

Eduvest – Journal of Universal Studies Volume 4 Number 08, August, 2024 p- ISSN 2775-3735- e-ISSN 2775-3727

# EVENT STUDY OF THE NEW ECONOMY BOARD ON ABNORMAL RETURN AND TRADING VOLUME ACTIVITY OF COMPANY SHARES IN THE INDONESIA STOCK EXCHANGE

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#### ABSTRACT

On December 5, 2022, Bursa Efek Indonesia resolutely revealed the primary economic data, which will be used as an event study in this investigation to understand the impact of abnormal return on the market and trading volume activity. The research window for this study is 11 days, which includes 5 days prior to the event, 5 days after the incident, and an estimated 14 days after the event. The type of research in this study is an event study. In this case, the independent variable (variable X) is the event of launching the New Board Economic whereas the dependent variables (variable Y) are abnormal return and trading volume activity. The research sample consists of companies listed on the new economic listing board. The companies included in the sample are GOTO, BUKA, and BELI. Hypothesis testing is done using One Sample T-Test and Paired Sample T-Test. The research results show that the significance value of abnormal return on T-5 is <0.05, whereas for other periods it is >0.05. Similarly, all periods of trading volume activity show values >0.05. This indicates that there is a significant abnormal return on T-5, or 5 days before the event of the launch of the New Economic Board. Meanwhile, in other periods, there is no significant abnormal return, and none of the periods show significant trading volume activity. In the difference test, the Sig. (2-tailed) values for both abnormal return and trading volume activity are >0.05, indicating no difference in abnormal return before and after the launch of the new economic board, as well as no difference in trading volume activity.

**KEYWORDS** Event Study, Abnormal Return, Trading Volume Activity, New Economic Board

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How to cite: E-ISSN: Published by: Agung Setiawan et al. (2024). Event Study Of The New Economy Board On Abnormal Return And Trading Volume Activity Of Company Shares In The Indonesia Stock Exchange. *Journal Eduvest. 4* (7): 6629-6641 2775-3727 https://greenpublisher.id/ Agung Setiawan, Yoyo Sudaryo, Dayan Hakim Natigor Sipahutar, Nunung Ayu Sofiati

#### **INTRODUCTION**

The capital market is a meeting place for business units that need funds with business units that have excess funds and is part of the financial market for longterm securities such as stocks, bonds, rights, convertible bonds, and derivative products like put or call options, with the capital market organizer being the Indonesia Stock Exchange, which is a merger of the Jakarta Stock Exchange and the Surabaya Stock Exchange (Dayan & Yoyo, 2022).

Companies whose stocks are listed on the stock exchange will be recorded on the trading board. According to the Indonesia Stock Exchange, the stock trading board is a concept for grouping stocks that are listed and traded on the stock exchange. Companies are grouped based on certain criteria. The stock trading board serves as a framework that helps market participants understand the characteristics and risk levels of the listed stocks. There are four types of stock groupings on the trading board: the main board, the new economy board, the development board, and the acceleration board.

On December 5, 2022, the Indonesia Stock Exchange officially launched the new economy board with the aim of providing a listing board for technology-based companies to create product and/or service innovations that have broad social benefits and high growth rates. The new economy board is a listing board equivalent to the main board. Companies can be listed on the new economy board if they meet the requirements for listing on the main board and possess specific characteristics determined by the Exchange. There are three companies listed on the Indonesia Stock Exchange :

No	Kode	Nama Perusahaan	Tanggal IPO	Saham	Papan Pencatatan
1	BUKA	Bukalapak.com Tbk.	06 Agustus 2021	103.099.967.067	EKONOMI BARU
2	GOTO	GoTo Gojek Tokopedia Tbk.	11 April 2022	1.201.409.662.836	EKONOMI BARU
3	BELI	Global Digital Niaga Tbk.	08 November 2022	120.766.180.771	EKONOMI BARU
C	т	1 ' 0' 1 E	1 (0004)		

Tabel 1.1 Data of Companies on the New Economy Board

Source : Indonesia Stock Exchange (2024)

In this study, the phenomenon of stock price movements of companies at the time the new economy board was officially launched, both before and after, experienced varying stock price changes as shown in the graph below.



**Figure 1.1 Stock Movement Graph** Source : Indonesia Stock Exchange (2024)

The graph above shows the stock data movement from the dates before the new economic board was officially launched, which is from November 28, 2022, to December 2, 2022, and from the dates after the new economic board was officially launched, which is from December 6, 2022, to December 12, 2022.

It is noted that the stock of BUKA experienced a positive price change before the new economic board was officially launched, but it experienced a negative price change, albeit fluctuating, after the board's launch. The stock of BELI experienced fluctuating price changes both before and after the new economic board was officially launched. The stock of GOTO showed a downward trend in price both before and after the new economic board was officially launched. Sari's research (2017) states that to study the impact of a sentiment on the capital market, an event study can be used. An event study is a study that examines market reactions to an event, where the information is published as an announcement.

The event window for this research is 11 days, consisting of 5 days before the event, the day of the event, and 5 days after the event. The determination of this event window is based on references from previous research. This research was conducted by Putu and Ayu with the title "Analysis of the Comparison of trading volume activity and Abnormal Stock Returns of IDX30 Before and After the Announcement of COVID-19 as a Pandemic by the World Health Organization." The event window for their research was also 11 days, consisting of 5 days before the event, the day of the event, and 5 days after the event. Additionally, research conducted by Rifa (2020) titled "The Impact of the COVID-19 Pandemic Event on the Composite Stock Price Index" used an event window of 15 days, which included 7 days before the event, the day of the event, and 7 days after the event. The use of

a 15-day event window was considered a limitation in the research, and it was recommended in subsequent studies to shorten the event window. A lengthy event window may introduce other events that could influence the research results (Irmayani & Wiagustini, 2015). Therefore, the researcher chose an 11-day event window to avoid the influence of other information that could affect the trading volume activity and Abnormal return of the relevant issuers.



**Figure 1.2 Event Window Image** 

In addition to the event window, research also includes an estimation period to calculate expected returns. Broen and Warner (1985) estimated expected returns using the mean adjusted model, market model, and market adjusted model. According to Peterson (1989), there is no fixed rule regarding the length of the estimation period and event period in an event study; the length of these periods depends on the researcher's considerations, previous literature, or the type of event. The researcher chose an estimation period of 14 days because, according to McWilliams and Siegel (1997), a too lengthy window period can make it difficult to control for confounding effects.

Signalling Theory states that corporate actions related to a company have the potential to convey information as a signal. When the announcement of the New Economic Board launch is published and received by market participants, they will immediately analyze and categorize this information as either good or bad news (Ayu and Henny, 2020).

Abnormal return is used as a measurement tool to analyze market reactions. Abnormal return is the difference between the actual return (the result obtained by investors) and the expected return (the anticipated result) that occurs before the official information is released or due to the leakage of information after the official information is published (Samsul, 2006:275).

The difference between the two returns can be either positive or negative. A positive abnormal return occurs when the actual return is greater than the expected return. This situation will attract investors to engage in transactions around the announcement period in the hope of obtaining above-normal profits. However, if the opposite situation occurs, the market will react negatively (Wistawan, 2014). A market's reaction to information is very important because it can cause price changes that affect abnormal returns and alter investors' perceptions when making investment decisions.

In addition to abnormal return, stock trading activity can also be used to measure market reactions. Trading volume activity is the ratio of the number of

shares traded at a specific time to the number of shares outstanding at that time. Trading volume activity affects stock price fluctuations. High trading volume activity indicates that the stock is in demand by investors, causing the stock price to become volatile.

Based on the explanation above, the researcher intends to investigate the market reaction to the announcement of the new economic board using abnormal return and trading volume activity as variables in this study. Unlike previous studies, the companies that are the objects of this research are those listed on the new economic board.

#### **RESEARCH METHOD**

#### Method

The type of research in this study is an event study. According to Jogiyanto (2014: 585), an event study is a study that examines the market's reaction to an event whose information is published as an announcement. Event studies can be used to test the information content of an event. The testing of information content is intended for the event under study, which is the launch event of a new economic board

#### **Operationalization of Variables**

Variables in this study consist of independent variables and dependent variables

#### **Independent Variables**

This variable is often referred to as a stimulus variable, predictor, antecedent. In Indonesian, it is also often referred to as an independent variable. An independent variable is a variable that influences or causes changes or the emergence of dependent (bound) variables. In this case, the independent variable (variable X) is the event of launching a new economic board.

#### **Dependent Variables**

Dependent variables are output variables, criteria, and consequences. In Bahasa Indonesia, they are referred to as dependent variables. Dependent variables are variables that are influenced or are the result of the presence of independent variables. In this case, the dependent variables are abnormal return and trading volume activity.

#### Abnormal return

Abnormal return is the difference between actual return and expected return. The calculation of expected return in this study uses the market adjusted model method, so the expected return is equal to the market return.

Actual Return

$$R_{i,t} = \left[\frac{P_{i,t} - P_{i,t-1}}{P_{i,t-1}}\right]$$

Explanation :

 $R_{i,t} = \text{issuer actual return i at time t}$  $P_{i,t} = \text{issuer stock price i at time t}$   $P_{i,t-1}$  = issuer stock price i at time t-1

Market Return

$$R_m = \left[\frac{IHSG_{i,t} - IHSG_{i,t-1}}{IHSG_{i,t-1}}\right]$$

Explanation :

 $R_m$ = market return at time t $IHSG_{i,t}$ = Composite Stock Price Index at time t $IHSG_{i,t-1}$ = Composite Stock Price Index at time t-1

Regretion individual daily stock returns with daily market returns to obtain  $\alpha$  (alfa) and  $\beta$  (beta) Each stock using the single index model.

 $R_{i,t} = \alpha_i + \beta_i R_{mt} + e_i$ 

Explanation :

 $R_{i,t}$  = stock actual return i at time t  $R_m$  = market return at time t  $\alpha_i$  = the part of stock return i that is not influenced by stock performance  $\beta_i$  = stock beta stock i  $\alpha_i$  = maidwal Erman

 $e_i$  = residual Error

Abnormal return

 $AR_{i,t} = R_{i,t} - R_m$ 

Explanation :

 $AR_{i,t}$ = Stock abnormal return i at time t $R_{i,t}$ = stock actual return i at time t $R_m$ = stock expected return i at time t

Average abnormal return

$$ARR_{i,t} = \sum_{t=1}^{n} \frac{AR_{i,t}}{n}$$

Explanation :

 $ARR_{i,t}$  = issuer average *abnormal return* i at time t  $AR_{i,t}$  = issuer *abnormal return* i at time t n = number of observation periods

# Trading volume activity

Trading volume activity

$$TVA = \frac{number \ of \ shares \ traded}{number \ of \ shares \ outstanding}$$

Average trading volume activity

$$\bar{X}TVA = \frac{\sum_{i=1}^{n} TVA_i}{n}$$

Explanation :

$\bar{X}TVA$	= Average trading volume activity
$TVA_i$	= trading volume activity in securities i
n	= number of samples

### Type and Source of data

The type of data used in this research is secondary data, which is data that is already available. The secondary data used in this study includes stock prices and trading volumes in 2022, covering 5 days before the announcement of the new economy board event, during the announcement event, and a 14-day estimation period.

# Data collection technique

Sugiyono (2013: 224) states that data collection techniques are the most strategic steps in research because the main goal of research is to obtain data. The data collection technique in this study is documentation. In this study, the author uses the documentation method. The documentation method involves information derived from important records, whether from institutions or organizations, or from individuals that already exist. Data collection is carried out by reviewing the necessary data, recording, and analyzing the annual reports of three marketplace companies listed on the Indonesia Stock Exchange (Bukalapak, Gojek-Tokopedia, and Blibli.com) from the year 2022.

## Sample

This research employs a sampling method that does not give equal chances or opportunities to every element or member of the population to be selected as a sample. The technique used is purposive sampling, which is a method of determining the sample based on specific goals and considerations. The research sample comprises companies listed on the new economic board. There are three special characteristics for a company to be included in this new economic board. First, having high revenue growth. Second, using technology to create product or service innovations that enhance productivity and economic growth while providing social benefits. Third, being in a business field determined by the IDX (Indonesia Stock Exchange). Companies that meet these criteria include Bukalapak, Gojek-Tokopedia, and Blibli.com.

# Population

The population is "a generalization area consisting of objects/subjects with certain traits and characteristics applied by the researcher to study and draw conclusions" (Sugiyono, 2019:126). The population in this study comprises companies listed on the new economy board recorded on the IDX (Indonesia Stock Exchange) in 2022.

# **Analysis Method**

#### **Deskriptive Analysis**

According to Sujarweni (2019:87), "this research is conducted to determine the value of each variable, whether one or more variables are independent, to obtain an overview of these variables Sujarweni (2019). In this research, the researcher not only compares these variables in different samples but also seeks the relationship between the variables to produce a conclusion. The descriptive analysis in this research aims to determine the minimum, maximum, mean, standard deviation, Jarque-Bera, kurtosis, skewness, and differences of each variable.

#### Verifikative Analysis

Verificative analysis is a research method aimed at testing the validity of a hypothesis, which means examining a previously determined hypothesis. To test the differences in abnormal return and trading volume activity before and after the event of launching the new economy board, a difference test is conducted using either the Paired Sample T-Test or the Paired Sample Wilcoxon Signed Rank Test, depending on the results of the data normality test.

#### Normality test

Normality testing is a classic assumption test aimed at determining whether the data are normally and evenly distributed or not (Nuryadi et al., 2017). In this study, a significance level or alpha of 0.05 was used with the Shapiro-Wilk test due to the small sample size, to better focus on a specific event. From the results of the Shapiro-Wilk test, if the significance value is >0.05, it means the data are normally distributed. If the significance is <0.05, it means the data are not normally distributed. Normality testing is useful for determining whether hypothesis testing will use parametric or non-parametric statistical tools. Parametric statistics are used if the data are normally distributed, while non-parametric statistics are used if the data are not normally distributed (Susanti, 2015).

#### Significance Test

Significance testing on the variables of abnormal return and trading volume activity can use the One Sample T-Test if the data are normally distributed based on the normality test. Alternatively, the One Sample Wilcoxon Signed Rank Test should be used if the data are not normally distributed, according to the normality test results for both variables.

#### **Paired Sample T-Test**

The Paired Sample T-Test is a method of difference testing aimed at examining and analyzing the difference in sample values before and after a specific event or treatment (Melisa and Ambang, 2022). According to the statistical test results, if the significance value (Sig.) is < 0.05, then Ha is accepted, indicating a significant difference in the sample mean. Conversely, if the significance value is  $\geq 0.05$ , then Ha is rejected, indicating no significant difference in the sample mean.

#### Paired Sample Wilcoxon Signed Rank Test

The Paired Sample Wilcoxon Signed Rank Test is a non-parametric test frequently used by researchers as an alternative to the Paired Sample T-Test. Its purpose is to assess significant differences between two groups of data that are not normally distributed (Hidayat, 2014). If the probability value is < 0.05, then Ho is rejected, indicating a significant difference between the two data groups. Conversely, if the probability value is > 0.05, then Ho is accepted, indicating no significant difference between the two data groups

#### **RESULT AND DISCUSSION**

#### **Deskriptive Analysis**

Table 4.1 presents the descriptive statistics results of the variables abnormal return and trading volume activity both before and after the event.

Domindo	N	Abno	rmal return	Trading Vol Activity	
Periode	IN	Mean	Std. Deviation	Mean	Std. Deviation
T-5	3	-0.04042	0.01486	0.01793	0.02644
<b>T-4</b>	3	-0.02376	0.03099	0.00151	0.00111
T-3	3	-0.04373	0.05889	0.00619	0.00776
<b>T-2</b>	3	-0.00001	0.02362	0.00150	0.00124
<b>T-1</b>	3	-0.03108	0.02731	0.00079	0.00077
TO	3	-0.03498	0.02054	0.00227	0.00269
T+1	3	0.03488	0.03856	0.00122	0.00093
T+2	3	0.00035	0.01558	0.00059	0.00037
T+3	3	-0.01627	0.03171	0.00079	0.00043
T+4	3	0.01960	0.02953	0.00066	0.00038
T+5	3	-0.03687	0.03530	0.00053	0.00042
<b>Average Before</b>	3	-0.02780	0.02744	0.00558	0.00457
Average After	3	0.00034	0.02711	0.00076	0.00045

Table 4.1 Deskriptive Analysis Abnormal return dan Trading volume activity

Source: Data processed by researchers (2024)

Next, normality testing was conducted on the abnormal return and trading volume activity data. If the normality test results indicate that the samples are normally distributed, parametric tests will be used for hypothesis testing. Conversely, if the data are not normally distributed, non-parametric tests will be used for hypothesis testing (Hidayat, 2004).

#### Verifikative Analysis

# Normality test

Table 4.2 presents the Normality test results of the variables abnormal return and trading volume activity both before and after the event.

				-		
Data		N	AR		TVA	
		IN	Sig.	Keterangan	Sig.	Keterangan
T-5		3	0.807	Normal	0.095	Normal
<b>T-4</b>		3	0.664	Normal	0.829	Normal
<b>T-3</b>		3	0.297	Normal	0.223	Normal
<b>T-2</b>		3	0.948	Normal	0.702	Normal

Table 4.2 Normality test

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T-1	3	0.724	Normal	0.478 Normal
Т0	3	0.238	Normal	0.439 Normal
T+1	3	0.691	Normal	0.272 Normal
T+2	3	0.363	Normal	0.742 Normal
T+3	3	0.051	Normal	0.742 Normal
T+4	3	0.683	Normal	0.586 Normal
T+5	3	0.671	Normal	0.256 Normal
<b>Average Before</b>	3	0.53	Normal	0.879 Normal
Average After	3	0.386	Normal	0.271 Normal

Source: Data processed by researchers (2024)

Based on the above data, it is known that the significance values for both abnormal return and trading volume activity are >0.05. Therefore, it can be concluded that all data from T-5 to T+5 are normally distributed, allowing hypothesis testing to be conducted using parametric tests, either the One Sample T-Test or the Paired Sample T-Test.

#### **One Sample T-Test**

Hypothesis Testing 1 and Hypothesis Testing 2 use the One Sample T-Test, which serves to determine the significance level of the abnormal return before or after the event of the new economic board launch and to test the significance level of the abnormal return before or after the event of the new economic board launch.

Data		AR	J	TVA	
Data	Sig.	Keterangan	Sig.	Keterangan	
T-5	0.042	<0,05	0.3610	>0,05	
<b>T-4</b>	0.315	>0,05	0.1420	>0,05	
T-3	0.327	>0,05	0.3010	>0,05	
<b>T-2</b>	0.999	>0,05	0.1710	>0,05	
<b>T-1</b>	0.188	>0,05	0.2200	>0,05	
TO	0.098	>0,05	0.2810	>0,05	
T+1	0.258	>0,05	0.1510	>0,05	
T+2	0.973	>0,05	0.1070	>0,05	
T+3	0.468	>0,05	0.0870	>0,05	
T+4	0.369	>0,05	0.0980	>0,05	
T+5	0.212	>0,05	0.1610	>0,05	
Average Before	0.221	>0,05	0.1690	>0,05	
Average After	0.985	>0,05	0.1000	>0,05	

Source: Data processed by researchers (2024)

Based on Table 4.3, it can be observed that the significance value of the abnormal return on T-5 is <0.05, while for other periods it is >0.05. Similarly, all periods for trading volume activity show values >0.05. This indicates that there is

a significant abnormal return on T-5, or 5 days before the event of the new economic board launch. Meanwhile, in other periods, there is no significant abnormal return, and no significant values are observed in any period for trading volume activity.

## **Paired Sample T-Test**

Table 4.4 presents the different test results of the variables abnormal return and trading volume activity both before and after the event.

	ABNORMA	L RETURN	TRADING VOLUME ACTIVITY		
	Sig. (2-tailed)	explanation	Sig. (2-tailed)	explanation	
	0.064	No difference	0.183	No difference	
~	~				

 Table 4.4. Paired Sample T-Test

Source: Data processed by researchers (2024)

Based on the above data, it is known that the Sig. (2-tailed) values for both abnormal return and trading volume activity are >0.05, leading to the acceptance of Ha. Thus, there is no difference in abnormal return between before and after the event of the new economic board launch, and similarly, no difference in trading volume activity.

#### Discussion

The test results show no significant market reaction to the launch event of the new economic board. This indicates that investors are not interested in making investments due to the negative abnormal return conditions on T-5, T-4, T-3, T-2, T-1, T-0, T+3, and T+5 as presented in chart 4.1.



Figure 4.1 Chart Average Abnormal return dan Trading volume activity

Source: Data processed by researchers (2024)

Figure 4.1 presents the average graph of the variables abnormal return and trading volume activity during the event period. From the graph, it can be seen that there is an increase in abnormal return on the day of the new economic board

launch. This indicates that the new economic board provided a positive signal, eliciting a reaction from investors on that day, although the test results were not statistically significant. This may be due to the limited sample size, as only three companies were listed on the new economic board. Additionally, the launch of the new economic board did not significantly impact trading volume activity, possibly because investors were not interested in buying shares of those companies.

#### CONCLUSION

Based on the research and discussion, the following conclusions can be drawn: 1. There is a significant abnormal return before the launch of the new economic board, specifically on T-5. 2. There is no difference in abnormal return between the periods before and after the launch of the new economic board. 3. There is no significant trading volume activity between the periods before and after the launch of the new economic board. 4. There is no difference in trading volume activity between the periods before and after the launch of the new economic board.

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