



Cultural and Natural Heritage Concerns and Cost of Equity: Case of Global Cement and Cement-Related Industries

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ABSTRACT: In recent business landscape, term of Sustainable Development Goals (SDGs) and Environmental, Social, and Governance (ESG) is interesting for many investors who concern on that. By implementing SDGs and ESG, investors and companies are expect to participate in the world sustainable development target. One of the SDG metric is strengthen efforts to protect and safeguard the world's cultural and natural heritage. With the 75 samples of cement and cement-related company across the world, this thesis delves into the nuanced of relationship between cultural and natural heritage issues and its cost of equity. Recognizing the profound impact of cultural and natural heritage concerns on corporate reputation, social license to operate, as well investor's perception, this research endeavors to elucidate the intricate interplay between these variables through research approach encompassing quantitative methodologies. The result of this research is showing that cultural and natural heritage issue is negatively correlate to the cost of equity which means the better the cultural and natural heritage score of a company, the lower its cost of equity among its peers. The regression analysis result in P-Value 0.016; coefficient -6.12 for cultural and natural heritage index impact to cost of equity (in market model) and in P-Value 0.033; coefficient -5.30 for cultural and natural heritage index impact to cost of equity (in Bloomberg CAPM), which considered significant. Implication of these finding are that cultural and natural heritage issue can be a threat for the company image as well can influence various aspects of company activities, if it is not well managed. Therefore, companies should start concern on any cultural and natural heritage since it has significant implication for investor's decision and perception which can be depicted in its each cost of equity.

KEYWORDS: cultural and natural heritage, cost of equity, cement company, cement related company, SDGs.

INTRODUCTION

The United Nations (UN) was adopted the Sustainable Development Goals (SDGs), also known as the Global Goals in 2015 as a universal call to action to end poverty, protect the planet, and ensure that by 2030 all people from all the world will enjoy peace and prosperity. SDGs will be a compass for aligning their plans with their global commitments. All of those goals in sustainable development is closely related to the human activities including their business as individual or company. Environmental, Social, and Governance (ESG) is known as one of the parameters for implementing the SDGs. ESG is often used in business as a key metric in making investment decisions and serves as a reference for companies reporting the impacts of their business. Nowadays, investors have shown increasing interest in environmental, social, and governance (ESG) factors in their investment decisions (In et al., 2019). According to Plastun et al., (2020) in Soni (2023), corporations and investors in emerging markets have begun to pay attention to ESG concerns in recent times, drawing their cues from developed countries. There has also been an increasing desire for corporations to connect their ESG disclosure with the Sustainable Development Goals (SDGs). In the business realm, increasing interest in Environmental, Social, and Governance (ESG) also reflected in investors behaviour or investment decisions (In et al., 2019), and businesses need to pay attention and respond to this (PWC, 2021). Corporate Social Responsibility (CSR) has been long incorporated in company which may be perceived as the part of ESG implementation in nowadays term. Accordingly, as the Sustainable Development Goals (SDGs) are seen as the worldwide commitment to bettering the world's conditions, ESG projects ought to be guided by the SDGs. Despite the fact that the SDGs are a framework based on states, businesses and investors are also encouraged to adopt (Alliance, 2020). Following Baker et al. (2022), ESG is described not as a tradeoff in investing, investors believe that today's prices do not yet reflect the financial benefits of corporate ESG and the tailwind of the ESG-concerned investors. Also, these market watchers argue ESG is not yet reflected in current market prices. Furthermore, investors believe they can do well, earning higher than average profits through ESG practices and higher than average returns by reallocating investable assets towards funds with ESG mandates. In relation to the SDG performance that also relate with the ESG performance, we capture an issue as one of the SDG11



metric related to the cultural and natural heritage issue, which is experienced by some companies and give negative impact to them. In this research, we try to bring that issue to the company's cost of equity, especially on the world cement and cement-related companies. Why the cultural and natural heritage is considered important, it is because cultural and natural heritage can be considered as the glue to connect among the different dimensions of sustainable development that are economic, social, cultural and environmental systems (Nocca, 2017).

SDG 11.4 target is mentioned to strengthen efforts to protect and safeguard the world's cultural and natural heritage. The measurement indicator to monitor is Total per capita expenditure on the preservation, protection and conservation of all cultural and natural heritage, by source of funding (public, private), type of heritage (cultural, natural) and level of government (national, regional, and local/municipal). According to Responsible Investment Association Australasia (2021) when a relationship with cultural heritage management is weak, it can lead to long-term financial risks for companies which could relate to one or a combination of the direct or indirect costs. To be clear, these long-term financial risks manifest because actions, such as the destruction of tangible or intangible heritage, have significant social costs.

On the world stage, tragedy happened in one of mining company named Rio Tinto which unintendedly destroyed the 46,000-year-old Juukan Gorge cave site in May 2020, it struck a bitter blow at the heart of Aboriginal culture. Not only was an irreplaceable cultural site desecrated but it also served to highlight the near constant damage, disturbance and removal of cultural heritage that occurs almost routinely within Australia. Out of this tragedy came a movement of people determined to ensure this kind of desecration will not happen again. Aboriginal people came together to form the First Nations Heritage Protection Alliance to strive for industry and legislative reform (Responsible Investment Association Australasia, 2021).

In Indonesia, unfortunately it is also become the spotlight on international news, which earlier on December 2022 it happened in PT Semen Indonesia (Persero) Tbk ("SIG") the biggest cement company in Indonesia. Council on Ethics which is the advisory of Norway Government, make a letter to Norges Bank as one out of top ten SIG's investors about the evaluation on investment in SIG. The letter is about Recommendation to place PT Semen Indonesia (Persero) Tbk under observation for a period of three years pursuant to the ethical guidelines' criterion concerning "particularly serious violations of other fundamental ethical norms". This happened because of the discovery of cultural heritage in the Maros-Pangkep karst landscape in South Sulawesi, Indonesia. The Council on Ethics issued its recommendation on 19 December 2022, then Norges Bank announced its decision to place the company under observation on 25 May 2023.

A. Research Questions

In pursuant to this research, based on the issue specifically on cultural heritage and its impact to the industry, we try to delve deeper into the impact of cultural heritage issue. The industry we select to be specified is in the cement and cement-related industry, on the world stage. The deeper side of this purpose as well to promote the awareness for cultural heritage protection, preservation and promotion as one of company's contribution to the Country to achieve the Sustainable Development Goals (SDGs). We attempt to build two research questions to support the goal of the research, to assess how company can provide the information about their level or concern to the cultural heritage, as well assessing the importance of cultural heritage toward investor's perception and decision.

1. How high the implication of issue related to cultural heritage to investor's perception in World Cement and Cement-related Company to their cost of equity?
2. How the cultural heritage concerns on the companies could be portrayed in the Sustainability Report to show their commitment to investors?

B. Research Methods, Data and Limitation

The research will be conducted quantitatively by using multiple linear regression method. This research is limited to the study of cultural heritage, along with other ESG and SDG measurement, which expected to be affecting the cost of equity on 75 cement and cement-related companies on the world. The measurement consist of independent variables which is cultural heritage index and control variables which are SDG Score, PB Ratio, Market Size, Leverage, and Beta. This limitation on the cement and cement-related industries is originate from the author's industry, which experienced firsthand about cultural heritage issue. The research period is limited from 2018 to 2022, but not all companies also have the complete data. The author primarily extracts data from Bloomberg Terminal and other reputable sources to address missing data and exclude companies with substantial data gaps, thereby enhancing the robustness of the analysis.



C. Findings and Implication

Cultural Heritage issue can impact to the investor's decision and perception toward their investment plan which can influence the company's cost of capital.

D. Writing Structure

- Introduction
- Theoretical Foundation
- Conceptual Framework and Hypotheses
- Methodology
- Result and Discussion
- Conclusion and Recommendation

THEORETICAL FOUNDATION

According to Silva (2021), around two-thirds of companies are incorporating Sustainable Development Goals (SDGs) in their operations. They either align their existing activities with SDGs or utilize them as a reference to plan future activities, whether it's their core business or sustainability initiatives. Based on Fernando & Lawrence (2018), social contract exists between company and its respective societies as expressed in the legitimacy theory. Other than legitimacy theory, there is stakeholder theory which suggests that effective management requires the balanced consideration and ethical treatments toward its stakeholders. Within this ethical perspective, managers are expected to manage the business for the benefit of all stakeholders (Hasnas, 2016). Stakeholder theory covers management's fundamental obligations that not only to maximize the firm's financial success, but also to ensure its survival by balancing the conflicting claims of multiple stakeholders.

A. Cultural and Natural Heritage

According to UNESCO (2009), cultural heritage includes artefacts, monuments, a group of buildings and sites, museums that have a diversity of values including symbolic, historic, artistic, aesthetic, ethnological or anthropological, scientific and social significance. It includes tangible heritage (movable, immobile and underwater), intangible cultural heritage embedded into cultural, and natural heritage artefacts, sites or monuments. The definition excludes intangible cultural heritage related to other cultural domains such as festivals, celebration etc. It covers industrial heritage and cave paintings. Whether natural heritage consists of natural features, geological and physiographical formations and delineated areas that constitute the habitat of threatened species of animals and plants and natural sites of value from the point of view of science, conservation or natural beauty. It includes nature parks and reserves, zoos, aquaria and botanical gardens (UNESCO, 1972).

Issues on cultural heritage can lead to unwelcome risk to some companies also may affect their reputation. In response to that, according to Mason & Ying (2020), financial institutions typically will avoid projects that have cultural heritage issue. Changes that have a notable effect on cultural and natural heritage can result in demonstrations, unfavorable media coverage, or criticism from influential non-governmental organizations (NGOs) like the International Council on Monuments and Sites. This negative perception can also spread to entities involved in project funding, potentially damaging their reputation. Consequently, investors and investment managers are increasingly opting to incorporate ESG considerations into their financial evaluations. Projects associated with significant adverse impacts on cultural and natural heritage can impact both financial institutions and advocates of development.

Financial institution in developed countries mostly will avoid financing projects that could result in a World Heritage Sites (WHS) being placed on the UNESCO "In Danger" list (Cameron and Rössler 2013; Meskell 2013 in Mason & Ying, 2020). In contrary in the developing country, such as in Chinese banks they are more conservative when encountering projects involving significant cultural heritage. They view cultural and natural heritage as a niche concern, and they do not have a dedicated person or team to address this consideration.

World's leading financial institutions as investor, will follow the global guidelines for the investment, which is The Equator Principles Financial Institutions (EPFIs). EPFIs are intended to serve as a common baseline and risk management framework for financial institutions to identify, assess and manage environmental and social risks when financing Projects.



B. Theories related to Cultural and Natural Heritage and Cost of Equity

To date, almost none a single research exist which assessing the cultural and natural heritage and its impact to the cost of equity. Hence, author attempt to explore the relationship between cultural and natural heritage which could be classified as social activity in the Corporate Social Responsibility (CSR). CSR has been long-practiced by the companies to regulate their activities in a manner that generates favorable outcomes for the environment and society. Following D. Dhaliwal et al., 2014; D. S. Dhaliwal et al., 2011; Petrova et al., 2012; Rao, 2023; Tang, 2022; Xu et al., 2015; Yang & Yulianto, 2022, CSR practice has impacted to the cost of equity figure of a company. Therefore, the previous research, which study about the CSR and its impact to the cost of equity, is still compatible to be referred in this research. Based on those research results, mostly concluding that CSR disclosure has significant affecting to the cost of equity capital. The relationship is negative association, which means the better the CSR disclosure information, the lower the cost of equity. We expect on the research in cultural and natural heritage also has negative association with the cost of equity, means that company who concerning more on that will be benefited by the lower expectation of investors on their required rate of return (cost of equity in the organisation).

Cultural and natural heritage concern as part of Sustainable Development Goals (SDGs) target, hold the relationship with ESG performance as the research conducted by Soni (2023), which examines the linkage between firm-level ESG disclosures and their relationship with country-level SDG scores. It means that cultural and natural heritage disclosure on the ESG report, which could be classified as social pillar, is important and required by the investors and affecting nationally SDGs target as well. Furthermore, the important of ESG or CSR disclosures keep increasing according to Gillan et al. (2021). It is depicted by the increasing investments on ESG or CSR that reports 300 mutual funds with ESG mandates received a total of \$20 billion in net flows, which was four times the 2018 total. In addition, currently more than 3,000 institutional investors and service providers that have signed onto the Principles of Responsible Investment (PRI), an agreement to incorporate ESG or CSR issues into their investment analysis and decision-making processes. Over 2006 up to 2019, assets under management for these investors has increased 122 times fold, from \$6.5 trillion in 2006 to over \$86 trillion in 2019.

Many companies have started to use the SDGs as a benchmark to measure their sustainability performance and are aligning their ESG practices with the SDGs (Bose & Khan, 2022 in Soni, 2023). There is a lack of research on how companies implement Sustainable Development Goals (SDGs) at their level according to Ike et al. (2019), which making it uncertain how the private sector can effectively put them into practice through corporate sustainability. Although each SDGs is considered equally important, it is left to companies themselves to interpret and decide which ones to prioritize in their implementation efforts. The result from that research denotes that Goal 11: Sustainable Cities and Communities is the most considered as priority for company, although not specifically mentioning Cultural Heritage concern as part of Goal 11 (SDG 11.4: strengthen efforts to protect and safeguard the world's cultural and natural heritage). To conclude the importance of cultural and natural heritage concern, hence we attempt to have deeper research on the relationship between cultural and natural heritage concerns and cost of equity in the global cement industries.

CONCEPTUAL FRAMEWORK AND HYPOTHESES

The idea of this research is coming from the cultural and natural heritage issue that is experienced by the company, and we attempt to focus on cement and cement-related industry. The cultural and natural heritage issues is found in one of the cement company and other sample from one of mining company. It depicts the importance of cultural and natural heritage management of a company that if not well-managed will cause any problem to them particularly on investor's perception which lead to their interest decision. From this framework, we build the hypotheses for testing the theories and guiding the research as follow:

- H1. There is a negative correlation between cultural and natural heritage performance and cost of equity*
- H2. SDGs score as the control variable have significant result and negative correlation to cost of equity*

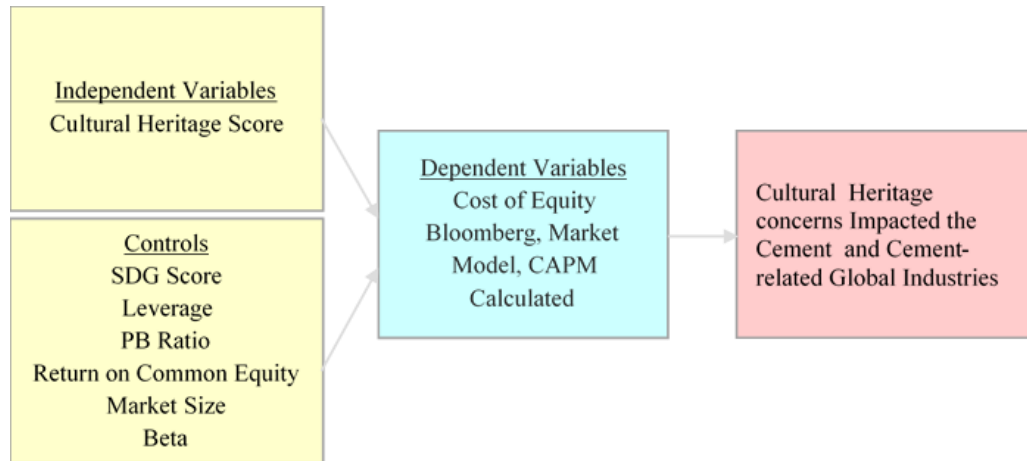


Figure I. Theoretical Framework

METHODOLOGY

A. Data Collection

Author collects standalone Sustainability Report or Integrated Annual Report from global cement and cement-related companies to obtain the information about cultural and natural heritage concern as well from various credible internet-based sources, including the media news and firms’ own websites. Whereas, for other control variables data we obtain from Bloomberg Terminal from 2018 up to 2022 Financial Year. For the cultural and natural heritage, we specifically just collect the 2022 Financial Year due to the lack of Sustainability Reports available in most companies before 2022. These datas are considered as our primary data because there is any assessment and simulation toward each company’s cultural and natural heritage score.

Secondary data in this research are collected from Sustainalytics Website, Company Website, Bloomberg Terminal and other credible available sources. The company are selected from the Sustainalytics Website which have ESG ratings and in the "Construction Materials" category all over the World. At first, there are 118 companies in that categories, but there is decreasing in the sample because of some other criteria did not met. After excluding observations that lack the information needed to calculate the cultural and natural heritage score as independent variable necessary for our analysis, we obtain 75 companies that satisfy the requirements to be analyzed and represent global cement and cement-related industries. Further criteria is based on the cement and cement-related company listed on the Bloomberg terminal, which have some independent variables and control variables set by author based on the related journal such as Yang & Yulianto, 2022; Xu et al., 2015; and other as written in Literature Review. Furthermore, cultural and natural heritage index as the independent variable is scored based on the parameters obtained from Amelia et al., (2022) with some modification by author.

Table I. Definition of Variables

Variable	Period	Definition	Reference
Dependent Variable			
• Cost of Equity Bloomberg, Market Model, CAPM Calculated	FY2018- FY2022	The cost of obtaining equity or expenses incurred by the company during the use of equity, calculated by Bloomberg method, Market Model method, CAPM method	(Yang & Yulianto, 2022)
Independent Variables			
	FY2022	Scoring based on the cultural and natural heritage concern expressed in	(Amelia et al., 2022)



Variable	Period	Definition	Reference
<ul style="list-style-type: none"> Cultural and Natural Heritage Index Score 		their official report, media news or other issues.	
Control Variables			
<ul style="list-style-type: none"> Price to Book Ratio 	FY2018- FY2022	the company's current stock price per share divided by its book value per share (BVPS)	(Yang & Yulianto, 2022)
<ul style="list-style-type: none"> Total Debt to Asset (Leverage) 	FY2018- FY2022	degree to which a company has used debt to finance its assets	(Yang & Yulianto, 2022)
<ul style="list-style-type: none"> Return on Common Equity 	FY2018- FY2022	the amount of profit or net income a company earns per investment dollar	(Yang & Yulianto, 2022)
<ul style="list-style-type: none"> Market Cap (company size) 	FY2018- FY2022	Company size represented using the natural logarithm of total assets	(Petrova et al., 2012)
<ul style="list-style-type: none"> Beta 	FY2018- FY2022	measure of a stock's volatility in relation to the overall market	(Yang & Yulianto, 2022)
<ul style="list-style-type: none"> SDG Score 	FY2018- FY2022	SDG overall score by UN, which is in SDG11 not included the SDG 11.4 yet, so author can treat them as control variables	(Sachs et al., 2023)

B. Data Analysis

This study employs three methods that are descriptive statistics, multiple linear regression and panel regression. Descriptive statistics and panel regression will not be explained in detail in this study since mostly the method used is multiple linear regression. The multiple linear regression will be conducted based on the previous research by Ngo, Hoang (2012). Descriptive statistics only used to assess the cultural and natural heritage score based on the assessment on Sustainability Report, media news and other credible web-based sources. The hypotheses will be tested using multiple linear regression with Minitab software. Panel regression will only be applied to assess the SDGs’ score which sufficiently has more than one year data which is expected to be able to represent the cultural and natural heritage effect across the years, since cultural and natural heritage is one of the SDGs target specifically in SDG11.4. When SDGs score used as the control variable of cost of equity regression, the effect is more significant than if it’s not included. For the compliance with the statistical procedure, all variables will be tested for its normality, multicollinearity and their correlation matrix.

Multiple Linear Regression

To obtain the conception of the hypotheses proposed, author use multiple linear regression for assessing the relationship between dependent, independent and control variables. Following literature, here is the multiple linear regression model to test hypotheses 1 and 2 (Xu et al., 2015; Yang & Yulianto, 2022) as follows:

$$Cost\ of\ Equity = \beta_0 + \beta_1\ Independent\ variables\ (Cultural\ and\ Natural\ Heritage\ Index) + \beta_2\ Controls + error$$

where:

- Cost of Equity is the measurement of investor’s equity rate of return using Capital Asset Pricing Model (CAPM) by Bloomberg, Market Model, and other models accepted by the current literature.



- Cultural and Natural Heritage Index/Score is an index that showing all relevant measurements of how the company concerns about the cultural and natural heritage, measured independently. For robustness, we will also measure this by using SDGs Score from Sustainable Development Report.
- Controls are the firm characteristics such as Market Size (Market Cap), Leverage (Total Debt to Total Asset), Price to Book Ratio, and Return on Common Equity (ROCE) and SDGs Score.

RESULT AND DISCUSSION

A. Result

In the latest Sustainability Report that have been issued by those 75 companies, some companies have started disclosing their concerns on cultural and natural heritage. We observe that Indian cement companies are more openly expressed their concern. Cultural and Natural Heritage scoring was assessed independently by author with the parameter based on the previous research about the weighted index of cultural and natural heritage disclosure in Indonesia (Amelia et al.,2022). The selection of parameters have been described in the Chapter III, subsequently, the calculation is done by using dummy model as for its availability. For available concern will be scored by “1”, while if it is not available is scored “0”. Table IV.3. shows the scoring method of cultural and natural heritage index and table IV.4. shows the score of all 75 sample companies.

Table II. Scoring Method Of Cultural and Natural Heritage Index

NO	PARAMETER	AVAILABILITY	POIN	WEIGHTED INDEX (Amelia et al., 2022)	WEIGHTED SCORE {(poin x weighted index)/total weighted index}
1	Compliance with the law/have CHMP/ have the policy to regulate	YES	1	1.04	0.147
		NO	0		0
2	Program for protect	YES	1	1.02	0.144
		NO	0		0
3	Program for preserve	YES	1	1.02	0.144
		NO	0		0
4	Cultural Heritage expense	YES	1	1.01	0.143
		NO	0		0
5	Program for promote	YES	1	1.01	0.143
		NO	0		0
6	Program for maintenance	YES	1	1.01	0.143
		NO	0		0
7	Operation in protected area/ concern to cultural heritage issue	YES	1	0.96	0.136
		NO	0		0
Total				7.07	1.00 (100%)

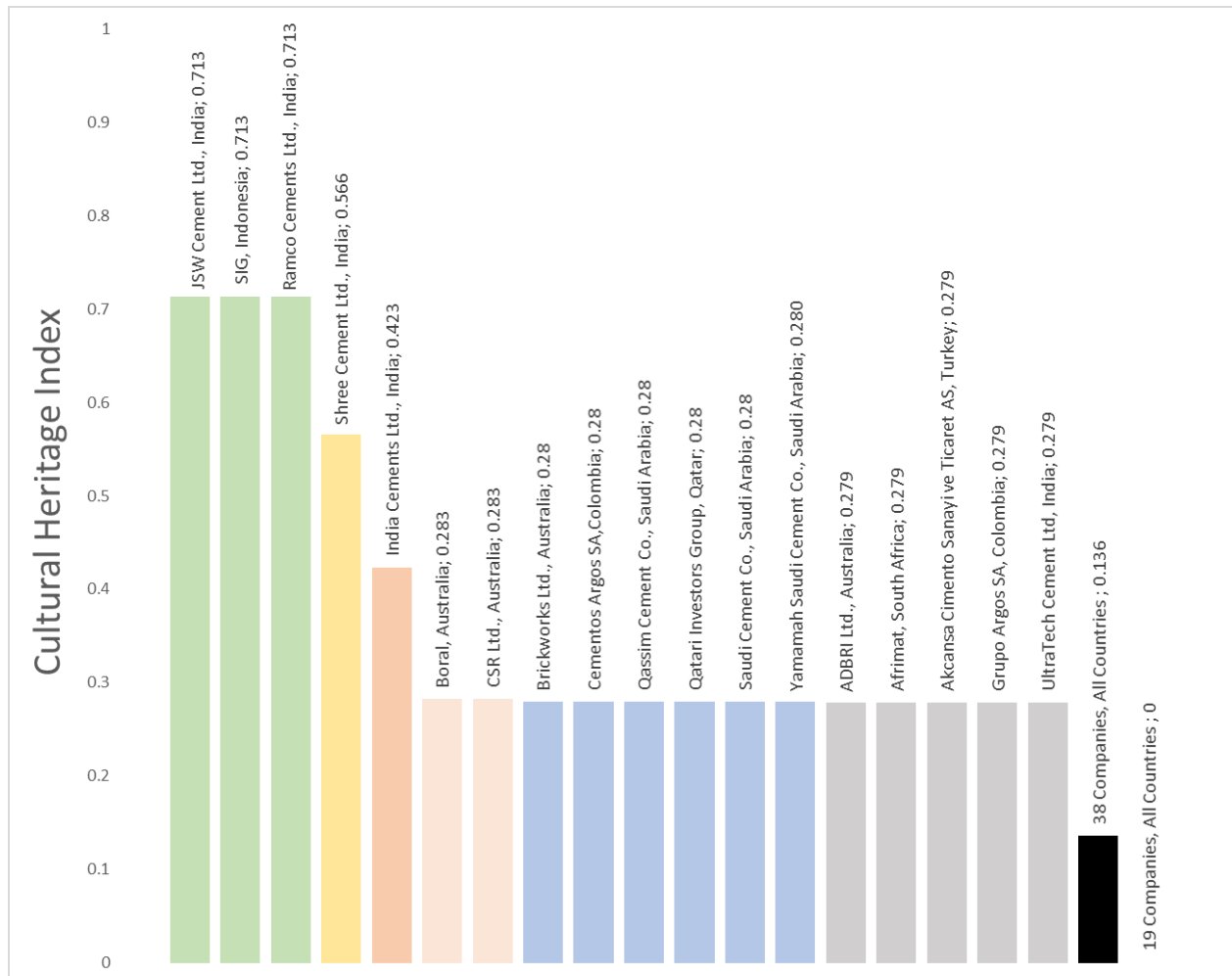


Figure II. Cultural and Natural Heritage Score/Index of 75 Sample World Cement and Cement-Related Companies

To conduct the regression method, we need to do some various test for the robustness and validity of the analysis which encompasses:

- Normality Test
Normality test in this study is conducted by using Minitab software. All the result of normality test for the four models of CoE which are: CAPM Bloomberg, CAPM Calculated, Market Model, and Averaged Normality Test are considered normal.
- Correlation Matrix Test
Variables have been tested by the correlation test, which results that all variables have low correlation therefore it can be included in the multiple linear regression process.
- Multicollinearity Test
From the test which conducted, there is no multicollinearity occurred in the data variables.

After those test are conducted we got the result that all variables are valid to be tested therefore we run the multiple linear regression and panel regression.

1. Multiple Linear Regression Result



Table III. Multiple Regression Result of Cultural Heritage Index to Cost of Equity

Variables	No. of Obs	Cost of Equity CAPM (Bloomberg)		Cost of Equity Market Model		Cost of Equity CAPM (Calculated)		Cost of Equity Averaged	
		[coeff]	[p-value]	[coeff]	[p-]	[coeff]	[p-value]	[coeff]	[p-value]
Cultural Heritage	56	-5,30	0,033	-6,12	0,016	-2,49	0,37	-3,49	0,033
SDGs Score	350	-0,168	0,006	-0,202	0,002	-0,488	0	-0,12	0,002
PB Ratio	353	-0,061	0,404	-0,07	0,337	-0,01	0,9	-0,04	0,352
Leverage (Debt to	361	0,023	0,434	0,034	0,266	0,05	0,14	0,024	0,220
Return on Common	367	0,146	0,000	0,152	0,000	0,14	0	0,098	0,000
Market Size	358	-0,613	0,006	-0,551	0,014	-0,063	0,8	-0,38	0,009
Beta	368	8,86	0,000	12,01	0,000	5,56	0,004	6,1	0,000
R-Sqr		59,75%		65,16%		58,40%		60,97%	
Average VIF		1.098		1.102		1.091		1.091	

It can be concluded that from the multiple linear regression we have the results as follow:

- There is a negative relationship between cultural and natural heritage performance and cost of equity
 - Cost of Equity by CAPM Bloomberg
Resulting p-value 0.033 that means significant if under 10% (0.1), and can be interpreted that every increase of 1-unit point it will decrease 5.3% in cost of equity.
 - Cost of Equity by CAPM Calculated
Resulting p-value 0.373 that means not significant (more than 10%), therefore we are not interpreting this result.
 - Cost of Equity by Market Model
Resulting p-value 0.016 that means significant if under 10% (0.1), and can be interpreted that every increase of 1-unit point it will decrease 6.12% in cost of equity.
 - Cost of Equity Averaged
Resulting p-value 0.033 that means significant if under 10% (0.1), and can be interpreted that every increase of 1-unit point it will decrease 3.49% in cost of equity.
- There is a negative relationship between SDGs score and cost of equity
As control variable, SDGs score add more significance in the relation of cultural heritage index to the cost of equity. It is showed that in any calculating method, SDG has significance impact along with its negative correlation which is supporting this hypotheses.

B. Business Implication and Discussion

Implication of these finding are that cultural and natural heritage issue can be a threat for the company image as well can influence various aspects of company activities, if it is not well managed. Therefore, companies should start concern on any cultural and natural heritage since it has significant implication for investor’s decision and perception which can be depicted in its each cost of equity.

CONCLUSION AND RECOMMENDATION

A. Conclusion

The result from this analysis is essential for investors and the Company. It enables us to make informed decisions, identify, manage, and mitigate risks. In addition, it also could assist in aligning the strategies with the sustainable and responsible investment goals.



From this research, we can conclude that:

1. Mostly of Indian cement companies that are, India Cements Ltd.; JSW Cement Ltd.; Shree Cement Ltd.; The Ramco Cements Ltd.; and UltraTech Cement Ltd., which already have stated their concern to the cultural and natural heritage, on the top of that they explicitly allocating their budget to protect, preserve and promote the cultural and natural heritage. In Indonesia, PT Semen Indonesia (Persero) Tbk. have stated its concern and has the Cultural Heritage Management Plan (CHMP). From author self-assessment based on literature on cultural and natural heritage index, those companies have the highest score which means they are the most concerning to cultural heritage amongst its peers.
2. Cultural and natural heritage score and SDGs is proven to give impact to the cost of equity of Company. The higher the score means the more they concern to the cultural and natural heritage, the lower the expected rate of return (cost of equity). The result of this research is showing that cultural and natural heritage issue is negatively impact the cost of equity. The better the cultural and natural heritage score of a company, the lower its cost of equity compared among its peers. The regression analysis result in P-Value 0.016; coefficient -6.12 for cultural and natural heritage index impact to cost of equity (in market model) and in P-Value 0.033; coefficient -5.30 for cultural and natural heritage index impact to cost of equity (in Bloomberg CAPM) for 2022. Means every increase of 1 unit point of cultural and natural heritage index will be lower its cost of equity by 6.12% in Market Model method and by 5.30% in CAPM method.

From this research, we can conclude that the result is conformable with other previous research which convey that ESG/SDG/CSR performance correlates negatively the cost of equity as have been explained in the literature by ADB Institute (2020); Cornell (2021); D. Dhaliwal et al. (2014); Rao (2023); Tang (2022); Xu et al. (2015); Yang & Yulianto (2022).

B. Recommendation

1. Author recommends the future researcher to develop on the sustainability reporting which contain about the cultural and natural heritage concern in order to get the comprehensive assessment on Company's awareness.
2. Author hopes that company will increase their concern to the cultural and natural heritage management include at the minimum effort to compose Chance Find Procedure to give the guidance if there is any previously unknown cultural and natural heritage encountered during project activities. For the company who has cultural and natural heritage, it is required to compose Cultural Heritage Management Plan (CHMP) to promote sustainable management and facilitate the coordination among all the parties by increasing the awareness of communities, thereby encouraging all people to enjoy and understand the site.
3. Rating agencies, such as Bloomberg may develop the detail on their scoring specifically in SDG 11 Cities - Potential Revenue Impact Percentage, as well as the rating of their performance on cultural and natural heritage management, so investor can value better about Company's concern on Cultural and Natural Heritage.

Finally, the author hopes that the result from this research can be a stepping-stone for company as guidance toward cultural heritage management and for investors and stakeholders to assess the company's concern which will they invested, as well to make investment choices that represents their values and goals.

LINKS AND BOOKMARKS

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