

Article

The Impact of Size on the Performance of Transnational Corporations Operating in the Textile Industry in Portugal during the COVID-19 Pandemic

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Abstract: The aim of this work is to understand the impact of size on the performance of transnational corporations (TNCs) operating in the textile and clothing industry in Portugal during the COVID-19 pandemic. For this purpose, we used ORBIS data for the period 2019–2020 and narrative, financial and correlation analyses to assess the performance of five companies. Thus far, the impact of company size on the competitiveness of Portuguese textile affiliates during the pandemic has remained unexplored. The results show that smaller firms performed better than larger ones, likely due to the higher fixed costs of the latter at times when orders declined worldwide. Our analysis suggests that there are some characteristics of TNCs that matter in explaining company-level performance during crises, such as management experience and flexibility. Furthermore, as Portugal is a major European textile exporter, it is useful for the host country to assess the economic sustainability of its foreign investors. The results provide some policy recommendations regarding the promotion of foreign direct investment (FDI) in Portugal.

Keywords: foreign direct investment; firm size; corporate performance; textiles; transnational corporations; globalization; economic sustainability



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1. Introduction

The textile and clothing industry contributes 7% of total world exports and employs 35 million workers worldwide [1]. The importance of this sector for European economies is paramount. For example, Portugal is Europe's biggest exporter, and in the U.K., the sector is a major employer. However, the COVID-19 pandemic significantly disrupted the supply chain; in the U.S., fashion sales were expected to fall by more than 50% by 2020 [2].

The lockdown in China, the world's biggest textile producer, has caused delays in the manufacturing supply chain. The ensuing large-scale order cancellations and postponements affected suppliers in Southeast Asia [3]. In addition, companies operating in China or South Korea faced shortages of labor and raw materials and a significant increase in transport and logistics costs [4]. Lack of consumer demand due to enforced blockades and travel restrictions that prevent consumers from shopping in fashion capitals severely hampered corporate business [5,6]. Furthermore, the lack of crisis management made it difficult for companies to guarantee liquidity during the pandemic [3]. Due to payment delays, order cancellations, fixed costs and other unpredictable expenses, companies are struggling to preserve their economic sustainability. In addition, the strong competitive pressure created by cheap labor economies, global scale fluctuation between supply and demand [7] and other problems related to the evolution of technology and changes in consumer preferences—for example, due to the implementation of circular economy

practices—forced the textile industry to face enormous volatility in relation to its economic performance. The combination of these adverse factors requires a new competitive dynamic and flexibility with regard to products, processes and management structures.

Transnational corporations (TNCs) have become an integrated international production system [8]. Indeed, the internationalization of production and capital, privatizations, strategic alliances and the liberalization of foreign trade place TNCs at the center of global economic development [2]. The current stage of development of TNCs is characterized by accelerating economic, information, technological, financial and other globalization [9]. Transnational corporations control more than 50% of the world's industrial production today; 67% of international trade; more than 80% of patents and licenses for new technologies, technology and know-how; and almost 90% of foreign direct investment (FDI). The diversity of the world's socioeconomic contexts drives the coordination of activities and development of TNCs and increases the potential for competition in the markets.

Globalization and the development of new technological structures limit business success to the possession of intellectual capital, which is the basis of the TNCs' business model. However, as TNCs' incentives are largely determined by global financial markets, the success of their activity requires high returns on investment [10]. At the same time, managers recognize that sustainable practices increase trust between companies and their customers. Sustainable practices can focus on three perspectives: environmental, economic and social [11]. Current trends in the development of the world economy, on the one hand, demonstrate the vital importance of the functioning of TNCs for economic stability. In fact, all economic connections and interactions related to the business of TNCs have already proven to be much more efficient than traditional market relations and mechanisms [12]. The business model of TNCs is based on an approach that focuses on the study of the internal environment of TNCs with an emphasis on system processes and interconnections. It consists of three key elements: strategy, finance and internal organization [13]. Strategy defines the types of production processes and markets; finance provides the means for processes and products; the organization includes the encouragement of workers, skills and efforts that create added value. The business model allows one to calculate the company's value and understand the definition of competitive strategies (for example, product differentiation), the relationship with customers and the infrastructure needed to support costs and generate cash flows and profit [14]. In this context, firm size has been identified as having a mediating role in the impact of various factors on the financial performance of companies [11].

The current period represents an extraordinary market situation, with almost no previous research on how an industry can recover from a pandemic. Thus, the purpose of this article is to contribute to the discussion on the impact of size on the competitiveness of TNCs and assessing corporate resilience during turbulent times with large-scale declines in demand. For this purpose, we adopted a mixed analysis of narrative approach, financial ratios and correlation analysis of the relevant variables from five European TNCs operating in textiles in Portugal. The four ratios employed measure performance regarding profitability, liquidity and solvency to determine whether these companies can be resilient during the crisis. Thus, the analysis for 2019–2020 makes it possible to compare the evolution of performance indicators before and during the pandemic. The identification of performance determinants will help TNCs manage their affiliates in Portugal more effectively, namely through the identification of strategies leading to the improvement of their performance. Furthermore, as Portugal is a major exporter of textiles in Europe, it is useful for the host country to assess the economic sustainability of its foreign investors. Thus, the results provide some policy recommendations regarding the promotion of FDI in Portugal that will help the Investment Promotion Agency of Portugal (AICEP) decide whether it is worth investing in campaigns to attract these companies to Portugal. In what follows, Section 2 reviews the literature, Section 3 describes the data sources and methods, Section 4 presents and analyzes the results, Section 5 discusses the results and Section 6 concludes.

2. Literature Review

2.1. Trends of TNCs

The fundamental distinction between domestic and international business is the existence of interventions by the governments of the home and host countries in the activity of TNCs. This is because TNCs impact the host country in terms of employment, income, balance of payments, regional development and technology transfer. Thus, the objective of the host country's government intervention is the redistribution of gains among countries through policies on international investment. Previous empirical evidence points to significant regional variation in the performance of TNCs in Europe. For example, one study [15] suggests that subsidiaries belonging to more geographically dispersed but relatively less diversified TNC groups exhibit superior performances. In this context, the most interesting aspect of the presence of TNCs in Portugal is their role in generating externalities that can significantly affect the growth trajectory of the economy [16,17].

The literature that focuses on the relationship between the size of TNCs and their performance [15,18,19] highlights that small TNCs tend to have advantages based on intangible assets, such as advanced technology that makes them more efficient than their domestic counterparts [20]. The main sources of technological changes that lead to increases in productivity come from abroad. Technology can be transferred through voluntary agreements or FDI externalities. These consist of an increase in the productivity of domestic firms due to the presence of TNCs in the host economy [21]. Furthermore, unlike large TNCs, the competitive advantages of small TNCs tend to emanate from four possible sources: production niches, mature technologies that were dropped by large companies, labor-intensive productions in countries with abundant cheap labor, and cost advantages from simple and flexible organizational structures. According to [19], the main source of competitive advantage in small TNCs is management flexibility, while previous experience with various technologies, economies of scale and costs are weak sources. Small TNCs have moderate advantages in technology, niche production and international reputation and prestige (brands). This reflects the diversity in the composition of small TNCs, some of which have an international reputation and are specialized in production with their own technology, while others use relatively mature technology. Furthermore, previous studies suggest that small TNCs are less profitable than large ones. Table 1 shows the trends in small TNCs and sources of competitive advantage, according to the geographical area of origin.

Table 1. Trends in small transnational corporations (TNCs) by home country.

Trends	USA	Europe	Japan
FDI in developed countries	+	+	–
Trademarks and patent agreements	+	+	–
Management flexibility	–	+	–
Organizational capabilities	–	+	–
Marketing capabilities	–	+	–
Competition with large companies	+	–	–
Experience with knowledge-intensive technology	+	–	–
Subcontracting	–	–	+
Government protection	–	–	+

Source: Own elaboration based on Fujita, Altamonte and the United Nations. + and – denote strong and weak trends.

The analysis from Table 1 shows that while American TNCs tend to operate in developed countries, they develop trademarks and patent agreements, compete with large companies and have experience with knowledge-intensive technology. European TNCs, in addition to operating in developed countries and developing brands and patents, are also flexible in terms of management and possess organizational and marketing capabilities. Finally, Japanese TNCs tend to be subcontracted by large companies and benefit from government protection, unlike American and European ones.

2.2. Firm Size and Corporate Financial Performance

Several studies focus on the relationship between a firm size and its performance [22–24]. Firm size has been widely used as a mediating factor for the impact of several variables on corporate performance. For example, the meta-analysis of [25] shows that firm size is used as a mediating factor for the impact of innovation and entrepreneurship on sustainability, the impact of social responsibility on performance and the impact of green management and environmental issues on performance (see, for example, [26]). Furthermore, the mediating role of firm size was applied to measure the impact of innovation and internationalization on firm performance (see, for example, [27–30]).

The arguments used to justify a direct and positive relationship between profitability and size focus on the greater resources and market opportunities of large companies, which can enable economies of scale. In addition, large companies also have greater bargaining power with customers and suppliers, as well as easier access to international markets [31].

Firm size influences the financial structure of the company [32,33] due to transaction costs related to accessing financial resources. Smaller companies typically lack a track record of performance, experience, reputation and status in relation to their competence and honesty. Thus, lenders can respond to unwanted borrowers demanding higher interest rates, more guarantees or more bureaucratic obstacles compared to prevailing market standards. These high transaction costs can discourage borrowing, leading to credit constraints for smaller firms [34]. To reduce the transaction cost of loans, it may be necessary to increase the quality of accounting information, displaying the ability of products to be successful in the market, demonstrating production capacity or proving the viability of the business model [35]. Therefore, firm size influences the ability to raise external funds, thus affecting the companies' debt ratio. A more indebted company may have its competitiveness limited by the ability to make decisions, while greater financial capacity allows greater flexibility in adapting to the product and technological changes, leading to a better adaptation to consumer demand [36]. Thus, studies show that large companies can obtain higher levels of return on assets [37–39], higher levels of return on equity or invested capital, higher profit margins or higher returns on sales [40].

In contrast, the main explanation for a negative effect of firm size on performance is the effect of transaction costs as the firm grows. For example, agency theory suggests that a manager may decide to invest in a project that is not in the company's interests, but this is in his own interest. Thus, agency conflicts between managers and owners can inhibit the appropriation of potential benefits of company size [41]. Other studies show a negative relationship between company size and operating profit or loss [42] or in the return on assets [40]. The results of another study [43] show that increasing company size reduces shareholder value by 18–20%. Thus, the literature review is inconclusive on the effect of firm size on firm performance. However, these divergences cannot be explained by measuring the variables used in the different studies. For example, the financial performance measured as ROA shows both positive and negative effects [37,39]. This lack of conclusive evidence indicates that the effect of size on performance can result from variable moderators, such as productivity [36,44], or control variables such as company age [45,46]. Another explanation for divergent results may come from the different methods applied. For example, one study [47] aims to investigate the effect of leverage, accounts receivable turnover and company size on the financial performance of automotive companies listed on the Indonesia Stock Exchange. They used descriptive analysis, time series data for 2014–2019 and multiple regression analysis. The results show that leverage, receivables turnover and company size have a significant impact on the financial performance of automotive companies.

The aim of [48] is to assess the impact of financial leverage on a company's profitability in the Bangladeshi textile sector. A company's profitability is measured by the return on equity (ROE) and short- and long-term debt are used as financial leverage proxies. The authors used a sample of 22 companies and pooled ordinary least squares (OLS), fixed effect (FE) and generalized method of moments (GMM) models to test the relationship between financial leverage and profitability. They found a significant negative relationship

between leverage and company profitability, which implies that profitability is negatively affected by a company's capital structure. The authors recommend that companies should focus on generating funds internally, as most companies use external debt as a source of financing.

Another study [49] examined the leverage of companies in manufacturing and services. The authors measure the impacts of debt, company size and inflation on financial performance. Size is represented by assets, leverage or debt is represented by the ratio of indebtedness to total assets and financial performance is measured by return on assets. Inflation is included as a control variable. Using pooled data regression for 156 companies in 2015–2017, the authors found that size positively influences financial performance and leverage has a significant negative effect on financial performance. However, although the effect of size is greater on services, the leverage effect is greatest in the manufacturing sector. Another study [50] analyzes the effect of capital structure on the financial performance of 90 textile companies listed on the Pakistan Stock Exchange in 2008–2017. The authors used ROE as a proxy for financial performance; debt to equity, total debt to total assets, asset turnover rates, sales growth, taxation and export growth as independent variables; and firm size as a control variable. Using random effects and panel data, the authors found that company size and capital structure have a significant negative impact on companies' financial performance, while the impact of asset turnover ratio was negative, but statistically insignificant.

Other authors [51] explore the moderating role of firm size in the impact of capital structure on the performance of textile companies listed on the Pakistan Stock Exchange (PSE) in 2010–2017. Using firms' annual reports and feasible generalized least squares (FGLS), the authors found that 65% of assets are financed by debt, suggesting high levels of financial leverage.

3. Materials and Methods

The aim of this article is to analyze the influence of size on the financial performance of TNCs in the textile sector (NACE code 13.0) in Portugal before and during the pandemic. This will provide an assessment of corporate resilience in turbulent times with large-scale drops in demand. For this purpose, we adopted a mixed approach, consisting of qualitative (narrative) and quantitative analysis (analysis of 4 profitability, liquidity and solvency ratios and Pearson correlation analysis) of 5 European TNCs operating in textiles in Portugal. Using data from ORBIS for 2019–2020, the search criteria were active companies operating in manufacture of textiles, located in Portugal, with at least 51% owned by shareholder in a foreign country. The search returned 29 companies, but only 5 had financial reports for 2020. The year 2020 is important to assess companies' performance during the pandemic. Therefore, the sample was selected based on the availability of financial reports for 2020.

From the literature review, it appears that the main source of competitive advantages for small TNCs is management flexibility, while previous experience with various technologies, economies of scale and costs are weak sources. Thus, despite inconclusive results regarding the sign of the impact of firm size on financial performance, smaller TNCs are expected to have more flexibility and thus to show better financial performances during the COVID-19 outbreak. Hence, the following hypothesis is formulated:

Hypothesis 1 (H1). *Firm size negatively affects the financial performance of transnational textile companies in Portugal.*

We also perform a Pearson correlation analysis between firm size and variables that proxy financial performance (ROE, ROCE, liquidity and solvency) as well as other control variables from the empirical literature. Indeed, according to the literature review, some of the control variables used in studies that measure the impact of firm size on companies' performance include productivity, which has a long-lasting impact on corporate financial

performance [36,44,52]. In this paper, we use labor productivity measured by the ratio of turnover to the number of employees. Thus, it is hypothesized that:

Hypothesis 2 (H2). *Firm productivity positively affects the financial performance of transnational textile companies in Portugal.*

Another control variable found in the literature is company age, which has been used as a proxy for knowledge of the foreign market and management skills [45,46]. It is expected that, over time, managers gain more experience in managing and selling their products, which in turn leads to better performance. Thus, it is hypothesized that:

Hypothesis 3 (H3). *The age of firms positively affects the financial performance of transnational textile companies in Portugal.*

Some researchers have focused on the narrative approach as an inquiry method within qualitative or interpretive research [53]. This article contributes to the field of mixed methods research, complementing the ratios and correlation analyses with a narrative approach based on the analysis retrieved by companies' websites to infer information on the strategies adopted by these TNCs.

The economic dimension of sustainability can be evaluated by financial ratios that impact corporate competitiveness and its stakeholders [54]. In this context, the ratios of profitability, liquidity and indebtedness are essential to assess corporate performance [55]. We assume that companies with worse performance in relation to profitability, liquidity and insolvency indices have fewer opportunities for growth and are more subject to insolvency. The profitability is of crucial importance to creditors and shareholders because profits allow dividends and funds to pay off debts to third parties. Thus, the use of profitability indices when measuring a company's ability to generate profits makes it possible to assess firms' economic sustainability. The most used profitability indicators are return on assets (ROA), return on equity (ROE) and return on capital employed (ROCE). In this article we use ROE and ROCE.

ROE allows us to assess the ability of companies to generate profits through shareholder's investments, and is calculated as:

$$\text{ROE} = (\text{Net income} / \text{Total Equity}) \times 100 \quad (1)$$

This ratio measures the efficiency of the application of shareholders' resources in generating profits.

ROCE reflects the company's ability to earn a return on the capital it employs.

$$\text{ROCE} = (\text{Earnings Before Interest and Taxes} / \text{capital employed}) \times 100 \quad (2)$$

The ability of companies to pay current debts without resorting to external capital is measured by liquidity ratios. This set of ratios includes the immediate liquidity ratio, current ratio and operating cash flow ratio. We use the current ratio:

$$\text{Current Ratio} = \text{Current Fixed Assets} / \text{Current Liabilities} \quad (3)$$

It allows us to assess the short-term debt coverage. The liquidity position of companies will be better the higher this index is. However, too high a value can reveal inefficient investments.

The solvency ratio measures the ability of companies to meet their long-term debt obligations. The main solvency ratios are the debt to assets ratio, interest coverage ratio, equity ratio and the debt to equity ratio. The formula used in this article is:

$$\text{Solvency} = (\text{Shareholder Funds} / \text{Total Assets}) \times 100 \quad (4)$$

The ratio analysis is complemented by the assessment of the companies' turnover, total assets, P/L before tax, net income, profit margin (%), cash flow and shareholders' funds. Table 2 shows the descriptive statistics.

Table 2. Descriptive statistics (N = 10).

	1st Quartile	Median	3rd Quartile	St. Dev.
Turnover	581,448	856,131	12,700,000	7,178,937
Total Assets	563,604	915,593	10,300,000	5,525,356
Number of Employees	1019	2278	4834	34,352
P/L Before Tax	2000	28,542	54,729	266,871
Net Income	−82,010	15,720	30,828	32,3652
Profit Margin (%)	0	4	5	3
Cash Flow	15,217	50,271	92,032	283,428
Shareholders' Funds	261,078	307,440	1,535,000	791,521
ROE Using P/L Before Tax (%)	1	13	19	17
ROCE Using P/L Before Tax (%)	5	10	11	7
Current Ratio (X)	1	2	2	1
Solvency Ratio (%)	15	30	35	14

Note: Values in Thousand USD. Source: Author's calculations using Stata 17.0.

The analysis of the standard deviation shows large differences between the TNCs, especially regarding turnover and total assets, as expected. The smallest differences are found in the liquidity ratio, profit margin and ROCE. Concerning medians, companies generate 13 USD for every 1 USD invested, and 1 USD invested in capital generates 10 USD. Companies' cash flow can cover 30% of their long-term debt. Firms in the first quartile report negative net revenues.

4. Results

Part of our methodology consists of a narrative approach based on information obtained from companies' websites to assess management strategies. The headquarters of company 1 are in Ireland, companies 2 and 3 in France, company 4 in Belgium and company 5 in Denmark. All TNCs are of European origin, confirming that European TNCs tend to invest in developed countries.

The analysis of Table 3 shows that the main competitive advantages of TNCs operating in the textile sector in Portugal are innovation, reputation and prestige, tailored solutions for the customer and after-sales service, as well as state-of-the-art technology. Among other advantages described are flexible management, vertical integration that allows control of the entire production, quality control, design, just-in-time production and the establishment of partnerships through joint ventures as well as with universities.

Table 3. Competitive advantages of the companies in the sample.

Competitive Advantages	TNCs				
	1	2	3	4	5
Innovation	+	+		+	+
Reputation and prestige	+		+	+	+
Tailor-made solutions/after-sales serv	+		+	+	
Technology	+			+	+
Flexible management		+			+
Joint ventures	+			+	
Quality control	+			+	
Design	+				
Just-in-time production	+				
Vertical integration				+	

Notes: + denotes ownership of the respective competitive advantage. Source: Own elaboration based on information available on companies' websites.

Table 4 presents the results of the analysis of financial ratios. In 2020, during the pandemic, the Irish and French companies had the highest turnover, while the Danish company had the lowest level of turnover.

Table 4. Financial analysis.

2020	Firms				
	1	2	3	4	5
Turnover	12,692,000	1,008,676	15,603,273	634,923	295,925
Total Assets	10,261,000	1,085,247	12,370,480	619,135	322,598
Number of Employees	77,000	2278	n.a.	4541	1019
P/L Before Tax	−429,000	54,729	676,578	34,615	22,140
Net Income	−547,000	50,311	635,064	23,666	14,477
Profit Margin (%)	−3.38	5.43	4.34	5.45	7.48
Cash Flow	−215,000	92,032	828,745	57,065	31,722
Shareholders' Funds	1,535,000	290,332	1,797,357	324,547	107,402
ROE Using P/L Before Tax (%)	−27.95	18.85	37.64	10.67	20.61
ROCE Using P/L Before Tax (%)	−2.81	9.59	19.48	10.16	22.31
Current Ratio (X)	1.17	1.76	1.65	2.29	0.76
Solvency Ratio (%)	14.96	26.75	14.53	52.42	33.29
2019					
Turnover	16,801,000	703,585	11,792,131	581,448	256,726
Total Assets	10,342,000	745,938	11,935,900	563,604	292,576
Number of Employees	83,000	2069	22	4834	1019
P/L Before Tax	2000	22,468	164,886	42,225	826
Net Income	−491,000	16,963	−82,010	30,828	788
Profit Margin (%)	0.01	3.19	1.40	7.26	0.32
Cash Flow	−173,000	43,476	134,007	59,413	15,217
Shareholders' Funds	2,189,000	261,078	1,181,183	271,230	97,338
ROE Using P/L Before Tax (%)	0.09	8.61	13.96	15.57	0.85
ROCE Using P/L Before Tax (%)	3.69	6.67	9.49	10.95	4.56
Current Ratio (X)	1.07	1.71	1.21	1.97	0.68
Solvency Ratio (%)	21.17	35.00	9.90	48.12	33.27

Notes: Values in Thousand USD; n.a., not available. Source: Author's calculations using Stata 17.0.

The same is true for total assets. However, when it comes to the number of employees, the Irish TNC is by far the largest, followed by the Belgian company. Again, the Danish TNC is the smallest. In relation to P/L before tax, net income and cash flow, the French TNCs outperform, followed by the Belgian TNC. Ireland's TNC shows negative revenue and cash flow. The smallest company, the Danish one, has the biggest profit margin, followed by the Belgian TNC. In relation to shareholder funds, the French and Irish TNCs exhibit the highest levels, while the Danish TNC shows the lowest levels.

As far as the ratio analysis is concerned, the French and Danish TNCs show better profitability (as measured by ROE and ROCE), while the Irish TNC shows a negative return. The Belgian TNC shows the best liquidity and solvency, while the Danish TNC shows the worst performance with regard to liquidity, and one of the French TNCs and the Irish TNC are the least solvent.

Comparing the financial performance between 2019 and 2020, some facts emerge. In the Irish TNC, all indicators worsened compared to 2019, except for liquidity, which increased. For the French TNCs, all indicators improved, except for the solvency of company 2, which decreased. Regarding the Danish TNC, all indicators improved, except the number of employees, which remained stable. Concerning the Belgian TNC, turnover, liquidity, solvency and shareholder funds improved. However, revenue, cash flow, profit margin, financial profitability and the number of employers all decreased, showing the immediate impact of the crisis on falling demand.

In short, the smaller companies performed better during the pandemic than the large TNCs, probably due to large companies' high fixed costs and number of employees at a time when orders decreased around the world. Smaller companies proved more flexible and resilient during the crisis.

Tables 5 and 6 show the Pearson correlation coefficients between the proxy for firm size (number of employees) with several measures of corporate performance and control variables. This coefficient measures the strength of the linear relationship between two variables. The analysis is carried out for each year since we want to compare the situation before the COVID-19 outbreak and during the pandemic. The objective is to assess the resilience and competitiveness of these firms when facing the crisis.

Table 5. Correlation matrix, 2019.

	Size	ROE	ROCE	Liquidity	Solvency	Age	Productivity
Size	1.0000						
ROE	−0.5938	1.0000					
ROCE	−0.6013	0.9787 *	1.0000				
Liquidity	−0.3709	0.5616	0.5738	1.0000			
Solvency	−0.2822	0.1890	0.3235	0.7635	1.0000		
Age	−0.0346	2007	0.3860	0.4099	0.8011	1.0000	
Productivity	−0.2800	0.4585	0.3512	−0.4082	−0.7497	−0.5410	1.0000

Note: Statistical significance at the 5% level is denoted with *.

Table 6. Correlation matrix, 2020.

	Size	ROE	ROCE	Liquidity	Solvency	Age	Productivity
Size	1.0000						
ROE	−0.9886 *	1.0000					
ROCE	−0.8486	0.8983 *	1.0000				
Liquidity	−0.5522	0.5843	0.1964	1.0000			
Solvency	−0.7005	0.1301	0.1818	0.2621	1.0000		
Age	−0.2333	−0.2464	−0.1132	−0.0315	0.8848 *	1.0000	
Productivity	−0.4760	0.5728	0.3766	0.2648	−0.2597	−0.7348	1.0000

Note: Statistical significance at the 5% level is denoted with *.

The regression analysis for 2019 reveals that only the profitability ratios are positively and significantly correlated with each other. Thus, none of the hypotheses are confirmed in the pre-pandemic period.

During the pandemic, one can observe a change in the correlations between the variables. Our hypothesis H1 holds—firm size is negatively and significantly correlated with profitability. In addition, the profitability measures are correlated with each other, as was the case in the previous year, and company age is positive and significantly correlated with solvency. Thus, H3 is valid during the pandemic, but H2 does not hold in 2020. These results suggest that during crises, some of the competitive advantages and manager capabilities emerge or grow stronger to find solutions to maintain firms' economic sustainability.

5. Discussion

Various crises have demonstrated the vulnerability of national economies to global trends and the high integration of the global financial system. The likelihood of any crisis arising has the greatest impact on the activities of TNCs. For example, during the 2008 crisis, many companies downsized or closed. In turn, hundreds of thousands of workers around the world lost their jobs, and this clearly led to the deterioration of living standards [56]. This raises the question of the resilience acquired by TNCs in the textile sector in Portugal, resulting from previous experiences in dealing with downturns and drops in international demand.

Our analysis suggests that firm size has a negative impact on the performance of textile TNCs operating in Portugal during the pandemic, confirming the findings of [41,42]. Thus, during the pandemic, H1 and H3 hold, but not H2.

According to Table 3, the main competitive advantages of TNCs operating in the textile sector in Portugal are innovation and state-of-the-art technology, reputation and prestige, tailored solutions and after-sales service. Other advantages include flexible management, vertical integration, quality control, design, just-in-time production and the establishment of partnerships through joint ventures as well as with universities. Moreover, according to Table 1, small European TNCs tend to exhibit flexible management and have organizational and marketing capabilities. These trends may help explain why H1 and H3 hold. However, while it can provide important clues, positive financial performance is not the only aspect to be considered when it comes to ensuring a company's economic effectiveness. The advantage of using traditional financial ratios in measuring corporate performance is the simplicity of the method, as data collection comes from mandatory financial statements. However, the development of sustainability assessment tools must accommodate the need for broader tools for different case circumstances, with the need for universal tools that provide more transparent results.

While this article can provide tips on policy measures to help governments effectively deal with future crises, the scope of this research is limited. First, the lack of environmental and social performance indicators makes it impossible to measure the global performance of TNCs. Second, the analysis focuses only on Portugal as the host country, not providing any conclusion on firms' performance in other countries. Including larger samples and different contexts would allow for deeper insights into the socioeconomic effects of the COVID-19 pandemic.

6. Conclusions

An important characteristic of TNCs is their ability to incorporate market relationships in order to develop their internal markets that function differently from traditional markets due to the active use of transfer prices and protection against external shocks. Another interesting aspect is the role of TNCs in generating externalities that can significantly affect the growth trajectory of host economies. In fact, TNCs tend to maximize cutting-edge technology to ensure their competitiveness in world markets. In recent decades, TNCs have been among the top 100 companies that apply for patents and have concentrated high resources that guarantee their leadership in innovation. In addition, TNCs implement a modern international division of labor that ensures economic efficiency and constant use of the potential for adaptability to new conditions. Hence, the ability of any country in the world economy to overcome crises involves creating strategies to attract innovative companies to reposition the country on the world scale of income distribution, and the development of new principles and rules for more communication between governments and representatives of TNCs.

The COVID-19 outbreak has made the importance of companies' economic sustainability obvious because it affects their long-term economic growth. In this work, we used qualitative and quantitative analysis to assess the economic sustainability and competitiveness of TNCs operating in the textile industry with affiliates in Portugal, before and during the pandemic. The resulting sample is composed of five foreign affiliates, observed over a 2-year period from 2019 to 2020.

To investigate the origins of different performances among the examined foreign affiliates, we developed a financial ratios analysis. Financial analysis makes it possible to assess whether a company can generate sufficient income to cover its costs and obtain a reasonable profit—that is, be economically sustainable. By applying this financial performance measurement framework using a benchmarking methodology, it is possible to identify relatively strong and weak companies.

The correlation analysis suggests that during the pandemic in 2020, there was a solid negative correlation between the proxy of firm size and the profitability of TNCs, as measured by ROE. The smaller TNCs performed better during the pandemic than larger TNCs. This could be caused by high fixed costs and the increased number of workers on the latter's payroll at a time when orders were declining around the world. Smaller companies proved more flexible and resilient during the crisis. Furthermore, the proxy for the experience of managers (company age) is positively and significantly correlated with a company's solvency. Therefore, our analysis suggests that there are, in fact, some characteristics of TNCs that matter in explaining firm-level performance in times of crises, such as management experience and flexibility. For example, two of the companies in the sample report on their websites that the COVID-19 outbreak prompted them to quickly turn to the production of personal protective equipment (PPEs). In terms of competitiveness, the findings show that smaller and more flexible companies with more years on the market are more competitive. Moreover, the qualitative analysis allowed us to uncover key competitive advantages of TNCs in the textile sector in Portugal, such as continuous innovation, reputation and prestige, tailor-made solutions/after-sales service and state-of-the-art technology. Other advantages found include design, flexible management, just-in-time production, establishing partnerships with customers and universities, establishing joint ventures, vertical integration and quality control.

Our analysis also allows us to trace some relevant international investment policy implications. Assessing the efficiency and effectiveness of FDI policies requires designing policies that consider the attraction of FDI and the budgetary consequences in the host economy. In this context, the presence (and magnitude) of FDI externalities is crucial for FDI incentives to be economically justified; that is, for the benefits to the economy to outweigh the incentive costs. Given that the number of incentives is limited, the Portuguese Investment Promotion Agency (AICEP) must carefully assess what type of TNCs are worth attracting to Portugal. The results suggest that the type of TNCs worth capturing are the smaller TNCs, which have proven to be more flexible, resilient and able to quickly adapt their operations to market needs. Therefore, AICEP should be cautious, safeguarding some contractual clauses, when attracting larger textile companies to invest in Portugal. Such clauses could, for example, target TNC initiatives that can lead to network investments, contributing to local business infrastructure. Furthermore, strong requirements for economic, social and environmental sustainability, as well as innovation components, transparency of operations, business development capacity and competitiveness should be established. Adopting the proposed analysis framework can help policy makers design industrial and investment policies with a view to early identify the most economically sustainable companies. The lack of economic sustainability seriously undermines the competitiveness of companies. Regions and national economies with few competitive companies cannot embark on a sustainable development path. Consequently, only by being resilient and able to maintain their financial performance can these TNCs bring benefits to the host countries' economies, such as employment growth and technology transfer, and thus contribute to their sustainable development. Furthermore, our findings can promote improvements in the governance of the textile industry in Europe and around the world. Avenues for future research include the use of other economic sustainability indicators as well as environmental and social performance indicators. Additionally, future studies may consider larger samples and different contexts to gain deeper insights into the socioeconomic effects of the COVID-19 pandemic.

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