

# **Factors Affecting Internet Financial Reporting on Banks Listed on Indonesian Stock Exchange 2013-2017**

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## **Abstract**

The fast development of the internet nowadays attracts many companies to start using the internet to deliver information about company financial or nonfinancial information. Using the company website because of lower cost and pervasiveness. This study aims to determine the leverage ratio, profitability ratio, and listing age of banking companies listed on IDX 2013-2017. It significantly affects how banking companies use internet financial reporting. This study uses a statistic descriptive test, classic assumption test as normality test, multicollinear test, heteroscedasticity test, and autocorrelation test. The multiple linear regression and hypothesis tests, both partial t-test and simulant f-test are done using 127 samples from 27 banking companies. This study shows a significant effect on leverage, profitability, and listing age. For partial test from three variables shows that only listing age has a significant impact on internet financial reporting, profitability and leverage have no considerable effect on internet financial reporting.

## **Keywords**

Internet financial reporting, leverage, profitability, listing age

## **1. Introduction**

At this time, many things can be done to meet the needs and carry out daily activities more easily thanks to the rapid development of technology today. The internet is one example of the features resulting from technology development. It is most often used by the community in daily activities and is already familiar in today's society (Rizqiah and Lubis 2017). The internet has become an essential part of the field of communication community today (Jones & Xiao, 2004; Hossain et al. 2012). Based on Internet World Stats (2018) data, Asia ranks top in internet usage globally. In this case, Asia takes a sizeable portion with a percentage value of 48.7%, which means Asia accounts for almost half of the world's internet users.

The rapid development of technology has made the internet one of the new alternatives for companies to present information regarding the company, financially and non-financially (Prasetya and Irwandi 2012). Financial reporting via the internet or Internet Financial Reporting (IFR) refers to the use of company websites to disseminate information about the company's financial performance (Ruga et al. 2011). The increase in computer technology and the internet significantly influences the communication of financial statements in the world sees. Companies started reporting information relating to the company's business on the company's website page (Rozak 2012). The quick

widespread towards the user of Web-based financial and business reporting attracts the accounting profession to some parts of the world (Debreceeny, 2001; Hossain et al. 2012). In this case, companies who implement the use of Internet Financial Reporting (IFR) use the internet as a tool to market companies to shareholders and investors. With no limitation, only to deliver information regarding products and consumers (Khikmawati and Agustina 2015).

In the field of internet accounting, it provides a significant change in communication, in which the company's financial situation is. Due to lower costs and increased ease of use for shareholders and other stockholders (Johnes and Xiao, 2004; Hossain et al. 2012). The internet is considered an essential tool in conveying a company's financial situation accurately because it can carry some information needed for the parties that require quick gain.

The benefit of using the internet as a medium for spreading the news is due to information conveyed through the internet is easily spread (pervasiveness), knows no boundaries (borderless-ness), real-time, low-cost, has high interaction and is integrated with text, numbers, images, animation, video and sound (Narsa and Pratiwi 2014). By using Internet Financial Reporting (IFR), interested parties can access the company's financial statement globally and in real-time. Wherever interested parties are located without having to wait or contract the company (Rizqiah and Lubis 2017)

The goal of the internet report is to give information regarding the financial position, financial performance, and cash flow that is useful to the majority of the report's users in making an economic decision. The financial statement also shows the management's responsibility for users of trusted resources to control and the company. Investors are going to assess how the company's management conducts a broader disclosure about the company's overall performance in a financial report. It is done to ensure that the investor has trusted the fund to make the right investment. The foundation of decision making for the investors, creditors and other users of the information is that the presented information has to be clear, reliable, relevant, and transparent (Rinny, 2011; Daniel 2013)

Financial ratios provide an overview of the company's good or bad situation or financial position. Thus, an excellent financial condition of the company will encourage management to submit a lot of financial information on the company's website to attract potential investors and creditors (Khikmawati and Agustina 2015). This study uses two existing financial ratios, namely profitability ratios and leverage ratios. Taking both rates is based on signal theory, where companies must utilize financial statement information to provide positive or negative signals to external parties (Narsa and Pratiwi 2014). It measures through financial ratios obtained from the contents of the financial statements.

Other variables are used in the research of Hossain et al. (2012), where the age of company listings to internet financial reporting (IFR). In previous research conducted, there was no influence between the age of company listings with the decision to do reporting via the internet. However, another study conducted by Anindita showed an influence between the age of company listings and the decision to report via the web.

The rapid development of the internet and the increasing number of internet users have become a challenge for financial institutions such as banking. Submission of financial information via the internet is considered more transparent and more attractive to investors and other outsiders not only from the availability of financial information but also because of the ease of internet financial reporting (IFR) accessibility. The banking industry is used because it is the closest financial institution to the public. Due to its function to raise public funds and channel them back through the financing media. Thus, banks have a higher moral responsibility in reporting financial performance to the general public and investors.

Hence, based on the description above, a study with the title "Factors Affecting Internet Financial Reporting on banks listed in on the Indonesian Stock Exchange 2013-2017."

## **2. Research Methodology**

The research method used in this study is quantitative research methods. This study aims to determine the effect of the independent variables used leverage, profitability, and age of listings on the internet financial reporting dependent variable. The population used in this study is a banking company registered under the Indonesia Stock Exchange from 2013 to 2017.

The type of data used in this study is panel data. Panel Data is the source of data used in research is secondary data. Secondary data is data obtained by researchers through various sources or other intermediaries, not found directly from the object of study.

The secondary data used is the financial statements of companies listed on the Indonesia Stock Exchange (IDX) that implemented Internet Financial Reporting (IFR) from 2013 to 2017. Sources of financial statement data and annual company reports are obtained through the official website of the Indonesia Stock Exchange ([www.idx.co.id](http://www.idx.co.id)) and the company's website, and other data sources such as journals, articles, and other research references.

The number of samples used in the study is obtained from banking companies listed on the Indonesia Stock Exchange (IDX) and have fulfilled the established requirements.

## **2.1 Determination of Sample Amount**

The criteria that should meet are the company is a banking company listed on the Indonesia Stock Exchange (IDX). During the period 2013 to 2017, the company uploaded the company financial statements and annual reports on the company's website / official website. The company's IPO year of at least 2012 has required data to support research conducted. They consist of net profit, total company assets, total corporate debt, and total company capital, and the company presents financial statements in rupiah. This study uses quantitative data, the data presented in tables and diagrams. In this study, there is also the appointment of a hypothesis. The results of the data presentation will explain the relationship between the dependent variable and the independent variable that exists, whether between variables have a significant effect or not have an influence. This test itself was carried out using Eviews software version 9.

## **2.2 Data Presentation Method**

Stages of processing research data using multiple linear testing. This process is where those data have to pass specific tests to be declared to use. The first test to be done is called the classic assumption test. The underlying assumption test itself consists of four experiments. Beforehand, a descriptive analysis was calculated using Eviews 09. The descriptive statistical test itself provides an overview and description of each of the variable data analyzed. A description of the variables used can be seen through the mean, median, maximum, minimum, standard deviation, skewness, kurtosis, Jarque-Bera, probability, sum, and the sum of a square.

The first test is the normality assumption test. A normality test is done to ensure the dependent and independent variables have normal data distribution. According to Wing, Winarno (2014), the normality test can be carried out by the Jarque-Bera method. If the probabilities generated are above 5% or 0.05, then the residual value is usually distributed.

The second test is the multicollinearity test. A multicollinearity test was conducted to ensure no correlation between the independent variables. A good regression model is a model in which the independent variable does not occur association. Multicollinearity test can be done by calculating the Tolerance Value and Variance Inflation Factor (VIF). The test value that must be obtained is  $<10$ .

The heteroscedasticity test is a test conducted to test whether, in a regression model, there is a difference in variance from one observation residual to another. If the remaining variant of one view to another observation is fixed, then it is called homoscedasticity and if different is called heteroscedasticity. A good regression model is a regression model that does not have heteroscedasticity. Heteroscedasticity testing can be done using a white test with a value that must have  $<0.05$ .

The autocorrelation test was carried out aimed at finding out whether the correlation between members of a series of observational data was outlined. According to time (time-series) or space (cross-section), the value should obtain  $<0.05$ .

After going through these tests, there were 127 samples from 215 samples from 43 banking companies listed on the Indonesia Stock Exchange for five years. The result was obtained after reducing as many as 12 companies or 60 samples from companies with an IPO year below above 2012. After that, it was reduced by as many as 28 samples due to an outlier test.

After passing the four classic assumption tests, the subsequent analysis using 127 samples was obtained to determine what type of data is most appropriate to use. Determination of information is handled through 3 tests, namely the Chow, Hausman, and LM tests.

The last test conducted is the hypothesis test and multiple linear. Hypothesis testing is done by simultaneous test (f) to see whether the three variables are used together to influence the dependent variable and partial test (t). To prove whether the independent variable separately affects the dependent variable using evIEWS09 software.

### 3. Result and Discussion

#### 3.1 Hypothesis Test Result

The calculation results for the dependent variable Internet Financial Reporting (IFR) show the mean or average results of 3.149606 and the standard deviation of 0.520664. The minimum value for the IFR dependent variable is two, and the maximum value is 4. The value obtained from the IFR dependent variable data describes the amount of disclosure through the website made by the company. This study uses seven items as a measure of the amount of disclosure through the internet by the company. Then the closer to the value of 7, the more disclosure through the internet/website made by the company.

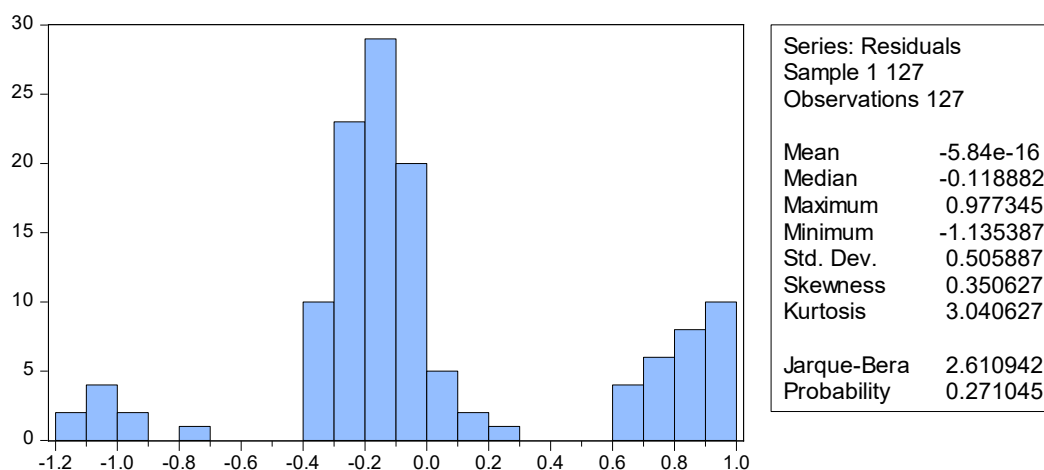
In the first independent variable, leverage (DER) shows an average yield of 7.42198 and a standard deviation of 2.650868. The maximum DER value of 18,2074 represents the DER value at the Banten Tbk Regional Development Bank in the 2015 period and the minimum amount of 2.7755 by Bank Woori Saudara Indonesia 1906 Tbk in the 2013 period.

The profitability variable (ROA) shows an average result of 0.010618 with a standard deviation value of 0.021089. The maximum value for the profitability variable (ROA) of 0.0514 was obtained through Bank Woori Saudara Indonesia 1906 Tbk data in 2013. The minimum amount for the profitability variable (ROA) of -0.0758 was obtained through Bank J Trust Indonesia Tbk data.

In the last dependent variable, the age of listing (LA) obtained an average value of 15.40157, which, if rounded up to 15 years with a standard deviation of 7.820668. The maximum amount of listing age is 35 years obtained through the age of listing of Bank PAN Indonesia Tbk. The minimum age value of listings was obtained through the data of the East Java Regional Development Bank Tbk.

#### 3.2 Normality Test Result

Table 1. Normality test result



It can be seen in the results of the normality test between the dependent variables of internet financial reporting with three independent variables, namely leverage, profitability, and age of listings showing results with a value of 0.271045 (Table 1). The conclusion is that the data has passed the normality test with a probability value of

0.271045 > 0.05. Moreover, it is feasible to test the effect of leverage, profitability, and age of listings on internet financial reporting.

### 3.3 Multicollinearity Test Results

The requirement to declare data passing the multicollinearity test is to get the results or VIF value <10. The results of the VIF tip variable are in the next Table 2.

Table 2. Multicollinearity test result

Variable	Coefficient Variance	Uncentered VIF	Centered VIF	
C	0.04146	20.08437	NA	
DER	0.000365	10.97492	1.232962	
ROA	5.84629	1.568976	1.24967	
LA	3.68E-05	5.304497	1.080546	

Based on the multicollinearity test result from above, it explains that.

1. Variable leverage (DER) has a result of 1.232962, where the results are <10. It can be concluded that the leverage variable has no correlation relationship with other independent variables.
2. Multicollinearity test results for the independent variable profitability (ROA) showed a VIF result of 1.24967, where the results are <10. So, with the results obtained, it can be concluded that the independent variable profitability has no correlation relationship with other independent variables.
3. The multicollinearity test results for the independent variable age listing (LA) show the VIF results of 1.080546. Where the value is 1.080546 <10, it can be concluded that the independent variable age of the listing does not have a correlation relationship with other independent variables.

After testing the three independent variables used, none of the three variables has a VIF value greater than 10. To sum it up, there is no multicollinearity in the regression model.

### 3.3 heteroscedastic test results

This test is carried out using the White test. Heteroscedasticity occurs when the significance value is <0.05. If the significance value > 0.05, then there is no problem. The results of the heteroscedasticity test of the study are in the table 3.

Table 3. Heteroscedastic test result

Heteroscedasticity Test: White			
F-statistic	1.511223	Prob. F(9,117)	0.1518
Obs*R-squared	13.22599	Prob. Chi-Square(9)	0.1526
Scaled explained SS	12.65799	Prob. Chi-Square(9)	0.1787

The table 3 presented shows the results of heteroscedasticity testing have a Chi-Square probability value of 0.1526 or 15.26%. These results are higher than 5%, so it can be concluded that the data used for the study contained no symptoms of heteroscedasticity.

### 3.4 Autocorrelation Test Results

Autocorrelation detection testing is performed using the LM Test. From the results of the initial regression with the Breusch-Godfrey Serial Correlation LM Test, if a probability value obtains less than 0.05 or 5%, an autocorrelation

problem occurs. Conversely, if the probability value obtained is more than 0.05 or 5%, that there is no autocorrelation problem.

Table 4. Autocorrelation test result

Breusch-Godfrey Serial Correlation LM Test:			
F-statistic	2.02122	iProb. F(2,121)	0.1369
Obs*R-squared	4.10573	cProb. Chi-Square(2)	0.1284

From the table 4, it can be seen that the obtained F probability value obtained is 0.1369 or 13.69%, where the value is higher than 0.05 or 5%. Then based on these results, it can be concluded that the data used in the study did not experience autocorrelation problems.

### 3.5 Result of Selection Of Data Model

The first test to get the right data model is to do the chow test using the F-Restricted test. By looking at the P-Value F-statistics value smaller than the significant level  $\alpha = 5\%$ . From the results based on the Fixed Effect Model (FEM) method and Pooled Least Square (PLS). From the results of data processing obtained, it shows that the acquisition value obtained is the F-statistics value of 6.297635, and the prob F-statistic value obtained is 0, smaller than 0.05. Then the data used based on these results is the Fixed effects model.

After that, the next step is to conduct a human test to determine the most appropriate model to use between the Fixed Effect Model (FEM) and the Random Effect Model (REM). Hausman's test provides an assessment using Chi-square Statistics and the value  $\alpha = 5\%$ . From the results of data processing obtained, it shows the acquisition value obtained is the F-statistics value of 6.297635, and the prob F-statistic value obtained is 0 smaller than 0.05. Then the data used from these results is the Fixed effects model.

Because two out of the three tests show the most appropriate data to use is the Fixed effects model, there is no need to do an LM test.

### 3.6 Multiple Linear Regression Test Results

After the data used passes the classical assumption test, it can be concluded that the data is distributed normally. Furthermore, in the regression model, there is no multicollinearity, autocorrelation, and heteroscedasticity. Therefore, it can proceed to the next test. Namely, a multiple linear regression test was conducted. To determine the relationship between the dependent variable with the independent variable, which is the research material. The research uses internet financial reporting (IFR) as the dependent variable and three independent variables, namely leverage (DER), profitability (ROA), and age of listings (LA) (Table 5).

Table 5. Multiple Linear Regression Test Results

Variable	Coefficient	Std. Error	t-Statistic	Prob.
C	1.32645	0.511608	2.59271	0.011
DER	0.02939	0.026938	1.09089	0.278
ROA	1.22769	2.741262	0.44786	0.6553
LA	0.10337	0.025042	4.12771	0.0001

From the results of the attached table, the following equation

$$\text{IFR} = 1.32645 + 0.02939 \text{ DER} + 1.22769 \text{ ROA} + 0.10337 \text{ LA} + \varepsilon$$

### 3.7 Determination (R2) Coefficient Test Results

Table 6. R-Squared and Adjusted R-Squared results

R-squared	0.648798
Adjusted R-squared	0.543799

In the table 6 presented, it can be seen the acquisition for the coefficient of determination (R2) in this study amounted to 0.543799 or 54.3799%. The ratio of determination (R2) obtained can be interpreted. The independent variables used in this study are leverage (DER), profitability (ROA), and age of listings can explain the dependent variable internet financial reporting (IFR) of 54.3799%. The remaining 45.6201% were influenced by other variables not included in the independent variables of this study.

## 4. Conclusion and Suggestion

### 4.1 Conclusion

This research has passed a series of tests to ensure the data used is appropriate as research material. A total of 127 sample data consisting of 25 companies have passed the classic assumption test, test, and hypothesis test, so the results of the study are stated as follows.

The independent variable of leverage is stated not to find empirical evidence that proves to have an influence on internet financial reporting with a positive coefficient value. If there is an increase in the leverage ratio, it increases the possibility for more disclosure to internet financial reporting. The results of this study are in line with previous studies conducted by Maharani (2017), Puri (2011), and Saher (2014). The independent variable of profitability is stated not to affect internet financial reporting with a positive coefficient value. If there is an increase in the profitability ratio, it increases the possibility for more disclosure to internet financial reporting. It is because the high value of profitability will make an investor and other outsiders put trust in the company. The results of this study are in line with previous studies conducted by Maharani (2017), Puri (2011). The age-independent variable of the listing is stated to have an influence on the internet financial reporting with a positive coefficient value. If there is an increase in the age ratio of the listing, it increases the possibility for more disclosure to internet financial reporting. The results of this study are in line with previous studies conducted by Chariti and Lestari (2007) and Maulida, Noor, & Nurul (2017). Due to the many experiences of companies that have a longer-lasting life. Hence, they are more aware of the completeness of any item. It will facilitate access to investors' and outsiders' needs.

#### *Simultaneous Significance Test Results*

The simultaneous significance test is conducted to find out how much influence the independent variable together on the dependent variable. In this test, if the probability value obtained has a value below 0.05 or 5%, then the conclusion is drawn that the independent variables used in research together influence the dependent variable.

Table 7. F-statistic and Prob (F-Statistic)

F-statistic	6.179102
Prob(F-statistic)	0.000000

The table 7 presented shows the probability value of the F value of 0.000000 for this study. From the values obtained, the conclusion is that the independent variables used in this study together influence the research variables, namely internet financial reporting (IFR).

*Partial Regression Test Results (Test)*

Table 8. Partial Regression Test Result

Variable	Coefficient	Std. Error	t-Statistic	Prob.	
C	1.326449	0.511608	2.592707	0.011	
DER	0.029386	0.026938	1.090885	0.278	
ROA	1.227693	2.741262	0.447857	0.6553	
LA	0.103367	0.025042	4.12771	0.0001	

From the table 8 above, it can be concluded that The leverage variable (DER), which is one of three independent variables used in research, has a probability value of t of 0.278 or of 27.8%, where the value of 0.0278 or 27.8% is more significant than 0.05 or 5%. Then the probability value t is obtained by the independent leverage variable (DER). It can be concluded that the independent leverage variable (DER) does not have a significant effect on the internet financial reporting dependent variable. These results are in line with research on the value of leverage. It affects internet financial reporting presented in the research results of Chariti and Lestari (2007). It explains the high value of leverage makes it more difficult for company management to make predictions about the running of the company in the future. It makes the position of company managers become threatened. Due to it being considered unable to manage the company properly, the company prefers not to practice internet financial reporting.

The research results are also in line with research conducted by Puri. In his study, it explained that there is no significant relationship between leverage and internet financial reporting. Due to the nature of voluntary financial reporting, not all companies carry out the same disclosure practices, but to the needs of the company. By doing internet financial reporting, the company can convey more information by showing the actual state of the company. Whereas the continuity of the operation of a company is not only measured by the leverage value obtained by the company.

The next independent variable from the research conducted is the profitability variable (ROA). In this research, the profitability variable (ROA) obtains a probability value of 0.6553 or 65.53%, where the value is higher than 0.05 or 5%. The results obtained conclude that the independent variable profitability (ROA) does not have a significant effect on the independent variable internet financial reporting (IFR).

The results of this study are in line with previous studies conducted by Puri (2011) and research conducted by Maharani. Maharani (2017) explained that the findings in his study showed the value of profitability obtained was relatively low. Therefore, the sampled companies could not explore their company in more detail to outsiders via internet financial reporting. Moreover, it caused investors not to invest shares in the company. It is due to the value of the company's profitability being low. However, it is also found in companies with high profitability values. The amount of obtaining profitability is less able to encourage companies to apply internet financial reporting practices. Therefore, both companies with high profitability and companies with low profitability will continue to practice IFR to show management openness in disclosing company financial information.

The last independent variable is the age variable listing (LA). In this study, the profitability value obtained by the independent variable age of listing (LA) is 0.0001 or 0.01%. From the value of profitability, t obtained, it can be concluded that the independent variable age of listing (LA) has a significant effect on the dependent variable of this study. Namely internet financial reporting. The research results are backed up by the results of Annis & Lestari's research (Chariti and Lestari 2007).

A study conducted by Chariti and Lestari (2007), stated that a longer listing company provided more financial information publicity than a company that had just listed because the company whose listing was longer was more experienced and tended to change its financial reporting methods. Along with technological developments to attract investors through the use of internet financial reporting.

#### 4.2 Suggestion

1. There are several suggestions to develop this research, given to future researchers who are interested in researching this research topic.
2. The results of the coefficient of determination obtained in this study indicate that other factors outside of the review affect the observed dependent variable. So that future research can make additions to the independent variables, such as block holder ownership, managerial ownership, assets in place, and business complexity.
3. The amount of this research is limited because the investigation conducts only on the object of banking company research. Further research studies conclude on companies whose sample values are higher such as manufacturing companies.
4. Conduct discussions on the use of internet financial reporting on companies that have not been listed on the Indonesia Stock Exchange (IDX).

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