership managerial can be used instead of ownership mechanism in aligning manager benefit and external shareholders benefit. Sundaramurthy and Lewis (2003) also enforced on the role of ownership managerial on the controlling opportunism management in company. Moreover, Vo and Phan (2013) found that increasing of ownership managerial developed operation of company in the Vietnam. But when managers keep significant share of net assets of company, increasing in ownership may prevent of substituting or punishing them because of incorrect decision, and it caused to manager formation (Duc Hong Vo and Van Thanh-Yen, 2014). When this formation formed, managers may use of more capital or retained earnings for decreasing risky investment opportunities in companies (Morck, Shleifer, & Vishny, 1988).

The second mechanism is reducing the agency cost, enforcing company to use Financing through leverage or loan (Rozeff, 1982; Easterbroke, 1984; Jensen, 1986). Increasing of loan ends to loss job and bankruptcy of company that encourage most

of managers to use of cash flow efficiently and decrease non continuous incomes. Moreover by high loan managers are under pressure for investment on the profitable project to create cash flow for periodic payment of profit and basic asset.

The third mechanism is increasing more dividend .Rozeff(1982) and Easterbroke(1984) found that cash payment of dividends can be used as an internal mechanism for decreasing representation cost. Paying more dividends, decrease this luck that shares resulting from external fund should increase for current and future financial fund. When company issued new notes payable, managers be controlled by capital market (Emery and Finerty, 1997). This controlling caused managers act to interests of shareholders.

### **Ownership Structure**

Ownership structure is effective on the managers' tendency on the selecting type of earnings management; also desired ownership system can increase companies' productivity and increase the stock price. For maximizing profit, companies should make suitable decision about kind of ownership system and benefit managing. Managers should consider one of the effective earnings management as the basic strategy due to the ownership structure. For this reason conduct

applied research about the effect of assets management system on the sharing benefit policy in accepted companies can prepare some condition for maximizing benefits by using suitable ownership structure. Different ownership structures as corporative, external, characteristic and managerial have pros and cons.

Among this looks that ownership managerial can guarantee in long time more of something by increasing benefit. But there is always a question: can ownership managerial structure defense of shareholders' benefits and prevent of undesirable transmission between different groups and violation of the rights of shareholders? (Duc Hong Vo and Van Thanh-Yen, 2014).

### **Concentration of Ownership and Earnings Management**

We can convey the relation between concentration of ownership and sharing benefit ownership from two viewpoints. The first viewpoint is that companies have low number and percentage of shareholders they don't have desired for distribution of profit distribution because by considering representation cost by increasing distribution of ownership and external shareholders percent increase the desired cash dividends of shareholders (Jahankhani and Qorbani,

2005). Moreover in the companies with high concentration of ownership there is no need for improving financial discipline or convergence of interests between managers and shareholders because in absence of agency conflicts shareholders have enough confidence that it is used of cash flow of company correctly. So, it is expected that distribute lower income and as a result the relation between concentration ownership and sharing benefit be indirectly (Harada and Negvin, 2006). The findings of Jensen(2003) and Harada and Negvin(2006) also confirmed this viewpoint. In the second viewpoint argument that paying sharing benefit is a substitute for supervision (Rosef, 1982). In the other hands, great shareholders (centralized companies) have enough power for enforcing companies to distributing extra cash flow for decreasing agency costs. On this basis, it is expected the relation between ownership concentration and prof sharing be in same direction (Harada and Negvin, 2006).

### **Study of the Relationship between Managerial Ownership and Earnings Management**

In general there are two viewpoints about effect of ownership managerial on the sharing benefit. In the first viewpoint argument that decreasing sharing benefit

decrease the problems of Agency and the conflict of free cash flow, because payment to shareholders decrease the source control management (Jensen, 1986). Managers by considering this subject that they considered as internal financiers and exist in the company are desired do not share benefits and keep their control on the distributional cash (Karami and et al., 2010). So, expected there be an indirect relation between the property management and sharing benefit. The second viewpoint argument that may property management be effective on convergence of interest between manager and shareholders and decrease of cash flow problems. Rozeff (1982) studied on the effect of growth factors, Beta coefficient and Agency cost on the benefit sharing system. The findings of study by using of regression says that benefit sharing policy (Dividend payout ratio) have meaningful and negative relation with past and future sales growth rate, Beta coefficient and percent of people in the organization's shares owned (ownership managerial) and have positive relation and meaningful by numbers of shareholders. The findings of study suggest that the level of internal ownership (managerial) is difference between companies and companies by high internal ownership, selected low debt level and share benefit. Moreover, impacts

profitability, growth and financial expenses on debt policy and benefit sharing support adjusted hierarchical model.

Stouraitis and Wu (2004) conveyed on the effect of ownership system on the benefit sharing of Japanese companies. The findings of regression for data from 1992 to 2000 suggest that the effect of managerial ownership and bank ownership are positive on dividend yield.

### **The composition of the Board of Directors and Management**

The board of directors is consisting of executive and non-executive managers. For having good efficient board of direction at least third of it should be non-executive manager. Unbound members, professional managers are expert on decision controlling. Their duty is acts with serious problem agency between bound members and shareholders as condition of executive managers' rewards and observing for substituting senior managers. Moreover the findings suggest that non-executive members support better of shareholders benefits and are better representative for them. On this basis, independent members control the problem of representation and decrease asymmetry of information between manager and shareholders by better and more quality reporting. Lim and et al. (2007) believed that

by entering non-executive members to the board of direction decrease the observation on managers' performance. The findings of Ajinka's study (2005) confirmed this claim. At the absence of other monitoring tools they use of benefit sharing policy for controlling on the representation problem. If non-executive members have effective controlling role, independence of board independence and dividend policy act as substitution tools. Against, if the controlling of non-executive members be inadequate, it may share more benefit for improving management oversight (Abdelsalam and et al., 2008).

Executive managers have internal information of company and when there is no external manager for controlling on their activities, they can use of this condition and for transferring cost to themselves. In the companies that have high percent of independent managers in the board of director system, the possibility of fake is so little (Klein, 2002). Independent of the board of director indirectly is related to abnormal commitment items. The possibility of benefit management is little in the companies which their board of director is consist of independent external managers and also have managers by organizational experience. The result of studies show that there is negative meaningful relation between increasing

benefit commitment items and ratio of external board of director members.

Phillippon (2004) studied on the relation between motivation of managers and benefit management. He used of optional commitment items as earnings management index. His results show in years that increase the numbers of commitment items managers' sale their assets for getting to desired benefit level.

#### **METHODOLOGY**

According to the main objective of this research, that is to examine the performance of managerial ownership system. To do so, the following hypothesis are tested:

1. There is a significant relationship between managerial ownership and stock dividend.
2. There is a significant relationship between managerial ownership and financial leverage.
3. There is a significant relationship between managerial ownership and free cash flow.
4. There is a significant relationship between managerial ownership and sales growth.
5. There is a significant relationship between managerial ownership and size of company.

The statistical population contains all listed companies in Tehran Stock Exchange during 2009 to 2014 with the following conditions:

- 1) Companies that they have been listed in Tehran stock exchange during 2009-2014.
- 2) Stop transactions of the companies haven't been more than 3 months over the period.
- 3) The traded stocks have not been included banks, financial institutions, investment companies, holding, leasing companies and financial Intermediaries in Tehran Stock Exchange over these periods.

With respect to above limitations, the number of Sample companies is to be 120 companies. The data are collected by Rahavard Novin and Tadbir pardaz software. Excel and Eviews7softwares have been used to estimate the descriptive statistics and statistical analysis. Finally Chaw and Hausman tests have been used for research models estimation. Hausman test strongly rejects the null hypothesis that the coefficients estimated by the efficient random effects test is the same as those estimated by the consistent fixed effects test

Panel data method is used in this paper. Panel data is a method that on the basis of it in an econometric test there are two cross-sectional and time-series aside together and increase

observed points and as a result estimate efficient compilation model.

The model of research generalized as follow:

$$MGO_{i,t} = \alpha_0 + \alpha_1 LEV_{i,t} + \alpha_2 DIVR_{i,t} + \alpha_3 FCF_{i,t} + \alpha_4 GRO_{i,t} + \alpha_5 SIZE_{i,t} + \varepsilon_{i,t}$$

Variables of this model are studied as follows:

- a. Dependent variables:

MGO: managerial ownership is computed by the ratio numbers of shares in authority of managers and the board of director to total of outstanding shares.

- b. Independent variables:

FCF: free cash flow is computed as follows:

(Total assets) (Expenditures - changes in working capital- depreciation + EBIT (1-tax rate)

LIQ: liquidity is ratio of current assets to the current debts

GRO: The sales growth rate is the difference of sales of current year and last year divide by sales of last

SIZE: natural logarithm of total assets

LEV: financial leverage ratio of book value of total debt to book value of total asset

DIVR: dividend paid out

Summary of characteristic related to the variables are in table (1), the reported

statistics are consist of Average, mean, maximum, minimum, range and standard deviation:

Table 1 represents descriptive statistics from used data in the research. Data model proposed for 600 data year. According to data are Winsorzed in the one percent level, it means that deleted data more than 99% and lower than 1% and instead of them 1% and

99% data are repeated. Outlier effect is partially controlled.

Represented model is related to assets management or the amount of share in authority of the board director. At the first for specifying suitable method to estimate we use of Chaw and Housman test.

Based on the Table 2, the amount of P-Value chow test (fixed effect) was zero and as the result failed data estimated method.

**Table 1: summary of descriptive statistics model**

Variable s	Mean	Median	Kurtosis	Maximu m	Minimum	Std. Dev.	Skewness	Observatio ns
MGO	60.3081	68.5800	2.77039	99.5130	0.000000	27.1521	-0.91443	600
DIVR	-0.09281	-0.03443	357.682	6.78E-06	-6.047461	0.27718	-16.9848	600
FCF	432157.	57314.00	45.52600	16701986	-2499452	17.42464	6.175823	600
GRO	1.398563	0.159044	122.3729	164.8458	-0.989768	13.19960	10.95881	600
LEV	3.690999	0.657007	397.6987	767.5493	0.002184	34.67106	18.64749	600
SIZE	13.41826	13.40801	6.042292	18.54509	4.955827	1.601364	-0.074691	600

**Table 2: results of fixed effect test (chow test)**

Effects Test	Statistic	Prob
Cross-section F	9.638310	0.0000
Cross-section Chi-square	736.845059	0.0000

**Table 3: results of random effect test (Hausman test)**

Test Summary	Statistic	Prob
Cross-section random	11.545872	0.0031

Also, the amount of P-value in Hausman test obtained to 0.0031 that in order that estimate of fixed effect for model is more suitable.

**Table 4: Results of managerial ownership model**

Variables	Coefficiente stimate	T value	P value
DIVR	-0.452570	-3.339852	0.0000
LEV	-0.452570	-0.712142	0.4767
FCF	-0.011078	-1.799732	0.0725
GROWTH	0.029313	3.078439	0.0022
SIZE	1.228788	6.040895	0.0000
C	43.53242	15.96871	0.0000
R <sup>2</sup>	0.796993	-	-
	0.796208	-	-
D.W	1.754799	-	-
F. Statistic	1269.958	-	0.0000

The coefficient of determination ( $R^2$ ) is equal to 79%. This coefficient shows 79% of dependent variable changes are explained by independent variables. Statistic amount is Watson camera 1.75 that is used for preventing autocorrelation of variance anisotropy in the estimating PCSE in Eviews. Related possibility to F statistic that is proposed in table 4 show that model is significant at the level of confidence. At the whole reached results of this model confirmed number one hypothesis.

Studying of the results from asset management estimation shows stock dividend has negatively significant effect on asset management. In other words, we can explicit in companies that majority of shares ownership are in authority of their manager there is no interest on paying the dividend, but they prefer to invest the amount in future.

There is no significant relationship between leverage and managerial ownership this variable. Free cash flow has negatively significant relation with assets management at 93% level. The sales growth has positively significant effect on assets management. Also the size of company has positively significant effect on assets management. The findings show that in big companies, managers have more tendencies for shares

authority. It is expected, positive coefficient of free cash flow (FCF) variable be compatible by this hypothesis that increase free cash flow create assets management for controlling brokerage fees.

Regarding the table (4), the results are as followed:

1. There is a negatively significant relationship between assets management and stock dividend.
2. There is no significant relation between property management and financial leverage.
3. There is positively significant relationship between assets management and the free cash flow.
4. There is positively significant relationship between assets management and the growth of sale.
5. There is positively significant relationship between assets management and size of company.

## RESULTS

Results of this research indicate that the relationship between assets management and dividend payout is negative. These findings confirm that managers that have higher stocks are desired to have retained earnings to invest instead of paying out the dividend. Also the sales growth and free cash flow has positive effect on assets management. These

results confirm that managers desired to increase their property for controlling effective incomes on the company's financial policy. Positive effect of considered size variable (SIZE) on assets managers shows that managers are willing to increase their ownership percent in the companies.

#### REFERENCES

- Abdelsalam, O, EL-Masry, A. and Elsegini, S. (2008).** Board Composition, Ownership structure and dividend policies in an emerging Market. *Journal of Managerial Finance*.
- Ajinkya, B; Bhojraj ,S, and Sengupta, P. (2005).** "The association between outside directors, Institutional investors and the properties of management earning forecast", *Journal of Accounting Research*.
- Bathala, C. T., Moon, K. P., and Rao, R. P.(1994).** "Managerial ownership, debt policy, and the impact of institutional holdings: An agency perspective", *Financial Management*.
- Cheung, J. K., Kim, J. B. and Leey,J.(1999)**"The Impact of Institutional Characteristics on Return-Earnings Associations in Japan." *The International Journal of Accounting*.
- Duc Hong, Vo and Van Thanh-Yen, Nguyen (2014),**"Managerial Ownership, Leverage and Dividend Policies: Empirical Evidence from Vietnam's Listed Firms". *International Journal of Economics and Finance*.
- Easterbroke, F.(1984).**"Two agency-cost explanations of dividend", *American Economic Review*, 74(4), 650–659.
- Emery, D. R., and Finnerty, J. D.(1997).**"Corporate Financial Management", Prentice Hall Inc.
- Guo, W, and Ni, J.(2008).**Institutional Ownership and Firm's Dividend Policy, *Corporate Ownership & Control*. Vol. 5, No. 2, pp. 128-136.
- Harada, Nguyen (2003).**"Ownership Concentration, Agency Conflicts and Dividend Policy in Japan". *Journal of Finance*. pp. 55,1–33.
- Jahankhani, ali, Ghorba, saeid(2006),**"Identify and explain the determinants of dividend policy of the companies listed in Tehran Stock Exchange". *Journal of Financial Research*. PP.20, 27-44.
- Jensen, M. C. (1986).**"Agency Costs of Free Cash Flow, Corporate Finance and Takeovers", *The American Economic Review*, 76(2), 323–329.
- Karimi, Farzad, Akhlaghi, Hasanali, Rezaemehr, Fatemeh(2010),**"The effect of financial leverage and growth opportunities for the

- company on the investment decision of firms Tehran Stock Exchange", *Journal of financial accounting*, PP. 8(2), 60-74.
- Klein, A. (2002).** "Audit committee, board of director characteristic, and earnings management", *Journal of Accounting and Economics*, vol. 33, pp. 375-400.
- Kumar, J. (2004).** "Agency Theory and Firm Value in India." [http://papers.ssrn.com/sol3/papers.cfm?abstract\\_id=501802](http://papers.ssrn.com/sol3/papers.cfm?abstract_id=501802). [Online]
- Lange, H. P. and Sharpe, I. G.(1995).** Monitoring Costs and Ownership Concentration: Australian Evidence. *Applied Financial Economics*.
- Leland, Hayne E. and Pyle, David H. (1977),** " Informational Asymmetries, Financial Structure, and Financial Intermediation", *The Journal of Finance* Vol. 32, No. 2, pp. 371-387.
- Lim, S; Matolcsy, Z, and Chow, D.(2007).** "The association between board composition and different types of voluntary disclosure." *European Accounting Review*. Vol.16, No.3, pp.555-583.
- Marrakchi, chtourou, Bedard, Jean and Courteau, Lucie,( 2001).** "corporate Governance and Earnings Management", Available at SSRN:<http://ssrn.com/abstract=275053>.
- Morck, Randall, Shleifer, Andrei, Vishny, Robert(1988),** Management Ownership and Market Valuation, an Empirical Analysis, *Journal of Financial Economics*, 20, pp, 293-315.
- Phillippon, T.(2004).** "CEO Incentives and Earnings Management", working paper.
- Naceur, S; Goaid, M, and Belanes.A.(2006).** On the Determinants and Dynamics of Dividend Policy. *International Review of Finance*.
- Rezaee, Ebrahim, Ege, Dilhan(2010),** " STOCK MARKET INTEGRATION IN THE EMERGING MARKETS: SOME EMPIRICAL EVIDENCE", *Journal of Applied Research in Finance*, PP.39-50.
- Rozeff, M. S. (1982).** Growth, beta and agency costs as determinants of dividend payout ratios. *The Journal of Financial Research*, 5(3), 249–259.
- Stouraitis, A, and Wu, L. (2004).** The Impact of Ownership Structure on the Dividend Policy of Japanese Firms with Free Cash Flow Problem. Working paper. [Online].
- Sundaramurthy, C., and Lewis, M.(2003),** "Control and collaboration: Paradoxes of governance.", *Academy of Management Review*, 28(3), 397–415