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研究課題名（和文）Sustainability Reporting and Firm Performance in East Asian Countries

研究課題名（英文）Sustainability Reporting and Firm Performance in East Asian Countries

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研究成果の概要（和文）：このプロジェクトは、持続可能性報告（CSR報告）と企業業績の関係を調査することを目的としています。調査結果は、東アジア諸国全体で高いCSR報告率を示しており、企業の透明性への強いコミットメントを明らかにしています。プールされたOLSを用いた分析では、CSR報告が企業業績と正の相関関係にあり、環境および社会的側面が財務成果を向上させる一方で、ガバナンスは負の影響を示すことがわかりました。この調査結果は、CSR報告の増加という世界的な傾向を強調し、ガバナンス評価における潜在的な複雑さにもかかわらず、財務業績および運営効率にとっての重要性を示しています。

研究成果の学術的意義や社会的意義

The findings demonstrate that high CSR reporting rates in Japan and other East Asian economies not only predict better financial performance for firms but also reflect a broader corporate commitment to transparency, accountability, and sustainability, enhancing both economic and social outcomes.

研究成果の概要（英文）：This project aims to investigate the relationship between sustainability reporting (CSR reporting) and firm performance. The findings reveal high CSR reporting rates across East Asia, with Japan, China, Taiwan, South Korea, and Singapore showing strong commitments to corporate transparency. An analysis using pooled OLS indicates that CSR reporting positively correlates with firm performance, with environmental and social dimensions enhancing financial outcomes, while governance shows a negative impact. The findings emphasize the global trend of increased CSR reporting, highlighting its importance for financial performance and operational efficiency, despite potential complexities in governance assessments.

研究分野：Business finance

キーワード：Sustainability Reporting CSR Reporting CSR report firm performance

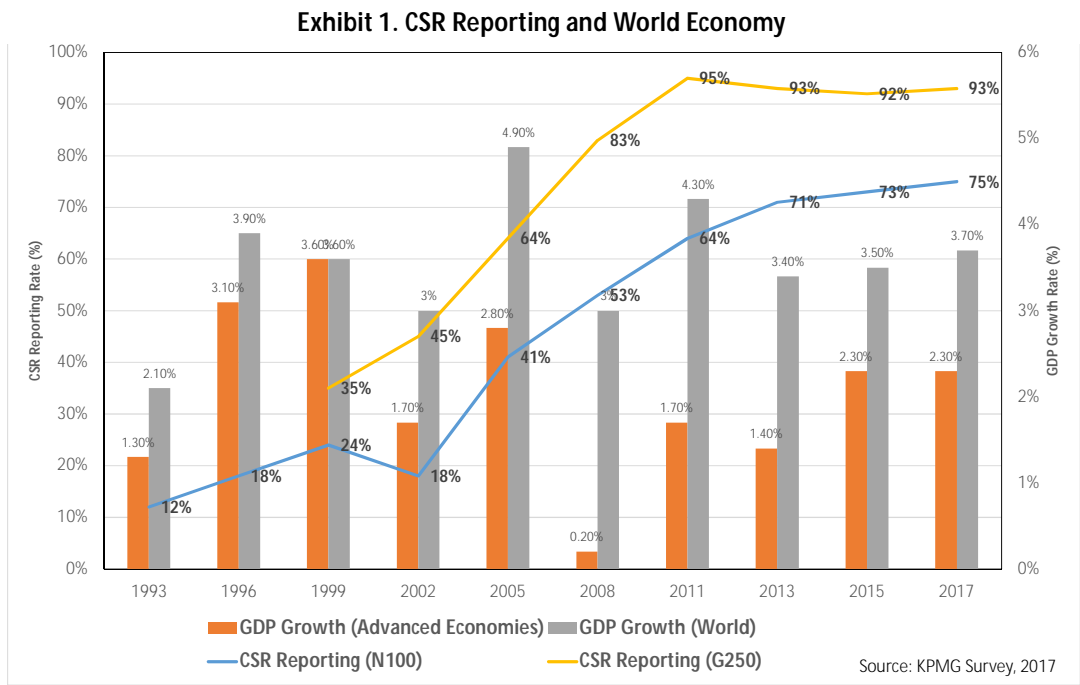
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1 . 研究開始当初の背景

In a market economy, the traditional objective of firm management has been to maximize corporate value, shareholder wealth, or stock price, primarily benefiting shareholders. However, this narrow focus has drawn criticism for overlooking the broader impacts of corporate decisions on stakeholders beyond shareholders. Acknowledging the importance of stakeholders, Porter and Kramer (2011) advocate for a paradigm shift towards creating shared value for major stakeholders, rather than solely maximizing shareholder value.

The concept of corporate social responsibility (CSR) has gained significant traction in response to societal demands for ethical business practices. Global initiatives such as the United Nations' Sustainable Development Goals (SDGs) and Environment Programme (UNEP) have further underscored the importance of CSR, urging firms to integrate social and environmental considerations into their operations. Wang (2017) highlights that CSR not only serves as a branding and promotional strategy but also opens avenues for additional business opportunities and potential tax benefits.

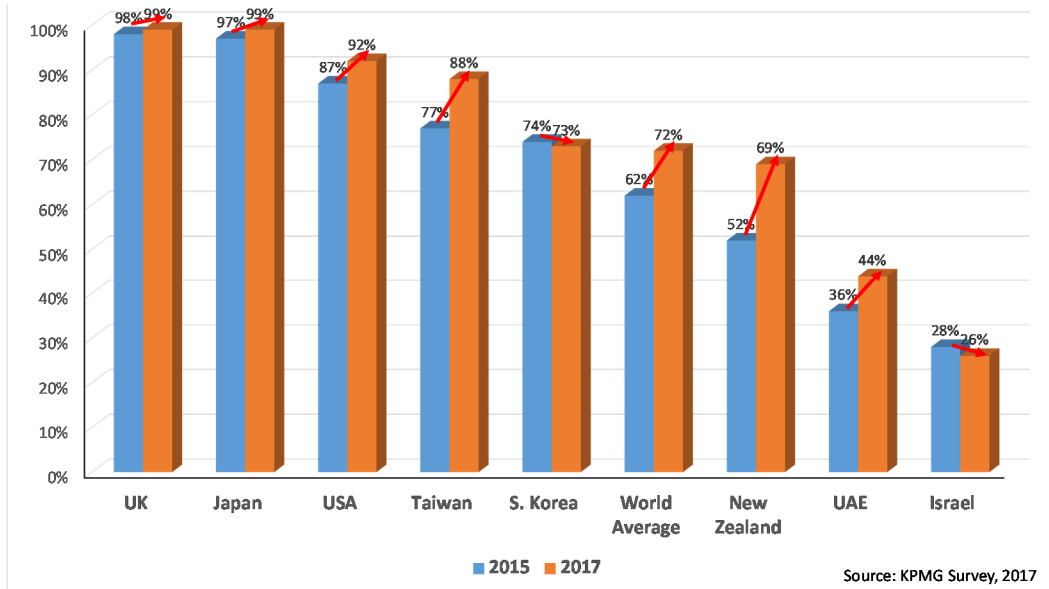
In response to growing societal pressures, many firms have voluntarily embraced CSR and sustainability reporting, often included in annual reports. Known as sustainability reports or CSR reports, these disclosures have become increasingly common. For instance, KPMG's CSR survey reveals a substantial rise in sustainability reporting among the world's top 250 companies, climbing from 35% in 1999 to 93% in 2017 (Exhibit 1). Similarly, in Singapore, Loh et al. (2016) document a significant increase in listed companies publishing sustainability reports, rising from 79 in 2011 to 186 in 2015.



The surge in sustainability reporting can be attributed to various factors: Some firms view CSR and sustainability as fundamental corporate values, while others engage to bolster corporate reputation and meet societal expectations. Additionally, anticipation of future regulatory requirements has prompted firms to proactively adopt reporting practices. Mandates by governmental agencies have also compelled firms to incorporate sustainability reporting into their operations (Exhibit 2).

This evolving landscape underscores a fundamental shift in corporate governance towards a more inclusive approach that considers the interests of all stakeholders and aligns with global sustainability agendas.

Exhibit 2. CSR Reporting Rate (Selected Countries)



2 . 研究の目的

As sustainability reporting gains traction globally within the business sphere, whether by choice or mandate, the focal inquiry revolves around its influence on firm performance and behavior. This study aims to scrutinize the current landscape of sustainability reporting on a global scale and evaluate its effects on corporate performance and behavior, encompassing business operations and risk management. The Asian economies of interest are primarily in East Asia, including China, Japan, South Korea, Taiwan, and Singapore, chosen for their robust economic growth and exemplary practices in sustainability reporting.

This project is structured around three main objectives: Firstly, to assess the current state of sustainability reporting, particularly in the specified East Asian economies. Secondly, to investigate the impact of sustainability reporting on firm performance and corporate behavior. Lastly, to delve into how a firm's engagement across the economic, environmental, social, and governance dimensions of sustainability reporting influences its overall performance and behavior.

3 . 研究の方法

To achieve the three research objectives, different research methods have been applied. To investigate the current situations of CSR reporting rates, an extensive literature review was conducted on major East Asian stock exchanges.

Furthermore, to examine the relationship between CSR reporting and firm performance, the ordinary least squares (OLS) method was applied to Japanese publicly listed firms. The data were primarily sampled from the Toyokeizai Database for the period 2017-2021. The regression model included a dummy variable for CSR reporting and control variables (logarithm of total assets and debt ratio to control the effects of firm size and financial leverage, respectively), regressed against measures of firm performance (*ROA*, *ROE*, and *EPS*). The regression model (Model 1) is expressed as follows:

$$Y_{it} = f(SR_{it}, TA_{it}, DR_{it}, DI)$$

where Y_{it} denotes the firm performance measures for company i in year t ;

SR denotes the dummy variable in CSR reporting;

TA denotes the logarithm of total assets;

DR denotes debt ratio;

DI denotes dummy variables of the industry effects.

As CSR reporting nowadays covers three major dimensions—environmental, social, and corporate governance (also called ESG)—the scores for each dimension were collected and

regressed on firm performance measures, expressed as follows (Model 2):

$$Y_{it} = f(E_{it}, S_{it}, G_{it}, TA_{it}, DR_{it}, DI)$$

where E , S , and G denote environmental, social, and governance scores, respectively.

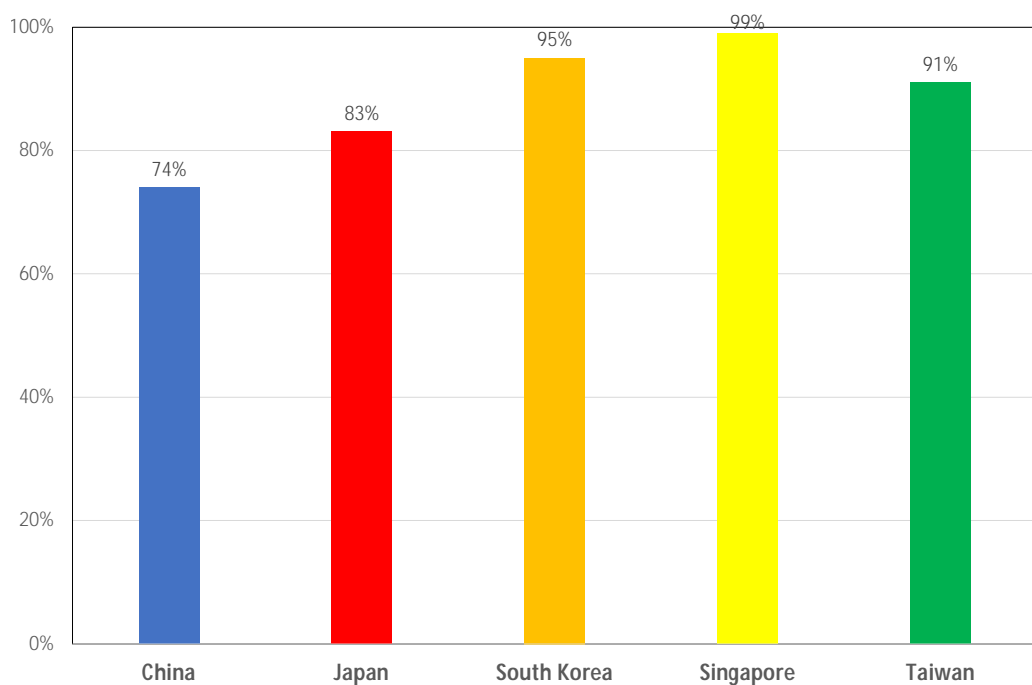
4 . 研究成果

Based on an extensive literature review, here are the CSR reporting rates for Japan, China, Taiwan, South Korea, and Singapore:

- Japan: Approximately 83% of companies listed on the Tokyo Stock Exchange (TSE) disclosed CSR information in their annual reports. (Source: Research Institute for Social and Economic Affairs (ESRI), 2023)
- China: About 74% of A-share listed companies published CSR reports in 2020. (Source: SynTao Green Finance's CSR Blue Book, 2020)
- South Korea: Approximately 95% of companies listed on the Korea Exchange (KRX) released CSR reports. (Source: Korea Corporate Governance Service (KCGS), 2023)
- Singapore: Nearly all listed companies on the Singapore Exchange (SGX) issued sustainability reports or integrated sustainability information into their annual reports. (Sources: Reference: Singapore Exchange (SGX), Sustainability)
- Taiwan: Over 90% of listed companies in Taiwan published CSR reports. (Source: Taiwan Stock Exchange (TWSE), CSR)

Exhibit 3 provides detailed insights into the CSR reporting landscape across Japan, China, Taiwan, South Korea, and Singapore, showcasing their dedication to corporate transparency and sustainability practices.

Exhibit 3 CSR Reporting Rates in East Asia



The analysis utilized a pooled ordinary least squares (OLS) approach with clustering at the firm level. Exhibit 4 presents the regression outcomes for the entire dataset. The regression results indicate that CSR reporting has a positive relationship with all the firm performance measures, which means that a firm committed to CSR reporting tends to financially perform better.

In Model 2, the dimensional scores of ESG were regressed on the firm performance measures. It was found that the environmental dimension was positively associated with ROA, while the social dimension positively impacted EPS. Interestingly, governance displayed a significant and adverse influence on both ROA and ROE.

Exhibit 4 Regression Results of Model 1

VARIABLES	ROA	ROE	EPS
SR	2.2629***	12.2682**	1.1163*
In_ta	1.3955***	7.7101**	1.1643**
dr	-2.3148*	-3.6789**	-2.0753**
Constant	12.9719**	5.2144**	-1.1499***
R-squared	0.2145	0.108	0.386
Industry FE	YES	YES	YES
Year FE	YES	YES	YES
*** p<0.01, ** p<0.05, * p<0.1			

Exhibit 5 Regression Results of Model 2

VARIABLES	ROA	ROE	EPS
env	0.0063*	0.0036	-0.0083
soc	0.0047	0.0056	0.0149**
gov	-0.0155***	-1.0143***	-0.0085
In_ta	0.0938***	0.1416***	0.4105***
dr	-2.7998***	-1.2717***	-3.3479***
Constant	1.6521***	0.8831**	0.4078
R-squared	0.2881	0.1141	0.2113
Industry FE	YES	YES	YES
Year FE	YES	YES	YES
*** p<0.01, ** p<0.05, * p<0.1			

In summary, this study presents three main findings:

Firstly, the rise of CSR reporting has emerged as a crucial global trend, particularly in East Asian economies. This trend underscores a growing recognition among businesses of the importance of transparency and accountability in addressing societal and environmental impacts.

Secondly, firms dedicated to sustainability reporting tend to exhibit stronger financial performance compared to their counterparts. This can be attributed to their focus on generating profits aligned with their social responsibilities.

Thirdly, efforts by firms to enhance their environmental and social performance correlate positively with overall firm performance. Companies that invest in sustainable practices not only improve their reputations and stakeholder relations but also often achieve operational efficiencies and cost savings through resource conservation and innovation.

Conversely, the negative association between corporate governance and firm performance may be influenced by the rating system used in the Toyokeizai database. In Japan, for instance, corporate governance scores heavily consider employee benefits, potentially leading firms with higher governance scores to prioritize employee welfare over profitability.

5 . 主な発表論文等

〔雑誌論文〕 計0件

〔学会発表〕 計4件（うち招待講演 2件 / うち国際学会 2件）

1 . 発表者名 George Y. Wang
2 . 発表標題 Are Policies and Cultural Connection Enough in Explaining Foreign Direct Investment - Lessons from the Experience of Shantou, China
3 . 学会等名 2019 International Conference of Association for China Economic Studies (ACES) (国際学会)
4 . 発表年 2019年

1 . 発表者名 George Y. Wang
2 . 発表標題 International Finance Speech
3 . 学会等名 School of Finance, Shanghai University of International Business and Economics (招待講演)
4 . 発表年 2019年

1 . 発表者名 George Y. Wang
2 . 発表標題 New Trends in Corporate Social Responsibility (CSR)
3 . 学会等名 International Conference on Global Trend Management 2019 (招待講演)
4 . 発表年 2019年

1 . 発表者名 George Y. Wang
2 . 発表標題 ESG, Firm Performance, and Corporate Policy
3 . 学会等名 the 14th Biennial Conference of Asian Consumer and Family Economics Association (ACFEA) (国際学会)
4 . 発表年 2023年

〔図書〕 計0件

〔産業財産権〕

〔その他〕

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6. 研究組織

	氏名 (ローマ字氏名) (研究者番号)	所属研究機関・部局・職 (機関番号)	備考
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7. 科研費を使用して開催した国際研究集会

〔国際研究集会〕 計0件

8. 本研究に関連して実施した国際共同研究の実施状況

共同研究相手国	相手方研究機関
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