

## **The Use of the Fair Value Accounting Method for Investment Property in Indonesia**

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### **ABSTRACT**

The purpose of this research was to examine the factors that motivate companies in selecting an accounting method to record their investment properties. This study was conducted during the adoption of International Financial Reporting Standards (IFRS) in Indonesia, i.e. the enactment of Financial Accounting Standards Guidelines (*Pernyataan Standar Akuntansi Keuangan*) (PSAK) No. 13 (2015) on *Investment Property*. Research conducted on 54 companies listed on the Indonesia Stock Exchange, which reported investment property on their financial statements for the period of 2008–2011. The results were consistent with the motivation to protect creditors through the choice of more conservative accounting methods. The results indicated that it was less likely that a company with high leverage would choose the fair value method. Additionally, this research proved that the motivation to reduce information asymmetry was associated with choosing the fair value method, whereas opportunistic motivation was not associated with choosing the fair value method. Additional findings showed that companies in the property industry were less likely to choose the fair value method. This is consistent with the political cost hypothesis, i.e. a company in the property industry avoids potential increases in tax burden due to an increase in fair value.

*Keywords:* Accounting choice, cost method, fair value method, investment property

### **INTRODUCTION**

This study was motivated by the enactment of PSAK No. 13 Investment Property. This standard is an adoption of IAS 40 *Investment Property*, which was first published in 2007 and has been effective since 1 January 2008<sup>1</sup>. PSAK No. 13 (DSAK, 2015) is

<sup>1</sup> Latest version of the PSAK No. 13 which was substantially the same with previous version was

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one of the revised Indonesian accounting standards, which was implemented as part of the IFRS convergence in Indonesia. In addition to using historical costs, PSAK No. 13 (2015) provides an alternative method of measurement using the fair value. Previously, the accounting treatment for investment property had been regulated in accordance with PSAK No. 13 (1994), Accounting for Investments, which only allowed the measurement method using historical costs without depreciation. The adoption of IAS 40 into PSAK No. 13 (2015) is a unique research opportunity because of the significant changes made, along with the emergence of more than one alternative measurement and the increase in disclosure requirements compared to the previous accounting standard applicable in Indonesia.

PSAK No. 13 (2015) is the first to introduce the fair value method for the recognition of long-term, non-financial assets. Companies can select cost or fair value method for reporting on their investment property in the financial statements. The difference between the fair value and the net book value is recognized in the income statement for the period. Any company that chooses the cost method must disclose the fair value of assets in the notes to the financial statements.

Research about the selection of accounting methods has always been an interesting topic to examine. The true reason for a company to opt for

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published in 2015, so hereinafter referred to as PSAK No. 13 (2015)

an accounting method has never been categorically determined. The selection of accounting method is based on management considerations and is never truly understood by the financial statements users (Ishak et al., 2012). Research about the selection of accounting methods can only predict the factors by which a company is influenced when implementing a particular accounting method and excluding the others. In relation to the alternatives where either the cost method or fair value method is applied on investment property, it is interesting to understand the reasons why a company would prefer the fair value method, while other companies keep applying the cost method.

A previous research project showed that when a company was faced with voluntarily choosing between accounting methods, then the choice tended to become 'sticky' or resistant to changes (Cairns et al., 2011). This means that, in spite of existing alternative accounting methods being made available by the new accounting standards (namely the fair value method), a company tends to opt for the new method according to the standards, and yet that is done by using the unrevised version (in this case it would be the cost method). However, the fact of the matter is that there are several listed companies in Indonesia that have opted for the fair value method for reporting on investment property since PSAK No. 13 (2015) became effective. Therefore, it is interesting to investigate the factors that affect the selection of the fair value method for applying to investment property.

There are only a few studies about the option of using the fair value method for non-financial assets, similarly in Indonesia, there are no study which examined the selection of fair value method of non-financial assets. Manihuruk and Farahmita (2015) included Indonesia as their observations, explained that the selection of the fair value method of listed firms in ASEAN was closely related to companies' size, fixed-asset intensity, leverage, and liquidity. Large companies tend to use the cost method, while companies with higher fixed-asset intensity, leverage and liquidity tend to use the fair value method. The decision to use the fair value method for non-financial assets is interesting to examine since there are different conditions when compared to financial assets, wherein the fair value of an asset may not be available in active markets. This condition is exaggerated in emerging market, such as Indonesia, as most of non-current assets do not have active markets, hence it makes fair value applications a real challenge. Furthermore, as feedback on the IFRS convergence in Indonesia, this kind of study is needed. This study is expected to add to the literature regarding the IFRS adoption and the choice of accounting methods.

Previous studies identify several factors affecting the selection of the fair value method for investment property. According to Muller et al. (2008), a company opting for the fair value method is a company with a more disseminated ownership, showing a high commitment to transparency for financial reporting and is a company that

reports the significant differences in the fair value amount in order to maximize reported profit. Additionally, Quagli and Avallone (2010) revealed the reason why companies were more likely to select the fair value method, which was for efficiency purposes, and was by reducing political expenses and protecting creditors using conservative accounting methods.

The objective of this study is to examine the factors that motivate companies to opt for the fair value method in reporting on investment properties after PSAK No. 13 (2015) became effective. The factors to be examined in this research are the factors that have been documented in the literature regarding the selection of accounting methods (Fields et al. 2001). These factors are (1) protection for creditors, for which this study uses a proxy of leverage to examine the motivation for protecting the contract with creditors; (2) political costs, for which this research uses firm size to examine the motivation to lower political costs; (3) information asymmetry, for which this study uses the market-to-book ratio (MTB) to determine the effect of information asymmetry on selecting accounting policies; and (4) opportunistic motivation from managers, for which this research will also look at through the gain recorded from the increase in fair value.

The four selected factors represent management motivation when choosing accounting policies (Fields et al., 2001) and have been studied in previous research (Ishak et al., 2012; Muller et al., 2008; Quagli & Avallone, 2010). The differences

of this research with previous research is that this research combines variables that have previously been studied separately by previous researchers. This research combines these variables based on framework of accounting choice proposed by Fields et al. (2001). This research is more comprehensive because the tested variables represent every motivation identified as management reasons in accounting choices presented by Fields et al. (2001). In addition, prior research was undertaken in Europe that had already adopted IFRS, while research was conducted in Indonesia, as a developing country in the Asian region which also began to adopt IFRS. Choice of accounting methods between cost and fair value method is one of IFRS adoption feature which gives opportunity to the researcher to observe management behaviour in choosing the accounting method.

This study is expected to contribute in the following ways. First, to add to the literature regarding the implementation of the IFRS in Indonesia by documenting the choice between the cost and fair value accounting methods. This choice may affect the comparability of financial statements between firms, which may be the basis of future studies investigating this comparability issue. Since this study found that some companies choose to measure the investment property with fair value method with efficient motives and some others are still measure with cost method, next research can explore whether the difference in accounting method affects the comparability of financial statements.

Second, extant studies in Indonesia rarely examined issue of fair value choice especially in the context of non-current assets such as investment property. The result of this study shows that management choose fair value method to protect lenders' rights and to reduce asymmetry information may provide a theoretical contribution on determinants of fair value method, especially for non-current assets. Third, the research findings are expected to assist the Financial Accounting Standards Board in Indonesia and practitioners to comprehend the characteristics and conditions that affect a company's decision on an accounting method, particularly ones involving the decision to use the fair value method. By referring to the research findings of Cairns et al. (2011), which stated that the comparability of financial statements between companies would increase when most companies opted for the same accounting method, then it was important for the Indonesian Financial Accounting Standards Board and practitioners to understand the characteristics of companies that chose the fair value method. Since the result of this study found that companies choose fair value with efficient motives, thus this study provides a positive feedback for the revised accounting standards for investment property.

## **LITERATURE REVIEW AND HYPOTHESIS**

This section explains the surrounding issues, literature review and hypotheses development.

## Literature Review

PSAK No. 13 (2015), regarding investment property, prescribes the accounting treatment for investment property and its disclosure. An investment property is defined as property (land or a building-or part of a building-or both) held (by the owner or by the lessee under a finance lease) to earn rentals or for capital appreciation or for both, rather than for: (a) use in the production or supply of goods or services or for administrative purposes; or (b) sale in the ordinary course of business.

The focus of this research is the method of measurement after the initial recognition. After the initial recognition, PSAK No. 13 (2015) gives a choice of methods for measuring investment properties, namely (1) the fair value model or (2) the cost model. The fair value model requires the investment property to be measured using the fair value, and changes in the fair value are recognized in the income statement as income for the current year and are not depreciated. If an entity chooses the cost model, then the treatment follows PSAK No. 16 (2015), concerning property, plants and equipment; that is, investment properties are measured at cost and reduced by the accumulated depreciation and impairment losses.

Companies that measure investment properties using the cost model, while not recognizing changes in the fair value in profit or loss, should also disclose the fair value of investment properties on notes to the financial statements, unless the fair value cannot be determined reliably. An entity that chooses the fair value method should disclose

the basis and assumptions used to determine the fair value and whether the determination of the fair value is acquired by using the services of an independent appraiser. Under the fair value method, the changes in the fair value, as required in PSAK No. 13 (2015), are reflected in the profit or loss, and not in other comprehensive income, such as PSAK No. 13 (2015) or PSAK No. 16 (2015). Consequently, as it affects the firm's profit or loss, managers should be aware that their choice of accounting policy for investment property will have a different impact on the profit or loss in terms of the recognition of fair-value differences.

Fields et al. (2001) classified the determinants of the choice of accounting method into three groups, namely (1) contracting, i.e. accounting policies selected to influence one or more contractual agreements, such as contracts with management, company owners and lenders; these motives are consistent with efficient contracting perspective (Watts & Zimmerman, 1986). (2) information asymmetry, meaning that accounting policies are determined by information asymmetries that seek to influence asset valuations/prices (Levitt Jr., 1998); and (3) externalities, meaning that certain accounting policies were chosen to influence external parties other than the owner or prospective owner of the company.

## Hypotheses Development

The analysis in this study is based on an assumption that refers to Schipper's (2007) study in which recognition in the financial

statements is more value relevant than the disclosure. In this case, the difference between the fair value of the investment property recognized in the income statement (fair value method) is not equivalent to the difference in the fair value disclosed in the notes to the financial statements (cost method). Likewise, according to Francis et al. (2004), the recognition of the fair value and cost accounting methods affects the numbers differently. The fair value method is more value relevant and it provides profit figures that are more predictable and timelier, since it is more oriented to the future cash flows. On the other hand, the cost method supports conservatism, the quality of accruals and a more proportionate profit (smooth) because it only recognizes the realized change in value. Thus, the future cash flow information extracted from the fair value will be appreciated by the market (analysts and investors) because it can reduce information asymmetry. While, on the other hand, the cost method is more supportive of income smoothing and efficient contracting where conservatism is preferred. Or, in other words, each method theoretically has its own strengths and weaknesses, and the actual choice will depend on the condition of the company. The different impacts that result from these two methods imply that the selections of the accounting method have different backgrounds according to the condition of the company.

Selection of a more conservative accounting policy will reduce agency costs through higher protection for creditors. According to Beatty et al. (2008), investors want a certain level of conservatism in

their debt contracts. Holthausen and Watts (2001), and Watts (2003) suggested that conservatism existed because it helped to mitigate agency problems. Badia et al. (2017) found evidence that firms holding higher proportions of financial instruments measured at Level 2 and 3 fair values (where there was no active market available), reported more conditionally conservative income attributable to fair value measurements. Investment property is one example of assets which rarely has active market.

The selection of the cost method would be in line with a more conservative accounting policy in efficient contracting theory, and, in order to boost protection for creditors, it is highly probable that the manager will select the cost method and less probable that they will choose the fair value method. By choosing the cost method, management will avoid to presenting assets that do not have an active market price at an overstated value to creditors. This research takes an opposing position from the debt covenant hypothesis, which states that managers prefer the fair value method in order to avoid breaching contract debts. The debt covenants hypothesis (Watts & Zimmerman, 1990) is less appropriate in this context since, normally, the profit from the difference in the revaluation of the fair value is not taken into account in the debt contract evaluation (Christensen & Nikolaev, 2008; Taplin et al., 2014). Thus, the first hypothesis is as follows:

***H1: The level of debt negatively affects the possibility of selecting the fair value method for investment property.***

Based on the political cost hypothesis (Watts & Zimmerman, 1990), it is predicted that managers will be less likely to select accounting methods that increase profitability. By choosing the fair value method, the value of the asset tends to increase as well as increase the amount of profit. A large amount of profit being reported would impact the increase in the size of the company (asset). Increasing the company size means higher political costs since the company's visibility will also rise. The political costs, in this case, are reflected in the increasing spotlight that results from more regulations being issued by regulators or more tax regulations coming from tax authorities.

Jung et al. (2013) proposed that smaller firms had a greater incentive to choose fair value method to provide more value-relevant information to investors. Previous studies such as Barth et al. (2001) found that information on fair value was more value-relevant than historical cost. This in turn will increase information content of accounting information. Zeghal (1984) found that information content of accounting information was negatively related to firm size. Quagli and Avallone (2010), and Ishak et al. (2012) found that firm size negatively affected the choice of fair value method which meant in accordance with the political cost hypothesis, i.e. the company did not choose the fair value method and applied the cost model to avoid the unfavourable regulations.

This argument of negative effect of firm size on the probability of selecting fair value is in accordance with Quagli and Avallone

(2010), and Ishak et al. (2012), thus the next hypothesis would be as follows:

***H2: Firm size negatively affects the possibility of selecting the fair value method for investment property.***

In situations where information asymmetry is found, managers may select an accounting method that could help to inform the market about the 'true value' of the company. Thus, assuming that the disclosure is not equivalent to the recognition (Schipper, 2007), as described previously, it can be assumed that a high level of information asymmetry will be a positive influence on the probability of management selecting the fair value method (Quagli & Avallone, 2010). Information asymmetry on the firms' assets value can be mitigated by departure from the historical cost accounting method. Through use of fair value, a firm may disclose to outsiders the underlying economic value of its assets and hence its actual financial condition (Brown et al., 1992).

Early studies used the MTB as a proxy for information asymmetry, which departs from the intuition that the market value captures the present value of the opportunities for growth of companies, whereas the book value reflects the value of existing assets. By choosing the fair value method, the asset will more reflect its fair value. Thus, using the fair value method for investment property will reduce information asymmetry since it increases the book value of assets to its fair value (Seng et al., 2010). Therefore, the next hypothesis is as follows:

***H3: The information asymmetry will positively influence the possibility of selecting the fair value method for investment property.***

Furthermore, both Quagli and Avallone (2010), and Muller et al. (2008) captured the existence of opportunistic motivations behind the selection of the fair value method for investment property. These opportunistic motivations are revealed by the accounting method selected for performance improvement through improved earnings. Muller et al. (2008) identified that the higher the gains resulting from the difference in the fair value of the investment property, the more probable it was for management to select the fair value method, so that the benefits gained could boost reported earnings. This argument is in line with Fargher and Zhang (2014) who argued that the use of fair value provided additional rooms for managerial discretion in fair value measurement, and they found that this higher discretion was associated with a higher probability of earnings management. Thus, the following can be hypothesized:

***H4: The reported amount of gains from revaluation from the application of the fair value method will be a positive influence on the probability of selecting the fair value method for investment property.***

## **METHODS**

### **Sample and Research Design**

The population of the sample in this study were all companies that had owned and

reported on investment property assets in the period after PSAK No. 13 (2015) became effective, namely from 2008–2011. The period observed was the first period in which the companies applied the accounting method for investment property, which is between the years 2008 and 2011. Years before 2008 or after 2011 are not relevant because to examine the motivation of choosing voluntary accounting methods is most effectively conducted in the periods around changes in accounting standards. These are companies that owned investment properties in 2008, added to new companies that have investment properties from 2008–2011. It is important to study the accounting policy choice in the early years of the standard effective date, as firms do not have the flexibility in changing their accounting policy once it was chosen. PSAK No. 25, adopted from IAS No. 8, *Accounting Policies, Change in Accounting Estimates and Errors* states that “An entity is permitted to change an accounting policy only if the change is required by a standard or interpretation; or results in the financial statements providing reliable and more relevant information about the effects of transactions, other events or conditions on the entity’s financial position, financial performance, or cash flows.”

The differences among the years of observation, from 2008–2011, are not considered significant because they cover a short period of time. In order to not reduce the number in the already small sample, this research does not only observe the companies in the property and real estate industry, but also all the companies that



have investment property from any kind of industrial sector. The research model enters a dummy variable of the type of industry to control the differences in conditions between companies in the property industry and other industries that also affect the possibility of selecting the fair value method.

The sampling criteria are as follows: companies that (1) are listed on the Indonesia Stock Exchange in the period 2008–2011 – the total number of companies listed on the Indonesia Stock Exchange is 442 (www.idx.co.id); (2) owned investment property during the period from 2008–2011; (3) have disclosed the accounting method used to measure investment property; (4) have selected the cost method and disclosed the fair value of assets in the notes for the financial statements; and (5) have complete data for hypothesis testing.

The hypotheses will be tested using a binomial logit regression model (1) as follows:

$$P\_FV_i = \beta_0 + \beta_1 LEV_i + \beta_2 LNNTA_i + \beta_3 MTB_i + \beta_4 FV\_GAIN_i + \beta_5 D\_PROP_i + e_i \quad (1)$$

where  $P\_FV$  is dummy variable for investment property accounting method; 1 if the company chooses the fair value method and 0 if it chooses the cost method.  $LEV$  is leverage (the corporate debt level) as measured by the ratio of total debt divided by total assets at the end of the year.  $LNNTA$  is the firm size, using a natural logarithm from the end balance of the total assets.  $MTB$  is market to book which represents the

information asymmetry, which is measured using the Market To Book (MTB) ratio.  $FV\_GAIN$  is the gain from the fair value revaluation, measured by the gain from the fair value revaluation reported in the profit or loss (if the fair value method is applied), or the difference between the fair value disclosed in the notes to the financial statement and the carried amounts of investment property in the balance sheet (if the cost method is applied). This value is then deflated by the total assets.  $D\_PROP$  is the dummy variable for the companies included in the property and real estate industries (1 if the company is included in the property and real estate industries and 0 otherwise).

The logit regression is popular and appropriate because its results are relatively easy to interpret. We follow previous research that also employed logit model such as Muller et al. (2008), and Quagli and Avallone (2010). This study also performed univariate analysis. Correlation test was conducted as preliminary examination about the correlation between variables. Mean different tests would be conducted for additional analysis of whether firms in the property industry had a different characteristic with non-property industry.

Sensitivity tests were performed using the following: (1) exchanging variable  $FV\_GAIN$  with indicator variable  $DFV$  by separating the differences in the fair value, with those above the median as the group with a high difference in fair value ( $DFV = 1$ ) and those below the median as the group with a low difference in fair value ( $DFV$

= 0); and (2) including all companies that had selected the cost model, but had not disclosed the fair value on the notes to the financial statements.

## RESULTS AND DISCUSSION

### Sample and Descriptive Statistics

The results of the sample selection can be seen in Table 1, and depict that, of the 108 companies reporting on investment property in their financial statement, 85.2% have selected the cost model. Of the total of 92 companies that selected the cost model, there are 50% of them unwilling to disclose the fair value of assets in the notes to the financial statements, although it was mandatory. There are two possible reasons for this: (1) the fair value of the assets cannot be determined reliably, and, under PSAK No. 13 (2015), this condition should be disclosed; or (2) the company is not aware that the benefits of disclosing the fair value exceeds the cost of obtaining this information. To disclose the fair value of assets, an enterprise should measure the fair value of the assets reliably. A company may use the services of an independent appraiser to calculate the fair value of its assets and it should be disclosed. An independent appraiser's services would mean additional

costs, and, in this case, if the company deems the potential increase in fair value is not significant enough to be disclosed, the companies would be reluctant to calculate and disclose the fair value of the asset in the notes to the financial statements.

Table 1  
*Selected samples*

Descriptions	Number of Firms
The years that the firm reported on investment properties in the period of observation, with a choice of the method, comprising:	108
- Fair value method	16
- Cost method	92
Less the years that the firm used the cost method, but did not disclose the fair value in the notes to the financial statements	<b>(46)</b>
The number of observations with incomplete data	<b>(8)</b>
<b>The final sample, comprising:</b>	<b>54</b>
- Fair Value Method	12
- Cost method	42

Table 2 presents the descriptive statistics of the sample. The portion of the sample that selected the fair value method is 22%, as shown by the average variable P\_FV. The companies that belong to the property industry (D\_PROP) represent 37% or 20 companies out of the sample of 54.

Table 2  
*Descriptive statistics*

	P_FV	LEV	TA (Million Rupiahs)	MTB	FV_GAIN	D_PROP
Mean	0.222	0.219	3,209,974,621	3.050	0.092	0.370
Median	0.000	0.193	2,248,405,785	1.494	0.010	0.000
Maximum	1.000	0.643	17,236,040,000	37.130	0.719	1.000
Minimum	0.000	0.000	64,936,512	0.005	-0.127	0.000
Std. Dev.	0.419	0.183	3,500,510,814	5.756	0.160	0.487

**Mean Difference and Correlation Test**

Table 3 shows the mean difference in the sample of companies in the investment property and real estate industry plus the samples submitted from other industries. As detailed in Table 3, the company size (LNTA), MTB ratio (MTB), and the difference in fair value (FV\_GAIN) for property companies in the sample are significantly higher than for companies in other industries that are in the sample. However, it is shown that the fair value method (P\_FV) is preferred by non-property companies, or, in other words, the average property company is more willing to select the cost method for measuring investment properties. This indicates a direction that is not consistent with the predictions. If a company chooses the fair value method, considering that the average differences in the fair value among the property companies are higher than for non-property companies, then the property companies should be able to boost performance through an increase in profit for the current year. But, in reality,

the average property company prefers to use the cost method. The average difference in every significant variable indicates the need to control the sample of firms in the property industry or other industries by using a model of hypothesis testing.

Table 3  
*Mean difference test group between the property industry and non-property industries*

Variable	Industry	Mean
<b>P_FV***</b>	Property	0.0500
	Non Property	0.3235
<b>LEV</b>	Property	0.2045
	Non Property	0.2285
<b>LNTA***</b>	Property	21.8309
	Non Property	20.8873
<b>MTB***</b>	Property	5.0944
	Non Property	1.8482
<b>FV_GAIN***</b>	Property	0.1994
	Non Property	0.0302

\*\*, \*\*\* Significant at the 5% level and 1% level, respectively

Table 4 demonstrates the correlation between variables using Pearson's correlation test. In Table 4, it can be seen that

Table 4  
*Correlation between variables*

	LEV	LNTA	MTB	FV_GAIN	P_FV
LEV	1				
LNTA	0.254 <b><i>0.032 **</i></b>	1			
MTB	0.240 <b><i>0.040 **</i></b>	0.110 <b><i>0.214</i></b>	1		
FV_GAIN	0.048 <b><i>0.364</i></b>	0.141 <b><i>0.154</i></b>	-.044 <b><i>0.377</i></b>	1	
P_FV	-0.222 <b><i>0.053 *</i></b>	-0.205 <b><i>.069 *</i></b>	-0.020 <b><i>0.443</i></b>	-0.202 <b><i>0.072 *</i></b>	1

Figures in italics and bold are the probability of significance Pearson correlation; \*\*, \* Significant at the 5% and 10% level, respectively

correlation between significant dependent and independent variables generally shows a direction consistent with the hypothesis. The level of leverage (LEV) and firm size (LNTA) are significantly and negatively correlated with the fair value method selected (P\_FV). The correlation of the difference in fair value (FV\_GAIN) with P\_FV is not in line with the hypothesis. The correlation between the independent variables reveals a significant positive correlation between the level of leverage (LEV) with the size of the company (LNTA) and information asymmetry (MTB). This means that a company with a high debt level is a large-sized enterprise and has high information asymmetry as well.

### **Hypothesis Testing**

The results of the hypothesis testing using a logit model (1) are presented in Table 5. Based on the hypothesis testing, variable LEV significantly (level 5%) and negatively affects the probabilities for the fair value method. This means that companies with higher leverage will be less likely to select the fair value method. Thus, hypothesis H1 is supported, since the higher the level of leverage of a company, the more likely it is for it to apply a more conservative accounting policy (the cost method, in this instance). This is consistent with the hypothesis for efficient contracts with creditors, in which companies apply conservative accounting policies as protection for creditors (Beatty et al., 2008; Watts, 2003; Watts & Zimmerman, 1986).

Firm size (LNTA) does not affect the probability of selecting the fair value method. This implies that the political cost determined by the company size is not a consideration when choosing a fair value measurement method for the company's investment property. This result is not consistent with the findings of Ishak et al. (2012), and Quagli and Avallone (2010). Therefore, hypothesis H2 is not supported. It is possible that firm size proxies for other firm characteristics, such as risk and growth (Scott, 2015). Firms with higher risk and higher growth may positively affect the selection of fair value, as those firms want to be perceived by investors as less riskier and able to maintain higher growth in the future. On the other hand, from political cost perspective, larger company tends not to choose fair value method to lower firms exposure. As firm size may reflect all of these characteristics, the positive and negative effect of firm size maybe offset (i.e. insignificant).

The choice of fair value maybe use to attract external financing, due to higher reported income. Thus, another alternative explanation is smaller entities may have incentives to realize cash flows more quickly to fund their operations, whereas larger entities may not have the same concern due to the fact that their larger size means that they are much less likely to experience liquidity problems than smaller entities (Ehalaiye et al. 2017).

The variable MTB has a positive significant effect (at the level of 10%) on the selection method for measuring the fair value

Table 5  
Logit regression results

$$P\_FV_i = \beta_0 + \beta_1 LEV_i + \beta_2 LNTA_i + \beta_3 MTB_i + \beta_4 FV\_GAIN_i + \beta_5 D\_ROP_i + e_i \quad (1)$$

Variable	Predicted sign	Coefficient	z-Statistic	Prob.
LEV	H1: (-)	-4.1813	-3.7320	0.03**
LNTA	H2: (-)	-0.0191	-0.1293	0.47
MTB	H3: (+)	0.0833	2.9029	0.07*
FV_GAIN	H4: (+)	-1.6574	-0.6479	0.37
D_PROP	(+)	-2.5151	-4.1570	0.01**
C		0.3872	0.1251	0.47
	McFadden R-squared		0197	
	Prob (LR statistic)		12.04**	
	% Correct estimation		77.78%	

\*, \*\* Significant at the 10% level and 5% level, respectively; N = 54 observations

of investment property. That is, companies with higher information asymmetry will have a higher probability of selecting the fair value method for confirming the true value of the company. These results are consistent with the research of Quagli and Avallone (2010). Thus, hypothesis H3 is supported. The market value depicts the present value of the growth opportunities and the book value represents the value of existing assets. According to Seng et al. (2010), the use of the fair value method has the effect of reducing information asymmetry since the application of the fair value method will increase the book value of assets.

Variable FV\_GAIN does not affect the probability of the fair value method being selected as the measurement instrument for investment property. This implies that having a greater difference in the fair value that is reported in the income statement does not necessarily affect the probability that a company will select the fair value method for measurements. A bigger fair value gain, which is reported in the income statement

for the current period, does not make the company choose the fair value method to record its investment property. Hence, there is no visible predisposition for opportunistic motives for selecting the fair value method. This result does not correspond with the research of Muller et al. (2008) and thus hypothesis H4 is not supported. This implies that the factors affecting the probability of a company selecting the fair value method for investment property is not based on the goal to gain a high profit from the difference in the recognized fair value. Firms choose the fair value model may indicate a sign of their commitment to transparent financial reporting (Muller et al., 2008).

Control variable D\_Prop has a significant negative effect (level 5%) on the probability of selecting the fair value method. The test results are not consistent with the prediction that the companies in the property industry are more likely to select the fair value method. The test results prove that companies in the property industry are less likely to select the fair value method,

despite the average differences test showing that property companies report a higher level of holding gains from fair value compared to non-property companies. In other words, companies in the property industry, on average, reported a high difference in the fair value of investment property, yet the companies in the group prefer to use the cost model for measuring their investment property.

This finding may be explained through the political cost hypothesis (Watts & Zimmerman, 1990). Property companies are reluctant to select the fair value method and recognize the difference in fair value on the income statement in order to avoid government regulations that could potentially cost the company money. As we know, there is a tax regulation for charging a final tax of 10% of the difference in the fair value revaluation of assets (from the Regulation of the Minister of Finance [*Peraturan Menteri Keuangan/PMK*] No. 79/2008, Revaluation of Fixed Assets for the Company's Interest Taxation). Although the PMK regulates fixed assets, the existing tax regulation does not distinguish between fixed assets and investment property; therefore, investment property is categorized in the group of assets referred to in this regulation. Although taxes are charged against the asset revaluation and for tax purposes only, in practice this is more of a grey area. It is not impossible that, through later development, new regulations will appear enforcing tax on the difference in the revaluation of the value of assets for a company specifically engaged in the property or real estate industry. Therefore,

property companies are more likely to select the cost model in order to avoid the risk of tax regulations that would cause an increase in tax payments. This finding at once implies that the hypothetical political cost in the context of this research is more related to the type of industry – namely, whether the company belongs to the property or other industries – and is not determined from the company size.

### Sensitivity Tests

A sensitivity test was first performed by exchanging variable FV\_GAIN with the indicating variable DFV by separating the difference in the fair value into those above the median as the group with a high difference in fair value (DFV = 1) and those below the median as the group with a low difference in fair value (DFV = 0). The results are consistent with the main test: LEV and D\_PROP are significantly in line with the prediction, and variable DFV has no effect on P\_FV (please see Table 6.).

The second sensitivity test was done by including all companies that have selected the cost model and yet have not disclosed the fair value on the notes to the financial statements. Referring to Table 1, the 46 companies that did not disclose the fair value on the notes to the financial statements are included with an FV\_GAIN value of 0, and thus obtaining a sample of 100 observations<sup>2</sup>. In accordance with the description in the descriptive statistics section, companies that have not disclosed the fair value are

<sup>2</sup> See Table 1, with 54 observations plus 46 observations = 100 observations

Table 6  
Sensitivity test using DFV

Variable	Predicted sign	Coefficient	z-Statistic	Prob.
LEV	H1: (-)	-4.1204	-3.6706	0.0332**
LNTA	H2: (-)	-0.0755	-0.4370	0.4135
MTB	H3: (+)	0.0745	2.3502	0.1200
DFV	H4: (+)	-0.8310	-1.5716	0.2160
D_PROP	(+)	-2.2362	-4.3230	0.0153**
C		1.7569	0.4776	0.4056
	McFadden R-squared		0.211	
	Prob(LR statistic)		0.03**	
	% correct estimation		79.63%	

\*\* Significant at the 5% level; N = 54 observations

companies considering the high cost of acquiring information to measure the fair value of the assets compared to the extent of the benefits disclosed. By retaining the assumption that recognition is more value relevant than disclosure, a company that selects the cost model and estimates the fair value of its investment property does not differ significantly from the carrying value at the end of the current period is reluctant to disclose the fair value in the notes to the

financial statements. This means that the companies estimate a difference in fair value that is too low to be disclosed. Although the disclosure requirement for the fair value is mandatory, this behaviour shows rational management actions.

The results (Table 7) are consistent with the main test. Variables LEV, MTB and D\_PROP are significantly on the same course as predicted, and variables LNTA and FV\_GAIN still have no significant effect.

Table 7  
Regression result with n = 100

Variable	Predicted sign	Coefficient	z-Statistic	Prob.
LEV	H1: (-)	-1.1015	-3.1217	0.0593*
LNTA	H2: (-)	0.0558	1.2121	0.2722
MTB	H3: (+)	0.0381	2.9119	0.0727*
FV_GAIN	H4: (+)	0.5819	1.0235	0.3044
D_PROP	(+)	-1.1265	-7.0215	0.0002***
C		-1.497362	-1.5570	0.2181
	McFadden R-squared		0.110	
	Prob(LR statistic)		0.09*	
	% correct estimation		76,33%	

\*\* Significant at the 5% level; N = 100 observations

## CONCLUSION

This research focused on the selection of accounting methods for investment property. This research aimed to examine the factors that motivate companies to select the fair value method to record their investment property after the introduction of PSAK No. 13 *Investment Property* (2015). The factors studied were (1) the protection of creditors, based on efficient contract hypothesis for the creditor; (2) the political costs, based on political cost hypothesis; (3) the reduction of information asymmetry; and (4) the opportunistic motivations for managers to increase reported earnings through accounting method selected.

Protection for creditors is measured using the level of leverage, the political costs is measured using company size, information asymmetry is measured using the MTB ratio, and opportunistic action is measured using the ratio of profit margin from the difference in fair value that is recognized than the total assets of the company.

The findings show evidences consistent with the efficient contract hypothesis for the creditors and the motivation to reduce information asymmetry. This means that it is less probable that companies with higher levels of leverage will select the fair value method, and it is more probable that the companies with lower leverage will select a conservative method (choose the cost method) for recording the investment property. This shows a form of protection for creditors, since creditors have higher

preference for companies (their debtors) to adopt a conservative policy to reduce the risk of overstatement of the asset value. The cost method is seen as a conservative accounting policy because it does not cause earnings to fluctuate and does not run the risk of giving a less reliable presentation of company value in the financial statements, such as the fair value method may do. Furthermore, companies with high information asymmetry will have a higher probability of selecting the fair value method so that they can present the true value of the company. This research did not find indication that companies selected fair value method due to opportunistic motivations of managers to increase reported earnings.

The additional findings of this research indicate that property companies, on average, have a higher fair value gain to report on their income statements compared with non-property companies. Further analysis has shown that the companies in the property industry, on average, are less likely to select the fair value method to avoid the political scrutiny due to higher earnings and also to minimize the possibility of tax regulations to change tax regulations that will increase their corporate tax expenses. These findings are consistent with the political cost hypothesis.

The implication of this research is that the characteristics and motivations of management will influence the selection of accounting method; thus, it will add to the very limited literature on assessing the factors that motivate management to choose the fair value method. The result of the study



implies that the management try to satisfy contract with lenders, reduce asymmetry information, and avoid the political cost.

This research has its limitations because it only evaluates some of the factors that have been presumed to motivate a company when selecting the method of recording investment properties. There are still other factors that can be tested in further research, such as the company's shares or if investment property is a major line of business for the company. In the case of using a proxy to represent the opportunistic motivation, it is also limited in the amount of gains on fair value that may be recognized. Further research could use another proxy to evaluate the presence of opportunistic motivations when choosing the method of recording investment property, such as income smoothing activity. This research is also limited to companies in Indonesia with a limited number of companies in the sample. The small number in the sample causes a difficulty in incorporating other proxies into the model, according to factors identified by Fields et al. (2001). In addition, a low number in the sample may affect the bias of the regression estimation results. Further research could be done on multiple countries in order to add more observations.

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