

# The effects of religiosity on earnings management under obedience pressure

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## ARTICLE INFO

### Article history

Received : 20 December 2018

Revised : 18 June 2019

Accepted : 18 June 2019

### JEL Classification:

M41

### Key words:

Obedience Pressure,  
Religiosity,  
Earnings Management.

### DOI:

10.14414/jebav.v22i1.1559

## ABSTRACT

This paper examined the effect of obedience pressure on real earnings management. It also also investigated whether the relationship between obedience pressure and real earnings management is moderated by individual's religiosity level. Religiosity is an individual believed as sources of ethical value that would normatively affect the management ethical decision. Prior studies have documented that management decision could be influenced by obedience pressure, however, there is limited study that specifically tested the effects of obedience pressure and religiosity on real earnings management. This study utilized a laboratory experiment with a 2 x 2 (obedience pressure x level of religiosity) factorial design involving 89 participants. This study found that individuals under obedience pressure were more likely to perform real earnings management than control group. However, religiosity did not significantly mitigate the association between obedience pressure and real earnings management. There is no significant effect of individual's religiosity level on real earnings management decision.

## 1. INTRODUCTION

Several studies have revealed that ethical consideration in accounting decision can be affected by social pressures such as obedience pressure, compliance pressure, and conformity pressure. The previous studies found that pressure from authority also affect the management accountant's unethical decision, i.e. creation of budgetary slack (Hartmann and Maas 2010, Davis *et al.* 2006), inappropriate auditor judgments and decision (Lord and DeZoort 2001, DeZoort and Lord 1994), and misreporting behavior (Mayhew and Murphy 2014). However, there is limited study that specifically examined management accountants that respond to engage in real earnings management under obedience pressure and how religiosity affects the relationship.

Religiosity is normatively believed to have a positive relationship with ethics, because religion is one of sources of ethical value. Although the ethical values may come from other sources than religion, e.g. philosophy, culture, and beliefs system, however religion can be seen as the most important sources of ethical values. Several studies support these beliefs by finding a positive relationship between religiosity and ethics (e.g., Cooper

and Pullig 2013, Peterson *et al.* 2010, Vitell 2009, Conroy and Emerson 2004, Weaver and Agle 2002, Kennedy and Lawton 1998, Singhapakdi *et al.* 2000). Kennedy and Lawton (1998) found that there would be significant differences between students at religiously-affiliated and secular institutions to engage in regarding unethical behavior.

Another proponent, Lu (2010) also confirm-ed that firms in the United States whose head offices are located in an area with a higher religious index tend to exhibit higher ethical performance that is indicated by lower discretionary accruals, higher accruals quality, higher earnings persistence, and higher earnings response coefficient (ERC). However, Kurpis *et al.* (2008), Smith *et al.* (1975), Hegarty and Sims (1978 and 1979), and Kidwell *et al.* (1987) documented inconsistent results by finding of no correlation between religiosity and ethics. Parboteeah *et al.* (2008) argue that the existence of mixed results are mostly due to methodological and conceptual limitation.

This study highlights earnings management as an ethical issue because it is still an unresolved ethical problem in accounting practice. Earnings management is an action undertaken by management to influence

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reported earnings that can provide information about economic benefits that do not reflect the actual conditions of company (Merchant 1989). Ng, Whrite *et al.* (2009) stated that earnings management as an active earnings manipulation to achieve predetermined target set by management or analysts, or to smooth income. There are two types of earnings management commonly used by management, i.e. accrual manipulation and real earnings management. This study focuses on real earnings management as chosen ethical issues because there is increasing interest in studying real earnings management (e.g., Zang 2012, Cohen and Zarowin 2010, Gunny 2010, Graham *et al.* 2005, Roychowdhury 2006).

The increasingly stringent accounting standards and government regulations make managers switch to use real earnings management rather than accrual manipulation (Cohen and Zarowin 2010). Despite the increasing interest and importance of real earnings management activities, no study to date has examined whether and how management accountants engage in real earnings management under obedience pressure and how religiosity affected on that relationship. This study tried to fill this research gap.

This study provides several contributions. First, this study is useful for providing empirical evidence related to the influence of obedience pressure on ethical decision making, specifically the real earnings management. Second, this study provides empirical evidence related to the role of religiosity in earnings management decision making for the context of Muslim subjects. Previous studies which investigated the role of religiosity in earnings management were conducted in the context of Christian and Jewish communities, whereas for the Muslim communities such issues have not been widely studied.

The results of this study support the expectation that obedience pressure significantly influences real earnings management decisions. Management accountants under obedience pressure condition have a tendency to conduct higher real earnings management than those who did not experience obedience pressures. However, this study did not find evidence that religiosity had a significant effect on real earnings management decision. Religiosity also does not have a role as moderating variable on the relationship between obedience pressures and real earnings

management decision.

## 2. THEORETICAL FRAMEWORK AND HYPOTHESIS

### Obedience Pressure and Earnings Management

Beliefs, opinion, judgment, attitude, and behavior can be influenced by social pressures. Social pressure is a form of external pressures, either individually or group. Social pressures can be either compliance pressure, obedience pressure, or conformity pressure. Compliance pressure is the pressure to fulfill the explicit requests of individuals at various levels. Obedience pressure is the pressure to obey the orders of those in authority such as the leadership. Conformity pressure is the pressure to conform to peers or other group members (DeZoort and Lord 1997).

Social pressure can lead to bias in decision-making so that someone behaves unethically (DeZoort and Lord 1994, 1997, Davis *et al.* 2006, Hartmann and Maas 2010). Milgram's experimental study (1974) showed that individual have a tendency to obey order of his/her superior (obedience pressure) even though those actions are unethical and unlawful. Meanwhile, Asch's study (1955) which observed the influence of group pressure (conformity pressure) showed that in the absence of group pressure, individuals make an error of less than 1%, but when under group pressure, they make a wrong judgment of 36.8%. In the condition that a person gets group pressure, he will make a more wrong decision.

Accounting professionals, whether as management accountants or as auditors, are quite susceptible to the influence of social pressures. Previous studies provide evidence that the pressures to obey superior's orders are very influential in the unethical financial decision-making (Wilhelm 2012), e.g. the creation of budgetary slack (Davis *et al.* 2006, Hartmann and Maas 2010, and misreporting behavior (Mayhew and Murphy 2014). Studies in the field of auditing also documented evidence that external auditors were vulnerable to social pressures, either in the form of compliance pressure (Lightner *et al.* 1982, Dirsmith and Covalleski 1985), conformity pressure (Ponemon 1992; Lord and DeZoort 2001), and obedience pressure (Dezoort and Lord 1994). Auditor has a tendency to make unethical decisions when he/she is under pressure from superiors.

The effect of pressure from superiors are

also associated with fraudulent behavior and tendency to abuse of authority. Baird and Zelin (2009) showed that the pressure to obey the superiors affect fraudulent behaviors. Based on the theoretical basis and empirical evidence from previous studies, it is predicted that management accountants under obedience pressure would tend to conduct higher real earnings management than those who do not experience such pressures. Formally, hypothesis 1 is expressed as follows:

**H1:** *Management accountant under obedience pressure will engage in higher real earnings management than those who do not experience obedience pressure.*

### **Religiosity and Earnings Management**

Individuals who deal with social pressures do not always adhere the authority order but may respond to the opposite, e.g. refusal. Based on the psychological reactance theory (Brehm and Brehm 1981), individuals who are under pressure to perform certain actions will perceive reduced freedom. These pressures lead to the refusal reaction which the purpose is to restore reduced or threaten freedom. Those who have the refusal reaction to obey authority orders often take actions contrary to the orders. Such effects occur mainly in response the pressure to deviate from the code of professional ethics or moral principles (Brehm and Brehm 1981). This study argues if a person has a high level of religiosity, then the pressure to perform ethically questionable actions could produce refusal reactions, because unethical behaviors conflict with religious values.

Religiosity is a complex and multidimensional aspect for human life. Until now, there is no single agreed definition of religiosity. Some have tried to make the definition of religiosity. Barnett *et al.* (1996) defined religiosity as the strength of one's religious beliefs. Cornwall *et al.* (1986) defined religiosity in three aspects, consist of cognitive, affective, and behavior. Cognitive aspects include religious knowledge and religious beliefs. Affective aspects are related to emotional ties or emotional feelings about religion. Behavioral aspects are associated with the actions taken in the framework of religious implementation, such as attendance to church, reading the scriptures, praying, and so on.

There are some theoretical frameworks to explain the influence of religion on ethical behaviors, for example the theory of religious self-identity developed by Weaver and Agle

(2002). By employing the perspective of symbolic interactionism theory, Weaver and Agle (2002) explained that religion offers role expectations, when internalized through repeated social interactions, will establish one's self-identity as a follower of a particular religion. However, the strength of religious identity between one individual and others is not the same, thus causing the differences in behaviors that are influenced by the level of religiosity of each person.

Yet, in examining the possibility of religiosity's influence on business ethics, Weaver and Agle (2002) referred to the process of ethical decision-making framework as developed by Rest (1986). In this case, Rest (1986) argued there are four stages of ethical decision-making, that is: (1) moral sensitivity, (2) moral judgment, (3) moral intention, and (4) moral behavior. Each of these stages could be influenced by individual's religious values.

The theory of religious self-identity developed by Weaver and Agle (2002) mainly focuses on the religious characteristics in individual level which consists of three aspects including religious identity, identity salience, and motivational orientation. Weaver and Agle argued that religiosity affects business ethics when an individual sets the religiosity as a major component of their self-identity.

When religion serves as the main component for a person's identity, the deviation of religion can cause cognitive and emotional discomfort that drives its followers to keep their behaviors to conform to what is expected by the religion (Weaver and Agle 2002). Therefore, the stronger the religious self-identity of a person, the more likely the person to behave in accordance with the expectations of his religion (McGuire *et al.* 2012).

Terpstra *et al.* (1993) and Barnett *et al.* (1996) found that individuals who have high scores in their religiosity tend to hold on to the traditional views of moral issues and have a more conservative moral standard than the people with lower levels of religiosity. Research conducted by Senger (1970) on 244 managers also showed that religious managers tend to be more humanistic and socialistic, have less economic motive for their own interests, and be more conservative than managers with a low level of religiosity. Thus, religiosity generally has a positive influence on business.

A study on the influence of religiosity on business ethics in accounting has been investigated by Conroy and Emerson (2004).



This study indicated that religiosity has positive influence on ethical attitudes. One of the questions in the research conducted by Conroy and Emerson (2004) was whether religiosity has a correlation with the use of accounting tricks for manipulation. The study results showed that the frequency of church attendance as a religiosity proxy is associated with the increasingly low level of acceptability of the use of accounting manipulation. The results of a survey of 1,200 managers in the United States undertaken by Longenecker *et al.* (2004) showed that business managers and professionals who have a view that religious beliefs as salient are significantly less likely to engage in accounting manipulation. The evidences from several studies indicate that individuals who have higher levels of religiosity tend to have better ethical considerations.

This study predicted that religiosity will affect real earnings management decision. Religiosity is also predicted will mitigate the effects of obedience pressures on earnings management intensity. The influence of obedience pressures on earnings management would be reduced if a person had a high level of religiosity. People who experience obedience pressures and have low levels of religiosity tend to engage in more earnings management than those with high levels of religiosity. This prediction is expressed formally in the following hypotheses:

**H<sub>2</sub>:** *Religiosity influence real earnings management decision*

**H<sub>3</sub>:** *Religiosity moderates the relationship between obedience pressures and real earnings management decision. Management accountants with higher level of religiosity who are under obedience pressure will have a lower support for real earnings management action than managers with lower levels of religiosity*

### 3. RESEARCH METHOD

#### Research Design

This study used a laboratory experiment with a 2 (obedience pressure: pressure/no pressure) x 2 (religiosity: high/low) factorial design. The independent variables of obedience pressure were manipulated using case scenarios that described the presence of pressure from CFO to management accountant as subordinate. Meanwhile, religiosity variables were measured using the Islamic Religiosity Scale (IRS) developed by Tiliouine *et al.* (2009). The Islamic Religiosity Scale (IRS) consists of 16 questions with 5-point Likert scales. One

example of the questions was: are you fasting during Ramadhan? The answer choices were (1) never, (2) rarely, (3) sometimes, (4) often, and (5) always. Then, based on total IRS value, participants classified into two group that is high and low religiosity level. Our pilot test results indicated that the Islamic Religiosity Scale (IRS) instrument showed a Cronbach Alpha coefficient of 0.809, meaning that the instrument was feasible to use. Pilot test was conducted before the true experiment. So, the subjects participate in pilot test were different with the subjects in true experiment. The dependent variables of real earnings management were measured based on the level real earnings management decision that was measured using 7-point Likert scales (1. Strongly Support; 7. Strongly Refuse).

#### Participants

The participants in the study were undergraduate students, accounting professional students, and accounting graduate students at the Faculty of Economics and Business, Universitas Gadjah Mada, Indonesia. Indonesia is the country with the most Muslims residing of more than 85% of its population. All participants in this experiment are Muslim although Universitas Gadjah Mada as a government's own university has many students that are plural in religion and culture. The total number of participants in the experiment were 89 (28 men and 61 women) with a mean age of 22.2 (SD = 3.53). Based on educational background, there are 47 participants of undergraduate student, 29 graduate program, and 13 student of accounting professional education program. Participant demographic data are shown in Table 1.

**Table 1**  
**Participant Demographic Data**

Information	Total	%
Gender:		
Male	28	31.5
Female	61	68.5
Education:		
Undergraduate students	47	52.8
Graduate students	29	32.6
Accounting Professional students	13	14.6
Age:		
18 – 24	76	85,4
25 – 30	10	11,2
> 30	3	3,4
Total	89	100%

Source: Processed Data

### Experimental Procedures

Experiments were conducted by laboratory experiment. The participants were randomly put into one of the two conditions: 1) there is obedience pressure, 2) no pressure. Participants in obedience pressure condition read the scenario illustrating the existence of pressure from authority. The group control will receive scenario which do not contain any pressure from superordinate. The scenario of obedience pressure described a situation in which the participants as a finance and accounting manager were under pressure from their superior (the chief financial officer) to undertake real earnings management actions in order to achieve profit target.

The dependent variables of this research is real earnings management decision. The participants were given a case of real earnings management transaction. After receiving experimental manipulation, subjects then are asked to determine their decision that indicate the intention to engage in real earnings management. After completing this step, participants then filled out manipulation check questions, their ethical perception of earnings management actions, Islamic Religious Scale (IRS), and demographic data of respondents. Participant that finished the experiment were given financial compensation.

### 4. RESULTS AND DISCUSSION

Based on the results of participants' IRS level, the participants were categorized into two groups, participants with higher levels of religiosity (the IRS value of above 64) and those with low levels of religiosity (the IRS value of less than 64). The IRS has a minimum value of 16 and a maximum value of 80 with a mean value of 48. The cutoff point to determine high or low level of religiosity is 64 not 48 as mean value. The reason is that IRS consist of 16 items with five Likert scale ranging from 1. Never, 2. Rarely, 3. Sometimes, 4. Often, and 5. Always. Participant that on average answer minimum

at 4 scale (often) that can be categorized as high religious level because he often practicing religious teaching. Based on the IRS value, 42 participants were categorized as having high levels of religiosity and 47 participants had low levels of religiosity. Whereas, the mean of real earnings management as 3.72 (SD = 1.50) indicate the level of participants' support for that action in higher enough because it's above 3 as median value. However, based on their perception regarding the ethics of real earnings management, on average participant perceived that real earnings management is in grey area, between ethical and unethical (mean = 2.55, SD = 0,70). The ethical perception of real earnings management is measure by 4 scale ranging from 1. Strongly ethical, 2. Ethical, 3. Unethical, and 4. Strongly unethical. The descriptive statistical test results are shown in Table 2 and 3.

Based on Table 3, it can be inferred that the group in obedience pressure condition has a higher agreement to engage in real earnings management than control group. The mean of real earnings management in obedience pressure group is 3.34 (SD: 1.36) while the mean of real earnings management in control group is 4.06 (SD: 1.57). However, there is interesting result concerning religiosity. Subjects in high religiosity level surprisingly have a higher level of real earnings management agreement (mean: 3.54, SD: 1.48) than subjects with lower level of religiosity (mean: 3.87, SD: 1.52).

As based on Table 3, the group that has highest agreement to engage in real earnings management is the one with obedience pressure condition and high religiosity level (cell 1). While group that has lowest agreement for real earnings management action is the group with no pressure condition and low level of religiosity (cell 4).

### Hypothesis Testing

The hypotheses H1 and H2 were tested using the Analysis of Variance (ANOVA). ANOVA

**Table 2**  
**Descriptive Statistics**

	N	Minimum	Maximum	Mean	Std. Deviation
Real Earnings Management Decision	89	1	7	3.72	1.50
Real Earnings Management Ethical Perception	89	1	4	2.55	0.70
Islamic Religiosity Scale	89	38	74	62.93	6.51
Age	89	18	42	22.20	3.53

Source: Processed Data

**Table 3**  
**The Descriptive Statistics (Dependent Variable: Real Earnings Management)**

		Obedience Pressure		Row Means
		Pressure	No Pressure	
Religiosity	High	Mean: 3.20	Mean: 3.86	Mean: 3.54
		SD: 1.24	SD: 1.64	SD: 1.48
		N: 20 (Cell 1)	N: 22 (Cell 2)	N: 42
	Low	Mean: 3.47	Mean: 4.25	Mean: 3.87
		SD: 1.47	SD: 1.51	SD: 1.52
		N: 23 (Cell 3)	N: 24 (Cell 4)	N: 47
Column Means		Mean: 3.34	Mean: 4.06	Mean: 3.72
		SD: 1.36	SD: 1.57	SD: 1.50
		N: 43	N: 46	N: 89

Source: Processed Data

was applied to determine the significance of the main effects and interaction effects of obedience pressure and religiosity variables on real earnings management. One of the classical assumptions that needs to be met in the ANOVA test is the homogeneity of variance between experimental groups. The results of Levene's tests on the homogeneity of error variance in this study showed the value of  $F = 2.138$  and  $p = 0.101$ . Since the value of  $p > 0.05$ , it can be said that there was no variance difference between the experimental groups, so the assumption of variance homogeneity was met.

The results of ANOVA test showed a significant effect of obedience pressure on real earnings management ( $F = 5.058$ ;  $p < 0.05$ ). Experimental group who was exposed to obedience pressure had a mean value of 3.34, while the group who was not exposed to obedience pressure had a higher mean value, i.e. 4.06. The smaller mean value indicates the higher level of agreement for real earnings management action. The difference between obedience group and control group was statistically significant ( $p = 0.024$ ). This result can be interpreted that individuals who are exposed to obedience pressure have a greater tendency to engage in real earnings management than individuals without obedience pressure. Thus, H1 of this study was supported.

Experimental group with a high level of religiosity had a mean value of 3.54, while that with a low level of religiosity had a mean value of 3.87. This suggests that individuals with low levels of religiosity had a higher refusal level to

conduct real earnings management. However, the difference between those two groups were statistically not significant ( $p = 0.313$ ). Based on ANOVA test, religiosity does not significantly affect real earnings management ( $F = 0.452$ ,  $p = 0.503$ ). This result indicate that H2 is not supported.

On the contrary, the test of interaction effects between obedience pressure and religiosity through two-way interactions showed no significant result. Two-way interaction between obedience pressure and religiosity on real earnings management was not significant ( $F = 0.125$ ;  $p = 0.725$ ). It can be interpreted that the effect of obedience pressure on real earnings management intensity was not affected by the level of religiosity. Profile plot that depicted the main effect and interaction effect between obedience pressure and religiosity was depicted in Figure 1. Based on this statistical test results, H3 was not supported.

The additional analysis to determine whether there is a difference in ethical perception between participants with high level of religiosity with participants with low level of religiosity on real earnings management was conducted by employing the independent sample t-test. The results of independent sample t-test showed no significant difference between high-religiosity group and low-religiosity group in the ethical perception of real earnings management activity ( $t = 0.937$ ,  $df = 87$ ,  $p > 0.05$ ). To ensure that gender as extraneous variable did not affect the dependent variable, this study tested it by categorizing gender as a covariate variable. The results indicated that

**Table 4**  
**ANOVA Test Results**

Dependent Variable: Real Earnings Management					
Source	Hypothesis	df	Mean Square	F	Sig.
Intercept		1	79.472	37.263	.000
Sex		1	6.878	3.225	.076
Obedience Pressure	(H1)	1	10.788	5.058	.027
Religiosity	(H2)	1	.964	.452	.503
Pressure * Religiosity	(H3)	1	.266	.125	.725
Error		84	2.133		
Total		89			

a. R Squared = .104 (Adjusted R Squared = .061)

Source: Processed Data

the gender variable had no significant effect on real earnings management decision ( $F = 3,225$ ;  $p > 0,05$ ).

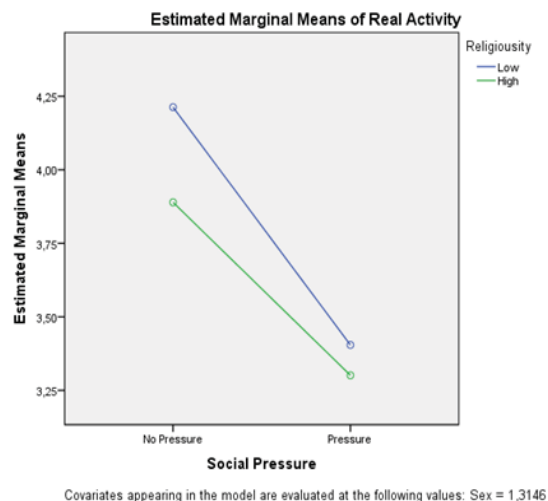
### Discussion

This study indicates that obedience pressure has a significantly effect on real earnings management. This result is consistent with previous studies that observe the effects of obedience pressure in accounting decision-making (DeZoort and Lord 1994, 1997, Hartmann and Maas 2010, Davis *et al.* 2006, Bishop 2013). However, this study does not find the significant role of religiosity on real earnings management. Religiosity does not moderate the relationship between obedience pressure and real earnings management decision.

the studies examining the effects of religiosity on business ethics is that they are not based on strong theory (Parboteeah *et al.* 2008, Giacalone and Jurkiewicz 2003, Weaver and Agle 2002). However, this study does not find any influence of religiosity on real earnings management. The theory of religious self-identity proposed by Weaver and Agle (2002) may be unfit to be use in explaining the ethical considerations of earnings management under obedience pressure.

The theory is basically an extension of the theory of symbolic interactionism that was drawn into individual level. Another explanation is that religion is mostly based on faith and beliefs while ethics is based on good reasons that have been interpreted differently (Rachels and Rachels 2011). This is in line with Kohlberg (1984) theory of cognitive moral development that proposed ethics has several levels from preconventional, conventional, and postconventional. Each level of moral development can be influenced by reasoning ability of individual. Whereas, religion has its own way in determining the level of religiosity beyond the reasoning ability.

The absence of the influence of religiosity in mitigating the relationship between obedience pressure and real earnings management decision may be derived from the lack of instrument that measure religiosity level since religiosity actually is very complex in nature. Islamic Religiosity Scale (IRS) may not measure comprehensively about individual's religiosity level. There is avenue for the next research to use alternative instrument besides IRS to measure religiosity.



**Figure 1**  
**Profile Plot**

Previous studies that examined the effects of religiosity on business ethics provide inconsistent results. In general, one criticism of



## 5. CONCLUSION, IMPLICATION, SUGGESTION, AND LIMITATIONS

The result of this study indicates that obedience pressure significantly affects real earnings management decision. The subjects who are exposed to obedience pressure have a higher tendency to engage in real earnings management. However, the influence of obedience pressure on real earnings management decision is not affected by the subject's level of religiosity. The results of this study, therefore, support the theory of social influence pressure (DeZoort and Lord 1997), especially the obedience theory (Milgram 1974). This study does not find any main effects of religiosity as well as interaction effects between obedience pressure and religiosity on real earnings management decision. This study provides evidence that there is no significant difference between individuals with high level of religiosity and individuals with low level of religiosity in the assessment of the ethical acceptability of real earnings management.

This study provides some practical implications, such as the need to pay closer attention regarding obedience pressure issues within an organization. Situational factors such as authority pressure to engage in unethical behavior has a dominant influence than personal factors such as religiosity. However, it is still necessary to find any variable that can mitigate the adverse effects of obedience pressure that could potentially lead to unethical behaviors.

The theoretical implication of this study is the need for further investigation of why religiosity cannot mitigate the adverse effects of obedience pressure on unethical behaviors. There are several possibilities why religiosity does not matter in mitigating the negative effect of obedience pressure condition, i.e. the lack of religiosity theory or it might be the lack of instrument to measure religiosity. It needs to be further studies related to the development of religiosity instrument that is more valid and reliable.

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## Appendix

### Experimental Manipulation for the Obedience Pressure Group

Participants in a group obedience social pressure condition will receive the following scenario:

A few days ago, the Finance Director invited you to his office to discuss the company's financial condition. The Finance Director explained to you that until the end of November profit realization was still far from the target. The Finance Director is very worried and anxious about the possibility of not achieving the company's profit target this year. Because if the business only runs normally, it is very difficult to meet the set profit target.

The Director of Finance strongly urges you and **ORDERS YOU** to implement the strategy for increasing profits that has been prepared so that this year's profit target is met.

The Director of Finance said to you:

"I have made a strategy to increase company profits so that this year's profit target is achieved. I **ORDER YOU** to implement the strategy that I have prepared."

### Control Group (No Pressure)

Participants in a group obedience social pressure condition will receive the following scenario:

A few days ago, the Finance Director invited you to his office to discuss the company's financial condition. The Finance Director explained to you that until the end of November profit realization was still far from the target. The Finance Director is very worried and anxious about the possibility of not achieving the company's profit target this year. Because if the business only runs normally, it is very difficult to meet the set profit target.

You are not given a specific order by the Finance Director. You are only asked to provide consideration of the strategy to increase profits that have been prepared by the Finance Director.

The Director of Finance said to you:

"I leave it entirely to you to determine the company's accounting and financial policies to increase company profit this year. "

### Real Earnings Management Decision

The subject will get a case that contains earnings management actions that the company will do in order to increase the company's profit to reach the year-end profit target. Subjects were asked to give their support for earnings

management actions that the company will undertake.

Real earnings management actions that the company will undertake is The company will reduce the cost of research and development expenses that have been budgeted with a significant amount of reduction.

If this strategy is executed, according to the calculation, the company will be able to achieve the profit target.

Subjects then were asked to indicate their decision to adhere or refuse such action:

Strongly Agree ☐ ☐ ☐ ☐ ☐ ☐ ☐ Strongly Disagree

### Religiosity

The instrument for measuring the level of religiosity adopted the Islamic Religiosity Scale (IRS) developed by Tiliouine et al. (2009). The Islamic Religiosity Scale consists of sixteen questions with five Likert scales. Questionnaires to measure the level of religiosity are as follows:

No.	Questions	Never	Rarely	Some-times	Most of the times	Al-ways
1	Voluntary prayers					
2	Prayers on time					
3	Weekly hours studying Koran					
4	Prayers in groups or Mosque					
5	Weekly time watch/read/listen religion					
6	Voluntary fast-ing other than Ramadan					
7	Advise others to do good and avoid sin					
8	Charity as reli-gious duty					
9	Praise God at the beginning and end of work					
10	Tolerate others for God's sake					
11	Seek relief from God when anx-ious/sad					
12	Obedient to par-ents for religious reasons					
13	Regard religion as personally important					
14	Mecca pilgrimage if affordable					
15	Fast at Ramadan					
16	Avoid mixing with opposite sex					