

COVID-19 Pandemic and Performance of Indonesian Stock Market: An Event Study Analysis

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Abstract

The aims of study are to analyze and evaluate the impact of COVID-19 outbreak on Indonesia Stock Exchange (IDX) performance before, during, and after the official announcement day on March 2nd, 2020. Five industry sectors were observed, i.e agriculture, property, manufacture, consumer, and mining sector. Event study analysis method is used to value the short-term influence of the announcement day on the selected stock market performance in Indonesia. The findings of the study indicated that manufacturing and consumer sectors had better stock performance with positive results of their abnormal return, unlike the agriculture and property sectors which showed the opposite result of their stock performance. The stock performance in the mining sector remained stable even after the announcement day. Indonesian Government, particularly the companies' management, is expected to pay more attention to the aggrieved industries because of the negative effect of outbreaks, especially on the agriculture and property sector.

Keywords: COVID-19, Event Study, Abnormal Return, Stock Performance, Indonesia Stock Exchange

Pandemi COVID-19 dan Kinerja Pasar Saham Indonesia: Analisis Studi Peristiwa

Abstrak

Penelitian ini bertujuan untuk menganalisis dan mengevaluasi dampak wabah COVID-19 terhadap kinerja Bursa Efek Indonesia (BEI) sebelum, selama, dan setelah hari pengumuman resmi pada tanggal 2 Mei 2020. Lima sektor industri yang diamati yaitu sektor pertanian, properti, manufaktur, konsumen, dan pertambangan. Kami menggunakan metode analisis studi peristiwa dalam penelitian ini untuk menilai pengaruh jangka pendek hari pengumuman terhadap kinerja pasar saham terpilih di Indonesia. Hasil studi empiris menunjukkan bahwa sektor konsumen dan manufaktur memiliki kinerja saham yang lebih baik dengan hasil yang positif dari abnormal return-nya, tidak seperti sektor properti dan pertanian yang menunjukkan hasil sebaliknya dari kinerja sahamnya. Kinerja saham di sektor pertambangan tetap stabil bahkan setelah hari pengumuman. Pemerintah Indonesia, khususnya manajemen perusahaan, diharapkan lebih memperhatikan industri yang dirugikan akibat dampak negatif wabah, terutama pada sektor pertanian dan properti.

Kata kunci: COVID-19, Studi Peristiwa, Abnormal Return, Kinerja Saham, Bursa Efek Indonesia.

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INTRODUCTION

Chinese Research Authorities had declared on 7th of January 2020 that new viruses were identified from the marine food industry in Wuhan city, which is called as 2019-nCoV. During the current spread of this COVID-19 pandemic in 2020, other countries were also confirmed of the COVID-19 cases (Shereen et al., 2020). For instance, Malaysia on 26th of January, Canada on 27th of January, Cambodia, Germany, and Sri Lanka on 28th of January, The United Arab Emirates on 29th of January, Philippines India, and Finland on 30th of January, Italy on 31st of January, Spain, Sweden, Russian Federation, and The United Kingdom on 1st of February, Belgium on 5th of February, and Egypt on 15th of February 2020 are confirmed several case of 2019-nCoV (D. Kumar et al., 2020). The number of cases of COVID-19 in Indonesia gradually increase after months since discovered the first case report of coronavirus in Indonesia, from 2 cases on March 2nd, 2020 to 25,773 cases on May 30th, 2020 where the total number of people who have recovered at the same date has reached approximately 7,015 people (van Empel et al., 2020).

In this study, Indonesia is mainly chosen with the consideration of one of the most rapid and fatal spread of the coronavirus along with the critical impacts within the country. There have been lots of declining business performance as well as temporarily closing the business have given major impacts on the current global economic sector, especially in terms of the issue of current stock performance globally (Baek et al., 2020). The evidence of major decline of daily average returns of the biggest global stock market indices of S&P 500, Nikkei 225, FTSE 100, Shanghai Composite Index, and DAX Index can be explicated through Figure 1.

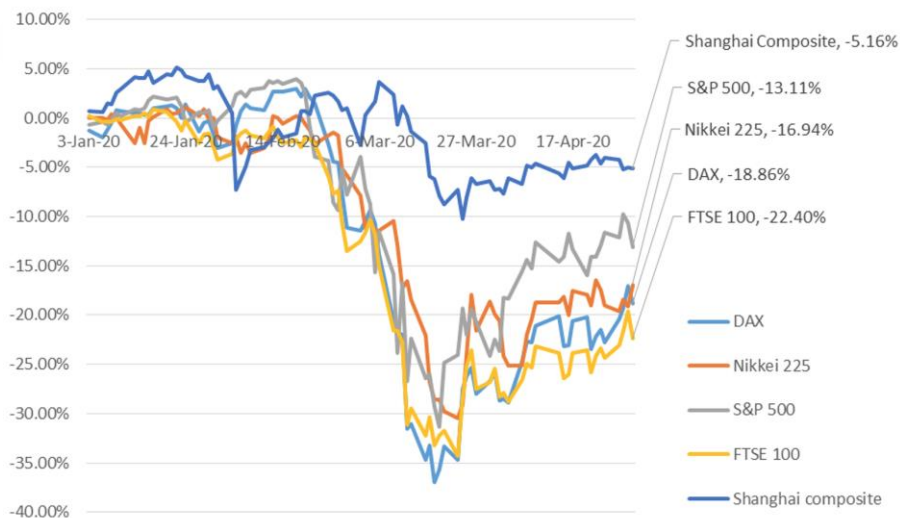


Figure 1: Returns of The Global Stock Markets Indices (January – April 2020)

Source: Investing.com

The effects of the COVID-19 pandemic vary widely from country to country. There have been several studies related to the effect of the COVID-19 pandemic on stock performance in the market, where it found that a pandemic had a negative effect on returns

of stock performance since the emergence of this COVID-19 pandemic (Al-Awadhi et al., 2020). Also, the rapid and global spread of coronavirus has negatively influenced investors' confidence and perspective in the market because of the uncertain global economic condition (Liu et al., 2020). Although the pandemic is more likely to have a negative impact, especially in the sectors of industry, there are also several potential industry sectors that can survive and continue to have stable business performance or even better performance during the pandemic, for instance the pharmacy and agriculture sector (Sun et al., 2021).

Household consumption in Indonesia contributes more than 50% of the total country's GDP, so consumption is a very strategic sector and a guarantee to ensure that the wheels of the economy continue to run (Hakim & Bustaram, 2019; Nugraha & Osman, 2018). Therefore, the government should maintain people's purchasing power so that household consumption can be sustained along with the government's commitment to boost the manufacturing industry sector to continue to contribute positively to the economy in the middle of this COVID-19 pandemic (Fawzi et al., 2021). Also, the mining sector has important role in Indonesia for providing more employment, enhancing regional income and the state income, and advancing the transportation and communication sector in Indonesia (Maia et al., 2019). While the property sector is the sector capable of absorbing numerous workers and has a multiplier effect as well as significant linkages to other economic sectors and has an impact on the economy, particularly the development of financial products (Nguyen & Razali, 2020; Susanti et al., 2020). Also, the agricultural sector of industry in Indonesia has been considered as one of the main drivers in the Indonesia citizen's economic development (Schoneveld et al., 2019).

Thus, it is necessary to analyze those potential industry sectors in Indonesia for which sectors have good resilience and sustainability to cope with the pandemic and which sectors are more vulnerable and have disadvantages of the existence of the pandemic. This research is expected to provide valuable information for the investors in order to make decision-making in terms of their potential investment in industry sectors in Indonesia and for the policymakers to generate ideas for any repressive and preventive actions and policies regulated to cope with the pandemic recently and in the future. Then, this study is written certainly in six sections, which are firstly the introduction, secondly the literature review, thirdly the method, next to the results and findings, and then the discussion and policy recommendation, and eventually the research conclusion.

Literature Review

Cai & Luo (2020) found that the pandemic of COVID-19 has been an unfavorable interruption on the manufacturing industry in China where it intervened in flow of the supply chain of spare parts and raw materials within the industry. Also, Kumar et al. (2020) added that the COVID-19 pandemic is certainly a global disturbance in the network of supply chain and global production of manufacturing sector, especially in India, for the result that many manufacturing plants are working with limited capacities and some have been shut down. Then, it notices that during the pandemic of COVID-19, especially in Turkey, the sustainable performance of food, agriculture, and health sector are vital for

repressive actions to assist in coping with the food crisis in the country as well as reducing the pandemic's negative impact towards global economy Aday & Aday (2020). The research was done by Chowdhury et al. (Chowdhury et al., 2020), related to the impact of COVID-19 in the consumer sector of industry in Bangladesh, revealed that the pandemic was severe towards performing of food and beverage industry where there were potential declines in companies' return on investment, companies' employee size, and companies' contribution towards country's GDP within the industry. Also, Martin et al. (2020) found that the transmission and impact of the spread of coronavirus were harmful and stimulated towards the increase of regional poverty rate in California, as well as the existence of individual income loss in the absence of social protection in the San Francisco Bay Area.

Concerned with the negative impact on the global economy, Genkin & Mikheev (2020) discovered that the spread of coronavirus not only has affected the industry performance of food production, but also the performance of agricultural and fisheries production of fruits and vegetables in Russia. But then, the study written by Barichello (2020) showed that the Canadian industry of agriculture sector was the least affected by the global spread of corona virus in terms of agricultural exports although there was a raise of wheat price during the pandemic. While Laing (2020) found that COVID-19 has given potential disturbance on many businesses' performance along with the issues of health of individual livelihoods globally, especially towards the mining sector performance in the United Kingdom, which has weak resilience and is not immune to the existence of the pandemic. Then, it notices that the research by Ibn-Mohammed et al. (2021) explicated that COVID-19 has negatively hit the mining sectors, especially in France, Japan, China, Italy, UK, Korea, and the USA, by being a disruption towards both the industry's performance and commodities' global prices. Meanwhile, Tanrıvermiş (2020) found that COVID-19 has negatively affected the investment returns, values and cost estimation, and operational sales performance, as well as the project developments in the real estate sector of industry in Turkey. Furthermore, within the property sector of industry, Del Giudice et al. (2020) showed that the pandemic of COVID-19 has unexpectedly hit in Italian industry of unfavorable consumption reduction and an increase in unemployment, and depressed the real estate sector of 4.16% drop of housing price in Campania Region. Then, Yoruk (2020) added that the real estate industry will certainly suffer a major loss because of existence of COVID-19 in the United States and there was apparently 60% fall new home listing performance in the industry sector of property.

In addition, Akrofi & Antwi (2020) identified that the packages of economic stimulus in Africa did not efficiently support the resilience of energy sectors in the country from COVID-19 pandemic, while Kenya, Nigeria, and Burkina Faso had certain interventions from the pandemic for their renewable energy sectors. Stephany et al. (2020) revealed that the pandemic of COVID-19 affected the mining sectors globally as well as the demand for metals unfavorably where the mitigation for related industries have been minimal to date. The significant drops in metal prices globally suggest a negative effect of the pandemic towards the global mining sectors of industry. And then, Maijama'a et al. (2020) added the findings that a total number of COVID-19 cases, as a current global pandemic, had a

negative influence on the shift of crude oil prices, while the country's total population had positive influence on total number of COVID-19 cases recently happening in China. The study done by Eroğlu (2021) showed that COVID-19 has created issues in the renewable energy sector, for instance, the issue in tax stock markets and delay in the supply chain, while Myllyvirta (2020) found that there was a drop in daily coal consumption within the industry of energy sectors in China. Furthermore, in the United Kingdom, Salisu et al. (2020) revealed that gold has performed better against the increasing risk of global oil prices, in which the industry of mining sector has good resilience in coping and sustaining against the pandemic happening within the country.

METHOD

The data analysis in this research has been using and measured a ten-day window data of the stock returns before, during, and after the announcement day of COVID-19 pandemic in Indonesia on March 2nd, 2020 (Natalia, 2020; Ratcliffe, 2020). The data sample is in the form of Indonesia Stock Exchange (IDX) with IDX Composite Index as the stock market data and other five selected sectors of industry's indices data which are IDX Consumer, IDX Manufacture, IDX Mining, IDX Property, and IDX Agriculture. The source of data in this research is mainly generated from the website of investing.com. Then, the research analysis method in this study is based on the event study analysis, in which assessing and evaluating the relationship between economic events and stock market performance (Linton, 2019). This study uses a 10-day event window with 120-day estimation window as suggested in the research done by Sun et al. (Sun et al., 2021) (see Figure 2). Based on the 120-day estimation window, the return of market index is regressed to every industry's stock returns in the purpose to calculate and measure the intercept (alpha) and coefficient of the slope (beta).

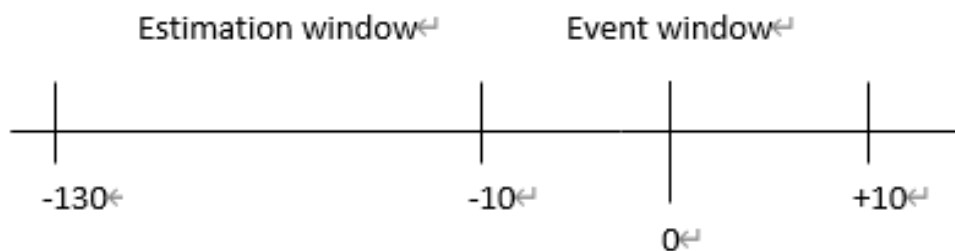


Figure 2: The Timeline of Event Study

The data analysis in this research is based on the analysis and valuation of the abnormal return and cumulative abnormal return. Abnormal return is basically the difference between the actual return and the expected return. This is often used to evaluate the performance of securities in the market which can also be used as a basis for testing market efficiency. While the cumulative abnormal return is basically the sum of all rates of the abnormal return, in which statistically a good result of cumulative abnormal return is

one that is positive and significant (Linton, 2019). According to Linton (2019), the formula of measuring daily stock returns can be written as follows:

$$R_t = \frac{P_t - P_{t-1}}{P_{t-1}} \quad (1)$$

R_t = Stock daily return on t day,
 P_t = Stock closing price on t day,
 P_{t-1} = Stock closing price on t-1 day.

Further, the formula of measuring expected stock returns can be written as follows:

$$E(R)_t = \alpha + \beta R_{mt} \quad (2)$$

$E(R)_t$ = Expected return on stock for day t
 α = Intercept of the regression equation
 β = Stock's Beta value (slope)
 R_{mt} = Return (on IDX) index for day t

And the formula of measuring stock's abnormal returns can be written as follows:

$$AR_t = R_t - E(R)_t \quad (3)$$

AR_t = Abnormal return for day t
 R_t = Actual return on stock for day t
 $E(R)_t$ = Expected return on stock for day t

FINDING AND DISCUSSION

Abnormal Return

Abnormal returns are often used to evaluate the performance of securities, which can also be used as a basis for testing market efficiency. The market will be efficient if none of the market players enjoy the abnormal return in a long enough period time. It is known that abnormal returns usually occur around the announcement of an event and the COVID-19 outbreak can be the potential factor of the stated event. A certain event can result in a significant increase in trading activity. Apart from increased trading activity, there indicates of appearing potentiality to lead to a stronger price movement (Sevindik & Gökgöz, 2018). Then, within the event period of -10 to 10, the abnormal returns of Indonesian industries of the consumer sector, property sector, agriculture sector, manufacture sector, and mining sector are explicated on Table 1 along with their significance level.

Based on Table 1, before the official announcement of the COVID-19 outbreak in Indonesia, only the index of manufacturing sector showed a significant and positive abnormal return on day -2. And then, most of the industry sectors of consumer, agriculture, and manufacture showed significant and negative abnormal return on day -1 certainly before the announcement day. These negative impacts potentially happened because of the worldwide crisis of the COVID-19 outbreak since the first time it was discovered in China

in December 2019. It has been a critical disturbance on the export-import activities that can cause a negative influence on performing of those related industry sectors in Indonesia in which the country is also very dependent on China concerned with certain the most raw materials supplied (Herman, 2020). Then, the pandemic had no significant influence on the abnormal returns of property and mining sector of industry concerned with the business performance before the announcement day.

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At the announcement day, it can be seen that only manufacture sector of industry in Indonesia that has a significant and positive abnormal return of 1.51%. The positive performance of Indonesia's manufacture sector is potentially because of resilience to face the negative impact of the COVID-19 in worldwide export-import activities by having better performance of providing domestic raw materials for industries to keep up with their performance during the pandemic (D. F. Rahman, 2020). In this aspect, Indonesian government is supposed to have major roles in supporting industries in the country to cope with the COVID-19 outbreak.

The effect of announcement of COVID-19 pandemic in Indonesia, it can be explicated that firstly based on Indonesia's industry of consumer sector, it has a significant and positive abnormal return of 2.68% and 2.14% on day 7 and day 8 respectively. This positive performance is potentially because of the increase of people's demand on daily consumption as well as intention of having more food and beverage stocks at home because of the potential issue of panic-buying and lockdown policy that will be done by the government (Potia & Praseco, 2020). Based on Indonesia's industry of property sector, it has a significant and negative abnormal return of -2.51% on day 7. This negative performance is potentially because of lack of real estate business' performance mostly concerned with the current sluggish housing deals and potential decline of sales of land and buildings supported with the potential issue of sales interest expense during the pandemic (Arcibal, 2020). This kind of situation will seem to make the investors to stop the investment activities because of uncertain economic condition that will affect many business deals. For agricultural sector, it has a significant and negative abnormal return of -2.67% on day 5. This negative performance is potentially because of major issue of worldwide export-import activities in

which it will weaken Indonesia's export performance for the staple food ingredients and other exported staple foodstuffs (Mapa, 2020).

Table 1. *Abnormal Return in the Event Window (-10 to 10)*

Event Day	Consumer	Property	Agriculture	Manufacture	Mining
-10	0.03%	1.20%	0.10%	0.08%	0.23%
-9	-0.08%	1.24%	-0.21%	0.36%	0.64%
-8	0.14%	-0.60%	-0.26%	0.24%	-0.06%
-7	0.71%	-0.73%	-0.69%	0.16%	1.48%
-6	-0.16%	-0.21%	-0.61%	-0.41%	0.11%
-5	-0.01%	-0.41%	-0.82%	0.22%	0.32%
-4	-0.08%	0.12%	0.56%	-0.49%	-0.09%
-3	0.27%	0.43%	-0.54%	-0.52%	-0.18%
-2	0.52%	0.92%	0.27%	0.92%**	-0.15%
-1	-1.50%**	-0.12%	-3.00%**	-1.26%**	-0.87%
0	1.06%	0.19%	0.64%	1.51%**	-0.14%
1	1.04%	-0.34%	0.42%	-0.09%	0.28%
2	-0.16%	-0.46%	-0.84%	-0.24%	-0.07%
3	0.51%	-0.92%	0.81%	0.39%	-0.34%
4	1.21%	-0.14%	1.02%	0.68%	1.06%
5	0.18%	-0.34%	-2.67%**	0.55%	-0.62%
6	0.65%	-0.96%	-1.33%	0.03%	-0.15%
7	2.68%**	-2.51%**	-1.83%	1.42%**	-1.11%
8	2.14%**	-0.87%	-1.70%	1.09%**	-1.39%
9	0.63%	-0.87%	-2.27%	-0.99%**	-0.87%
10	-1.02%	0.09%	-0.87%	0.07%	0.71%

Notes: ** explicates the significance at 5% level.

According to Indonesia's industry of manufacturing sector, it has significant and positive abnormal return of 1.42% and 1.09% on day 7 and day 8 respectively, but then in the following day of day 9, it has a significant and negative abnormal return of -0.99%. This negative performance is potentially because of the starting of lack of manufacturing industries' performance caused by critical issue of export-import activities, especially for imported major and basic raw materials from China, in which supported by potentiality of temporary business shut-down of many manufacturing companies because of public policies related to lockdown and work-from-home activities that will potentially and certainly be implemented soon by the government of Indonesia (Herman, 2020). And eventually, only Indonesia's industry of mining sector that has no significant abnormal return concerned with the impact of existence of COVID-19 in the country. This happened considerably because of indirect critical influence of the pandemic on the business performance where the mining sector mainly focuses on providing employment, increasing regional and state

income, and supporting transportation and infrastructure sector in Indonesia (Müller, 2020; Winzenried et al., 2019).

Cumulative Abnormal Return

The cumulative abnormal returns of Indonesian industries of consumer sector, property sector, agricultural sector, manufacturing sector, and mining sector within the test window are explicated on Figure 3 along with their trend movement before and after the announcement day. It seemed that, on day 10 after the announcement, two industry sectors of manufacture and consumer have positive cumulative abnormal return while the other three sectors of mining, property, and agriculture have negative cumulative abnormal return. Then, the highest increase of trend movement of cumulative abnormal return is carried by consumer sector of industry, while the highest decline is on the agricultural sector of industry in Indonesia. A quite stable trend movement of cumulative abnormal return from day -10 to day 10 is shown by the mining sector which is less volatile during the event window.

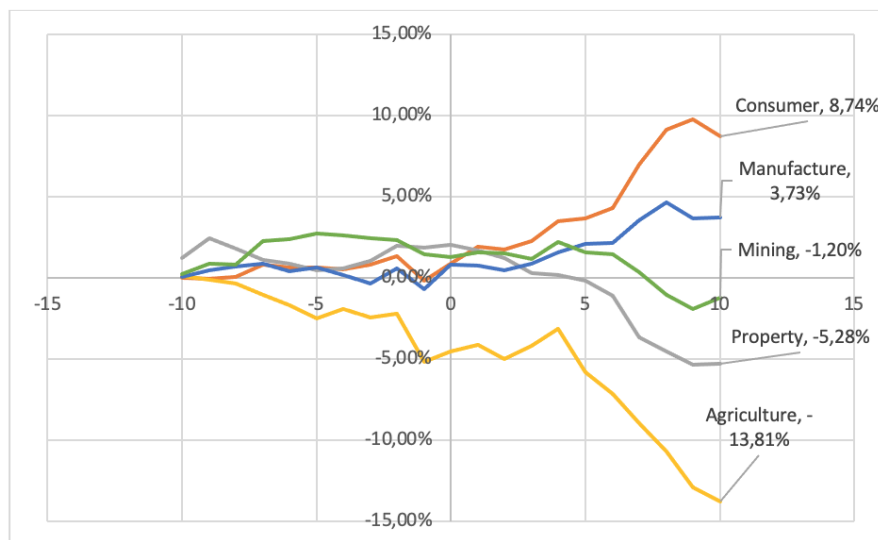


Figure 3. Cumulative Abnormal Return (CAR) of Industry's Indices within Test Period (-10 to 10)

Based on Figure 3, during day -10 to day -1 before the announcement day, the four Indonesian industry sectors of consumer, manufacturing, mining, and property showed a quite stable trend movement of their cumulative abnormal returns, while the industry sector of agriculture showed more volatile cumulative abnormal return with declining trend movement from 0.10% on day -10 towards -5.20% on day -1. This declining trend movement by the agriculture sector can be potentially caused by the decline of its contribution, especially in agricultural aspects, during the current year supported by the potential increase of rice imports done by Indonesia (Mapa, 2020).

After the announcement day, some industries sectors have reacted towards the official announcement of existence of COVID-19 in Indonesia on March 2nd, 2020, for instance the consumer, manufacture, property, and agricultural sector. The consumer sector of industry has the highest increasing trend movement of its cumulative abnormal return from 0.90% on day 0 of the announcement day towards 8.74% on day 10 after the announcement day. It is potentially caused by increasing demand of food and beverage and other daily consumption products within the country because of the upcoming quarantine policy done by the government in which it has led to the increase of business performance of the consumer sector (Potia & Praseco, 2020). Then, the increasing trend movement of cumulative abnormal return is also showed by the manufacturing sector after the announcement day from 0.83% on day 0 towards 3.73% on day 10. It is known that manufacturing sector in Indonesia is very potential in supporting the economic growth where the government will certainly assist the industry to keep operating well in which this industry sector also absorbs the most of the employment in the country (Rahman, 2020)

And then, the decreasing trend movement of cumulative abnormal return is shown by the property sector from 2.03% on day 0 towards -5.28% on day 10 after the announcement. This is potentially concerned with the lack of housing business deals in real estate sector, including the issue of fluctuation of interest rate and currently uncertain economic condition in the country which considerably leads to the decrease of property investment and the lack of land and building sales (Arcibal, 2020). And the highest a declining trend movement of cumulative abnormal return is on the agriculture sector from -4.55% on day 0 of the announcement day towards -13.81% on day 10. It is certain that the agriculture sector has already had declining trend movement before the announcement and it is getting worse from day 4 after the announcement, from -3.14% to -13.81% on day 10. It explains that COVID-19 pandemic has major impact on Indonesia's agriculture sector after the announcement day. It is potentially supported by the lack of business performance in that sector before the announcement because of considerably lack of agricultural export contribution from the country and high rate of rice imports which can lead to investors' perspective that the investment in the agriculture sector is no longer promising added by the existence of the pandemic in the country that has caused disruption and unstable economic condition (Mapa, 2020). And eventually, based on the mining sector, this sector has shown a quite stable trend movement of its cumulative abnormal return even after the announcement day with certainly less volatile trend movement. Based on Figure 3, the mining business sector, as well as the consumer and manufacturing sector in Indonesia, have resilience and can sustain better regardless of any existence of critical pandemic like COVID-19, and are considerably suggested for potentially profitable investment for the interested investors.

The existence of the COVID-19 pandemic has become a critical disruption and a formidable challenge to global economic growth and development. These disruptions and challenges have also been felt by the performance of the stock market which was affected by the presence of COVID-19, especially the performance of the stock market in Indonesia. In the current uncertain economic condition, most investors will be worried about their

investment in any industrial sector related to the COVID-19 outbreak. Most likely investors will sell their shares which will result in a decline in the performance of domestic stocks (Susanti et al., 2020). But then, regardless of the current pandemic, it can be considered that there are several sectors of industry in Indonesia that can withstand the critical impact of the spread of COVID-19 in the country.

Based on the research findings, there are several sectors of industry that are likely more sensitive on the official announcement of existence of COVID-19 pandemic in Indonesia, and also there are industries that keep sustaining with stable business performance even during and after the announcement day of COVID-19 in the country. Based on the performance of their cumulative abnormal return, after the official announcement of COVID-19 in Indonesia, the consumer and manufacturing sector have an increasing trend and better performance after the announcement day. This result contradicts with the research result done by Cai & Luo (2020) and Kumar et al. (2020) related to negative impact of pandemic towards manufacturing industry which the different research result is potential because of different government repressive actions and policies to protect the related industry as well as the industry performance in terms of its resilience during pandemic situation within the country. But then within the consumer sector of industry, the result of this research supports the research done by Aday & Aday (2020) concerned with increasing performance of food industry during a pandemic in which this sector is one of vital sectors of industry to assist coping and reducing the pandemic's unfavorable impact within the country.

Moreover, it is unfortunate for property and agriculture sectors that have decreasing trend and lower performance after the announcement day. And this result supports the research result done by Genkin & Mikheev (2020) related to lower agriculture industry's performance caused by the existence of pandemic in the country, as well as supporting the research done by Tanrıvermiş (2020) related to the negative influence of a pandemic towards operational sales performance and projects development in the property industry. And then, for the only industry of mining sector, this business sector rather has more stable trend movement with less volatile of its cumulative abnormal return compared with other sectors of industry in this research (Müller, 2020; Winzenried et al., 2019). It seems that Indonesia's mining industry sector is more sustainable for potential investment activity because of its resilience of business performance even during a critical economic condition of the existence of a pandemic, as well as the favorable performance of consumer and manufacturing sector (Siregar, 2020).

The findings in this research are expected to be meaningful and useful for potential investors of related industry sectors and the government of Indonesia as well for any potential policies regulated. This research is expected to be very helpful, especially for investors, to study and determine certain sectors of industry as potential investment places in Indonesia. In this study, it can be seen and explained that the industry sectors of consumer, manufacture, and mining are the most considerable potential investment opportunity for interested investors because of good business performance sustainability even during the COVID-19 pandemic happening in Indonesia. Thus, apart from the

repressive actions done and initiated nowadays, the government of Indonesia should be able to conduct preventive actions as well to cope with the potentiality of a pandemic happening. With the existence of preventive actions carried out by the government, through new regulated policies, there will be more potential for Indonesia to at least reduce the critical impact of the pandemic, especially to support protecting industries in Indonesia. These potential preventive policies will be valuable to consider that Indonesia's stock market performance will have good resilience to cope with the pandemic happening concerned with sustainable business performance within sectors of industry.

Furthermore, the government of Indonesia can consider reducing the interest costs for letters of credit and lower import duties on imported raw materials to protect domestic industries. Then, another action is that the government can prioritize the state budget to support the availability of adequate health facilities and equipment for the rapid handling of victims of the pandemic, with the aim of reducing the death rate and increasing the cure rate efficiently. Then, the government can also pay more attention to research institutions to be more responsive in creating vaccines for various kinds of new viruses that are currently developing. Various government policies to break the chain of the spread of the coronavirus in Indonesia have been carried out well, for instance the existence of a quarantine policy, both self-quarantine and regional quarantine, lockdown and work-from-home policy, as well as the polymerase chain reaction test which must be carried out if the person wants to go to a different province or for the arrival of Indonesian citizens from abroad. Certainly, if the economic conditions and national security have improved, then this will be good news for investors where companies from many sectors of industry will begin having better performance as well as passing through the pandemic, especially for property and agriculture sector, that have unfavorable impact from the COVID-19 outbreak to their declining stock performance in this study.

In addition, related to small business enterprises, the government can issue policies to exempt interest payments and delay credit terms for businesses that are critically affected by the COVID-19 pandemic. As for several policies from other countries that can be considered by the Indonesian government, such as in China, which has implemented a reduction and postponement of tax payments to companies that are critically affected by this pandemic. Then in South Korea, which has implemented optimal subsidies for people who are less well off financially. And then in Japan, which has implemented subsidies for people who have undergone a lockdown and work-from-home situation, especially for all the entrepreneurs who are temporarily closing their business during the pandemic.

CONCLUSION

This research is utilizing the method of an event study to analyze and value the influence of the official announcement of the existence of COVID-19 in Indonesia towards selected potential industries of consumer, manufacture, mining, property, and agriculture sector. Based on the data analysis, it showed that the index of manufacturing sector showed a significant and positive abnormal return on day -2 before the announcement day. It is noticed that most of the industry sectors of consumer, agriculture, and manufacture showed

a significant and negative abnormal return on day -1 certainly before the announcement day. But then, it seems that the pandemic had no significant influence on the abnormal return of property and mining sector of industry concerned with their business performance before the announcement day.

After that, on day 0 of the announcement day, it can be seen that only manufacturing sector of industry in Indonesia has a significant and positive abnormal return of 1.51%. And then after the announcement day of COVID-19 pandemic in Indonesia, it can be explicated that firstly based on Indonesia's industry of consumer sector, it has a significant and positive abnormal return of 2.68% and 2.14% on day 7 and day 8 respectively. Secondly, based on Indonesia's industry of property sector, it has significant and negative abnormal return of -2.51% on day 7. Thirdly based on agriculture sector, it has a significant and negative abnormal return of -2.67% on day 5. Next, based on Indonesia's industry of manufacturing sector, it has a significant and positive abnormal return of 1.42% and 1.09% on day 7 and day 8 respectively, but then in the following day of day 9, it seems that it has a significant and negative abnormal return of -0.99%. And eventually, only Indonesia's industry of mining sector that has no a significant abnormal return related to the impact of the existence of COVID-19 in the country.

The findings in this research are expected to be able to provide valuable information to the potential investors for related business sectors, the related companies' management, researchers, and the government of Indonesia concerning the impact of the existence of COVID-19 pandemic on Indonesia's stock performance. It is noticed that the stock performance of consumer, manufacturing, and mining sector in Indonesia have been promising for potential investment for their resilience and better business performance during the pandemic, while recently the stock performance of property and agriculture sector are considerably unfavorable for the potential investment during the COVID-19 outbreak. It is suggested for the companies' management within the industry of property and agriculture sector to have better preventive actions and efficient regulations to cope with any pandemic that will probably happen in the future. Moreover, the government of Indonesia should pay more attention to companies within potential the sector of industry that is giving high contribution for the economic growth to support assisting those companies to sustain and be able to cope with the pandemic, especially for any tax reduction and postponing the credit terms affecting the current business performance. Although it is known that currently there is no definite and efficient action or policy to deal with this COVID-19 case, since the pandemic itself still exists until now. Then it is also expected that all findings in this research will be useful for the related parties to generate quick repressive actions and policies to cope with the pandemic. And eventually, it is suggested for future research to be able to conduct further research in terms of the long-term influence on the related industries and also other industries that have not been included yet in this study.

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