INTERNATIONAL UNIVERSITY LIAISON INDONESIA

Assignment Letter / *Surat Tugas*

No. AL/Rec/0050.1/I/2021 **Date/Rev.** 30 January 2021 / 00
Doc Type. Main Document **Page** 1 of 2

Dr. Samuel PD Anantadjaya, B.Sc., MBA, MM

Assignment of Academic Task at
INTERNATIONAL UNIVERSITY LIAISON INDONESIA

Penugasan Akademik Pada
UNIVERSITAS LINTAS INTERNASIONAL INDONESIA

Vice Rector for Academic Affairs of International University Liaison Indonesia

Wakil Rektor bidang Akademik Universitas Lintas Internasional Indonesia

In consideration of:

His appointment as the Vice Rector for Academic Affairs of International University Liaison Indonesia under agreement No. SK/Y-IULI/0544/II/2021

Mengingat:

Pengangkatannya sebagai Wakil Rektor Bidang Akademik Universitas Lintas Internasional Indonesia dibawah perjanjian No. SK/Y-IULI/0544/II/2021

Herewith gives the task to:

Dengan ini menugaskan kepada:

Name: **Dr. Samuel PD Anantadjaya, B.Sc., MBA, MM**

Position: **Dean**

Nama: ***Dr. Samuel PD Anantadjaya, B.Sc., MBA, MM***

Jabatan: ***Dekan***

To participate on the following activity including its preparation :

Untuk berpartisipasi dalam kegiatan berikut ini termasuk persiapan :

No	Task/ *Tugas*	Organizer/ *Penyelenggara*	Period/ *Periode*	Detail/ Detil	SKS Equivalent/ *Setara*
1	Review Article with the title: Stakeholder Relationship Capability and Investment Efficiency: A Mozaic Theory Test	Journal: Measuring Business Excellence Publisher: Emerald Publishing ISSN # 1368-3097 Article # MBE-01-2021-0009 Index: Scopus & Web of Science (WoS)	Jan 30 – Mar 14 2021	Invited by: Dr. Jos Van Iwaarden (josvaniwaarden.mbe@gmail.com)	1 SKS

This appointed shall accomplish the task in responsible ways in line with the related guidelines and other regulations valid in IULI.

Pihak yang bersangkutan harus melaksanakan tugas dan tanggung jawab sebaik-baiknya sesuai dengan petunjuk dan peraturan dari IULI.

Assignor/*Pemberi Tugas:*

Tutun Nugraha, BASc., MASc., Ph.D.
Vice Rector / *Wakil Rektor*

Organizer's Signature & Chop/Tanda tangan dan Stempel Penyelenggara:

conducted online. Please refer to the attachments

PO Box 150, BSD CPA 15330
Tel. +62 852 12318000
info@iuli.ac.id
www.iuli.ac.id

IULI – Eco Campus, The Breeze
Jl. BSD Grand Boulevard
BSD City 15345
Island of Java

Gmail

S A M <ethan.eryn@gmail.com>

Invitation to Review for the Measuring Business Excellence

1 message

Measuring Business Excellence <onbehalfof@manuscriptcentral.com> Sat, Jan 30, 2021 at 5:13 AM
Reply-To: josvaniwaarden.MBE@gmail.com
To: ethan.eryn@gmail.com, keeshondenkeeshonden@yahoo.com

29-Jan-2021

Dear Dr. Anantadjaya,

Manuscript ID MBE-01-2021-0009 entitled "Stakeholder Relationship Capability and Investment Efficiency: A Mosaic Theory Test" has been submitted to the Measuring Business Excellence.

I invite you to review this manuscript. The abstract appears at the end of this letter. Please let me know as soon as possible if you will be able to accept my invitation to review. If you are unable to review at this time, I would appreciate you recommending another expert reviewer. Please click the appropriate link below to automatically register your reply with our online manuscript submission and review system.

*** PLEASE NOTE: This is a two-step process. After clicking on the link, you will be directed to a webpage to confirm. ***

Agreed: https://mc.manuscriptcentral.com/mbex?URL_MASK=9813537212b24aa78081d6512d5e33d9

Declined: https://mc.manuscriptcentral.com/mbex?URL_MASK=67c2a7ba20894072bec772c288f2e420

Unavailable: https://mc.manuscriptcentral.com/mbex?URL_MASK=0ecf06fe3aba4ccbab26935d3d24a1c8

Once you accept my invitation to review this manuscript, you will be notified via e-mail about how to access Manuscript Central, our online manuscript submission and review system. You will then have access to the manuscript and reviewer instructions in your Reviewer Centre.

I realize that our expert reviewers greatly contribute to the high standards of the Journal, and I thank you for your present and/or future participation.

As an extra thank you all completed reviews will now receive complimentary access to Measuring Business Excellence.

Reviewer Resources are available here: http://www.emeraldgrouppublishing.com/reviewers/index.htm

Yours sincerely
Dr. Jos Van Iwaarden
Editor, Measuring Business Excellence
josvaniwaarden.MBE@gmail.com

MANUSCRIPT DETAILS

TITLE: Stakeholder Relationship Capability and Investment Efficiency: A Mosaic Theory Test

ABSTRACT:
Considering the constraints on resources and the need for firms' planning to avoid recession and underdevelopment, enhanced investment efficiency would promote the capital market attractiveness and increase the performance of capital market investment. Empowering these markets through investment efficiency requires to promote the flow of information disclosure to stakeholders in order to provide the greater coherence and integration of information, enhance equal decision-making capabilities, and promote trust and confidence in the company. The present study aimed to examine the impact of stakeholder relationship capability on investment efficiency through testing the mosaic theory.
: In this study, two criteria (namely the ratio of net fixed assets to total assets and investment level) were used in order to measure investment efficiency. Furthermore, meta-synthesis and Delphi analyses were adopted based on a 5-point Likert scale to measure the development of stakeholder relationship capability. To collect the research data, the questionnaires were sent to 142 companies in 2019, of which 112 questionnaires were returned by the managers of the firms listed in Tehran Stock Exchange. To fit and test the research hypothesis was used partial least squares analysis.

After confirming the fit of the model, the results revealed that the stakeholder relationship capability had a positive and significant effect on investment efficiency.
With regard to the Mosaic theory, this finding confirms that the equity of information in reflecting news and knowledge among stakeholders can promote the role of the firm's stakeholder relationship capability, thus enhancing the investment efficiency.

emerald PUBLISHING

Measuring Business Exce

Stakeholder Relationship Capability and Investment Efficiency: A Mosaic Theory Test

Journal:	*Measuring Business Excellence*
Manuscript ID	MBE-01-2021-0009
Manuscript Type:	Research Paper
Keywords:	Stakeholder relationship capability, Investment efficiency, Mosaic theory

invited by Dr. Jos Van Iwaarden, Editor, Measuring Business Excellence
Email: josvaniwaarden.MBE@gmail.com
ISSN # 1368-3097
indexing: Scopus & Web of Science

Stakeholder Relationship Capability and Investment Efficiency: A Mosaic Theory Test

Abstract

Purpose: Considering the constraints on resources and the need for firms' planning to avoid recession and underdevelopment, enhanced investment efficiency would promote the capital market attractiveness and increase the performance of capital market investment. Empowering these markets through investment efficiency requires to promote the flow of information disclosure to stakeholders in order to provide the greater coherence and integration of information, enhance equal decision-making capabilities, and promote trust and confidence in the company.
Design/methodology/approach: The present study aimed to examine the impact of stakeholder relationship capability on investment efficiency through testing the mosaic theory. In this study, two criteria (namely the ratio of net fixed assets to total assets and investment level) were used in order to measure investment efficiency. Furthermore, meta-synthesis and Delphi analyses were adopted based on a 5-point Likert scale to measure the development of stakeholder relationship capability. To collect the research data, the questionnaires were sent to 142 companies in 2019, of which 112 questionnaires were returned by the managers of the firms listed in Tehran Stock Exchange. To fit and test the research hypothesis was used partial least squares analysis.
Findings: After confirming the fit of the model, the results revealed that the stakeholder relationship capability had a positive and significant effect on investment efficiency.
Originality/value: With regard to the Mosaic theory, this finding confirms that the equity of information in reflecting news and knowledge among stakeholders can promote the role of the firm's stakeholder relationship capability, thus enhancing the investment efficiency.

Keywords: Stakeholder relationship capability, Investment efficiency, Mosaic theory

1. Introduction

From the perspective of analysts and investors, one of the major pillar of capital market sustainability is the capability of investment efficiency in firms, indicating how much they have the capability to attract cash resources to finance investment projects and to what extent the project has the returns needed to gain investors' trust in this project. This is because one of the main roles of accounting is the efficient allocation of capital and consequently increasing the investment efficiency (Kothari et al., 2010). Unsurprisingly, the relevant literature focuses on the role of accounting in capital allocation decisions (Goodman et al., 2014; McNichols & Stubben, 2008). Theoretically, these accounting approaches indicate that the firms continuously invest in projects with a positive net present value as long as the ultimate benefits of such investments are equal to their final costs (Chen et al., 2011). However, one of the main factors which plays a role in the investment efficiency is how to obtain the funding needed to advance plans and projects in achieving higher investment efficiency. In other words, the firm must possess the necessary credit capabilities to obtain the necessary cash resources through attracting the investors and facilitators' trust and confidence (Chen et al., 2011). Connectivity with shareholders and investors and timely disclosure of information are one of the most effective techniques, through which the firms can promote their resource attraction capacities to enhance their investment efficiency, thereby enriching the likelihood of success even in an inflation market (Barnett, 2007). In other words, the effective relationship of the firm and the stakeholders would increase the capacity to attract cash resources due to the established trust, and enhance the value in the financial statements for stakeholders to make decisions (Nourvash et al., 2019). To put it in other words, the higher the value of the disclosed information for the stakeholders, the more reliable the financial statements for the investors' decisions is and the stronger the relationship between the financial statement items and the price is to reduce risk and enhance stock returns (Siemroth, 2019). Such an interaction between the firm and the shareholders, investors, creditors, and, in general, stakeholders helps the company making its capacities to attract resources dynamic. From a theoretical viewpoint, how can stakeholder relationship capability enhance investment efficiency in the capital market? To answer this question, the mosaic theory can be considered. The rationale of this theory is based on information, and the existence of equilibrium and fairness in this theory can be considered as a factor to make confidence. In other words, the mosaic theory is the combination of several pieces of information in order to establish a more accurate estimation of value to the stakeholders, according to which a more effective form of interactions between the company and the stakeholders is expected (Cheynel & Levine, 2020). According to this theory, like mosaics, the equal disclosure of information with no rent in the form of financial reporting can contribute to the construction of coherence and trust; however, selective information along with economic rent may disrupt that equilibrium, enhance the mistrust, and consequently reduce the investment efficiency in the capital market (Al Sakini, 2019). In general, stakeholders, or more specifically, a firm's stakeholders need information in a market to make decisions. In this regard, if the information possesses the public and equitable aspect of disclosure, the more sustainable trust is expected for the firm in order to enhance the capacities to attract resources in funding projects and investment plans and provide the opportunities for the growth of the firm (Lai et al., 2012). According to this issue and theoretical aspects of the mosaic theory, it can be claimed that the complete and equitable disclosure of information paves the way for competition, and the firms not having the required competitiveness are excluded due to the features of the free flow of information. This would enhance the efficiency in the capital market significantly. In contrast, the selective disclosure of information not only reduces connections with stakeholders and diminishes trust in the capital market but also greatly restricts the investment capacities and ongoing

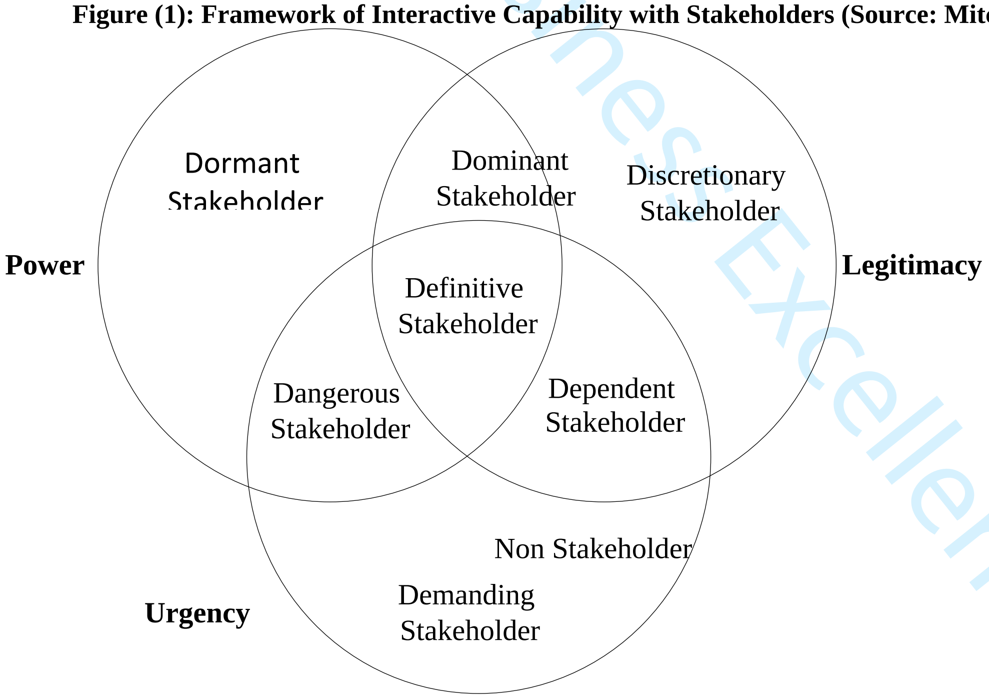
projects of the firm because of the problems with minimal external financing. This reduces the investment efficiency of the firms. Accordingly, the present study aimed to examine the effect of stakeholder relationship capability on investment efficiency with regard to the mosaic theory test.

2. Literature Review

2-1. Interactive Capability with Stakeholders

The theory of stakeholder gradually developed during the 1970s and, in the mid-1980s, was proposed by Freeman in the firms' strategy. The theory that is focused on the dimension and perspective of the firm believes that firms while following their economic interests, should take into account the interests and needs of different stakeholder groups (Golmohammadi et al., 2017). According to the Stanford Research Institute, stakeholders are a group that, without their support, ceases to exist as a firm (Wageningerminards et al., 2008). In another definition, Gary et al. (1), stakeholders are considered to be a group of people who, while sharing common interests, can influence both the organization and the organization. According to the definition of Stanford Research Institute (SRI), stakeholders are a group that the nature of the existence of a firm is stopped without their support (Wagner Mainardes et al., 2011). In another definition presented by Gary et al. (1996), stakeholders are a collection of individuals from a group who, while enjoying common interests, can be influenced by the organization and affect the organization. In order to identify the stakeholders, Mitchell et al. (1997) developed a theoretical framework for the identification and salience of stakeholders. On the basis of this framework, the interactive capability of stakeholders can be specified concerning the enjoyment of one, two, or all three of the following attributes (In order to be considered a stakeholder, an entity has to present at least one out of three stakeholder attributes: power, legitimacy and urgency (Mitchell et al. 1997)):

Figure (1): Framework of Interactive Capability with Stakeholders (Source: Mitchell et al. 1997)



1- Power: The stakeholder's power to influence the firm; 2- Legitimacy: The stakeholder's relationship to the firm; 3- Urgency: The stakeholder's claim on the firm. Mitchell et al. (1997) argue that, according to restrictions on the sources to track stakeholders' behavior and manage the relationship with them, managers may take no action on stakeholders that have one of the attributes, and even some managers

since this was back in 1997, are there new ones to illustrate the recency to the current conditions?

may not identify this category of stakeholders. Individuals or groups with two attributes are recognized as "expectant stakeholders" that the level of engagement between managers and these stakeholders will be high. This group is composed of "dominant" stakeholders, "dependent" stakeholders, and "dangerous" stakeholders. A stakeholder who possesses two attributes can be active or passive (Kumar et al., 2016). In this classification, the seventh stakeholder is "reasonable stakeholder". Stakeholders in this class have power, legitimacy, and urgency (Balmer, 2017). As various stakeholders deliver different sources to the firms and result in different outcomes (Parmar et al., 2010), thus, the interactive capability with stakeholders has a great emphasis on interaction, collaboration, and close relationship with stakeholders. First, the interactive capability with stakeholders has a substantial emphasis on the extensive and continuous relationship with many stakeholders so that it can raise stakeholder involvement in activities and knowledge sharing processes in this way. Second, the interactive capability with stakeholders leads to an improvement in the level of collaboration and engagement in problem-solving and decision-making (Herremans et al., 2016). In this respect, Jones et al. (2018) argue that the stakeholder relationship management somehow contains relational contracts, the generation of the joint wealth, the enhancement of the level of trust and cooperation, and the public sharing of assets that results in the generation of "close interactive capability", i.e., the encouragement of stakeholders to establish a close relationship with the firm (Jones et al., 2018). Besides, establishing close relationship causes the accessibility of firms to specialized knowledge and information (Romijn & Albaladejo, 2002). Moreover, in the opinion of some researchers, a close interactive capability with stakeholders, including customers and suppliers, leads to the exchange of information between them and has a remarkable effect on the development of a vision based on the firm trust (Landry et al., 2002).

2-2. Mosaic theory, stakeholder relationship capability, and investment efficiency

Information has always been a necessity as a basis for the development of interactions, especially in a competitive environment. In other words, the rationale of the mosaic theory is based on information. If such information is properly and equitably reflected among the audience, it provides the basis of specialized capabilities for success and greater returns. Like all theories in humanities, this theory is rooted in configuration- and equity-based thinking. In other words, the mosaic theory describes the establishment of coherence in reinforcing the social context of equity, indicating that no asymmetry-based element can be understood in a collection. According to McLuhan, the mosaic theory claims that isolation and separation eliminate the equilibrium, thereby enhancing individuals' distance from their surrounding environment (Davidowitz, 2015). McLuhan was the follower of Marx. With regard to the decisive role of production factors and methods, Marx discussing historical dialectics states that human life first was "equitable"; later on some individuals abused, leading to inequity and class discrimination. In other words, he considers tools not as a means for the message. In contrast, he assumes that the tool is the message, indicating that the form is preferred and superior to content (information equality vs. information quality), and that reflecting equity can enhance the quality content. Describing the rationale of the mosaic theory, Page (1976) considers the existence of equitable approaches to promoting information as a factor contributing to cooperation and solidarity with the source of equilibrium in the dissemination of news and information and regards it as the source of more efficient decisions. To explain this theory, Cheynel and Levine (2020) also mention that information feedback to individuals and the timely reflection of such information lead individuals in a community towards greater cohesion. The mosaic theory can be extended to the capital market domains and agency-based interactions between firms and stakeholders. Previous studies have revealed that factors such as information asymmetry and agency problems in semi-mature markets may oblige managers to make inefficient investment decisions, which lead to the under- or over-investment growth (Jensen, 1986; Myers & Majluf, 1984; Stalls, 1990). In other words, information asymmetry between managers and shareholders significantly affects the

firm's investment decisions and exacerbates agency problems (Jiang et al., 2010). According to Myers and Majluf (1984), information asymmetry between firms and investors leads to under-investment. With regard to the theory of underinvestment, managers may disregard low-risk projects with positive present value when investment is financed by shareholders. They are willing to have such investments since the shareholders bear the investment cost and its risk, while the benefits of such investments go to the bondholders. Accordingly, it can be deduced that the lack of disclosure and feedback to the capital market, caused by the lack of equilibrium approaches among the stakeholders and the reduction of the agency cost gap in the managers disrupts the market equilibrium, thereby leading to lower investment efficiency.

On the other hand, the information disclosure can also lead to overinvestment since the interests of the managers and shareholders are not consistent. In this case, the managers, even in the face of free cash flow, would be willing to expand their company and select projects with a negative net present value, which reduce the shareholders' value (Baradaran Hasanzadeh & Taqizadeh Khanqah, 2016). In other words, the overinvestment problem largely arises from the managers' opportunism in the case of unequitable environment and information disequilibrium, and this may be caused by shareholder and investor relationship management. According to Empire Building Phenomenon, more credit and power exclusively belong to the managers, and this makes the agency gap be deeper than the past because of disequilibrium in information disclosure, making the investment efficiency face the overinvestment and underinvestment challenges. In other words, the tendency to build an empire provides the managers have an access to all of the firm's resources (free cash flows). Excessive access to the firm's resources drives managers to invest in projects that increase the firm size and have no impact on the firm value. In general, the managers tend to invest even in projects with a negative net present value as long as they enhance the firm size and adds to the personal interest (Degryse & De Jong, 2001). As many previous studies (e.g., Lai et al., 2012; Lee & Fin, 2018; and Guttman & Meng, 2020) has examined the role of financial information symmetry on investment efficiency, the music theory can be extended with regard to the impact of relationship capabilities on investment efficiency. In other words, information symmetry reduces the information acquisition cost and increases the quantity and quality of information available to decision makers. Regarding the adaptive capability of disclosed information as a basis for stakeholder trust, De Franco et al. (2011) states that this level of capability would help decision makers make better decisions and increase investment efficiency. Accordingly, the following hypothesis is posed:

- **Research Hypothesis: Stakeholder relationship capability has a significant impact on the investment efficiency of firms in the capital market.**

3. Methodology

This is an applied study in terms of purpose and is of the type of descriptive-correlational research in terms of data collection. As well as, this is a deductive-inductive investigation in terms of reasoning. Due to the study of data related to a specific time period, the data analysis method is cross-sectional based on the technique of path analysis. The data of the research were collected from CDs of statistical and video archives of the Tehran Stock Exchange, Tehran Stock Exchange website, Rahavard-e-Novin software. And the data related to interactive capability with stakeholders were also gathered through meta-synthesis analysis, Delphi analysis and finally sending questionnaires to the sample firms. The statistical population examined in this study consists of all companies listed in Tehran Stock Exchange in 2019. The selected sample for this study are companies that have the following set of conditions:

1- The companies that, from the beginning to the end of the year 2019, are in the membership of the Stock Exchange.

2- The companies that have no change in activities or change in the fiscal year during the year 2019.

3- The companies that are not among investment and financial intermediation firms (due to the difference in the nature of the activity with other companies, investment companies were not included in the population).

After applying the above financial constraint, 142 companies listed in the Tehran Stock Exchange were selected as the research sample, and the questionnaire was submitted to the managers of these companies. Ultimately, after a lot of follow-ups, 112 questionnaires were completed and returned and used as the final sample for the analysis. The final analysis of the collected data was performed using Structural Equation Modeling (SEM) and Partial Least Squares (PLS) analysis via software PLS. The procedure of structural equation modeling is in a way that we first examine the fitness of the model (including the measurement models fitting, the structural model fitting and the overall model fitting) and then test the research hypotheses.

3-1. Theoretical Framework of the Research

Taking into account the theoretical foundations of the research, the conceptual model framework of this research has been illustrated based on the structural equation modeling approach in Figure (2):

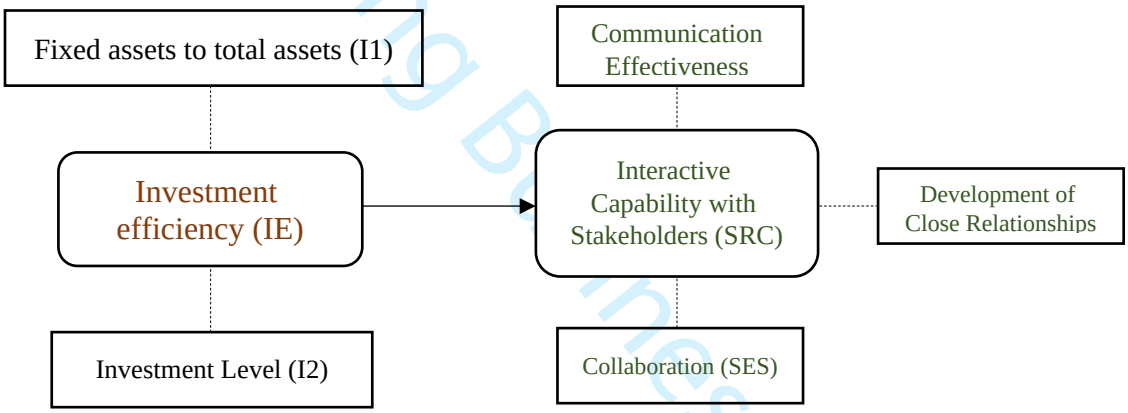


Figure (2): Theoretical Framework of the Research

3-2. Dependent variable

3-2-1. Investment efficiency

In this study, the dependent variable (endogenous variable) was investment efficiency. In this study, two investment efficiency criteria were used: Ratio of net fixed assets to total assets (I) (Goodman et al., 2014) and investment level (Inv) (Chen et al., 2011) since coherent criterion is proposed to measure this variable with regard to its nature.

(A) Ratio of net fixed assets to total assets (I)

Following Goodman's et al. (2014) study, this regression model, which measures investment efficiency based on the investment level, was used.

$$I_{it} = \beta_0 + \beta_1 Q_{it-1} + \beta_2 {CFO_{it-1}}/{Asset_{it-1}} + \beta_3 \text{Asset Growth}_{it-1} + \beta_5 I_{it-1} + \varepsilon_{it} \quad (1)$$

where, $I_{it}$is the net fixed assets and intangible assets in year (t) divided by total assets at the beginning of year (t); $Q_{it-1}$is Tobin's Q ratio for year (t), obtained from dividing the market value of assets by the book value of assets; ${CFO_{it-1}}/{Asset_{it-1}}$is the ratio of cash flows from operating activities to total assets at the beginning of year (t); $\text{Asset Growth}_{it-1}$is the percentage of asset growth in year (t-1); $I_{it-1}$is the firm's investment level at the beginning of year (t-1) divided by total assets at the beginning of year (t-1). If the residual of this model is positive, there will be an overinvestment, and if the residual is negative,

underinvestment will emerge. In this regard, investment efficiency is the inverse absolute value of the residuals obtained from the regression model in Equation (1).

B) Investment level (Inv)

In this study, Chen et al.'s model (1) was used to measure the investment efficiency in Equation (2). According to this approach, total investment is a function of negative sales growth, growth opportunities, negative growth equilibrium, and growth opportunities.

$$Inv_{it} = \alpha_0 + \alpha_1 Neg_{it-1} + \alpha_2 Sales\ Growth_{it-1} + \alpha_3 Neg_{it-1} \times Sales\ Growth_{it-1} + \varepsilon_{it} \quad (2)$$

where, $Inv_{it}$is total investment obtained from the net ratio of an increase in tangible and intangible assets to total assets, $Neg_{it-1}$is negative sales growth as such if the firm's sales growth in the last year is negative, it is one; otherwise, it is zero; $Sales\ Growth_{it-1}$is the sales growth and shows the percentage of sales of a firm from year (t-2) to year (t-1). With placing the value of total investment in Equation (2). In this regard, the positive residuals (positive deviation from expected investment) represent the selection of projects with a negative net present value or overinvestment ($\varepsilon_{it} > 0$) and negative residuals (negative deviation from expected investment) indicates passing from the investment opportunities with positive net present value or underinvestment ($\varepsilon_{it} < 0$). According to Equation (2), all the absolute values of the errors in the model, which show the investment inefficiency, are obtained and then multiplied by (-1) to determine the overall investment efficiency index.

3-3. Independent variable

For the development of interactive capability with stakeholders as an endogenous (dependent) variable of the research, inspired by the studies of Jiang et al. (2019) and Sharma and Waldenburg (1998), meta-synthesis and Delphi methods were used. Accordingly, employing the meta-synthesis analysis, the components related to interactive capability with stakeholders were identified. Then, Delphi analysis was carried out with the cooperation of experts to confirm/delete the components (statements). In the meta-synthesis analysis, in the first step, with the help of search engines in databases inside and outside the country, we attempted to identify investigates associated with the concept and nature of this study. In the second step, through critical appraisal, the criteria and statements concerning the interactive capability with stakeholders were determined. On the basis of the preliminary results gained from the search, because of narrowing the research in the assessment section, 55 research, contents and books related to the nature of the research were identified. In order to choose the proper studies based on the Critical Appraisal Skills Programme (CASP), the researchers initially specified the necessary priorities for any of the articles and books by taking notes of similar articles in terms of their abstracts and contents. In this respect, the steps of filtering the references used are as follows:

Table (1): The steps of filtering the references used based on the Critical Appraisal Skills Programme (CASP)

Steps	References Searched	Number
Step 1	The number of references found The number of references rejected due to the title	55 (18)
Step 2	The references screened based on title The number of references rejected in terms of the abstract	37 (10)
Step 3	The references screened based on abstract The number of references rejected in terms of the content	27 (15)
Step 4	The number of final references	12

As illustrated in the table above, 12 research were selected to identify the statements of interactive capability with stakeholders. Based on the Critical Appraisal Skills Programme (CASP), this research enters the phase of text information extraction. In this approach, through 10 criteria of the aims of the research, methodology, appropriate research design, sampling, data collection, reflexivity (research partnership relations/recognition of researcher bias), data analysis, ethical issues, findings, and value of the research, with the help of 18 members of the panel in the qualitative section, the criteria and

statements of interactive capability with stakeholders are determined. Critical appraisal Skills Programme (CASP) is a 50-point scale in which researchers, based on the scoring system, delete any article that is lower than the score 30. This program is an index that will help researchers determine the accuracy, reliability, and importance of the research qualitative studies. Thus, relevant research under Table (2) must be initially identified using the scoring method based on Table (3). Then, the indices associated with interactive capability with stakeholders should be specified.

Table (2): Critical appraisal Skills Programme (CASP) of Researches related to Interactive Capability with Stakeholders

Articles/Criteria of Critical appraisal Skills Programme (CASP)	Research Objective	Methodology Rationale	Research Design	Sampling Method	Data Collection Method	Generalization of Findings	Ethical	Statistical Analysis Method	Theoretical Capability	Significance of the Study	**Sum**
Jiang et al. (2019)	3	2	3	2	4	5	5	5	4	5	38
Veronica et al. (2019)	2	2	2	2	2	3	4	3	2	2	24
Yang et al. (2019)	3	4	4	4	4	4	4	5	4	5	41
Watson et al. (2017)	4	5	4	4	3	4	4	3	5	4	39
Martin et al. (2016)	3	3	2	2	2	2	2	2	2	2	22
Loi et al. (2016)	4	5	3	4	4	4	5	4	3	4	40
Wang et al. (2016)	4	4	4	4	4	4	3	4	4	4	43
Gao & Slawinski (2015)	3	3	3	2	2	2	4	2	5	3	29
Hayati et al. (2018)	5	5	3	4	3	2	4	4	4	4	38
Najafian and Safari Grayeli (2017)	4	4	3	4	4	3	4	4	4	3	35
Abtahi Foroushani et al. (2015)	3	2	3	3	3	3	4	3	3	2	29
Saghafi et al. (2014)	3	2	3	2	4	5	5	5	4	5	38

Among 12 research confirmed, 4 studies carried out by Veronica et al. (2019), Martin et al. (2016), Gao & Slawinski (2015), and Abtahi Foroushani et al. (2015) are excluded from determining the statements of the research, taking into account that they gained the score lower than 30 out of 50 based on the scores given by members of the panel. On the basis of this approach, all the sub-criteria extracted from the text of the approved articles are written in the column of the table and then the names of the researchers of confirmed investigations are given in the row of each table. According to each researcher's use of sub-criteria written in the table column, the symbol "*" is inserted. Then, the scores of each symbol "*" in the sub-criteria column are added together, and the scores higher than the mean of the researches conducted are selected as the research components.

Table (3): Determining the main components of interactive capability with stakeholders

Researchers	Power of influence	Communication effectiveness	Legitimacy	Influence	Collaboration	Interests	Maintaining property rights	Timely disclosure	Value creation
Jiang et al. (2019)	-	*	-	-	*	-	-	-	*
Yang et al. (2019)	-	*	*	-	-		-	*	-
Watson et al. (2017)	*	-	-	-	*	*	*	-	-
Loi et al. (2016)	-	*	-	-	*	-	*	-	*
Wang et al. (2016)	-	-	-	-	*	-	-	*	*
Hayati et al. (2018)	*	*	*	*	-	*	-	-	*
Najafian and Safari Grayeli (2017)	-	*	-	-	-	-	-	*	-
Saghafi et al. (2014)	-	-	-	*	*	-	-	-	*
	2	5	2	2	5	2	2	3	5

Taking into account that 8 researches in this section were evaluated on the basis of all components of interactive capability with stakeholders, in terms of the frequency of the scores earned, the components that gained more than half of the studies confirmed, i.e. interaction, collaboration, and development of close relationships were selected as sub-components of the research, which were developed under Table (4) in the form of a scoring checklist.

Table (4): Checklist related to Indices of Interactive Capability with Stakeholders

Main components	Sub-components	Indices
Interactive Capability with Stakeholders (SRC)	Communication Effectiveness (SRC)	Ability to identify the social concerns
		Ability to understand the needs and expectations of stakeholders
		Ability to represent the transparent feedback of information to stakeholders
		Ability to hold sessions with representatives of stakeholders
	Collaboration (SES)	Ability to employ the knowledge of stakeholders
		Ability to hold the annual conferences for expressing the approaches and ideas of stakeholders
		Ability to generate synergy for increasing the interests of stakeholders
		Ability to identify and derive the problem through learning
	Value Creation (VCS)	Ability to generate the motivation in interactions with stakeholders
		Ability to build trust in stakeholders
		Ability to create value for stakeholders
		Ability to continue the loyalty programs for stakeholders

Then, in order to ensure the components and indicators identified, Delphi analysis was used to achieve the theoretical saturation point. For this purpose, these indices were provided to experts in the form of a 7-option checklist. Table 5 indicates the results of the Delphi analysis.

Table (5): Results of the Delphi analysis

Main components	Sub-components	Indices	Mean	Measure of agreement	Confirm / Delete
	Communication	Ability to identify the social concerns	5.13	0.77	Confirm

Interactive Capability with Stakeholders (SRC)	Effectiveness (SRC)	Ability to understand the needs and expectations of stakeholders	5.16	0.79	Confirm
		Ability to represent the transparent feedback of information to stakeholders	5	0.68	Confirm
		Ability to hold sessions with representatives of stakeholders	5.10	0.72	Confirm
	Collaboration (SES)	Ability to employ the knowledge of stakeholders	5	0.72	Confirm
		Ability to hold the annual conferences for expressing the approaches and ideas of stakeholders	5.16	0.79	Confirm
		Ability to generate synergy for increasing the interests of stakeholders	5.10	0.72	Confirm
		Ability to identify and derive the problem through learning	5.15	0.74	Confirm
	Value Creation (VCS)	Ability to generate the motivation in interactions with stakeholders	5.20	0.82	Confirm
		Ability to build trust in stakeholders	5	0.68	Confirm
		Ability to create value for stakeholders	5.12	0.79	Confirm
		Ability to continue the loyalty programs for stakeholders	5	0.68	Confirm

Concerning the two criteria of mean (according to the 7-item scale) and the measure of agreement (should be higher than 0.5), it can be stated that all the components of the above table were confirmed in the first round Delphi. Hence, it can be understood that the identified indices are in line with the theories related to stakeholder relationship management. Finally, the identified indices above were sent to the managers of firms in the form of a questionnaire. The questionnaire contains 12 questions and 3 sub-components of communication effectiveness, collaboration, and development of close relationships. Scoring of the questionnaire was conducted based on a five-point Likert scale (strongly agree = 5, agree = 4, neither agree nor disagree = 3, disagree = 2, and strongly disagree = 1). So that, the ratio of the total score belonging to any questionnaire to the total score obtainable (60) is taken into account as an index of interactive capability with stakeholders of the firm.

4. Results

4-1. Demographic Information of the Research

In order to familiarize with the characteristics of the statistical sample, demographic information of the research is illustrated in Table (1).

Table (7): Demographic information of the research

Variable	**Qualitative section**			**Quantitative section**		
	Criteria	**Number**	**Percent**	**Criteria**	**Number**	**Percent**
Gender	Male	13	72.22%	Male	105	93.37%
	Female	5	27.78%	Female	7	6.63%
Total		18	100%	Total	112	100%
Age	Less than 40 years old	6	34%	Less than 40 years	35	31.42%
	Between 40 and 50 years old	10	55.55%	Between 40 and 50 years	45	40.17%
	More than 50 years old	2	11.12%	More than 50 years	32	28.58%
Total		18	100%	Total	112	100%
Work Experience	Lower than 10 years	7	38.88%	Lower than 20 years	60	53.57%
	Higher than 10 years	11	61.12%	Higher than 20 years	52	47.43%
Total		15	100%	Total	112	100%

As indicated in the results of the demographic statistics, out of 18 experts in the research, 13 men and 5 women participated. Also, it was found that 6% of participants in the qualitative section were less than 40 years of age, and the highest frequency was related to the age range of 40 to 50 years, which represents the age of 55.55% participants. Ultimately, it became clear that 38.88% of the participants had a work experience of lower than 10 years, and 61.12% of them had a work experience of higher than 10 years. The demographic statistics in the quantitative section, which was carried out with the participation of 105 managers of companies listed in the Tehran Stock Exchange, indicated that out of 105 company managers of the Tehran Stock Exchange in different layers of the companies examined, 93.34% of the participants were male, and 6.66% of them were female. Furthermore, it was found that the highest frequency associated with the age was equal to 42.85% for the age range of 40 to 50 years. Eventually, it was determined that 52.38% of the participants had a work experience of lower than 20 years, and 47.62% of the participants had a work experience of higher than 20 years.

4-2. Descriptive Statistics

Table 8 presents the descriptive statistics of the study variables using some central and dispersion indices. As it is shown, the mean and median of stakeholder relationship capability are 3.86 and 4.00, respectively, indicating the significant impact of this variable on the interaction of firms with stakeholders. Furthermore, the minimum and maximum values of this variable also confirm this claim. Furthermore, the mean and median of investment efficiency indices were 0.054 and 0.038 for the ratio of net fixed assets to total assets and 0.054 and 0.062 for the investment level, respectively. In this regard, the highest mean values for the three dimensions of stakeholder relationship capability belonged to the value-making for stakeholders (mean= 3.196), indicating that stakeholders at the capital market level, including investors, creditors, legislators, and analysts, consider value-making as a necessity to promote interactions and attractiveness in investment.

Variable	Variable symbol	Mean	Median	Minimum	Maximum	Standard Deviation
Interactive capability with stakeholders	SRC	3.86	4.000	2.750	4.750	0.420
Communication effectiveness with stakeholders	RES	3.86	4.000	2.250	5.000	0.520
Collaboration with stakeholders	SES	3.76	4.000	2.250	5.000	0.680
Value creation for stakeholders	VCS	3.96	4.500	2.50	5.000	0.520
Fixed assets to total assets	(I1)	0.054	0.038	0.0000	0.42	0.062
Investment Level (I2)	(I2)	0.062	0.041	0.0001	0.629	0.085

4-3. Fitness of the measurement models

In fitting the measurement models, three criteria of reliability, convergent validity, and divergent validity are used. In order to evaluate the reliability of the research measurement model, the factor loadings coefficients, the Cronbach's alpha coefficients, and the composite reliability (CR) coefficients are employed.

Table (10): Factor loadings coefficients

Factor	Index	Questions	Factor loading
Dimensions of interactive capability with stakeholders (SRC)	RES	RES1	0.70
		RES2	0.75
		RES3	0.69
		RES4	0.79
	SES	SES1	0.77
		SES2	0.89
		SES3	0.83
		SES4	0.71
	VCS	VCS1	0.64
		VCS2	0.76
		VCS3	0.74
		VCS4	0.81
Investment efficiency (IE)		I1	0.41

	I2	0.84
Interactive capability with stakeholders (SRC)	RES	0.93
	SES	0.72
	VCS	0.78

The criterion value for fitting the factor loadings coefficients is 0.4. In accordance with Table (10), all numbers of factor loadings coefficients for the questions are greater than 0.4, which indicates the fitness of this criterion. According to the data analysis algorithm in PLS, after measuring the factor loadings of the questions, now we calculate and report the coefficients of the Cronbach's alpha and the composite reliability (CR) that the results of them are provided in Table (11).

Table (11): The results of the criteria of Cronbach's alpha and composite reliability for the latent variables of the research

Latent variables	Symbols	Cronbach's alpha coefficient (Alpha> 0.7)	Composite reliability coefficient (CR> 0.7)
Investment efficiency	**Inv E**	0.74	0.88
Communication effectiveness	RES	0.72	0.82
Collaboration	SES	0.81	0.98
Interactive capability with stakeholders	SRC	0.58	0.78
Value creation	VCS	0.72	0.83

Taking into account that the suitable value for the Cronbach's alpha and the composite reliability is 0.7, and according to the findings of the above table, these criteria have gained appropriate values for the latent variables, therefore, the suitability of the reliability of research measurement models can be confirmed. The second criterion to evaluate the fitting of measurement models is convergent validity that checks the correlation of each construct with its questions (indices).

Table (12): The results of the convergent validity for the latent variables of the research

Latent variables	Symbols	Average variance extracted (AVE> 0.5)
Investment efficiency	**Inv E**	0.79
Communication effectiveness	RES	0.54
Collaboration	SES	0.64
Interactive capability with stakeholders	SRC	0.54
Value creation	VCS	0.55

Considering that the proper value for AVE is 0.5 (Fornell & Larcker, 1981), and based on the findings of the Table (12), this criterion obtained an appropriate value for the latent variables, hence, the suitability of the convergent validity of the research is confirmed.

The third criterion to evaluate the fitting of measurement models is the divergent validity. The acceptable divergent validity of a model represents that one construct in the model, compared to other constructs, has higher interaction with its indices. The divergent validity will be at an acceptable level when the AVE for each construct is greater than the amount of shared variance between the construct and the other constructs in the model (Fornell & Larcker, 1981). In accordance with Table (13), the root mean square of the common values for the latent variables in this study, placed in the cells in the diagonal of the matrix, is greater than the correlation value between those placed in the lower and right cells of the diagonal. This means that any construct in the research model, compared to other constructs, has more interaction with its indicators. This indicates the favorable divergent validity and proper fit of the research measurement models.

Table (13): Fornell & Larcker matrix to check the divergent validity

		Investment efficiency	Communication effectiveness	Collaboration	Value creation	Interactive capability with stakeholders
	Symbols	Inv E	RES	SES	VCS	SRC
Investment efficiency	Inv E	0.89				
Communication effectiveness	RES	0.39	0.73			
Collaboration	SES	0.60	0.25	0.80		

Value creation	VCS	0.68	0.72	0.70	0.74	
Interactive capability with stakeholders	SRC	0.50	0.40	0.31	0.76	0.81

With respect to the results of reliability, convergent validity, and divergent validity, it is observed that the measurement models of the structural equation modeling (SEM) can favorably measure the latent variables of the research. Thus, the fitting of the research structural model is evaluated in the following.

Fitness of structural model

After assessing the validity and reliability of the measurement model, the structural model was evaluated through the relations between the latent variables. In this study, two criteria of coefficient of determination (R^2) and predictive power (Q^2) are used.

Coefficient of Determination (R^2) and Predictive Power (Q^2)

R^2 is a measure that indicates the influence of an exogenous variable on an endogenous variable. According to Figure (2), the value of R^2 is calculated for the endogenous constructs of the research that the suitability of the structural model fit can be confirmed. Moreover, in order to evaluate the predictive power of the model, a measure called Q^2 was employed. Considering the results of this measure in Table (13), it can be concluded that the model has a "strong" predictive power.

Table (14): The values of coefficient of determination (R^2) and predictive power (Q^2)

Symbol	Q^2	R^2
Inv E	0.47	0
RES	0.53	0
SES	0.49	0
VCS	0.62	0

Goodness of fit

After fitting the measurement part and structural part of the model of this study, in order to control the overall fit of the model, a measure called goodness of fit (GOF) was used that three values of 0.01, 0.25, and 0.36 are introduced as weak, medium and strong values. This criterion is calculated through the equation (1):

Equation (1) $GOF = \sqrt{\overline{Communalities} \times \overline{R^2}}$

$\overline{Communalities}$ is the average of the common values for the latent variables of the research, and $\overline{R^2}$ is the average values of the coefficient of determination for the endogenous variables of the model.

Table (15): The value of Communalities and R2

Latent variables	Symbol	Communality	R2
Investment efficiency	Inv E	0.79	0.47
Communication effectiveness	RES	0.54	0.53
Collaboration	SES	0.64	0.49
Value creation	VCS	0.54	
Interactive capability with stakeholders	SRC	0.55	0.62

Table (16): The results of overall model fitting

$\overline{Communality}$	$\overline{R2}$	GOF
0.61	0.53	0.568

According to the value gained for GOF at a rate of 0.56, the very good fit of the overall model is verified.

The results of testing hypotheses

After assessing the fit of the measurement models and the structural model and enjoying the favorable fit of the overall model, according to figures (3) and (4), we check the results of testing the research hypotheses, which have been provided in Table (17).

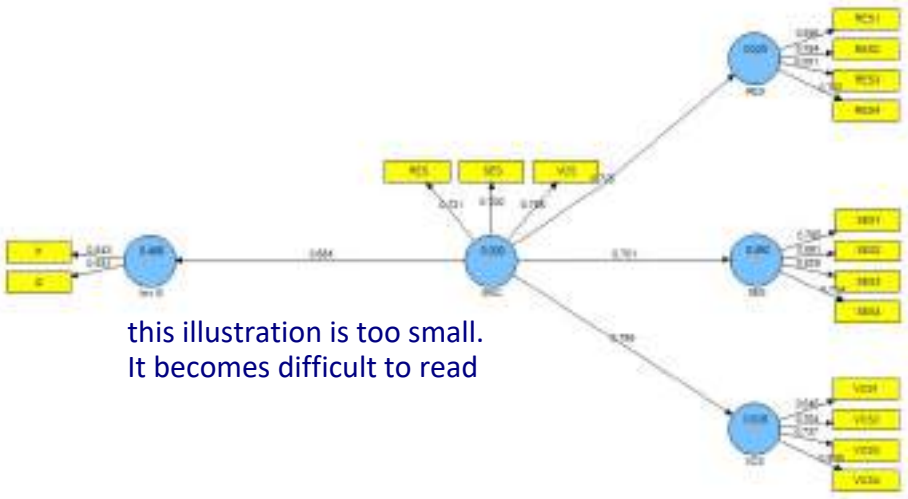


Figure (3): The structural model of research hypothesis with factor loadings coefficients

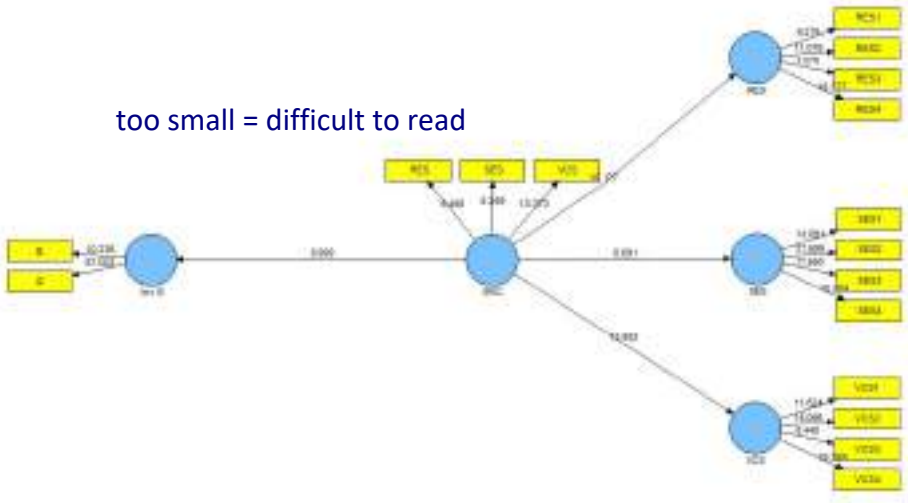


Figure (4): The structural model of research hypothesis with significant coefficients

Taking into account the structural model and factor loadings, as depicted in Table (17), the result of the research hypothesis test can be observed.

Table (17): The result related to the research hypothesis test

Hypothesis	The causal relationships between research variables	Path coefficient (β)	Significance (T-Value)	Test result
Research hypothesis	Investment efficiency ----- development of interactive capability	0.49	7.36	Confirmation of hypothesis

With respect to Figures (3) and (4), the standardized coefficient (path coefficient), the information content of financial reporting has a significant and positive impact on the development of interactive capabilities with stakeholders since the path coefficient is positive and equals to 0.49, and the t statistic is also equal to 7.36. Considering that t statistic is greater than 1.96, while confirming the result of the hypothesis, it illustrates the influence of information content of financial reporting on the development of interactive capabilities with stakeholders.

5. Conclusion

The present study aimed to explore the impact of stakeholder relationship capability on investment efficiency with regard to the mosaic theory test. Examining and testing the research hypothesis not only confirmed the suitability of the model but also showed the positive and significant effect of stakeholder relationship capability on investment efficiency. This finding is based on the mosaic theory, implying the fact that the disclosure of complete and coherent information among stakeholders promotes the firm's stakeholder relationship capability and makes the firm face fewer limitations to finance its operations through relying on the existence of trust-based stakeholder relationship capabilities. This issue would also enhance the firm's investment efficiency. In other words, full disclosure along with financial reporting transparency provides safe conditions and enhance investor's trust. On the other hand, the investment efficiency in firms with effective stakeholder capabilities can be more dynamic when the firm in selecting its future investment projects spares its effort to consider the stakeholders' concerned investment values such as decreasing risk and enhancing returns through timely information disclosure. In other words, the transparency of the disclosed information reduces the unequitable distribution of information between decision makers or stakeholders. Furthermore, in addition to reducing information asymmetries and agency costs, this information is made public and complete and, under the transparency of the information environment, reduces the possibility of wrong selections and inappropriate decisions by managers in investment projects and ultimately significantly improves the investment efficiency. The findings are conceptually in line with those reported by Lai et al. (2012), Lee and Fin (2018), and Guttman and Meng (2020).

Accordingly, since the role of accounting information transparency in promoting the investment efficiency in Tehran Stock Exchange is assessed, Tehran Stock Exchange should as a monitoring institution in Iran's capital market is suggested to adopt practical solutions such as periodic qualitative evaluations of information disclosed by experts; qualitative ratings of information disclosure based on stakeholder right protection criteria, and so on to direct the market toward efficiency in order to ensure that information is disclosed equally to all stakeholders and prevent any rent and inequality in decision-making at the capital market level. In other words, it should avoid access to rent-based information that makes a party in the market reach more remarkable information in comparison to the other party and prevent the establishment of an asymmetric information system in order to avoid inappropriate selection and ethical risks. On the other hand, this organization should make the firms provide accurate, high-quality and real information through monitoring the quality, not just quantity, timely presentation of financial reports provided by the firms active in the market, and the agency relationships in such firms in order to reduce the potential constraints, especially under inflation conditions, and make the capital market more attractive than other investment markets in the country to further attract cash resources. On the other hand, the monitoring institutions are also recommended to formulate policies for the establishment of institutes to rank and determine the financing cost for each company based on risk (beta) in comparison to the firm's information transparency. This decreases the orientations of the decision making agencies in the national capital market through specifying bank commission rates in commands. With greater information transparency, the financing costs of the firms operating in the capital market

converts from the relational financing process into a systematic process. Finally, this organization is suggested to provide an opportunity to promote investor trust (potential and actual) to companies through various mechanisms such as nurturing the culture of entering into the financial markets so that the managers have no chance for abuse, fraud and corruption, as well as setting up strict regulations against the faulty firms. Accordingly, the information demand functions do not move toward the acquisition of all confidential information and information symmetry promotes further coherence and integration between the firms and stakeholders.

References

Al Sakini, A. (2019). The Impact of Disclosure of the Financial Statements at the Level of Information Asymmetry between Investors: An Empirical Study on the Commercial Banks in Jordan, Academy of Accounting and Financial Studies Journal, 23(6): 103-123.

Balmer, J. (2017). The corporate identity, total corporate communications, stakeholders' attributed identities, identifications and behaviors continuum, European Journal of Marketing, 51(9/10): 1472-1502. https://doi.org/10.1108/EJM-07-2017-0448

Barnett, M, L. (2007). Stakeholder Influence Capacity and the Variability of Financial Returns to Corporate Social Responsibility, the Academy of Management Review, 32(3): 794-816.

Beatty, A., Weber, J., Scott, J. (2007). The Role of Accounting Quality in Reducing Investment Inefficiency in the Presence of Private Information and Direct Monitoring. Working paper, The Ohio State University

Bridoux, F., & Stoelhorst, J. W. (2014). Micro-foundations for stakeholder theory: Managing stakeholders with heterogeneous motives, Strategic Management Journal, 35(1): 107–125

Chen, F., Hope, O, K., Li, Q., Wang, X. (2011[b]). Financial Reporting Quality and Investment Efficiency of Private Firms in Emerging Markets. The Accounting Review, 86(4): 1255-1288. https://doi.org/10.2308/accr-10040

Chen, F., Hope, O., Li, Q., Wang, X. (2011[a]). Financial reporting quality relate to investment efficiency? Journal of Accounting and Economics, 48(2-3):112-131

Cheynel, E., Levine, C, B. (2020). Public Disclosures and Information Asymmetry: A Theory of the Mosaic. The Accounting Review, 95(1): 79-99. https://doi.org/10.2308/accr-52447

Davidowitz, A. (2015). Abandoning the 'mosaic theory': Why the 'mosaic theory' of securities analysis constitutes illegal insider trading and what to do about it. Washington University Journal of Law & Policy 46(1): 281–303

De Franco, G., Kothari, S, P., Verdi, R, S. (2011). The benefits of financial statement comparability, Journal of Accounting Research, 49(2): 895-931.

Degryse, H., De Jong, A. (2001). Investment Spending in the Netherlands: Asymmetric Information or Managerial Discretion? Working Paper, Erasmus University Rotterdam.

Freeman, R. E. (1984). *Strategic management: A stakeholder approach*. Boston: Pitman.

Gao, J., Slawinski, N. (2015). The Impact of Stakeholder Management on Corporate International Diversification, Business and Society Review, 120(3): 409-433. https://doi.org/10.1111/basr.12061

Goodman, T. H., Shroff, N., Neamtiu, M., White, H. D. (2014). Management Forecast Quality and Capital Investment Decisions. The Accounting Review, 89, 331-365

Gray, R., Owen, D., Afams, C. (1996). Accounting and accountability: Change and challenges in corporate social and environmental reporting, London: Prentice Hall.

Guttman, I., Meng, X. (2020). The Effect of Voluntary Disclosure on Investment Inefficiency, The Accounting Review In-Press, https://doi.org/10.2308/tar-2018-0749

Herremans, I. M., Nazari, J. A., & Mahmoudian, F. (2016). Stakeholder relationships, engagement, and sustainability reporting. *Journal of Business Ethics*, 138(3), 417–435.

Jensen, M, C. (1986). Agency Costs of Free Cash Flow, Corporate Finance and Takeovers, The American Economic Review, 76(2): 323-329

Jiang, G., Lee, C, M, C., Yue, H. (2010). Tunneling Through Intercorporate Loans: The China Experience". Journal of Financial Economics, 98(3): 1-20.

Jiang, W., Wang, A, X., Zhou, K, Zh., Zhang, Ch. (2019). Stakeholder Relationship Capability and Firm Innovation: A Contingent Analysis, Journal of Business Ethics, https://doi.org/10.1007/s10551-019-04161-4

Jones, T. M., Harrison, J. S., & Felps, W. (2018). How applying instrumental stakeholder theory can provide sustainable competitive advantage. *Academy of Management Review*, 43(3), 371–391.

Kothari, S. P., Ramanna, K., & Skinner, D. J. (2010). Implications for GAAP from an analysis of positive research in accounting. Journal of Accounting and Economics, 50 (2-3): 246–286.

Kumar, V., Rahman, Z. and Kazmi, A. (2016). Stakeholder identification and classification: a sustainability marketing perspective, Management Research Review, 39(1): 35-61. https://doi.org/10.1108/MRR-09-2013-0224

Lai, Sh, M., Liu, Ch, L., Wang, T. (2012). Increased disclosure and investment efficiency, Asia-Pacific Journal of Accounting & Economics, 21(3): 33-69. https://doi.org/10.1080/16081625.2012.741791

Landry, R., Amara, N., Lamari, M. (2002). Does social capital determine innovation? To what extent? *Technological Forecasting and Social Change*, 69, 681-701.

Lee, T., Fin, M. (2018). The Link between Information Transparency and Investment Efficiency: A Literature Review, Business and Economic Research, 8(4): 71-79. https://doi.org.10.5296/ber.v8i4.13897

Li, Y., He, J., Xiao, M. (2018). Risk Disclosure in Annual Reports and Corporate Investment Efficiency, International Review of Economics and Finance, 12(4): 333-351. https://doi.org/10.1016/j.iref.2018.08.021

Loi, T. (2016). Stakeholder management: a case of its related capability and performance, Management Decision, 54(1): 148-173. https://doi.org/10.1108/MD-06-2015-0244

Martin, M, V., Reinhardt, R., Gurtner, S. (2016). Stakeholder integration in new product development: a systematic analysis of drivers and firm capabilities, 46(3): 1095-1112.

McNichols, M., & Stubben, S. R. (2008). Does earnings management affect firms' investment decisions? The Accounting Review, 83(6): 1571–1603

Mitchell, R., Agle, B., Wood, D. (1997). Toward a theory of stakeholder identification and salience: Defining the principles of who and what really counts, Academy of Management Review, 22: 55-886

Myers, S., Majluf, N. (1984). Corporate Financing and Investment Decisions When Firms Have Information That Investors Do not Have, Journal of Financial Economics, 13(1): 187-221

Page, I, H. (1976). The mosaic theory of arterial hypertension–its interpretation. Perspect Biol Med, 10(3):325–33.

Parmar, B. L., Freeman, R. E., Harrison, J. S., Wicks, A. C., de Colle, S., & Purnell, L. (2010). Stakeholder theory: The state of the art. *Academy of Management Annals*, 4(1), 403–445.

Romijn, H., Albaladejo, M. (2002). Determinants of innovation capability in small electronics and software firms in southeast England. Research Policy, 31, 1053-1067

Rueda-Manzanares, A., Aragn-Correa, J. A., & Sharma, S. (2008). The influence of stakeholders on the environmental strategy of service firms: The moderating effects of complexity, uncertainty and munificence. *British Journal of Management*, *19*(2): 185–203.

Sharma, S., & Henriques, I. (2005). Stakeholder influences on sustainability practices in the Canadian forest products industry. Strategic Management Journal, 26(2): 159–180.

Verbeke, A., & Tung, V. (2013). The future of stakeholder management theory: A temporal perspective. Journal of Business Ethics, 112(3): 529–543.

Veronica, S., Alexeis, G, P., Valentina, C., Elisa, G. (2019). Do stakeholder capabilities promote sustainable business innovation in small and medium-sized enterprises? Evidence from Italy, Journal of Business Research, https://doi.org/10.1016/j.jbusres.2019.06.025

Wagner Mainardes, E., Alves, H., Raposo, M. (2011). Stakeholder theory: issues to resolve, Management Decision, 49(2): 226-252. https://doi.org/10.1108/00251741111109133

Wang, H, M., Sengupta, S. (2016). Stakeholder relationships, brand equity, firm performance: A resource-based perspective, Journal of Business Research, 2(3): 1-8. http://dx.doi.org/10.1016/j.jbusres.2016.05.009

Watson, R., Wilson, H, N., Smart, P., Macdonald, E, K. (2017). Harnessing Difference: A Capability-Based Framework for Stakeholder Engagement in Environmental Innovation, 35(2): 254-279.

Yang, D., Jiang, W., Zhao, W. (2019). Proactive environmental strategy, innovation capability, and stakeholder integration capability: A mediation analysis, https://doi.org/10.1002/bse.2329

MBE-01-2021-0009 - **View Abstract**

Stakeholder Relationship Capability and Investment Efficiency: A Mosaic Theory Test

publons

*Do you want to get recognition for this review on **Publons** ?

Don't let your reviewing work go unnoticed! Researchers the world over use Publons to effortlessly track their valuable peer review contributions for any journal. If you opt in, your Publons profile will automatically be updated to show a verified record of this review in full compliance with the journal's review policy. If you don't have a Publons profile, you will be prompted to create a free account.Learn more about Publons

- (●) Yes
- ( ) No

* **1. Originality: Does the paper contain new and significant information adequate to justify publication?**

yes, it appears that this manuscript has shown the sufficient originality

* **2. Relationship to Literature: Does the paper demonstrate an adequate understanding of the relevant literature in the field and cite an appropriate range of literature sources? Is any significant work ignored?**

yes, it appears that this manuscript has shown the sufficient comprehension on the underlying theories on the Stakeholders Relationship. However, the term "mozaic theory" used needed to be clarified and elaborated a bit, at least separating the public vs private info

* **3. Methodology: Is the paper's argument built on an appropriate base of theory, concepts, or other ideas? Has the research or equivalent intellectual work on which the paper is based been well designed? Are the methods employed appropriate?**

the use of structural equation modeling does not rely on the terms "independent variable" and "dependent variable". Hence, the sub-headers of "independent variable" and "dependent variable" may not be appropriate

* **4. Results: Are results presented clearly and analysed appropriately? Do the conclusions adequately tie together the other elements of the paper?**

- the graphs on the structural model are too small. It is very difficult to see and evaluate

- lack of managerial explanation of the results
- what is the need for showing both factor loadings and coefficients?

- what are the names for the circles/eclipses?

* **5. Implications for research, practice and/or society: Does the paper identify clearly any implications for research, practice and/or society? Does the paper bridge the gap between theory and practice? How can the research be used in practice (economic and commercial impact), in teaching, to influence public policy, in research (contributing to the body of knowledge)? What is the impact upon society (influencing public attitudes, affecting quality of life)? Are these implications consistent with the findings and conclusions of the paper?**

yes, this manuscript appears to have the managerial perspective onto the capital investment from the view of stakeholder relationship

It appears to provide the bridge between the capital investment and the stakeholder relationship

* **6. Quality of Communication: Does the paper clearly express its case, measured against the technical language of the field and the expected knowledge of the journal's readership? Has attention been paid to the clarity of expression and readability, such as sentence structure, jargon use, acronyms, etc.**

need to be run into spell check & grammarly to modify some thoughts. Otherwise, this manuscript can be understood

---

* **Recommendation**

- ◯ Accept
- ◉ Minor Revision
- ◯ Major Revision
- ◯ Reject

Confidential Comments to the Co-Editor

Ω

Ω

Gmail

S A M <ethan.eryn@gmail.com>

Thank you for submitting your review of Manuscript ID MBE-01-2021-0009 for the Measuring Business Excellence

1 message

Measuring Business Excellence <onbehalfof@manuscriptcentral.com> Fri, Mar 12, 2021 at 1:03 PM
Reply-To: josvaniwaarden.MBE@gmail.com
To: ethan.eryn@gmail.com, keeshondenkeeshonden@yahoo.com

12-Mar-2021

Dear Dr. Anantadjaya,

Thank you for submitting your review of MBE-01-2021-0009 for Measuring Business Excellence. We are very grateful for the contribution you have made to the journal by providing your review. We recognise the value that is added by our reviewers and would therefore like to thank you for your work, by granting you free personal access to up 40 Emerald journal articles (excluding Backfiles) within a three-month period.

Early next month, we will send an email that will contain all the information you need to activate your personal free access.

Once you have received this email, all you will need to do is:
- click the link in the e-mail: this will take you directly to the Emerald log-in page
- If you have an Emerald MyProfile log in, simply log on using these details (this is different to the log in you use for ScholarOne)
- If you do not have an Emerald MyProfile, you can register with us there and then to get your free personal access to Emerald content.
Instructions on how to contact us to set up your Emerald MyProfile will be in the email we send next month.

We would also like to offer you a 30% DISCOUNT on all Emerald books available for purchase from the EMERALD BOOKSTORE. To take advantage of this offer please visit http://books.emeraldinsight.com/ and then enter the code REVIEW at the checkout.

On behalf of the Editors of Measuring Business Excellence, we appreciate the valuable and efficient contribution that each reviewer gives to the Journal and we hope that we may call upon you again to review future manuscripts.

Yours sincerely,

Dr. Jos van Iwaarden
Editor, Measuring Business Excellence
josvaniwaarden.MBE@gmail.com