

THE IMPACT OF DISCLOSING ENVIRONMENTAL SUSTAINABILITY PRACTICES ON IMPROVING INVESTOR DECISIONS: AN ANALYTICAL STUDY OF INDUSTRIAL COMPANIES IN BABYLON

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ABSTRACT

This research aims to assess the level of disclosure regarding the dimensions of sustainable development (economic, social, and environmental) in companies, and to demonstrate the impact of this disclosure on investment decisions. The research stems from the fact that sustainable development has become a global imperative requiring transparency, especially in light of rapid industrial growth and its impact on these three dimensions. The research employed a descriptive-analytical approach, using data collected from a sample of companies in Babylon Governorate (N=80). The descriptive statistics revealed a general consensus among the sample regarding the importance of all study variables, with the averages for the four dimensions exceeding the hypothetical mean (3). Furthermore, opinions on investment decisions were characterized by a high degree of homogeneity. The main findings revealed a disparity in the perceived importance of the dimensions; the economic and social development dimensions recorded the highest averages, indicating that companies focus on disclosures with direct impact. In contrast, the environmental development dimension ranked lowest, indicating a relative weakness in its integration within the disclosure process that influences investment decisions. The research concluded that it is necessary to enhance environmental disclosure to ensure balance across the dimensions of sustainable development, standardize social disclosure criteria, and raise awareness among management and investors to enable them to use sustainability information more effectively in investment decision-making.

Keywords: disclosure; sustainability disclosure; investment decisions

INTRODUCTION

Investors' and stakeholders' informational needs for a thorough assessment of a company's past performance and forecasting of its future performance can no longer be satisfied by relying only on financial disclosure, particularly in light of the global focus on environmental sustainability challenges and their impact on corporate performance and sustainability. (Bernardi & Stark, 2018). Consequently, it has become

essential to reconsider the informational content of traditional financial reports to better meet the needs of investors and users of these reports. The information currently provided represents only the minimum level of disclosure, prompting a focus on expanding the scope of disclosure to include the disclosure of companies' environmental sustainability practices. This aims to provide investors with relevant information that enables them to make sound investment decisions (Arafa &

Meligy, 2016). As a result, interest in corporate environmental sustainability disclosure initiatives has grown at both the academic and professional levels. The goal is to provide appropriate environmental information for investors and decision-makers, and to modify and develop the traditional financial reporting model to reflect both financial and non-financial information for its users. This will allow for an assessment of a company's success in achieving its economic and environmental sustainability objectives. This has led to... The initiatives propose financial and non-financial disclosures that include environmental dimensions, through a new approach to disclosing environmental sustainability standards.

The exacerbation of environmental problems, the increasing pace of climate change in recent times, and their negative repercussions on the financial and economic conditions of companies have raised doubts about the ability of traditional financial reports to accurately reflect company performance and provide a comprehensive picture of all their activities. This is especially so given the global trend for large corporations to adopt environmental sustainability initiatives and the increasing pressure from communities, both government and non-government, and

investors for disclosure of environmental sustainability practices. Also, firms are trying to present more reliable financial statements and show we have got transparency in order to develop creditability and corporate legitimacy. The inadequacy of financial reporting in communicating environmental sustainability performance – and by implication its limitations in meeting stakeholder needs, at a time when ethical investing is on the increase – is the main issue to which this note responds. This is further obscured by poor accounting standards related to the disclosure of environmental sustainability report. That would lead to variations among the companies in terms of environmental sustainability, thus making investment decision for investors to assess relatively complicated.

LITERATURE REVIEW

In recent years, sustainability reporting has garnered increasing attention in both industry and academia. Companies with a strong presence, whether in terms of sector, size, or other factors, appear to be over-disclosing sustainability information. It has been argued that voluntary disclosure of sustainability information is often used as an impression management tool, with the majority of information disclosed in

sustainability or corporate social responsibility reports portraying the reporting company in a positive light. However, revised sustainability reports are likely to raise doubts about the reliability, comparability, and intrinsic relevance of the published information (Lougee and Wallace, 2008; Holder Web et al., 2009) Theoretical framework of study Sustainability reportage is one of the means to convey inner workings of necessitated principle again its business demonstration.. The conceptual framework is presented in the figure below.

Disclosing Environmental Sustainability

Environmental sustainability is a significant issue facing society today. It is described as the capacity to preserve important elements in the physical environment, including flora, water, air, and energy, for future use(Sutton,2004).It is a critical part of social and economic sustainability (Morelli,2011). People are dependent on the physical environment in many ways and there may be short-term needs for good environmental conditions to ensure the survival of individuals and/or communities in accordance with social sustainability. Instead, economic sustainability directly relies on the flow of environmental resources and services; thus

also economic maintenance is dependent on the environmental one (Sutton 2004). Then we have to live greener lives and at homes, if it's up to us to save our ecosystem as non-repairable would result in a very hard environment to survive under the planet of Earth.

The reporting of carbon emissions generated by corporations due to their activities is grounded in sociopolitical theory. Sociopolitical theory examines the interplay between society and social institutions, highlighting the interdependent link between the state and society. Sociopolitical theory about carbon emissions deployment emphasizes the significant influence of social and political variables in the formulation of carbon emissions reduction programs. Moreover, sociopolitical theory has developed into legitimacy theory and stakeholder theory within the field of accounting science. Dolly et al. (2025). According to legitimacy theory, firms are obligated to reconcile their corporate objectives with societal needs across all dimensions, including environmental considerations, to avoid a legitimacy gap (Irwhantoko & Basuki, 2016). Alignment may manifest as operational operations that adhere to societal norms and values while complying with all governmental rules and regulations,

so ensuring firm performance aligns with social ideals. Poor environmental performance is believed to heighten the risk to corporate social legitimacy; hence, to preserve the legitimacy of the company's operations, comprehensive disclosure in the annual report is essential, including the reporting of carbon emissions (Pratiwi et al., 2021). In addition to being elucidated by legitimacy theory, the disclosure of carbon emissions is intrinsically linked to the influence of stakeholders. Corporate disclosure of carbon emissions also addresses stakeholder expectations and requirements. Investors increasingly concerned about environmental concerns anticipate comprehensive information about the carbon effect of their investments in firms. This occurs because, according to this idea, organizations must fulfill stakeholder expectations and get their support to ensure their objectives (Akbaş & Canikli, 2019). Ultimately, the disclosure of carbon information may mitigate the information disparity between stakeholders and the firm, therefore enhancing the company's image (Desai, 2022). Furthermore, stakeholder theory elucidates that a company's voluntary disclosure indicates its capacity to adequately react to societal and political constraints (Akbaş & Canikli, 2019).

Sustainable development emerged to address the environmental and social concerns arising from rapid global industrial growth. As the scope of this industrialization and its long-term effects on the environment, economy, and society increase, sustainability is no longer merely a term but a pressing necessity requiring sustained societal attention (Booher, 2015, p. 17). Therefore, sustainable development is a comprehensive concept that focuses on the efficient and rational use of resources (Chen, 2013, p. 6). According to Booher (2015) and Chen (2013), the dimensions of sustainable development are the economic, social, and environmental dimensions. The economic dimension in the context of sustainable development and disclosure goes beyond mere profitability; it focuses on the ability of an organization to create sustainable economic value in the long term, and how its activities affect broader economic systems at both the local and global levels. The social dimension focuses on balancing the fulfillment of human needs with ensuring that natural resources are not overburdened, especially in light of population growth (Chen, 2013). As for disclosure, it encompasses the optimal use of human resources and the provision of necessary care and support, such as improving healthcare and education, to

enhance individuals' capabilities and help them face challenges and achieve sustainable human development (Olkinora, 2014). The environmental dimension gains its importance from addressing the relationship between development and the environment, clarifying the foundations and limits that must not be exceeded to ensure the sustainability of natural resources (Al-Ardawi, 2018). This dimension requires sound environmental management aimed at achieving a balance between the economic and environmental systems (Al-Saidi, 2012). Despite the difficulty of integrating the three dimensions, the environmental focus centers on preserving ecosystems and the efficient use of environmental capital, which translates into a rate of growth in environmental sustainability (Masoudi et al., 2019).

Investment decisions

The most important part of making an investment decision is picking a stock from a wide range of options on different stock exchanges. Conventional economic theory posits that individuals, regarded as rational agents, leverage their knowledge, experience, and expectations to exploit opportunities. The behavioral framework of financial decision-making, encompassing emotional inclinations, established

cognitive processes, and psychological biases, elucidates the interpretative lens through which investors perceive their environment and make investment choices (Jagongo & Mutswenje, 2014; Bhanu, 2023). Investing decisions have usually been based on a basic triangle of risk, liquidity, and return. Nonetheless, an increasing number of investors have embraced the comprehensive square, encompassing liquidity, risk, return, and sustainability (VonWallis & Klein, 2015). As a result, investors' processes for making investment decisions are different for each person, rather than being the same for everyone. Many different investors use different strategies when it comes to picking stocks or bonds. Some people may only look at the financial returns of an investment when making a decision, while others may look at both the financial results and ESG factors.

The influence of disclosing environmental sustainability on investor decisions

From the researchers' perspectives, the meaning of sustainability disclosure and investment decision-making may differ. The practice of companies and institutions freely disclosing details of their environmental, social, and governance (ESG) performance is known as

sustainability disclosure. This encompasses reporting on sustainability-related activities such as corporate governance practices, social responsibility programs, diversity and inclusion initiatives, and environmental impacts (Lewis et al., 2020). Sustainability disclosure involves the voluntary or mandatory sharing of information by companies about their ESG practices and their impacts on society and the environment, enabling stakeholders, including investors, to assess the company's commitment to sustainability and make informed choices (Al-Zoubi et al., 2019). Conversely, investment decision-making involves evaluating diverse investment opportunities by individuals, fund managers, or organizations, followed by allocating funds to different assets or securities. This process includes assessing factors such as risk, return potential, and other relevant aspects to create portfolios that align with the investor's financial objectives and risk tolerance (Ng, C, 2023). Furthermore, it involves a systematic strategy for selecting and managing investment assets, taking into account diverse factors such as financial data, market conditions, investor preferences, and increasingly, environmental, social, and governance (ESG) criteria. It is a deliberate endeavor designed to maximize returns

while efficiently mitigating ESG risks (Ganji et al., 2023). Sustainability disclosure significantly impacts investment decision-making by providing investors with essential information about a company's risks, opportunities, and long-term viability in relation to ESG factors (Çakali & Baloglu, 2023). In an investment environment where ESG concerns are paramount, sustainability disclosure has emerged as a crucial element in assessing investment potential. Research findings highlight the relationship between sustainability disclosure and investment decision-making. The reference (Seliang, Y., & Tapatfeto, 2021) indicated that environmental sustainability disclosures in listed companies negatively impact stock returns, suggesting that investors may not adequately consider these disclosures when evaluating stock value. This impact is particularly significant for companies with financial constraints. Conversely, Dahiyat (2022) highlighted the importance of sustainability information in attracting investments from socially and environmentally conscious investors. They explored several aspects that positively influence the presentation and disclosure of sustainable development information within organizations. Assessing a company's environmental impact in relation

to ESG disclosure levels (Cooper, 2022) and Sethibi & Naidu (2022) confirmed that stakeholders are increasingly demanding greater openness and comparability of disclosures, especially regarding climate-related information from major emitters. This has led to a greater emphasis on sustainability information within the investment decision-making process. Moda et al. (2022) argued that the degree of sustainability reporting may not directly affect investment efficiency, implying that non-financial information may not play a decisive role in investment choices. Figure 1 presents a diagram of the proposed conceptual framework for this study, illustrating the impact of sustainability disclosure factors on investment decision-making. This study aims to evaluate theories about the interrelationships between the three elements of sustainability disclosure and investment decision-making. Accordingly, our argument is offered below:

H1: Economic development influences investment decision in Iraqi companies

H2: Social development influences investment decisions in Iraqi companies.

H3: Environmental development influences investment decisions in Iraqi companies.

H4: disclosing environmental sustainability practices influences investment decisions in Iraqi companies

RESEARCH METHOD

Population And Sample Study

The research relied on a questionnaire as its primary data collection tool. Its items were designed to cover the research dimensions and variables, namely, disclosure of environmental sustainability (independent variable) and investment decisions (dependent variable). The questionnaire was distributed to the administrative, financial, and accounting staff working in a sample of industrial companies in Babylon Governorate, (112) employees, distributed across (4) companies.

Data-collection Methods

The research population consisted of a sample of (112) financial and accounting employees working in industrial companies in Babylon Governorate. A random sample of (80) was selected from the (112) to ensure population representation. All samples were valid for statistical analysis. Table (1) shows the distribution of the study population and the study sample among the companies. Table (1) also shows the number of employees in each company in Babylon Governorate.

Table 1. Population And The Study Sample

No.	Company name	No. of employees	Sample
1.	Al-Ittihad Company	37	24
2.	Al-Furat Company	17	12
3.	Al-Waha Company	16	12
4.	General Company for Automotive and Equipment Manufacturing	42	32
Total		112	80

Data-analysis Methods

To achieve the objectives of study and answer the research questions, this study employed data analysis, IBM SPSS software was used for the analysis. Measures of central tendency, such as standard deviation and arithmetic mean, were used as descriptive statistical measures. The reliability of the constructs was confirmed using Cronbach's alpha coefficient. Since the aim of this study was not to develop a predictive model for the dependent variable based on the independent variable, no control variables were used. Instead, the focus was on identifying potential relationships between the relevant variables. Statistical relationships between the variables of interest were measured using Pearson's correlation coefficient. Three linear regression tests were conducted to validate the hypotheses concerning the direct relationships of interest.

RESULT AND DISCUSSION

Reliability Analysis

Table 2. Reliability Analysis

Items	Cronbachs Alpha	reliability coefficient
Economic development	0.832	0.912
Social development	0.795	0.891
Environment development	0.805	0.897
Total	0.810	0.901
Decision investment	0.895	0.946

To ensure the reliability of the research instrument, Cronbach's Alpha test was used to measure the internal consistency reliability of the questionnaire items, which were designed according to the Likert scale. As noted by Sekaran (2003), a reliability coefficient of 0.70 or higher is considered acceptable for scientific research purposes. The results in Table 2 show that the Environmental Sustainability Disclosure axis achieved a high reliability coefficient of 0.901, while the Investment Decisions axis recorded a reliability coefficient of 0.946. Overall, the total reliability of the instrument was 0.967, confirming the high reliability of the research instrument and the suitability of its items for statistical analysis.

Descriptive Statistic

Table 3. Descriptive Statistic

Variables	N	Mean	Std. Deviation
Economic development	80	3.23	0.639
Social development	80	3.22	0.736
Environment development	80	3.06	0.656
Decision investment	80	3.14	0.514

Table 3 presents the descriptive statistics for the four study variables, with a sample size (N) of 80 individuals. Given that the hypothetical mean on the measurement scale is 3, all the recorded arithmetic means for the four variables exceeded this value, confirming a general consensus among the sample members regarding the importance or perception of the variables under study. Comparing the mean values, the dimensions of sustainable development were similar, all exceeding the hypothetical mean (3). Economic development recorded the highest mean at 3.23, followed closely by social development at 3.22. Environmental development had the lowest mean at 3.06. Although lower than the other two dimensions, it still reflects a level of perception or practice that goes beyond neutrality. The dependent variable, investment decision, recorded a mean of 3.14, further confirming this consensus. Regarding dispersion, measured by

standard deviation, the sample responses showed the highest degree of homogeneity and agreement concerning the investment decision variable (lowest standard deviation = 0.514), while social development recorded the highest divergence of opinions (standard deviation = 0.736). However, the convergence of all means generally confirms a positive consensus in the evaluation of all study variables.

Hypothesis Testing

This section deals with testing the impact hypotheses to determine whether they can be accepted or rejected. Simple and multiple regression coefficients will be used.

H1: Economic development influences investment decision in Iraqi companies

Table 4. The Impact Of Economic Development On The Quality Of Investment Decisions

Independent variable	A	B	(R ²)	F	P-Value	Dependent variable
<i>Economic development</i>	1.746	0.52	0.459	137.331	0.000	Decisions Investment

Table 4. shows the results of the simple regression analysis to test the impact of economic development on investment decisions. The results showed the following: Strength and direction of the

relationship: The regression coefficient (β) reached a value of (0.52), indicating a

positive (direct) impact of economic development on investment decisions. This statistically means that any one-unit improvement in the level of economic development will lead to an increase in the quality of investment decisions by (0.52). Explanatory Power of the Model: The coefficient of determination (R^2) reached a value of (0.459), which means that economic development is able to explain (45.9%) of the variance (changes) in the dependent variable, the quality of investment decisions, while the remaining (54.1%) is attributed to other factors and variables not addressed by this model. Significance of the Model: The calculated F-value of (137.331) confirmed the validity of the model used, as it was statistically significant at the significance level (p -value = 0.000). Since the probability value is less than the adopted significance level (0.05), this leads us to reject the null hypothesis and accept the alternative hypothesis, thus confirming the existence of a statistically significant effect of economic development on the quality of investment decisions.

H2: Social development influences investment decisions in Iraqi companies.

Table 5. Illustrate The Impact Of Social Development On The Quality Of Investment Decisions

Independent variable	A	B	(R^2)	F	P-Value	Dependent Variable
Social development	1.43	0.616	0.517	17	0.000	Decision investment
	8			3.2		

The results of the statistical analysis shown in Table (5) illustrate the impact of social development on the quality of investment decisions. The detailed results are as follows: Direction and strength of effect: The regression coefficient showed a positive value of (0.616), indicating a strong, direct effect. This is statistically interpreted as meaning that raising the level of social development by one unit leads to an improvement in the quality of investment decisions by (0.616). Explanatory power (R^2): The coefficient of determination recorded a value of (0.517), indicating that the characteristic of social development has a high explanatory power, as it was able to explain (51.7%) of the variance in the dependent variable (quality of investment decisions). This percentage is a strong indicator of the effectiveness of this dimension in determining the level of quality, while the remaining percentage is attributed to other factors. Significance of the model: The calculated (F) value was (173.2), which is a high value with statistical significance at the (p -value = 0.000) significance level. Since the

probability value is less than the accepted significance level (0.05), this confirms the validity of the statistical model used and supports the decision to accept the hypothesis that there is a significant effect of the truthfulness characteristic on the quality of financial statements.

H3: Environmental development influences investment decisions in Iraqi companies.

Table 6. Illustrate The Impact Of Environment Development On The Quality Of Investment Decisions

Independent variable	A	B	(R ²)	F	P-Value	Dependent Variable
<i>disclosing environmental sustainability practices</i>	0.918	0.735	0.673	33.765	0.000	Decision investment

Based on the results of the linear regression analysis shown in Table 6, the relationship between environmental development (independent variable) and investment decisions can be analyzed. The beta coefficient (β) is 0.616, indicating a strong positive relationship between the two variables. This means that the greater the focus on environmental development, the higher the quality of investment decisions. The coefficient of determination ($R^2 = 0.545$) indicates that 54.5% of the variance in the quality of investment decisions can be explained by the variance in environmental development. This is a very high percentage and confirms that

environmental development has a significant and specific impact on the quality of investment decisions. The F-value = 194.158 indicates that the statistical model is highly significant, meaning that the relationship between the two variables is not due to chance. The p-value = 0.000 indicates that since this value is less than the standard significance level (0.05), we conclude that the relationship between the two variables is very strong. This allows us to reject the null hypothesis that no relationship exists.

H4: disclosing environmental sustainability practices influences investment decisions in Iraqi companies.

Table 7. Illustrate The Impact Of Disclosing Environmental Sustainability Practices On The Quality Of Investment Decisions.

Independent variable	A	B	(R ²)	F	P-Value	Dependent Variable
Environment development	1.66	0.616	0.545	194.158	0.000	Decision investment

Table 7. presents the results of the regression analysis to test the main hypothesis, which states that environmental sustainability disclosure (in its combined dimensions) impacts the quality of investment decisions. The results showed the following statistical indicators: (1) Strength and direction of the relationship: The regression coefficient reached a value

of (0.735), confirming a very strong positive correlation. This is explained by the fact that increased commitment to implementing the dimensions of sustainable development disclosure leads directly and significantly to an increase in the quality of investment decisions. (2) Explanatory power of the model: The coefficient of determination (R^2) recorded a value of (0.673), which means that the dimensions of sustainable development disclosure are able to explain (67.3%) of the variance and changes in the quality of investment decisions. This is a very high explanatory percentage, indicating that sustainability disclosure is the most prominent factor and the main determinant of the quality of investment decisions in the companies studied. (3) Model Significance: The calculated F-value (333.765) is very high and statistically significant at the significance level (p -value = 0.000). Since the probability value is less than the accepted significance level (0.05), this confirms the quality of the statistical model and its generalizability.

Statistical Decision: Based on the above results, the null hypothesis is rejected, and the alternative hypothesis is accepted, which states: (There is a statistically significant effect of disclosing

environmental sustainability on the quality of investment decisions).

CONCLUSIONS

(1) The economic and social dimensions are perceived as having greater importance than the environmental dimension in the disclosure process. This suggests that companies and investors in Babylon tend to focus on disclosure requirements that have direct and immediate impacts on financial performance and the company's local reputation (such as employment and contribution to the economy). (2) The environmental sustainability dimension is the least valued of the three dimensions. This indicates that adherence to and disclosure of environmental standards (such as waste management or energy efficiency) has not yet become a crucial and central element in the investment decision-making process, despite being an essential part of the overall concept of sustainable development. (3) There is a general consensus among the respondents that sustainability disclosure in all its dimensions is more than a neutral issue. This confirms a positive belief in the importance of these dimensions and their role in influencing investment decisions, rather than viewing them merely as a burden or cost. (4) Greater divergence or

dispersion in the respondents' opinions regarding the social dimension compared to the economic dimension and the investment decision was observed. This may reflect a difference in how companies or individuals understand the areas that social disclosure should cover (such as corporate social responsibility, health and safety, or training. (5) Opinions on the impact of disclosure on investment decisions are characterized by high stability and consistency. This means there is broad agreement among respondents on the level or nature of the relationship between sustainability information and financial decisions made by companies.

Recommendation

(1). Companies should link environmental performance indicators (such as resource efficiency) to investment decisions, making them a critical factor rather than a mere formality. (2). The areas covered by social disclosure should be standardized and defined to minimize discrepancies in understanding and evaluation. (3). Training programs should be organized for senior management and analysts to increase the use of sustainability information in financial evaluation. (4). Governmental and professional bodies should develop legal and regulatory frameworks to ensure the mandatory and

reliable nature of sustainability disclosure information.

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