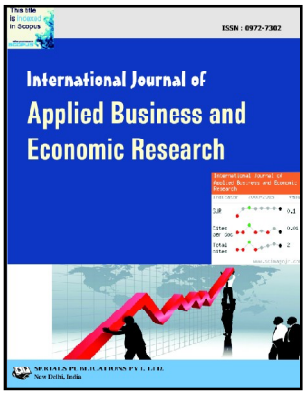

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Disjunction Behaviour in the Indonesia Stock Exchange (IDX)

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Abstract: The aims of this research are to assess and obtain empirical evidence of the behavior of securities analyst to the stock selection decisions made by prospective investors (mental discounting) at the Indonesian Stock Exchange which depends on the influence of financial information, beliefs revision, subjective norm, and perception of risk. The intention to buy share with voting right is triggered by the hope to maximize investors' utility.

This research applies explanatory perceptional approach with survey methods. This research analyzes primary data and shall be categorized as one shot study. The respondents are 186 securities analysts. The units of analysis are individual securities analysts. Data analysis of this research uses Structural Equation Modeling (SEM) with AMOS program.

The study reveals that the usefulness of accounting information has positive influence on the beliefs revision, the usefulness of accounting information has positive influence on risk perceptions, beliefs revision has positive influence on mental discounting, risk perception has positive influence on mental discounting, and subjective norm has positive influence on mental discounting.

Study findings indicate that accounting information has the characteristics of relevance, reliability, and full disclosure. Accounting information is useful to revise investors' beliefs, provide unsystematic risk perception, and have value relevance and usefulness in decision-making stock selection decisions. Securities analysts must be sophisticated, rational, prudence, receive hallo effect, and adopt neutral risk preference when performing stocks selection.

Keywords: Usefulness of Accounting Information, Belief Revision, Subjective Norm, Risk Perception, Mental Discounting

1. INTRODUCTION

The development of stock market brings wind of change to meet the demands of quality and information transparency, particularly accounting information which is engaged in the formation of capital market. Such information is loaded with various topics, substances, and knowledge which may benefit the investors, creditors, securities analysts, *users, etc regarding investment decision making* (Hartono, 2008; SFAC No.1, 1978).

Securities analysts use accounting information for their analysis, stock prediction, and stock selection decision. The aim of those activities are to provide stock recommendation for investors and other market makers (Arrozi, 2010; Arrozi, 2014).

Securities analysts, with regards to its fundamental, prefer simple, comprehensive, and accounting information-based model (Arrozi, 2010; Ho & Wong, 2004; Chen & Hsu, 2005). It has been evidenced by Bumi Resources Tbk (BUMI) stock problem arising at IDX. BUMI's 2008 Financial Statement reveals that the amount of *net profit is decreasing* (– 58%) and operational profit increases to the level of 102 % compared to 2007. BUMI's normal stock price was Rp. 4,500/sheet. Securities analyst gives recommendation to *buy* the stock with price ranging from Rp. 8,400–Rp.10,000/sheet. Such recommendation is given because fundamental-operational profit increases to the level of 102%, company's major activities are greatly profitable since the proce of mining commodity in the global market is very high and prospective. Securities analysts do not say something bad about company's price in order to avoid the conflict of interest and the potential that investors will rely on other brokers. Securities analysts recommend to increase the price of the stocks because their movement is so liquid that investors may *gain* very high volume of profit.

The recommendation from securities analystsstud regarding stock fundamental was made in consideration of information availability and *sophistication of major market makers* (Hartono,2005). Accounting information availability reflects the availability of information announced by emitents regarding company's performance, prospect, *uncertainty, expected values, corporate action,* and *responsibility facilities provided for* its *stakeholders. Such information gives a signal and contains* a number of *good news* or *bad news which may serve the function as* investment *stimulus* (Bruns, 1966). Sophisticated securities analysts will analyze such information carefully and conclude whether such *signal* is valid, reliable, and able to produce economic value. The implication of such economic value is the selection of stock with good fundamental performance which may be used to assess future prospect of the company (Scott, 2015).

This study observes securities analysts motif in selecting certain stock and recommend its prospect to their investors (*mental discounting). Mental discounting is influenced by financial and non-financial* information, revision of the belief, subjective norm, and risk perception and has implication on the optimization of stock utilitas. *Background argument for this* concept is stock prospect and value are influenced by the performance of financial statement. Securities analysts have prior belief about stock performance which is established in accordance with financial statement. After announcing financial statement for current budget year, securities analysts analyze the financial statement and conclude whether the result of their analysis is a *good news* or *bad news*, valid, reliable,or not. If the signal has been considered valid and comprehensive, such *signal may serve a function as the* stimulus which affect investors' confidence to select and revise their stock preference. As a consequence, positive affect in terms of stock approval or negative affect in terms of stock refusal will be made by the investors. The intention regarding stock preference is comprised of some factors which indicate how carefully the investment is planned and those factors are individual characteristics, social pressure, and environment. Those factors may vary over time due to the availability of information and trigger a motivation to change, an indication which affects investors' intention (Ajzen, 1988).

The motivation of this research are ***first,*** this issue is rarely discussed in the stock market. IDX is an emerging market of which decision is very speculative, influenced by mass opinion and psychological state. Financial and accounting decision shall be focused on utility and evaluation of accounting information which are performed after doing thorough fundamental analysis. ***Second,*** this research is the decomposition

of investors attitude and may trigger the characteristics of risk perception, and belief revision. The decomposition of subjective norm may develop the characteristics of internal pressure and external pressure influences. **Third,** there is inconsistency between the research about investors attitude and subjective norm which may trigger the intention to take action.

The aims of this research are to analyze and gain empirical evidences about the influence of securities analysts in making stock preference decision (*mental discounting*) at the IDX which is affected by the benefit of accounting information, belief revision, risk perception, and subjective norm.

2. THEORETICAL FRAMEWORK AND HYPOTHESIS DEVELOPMENT

2.1. Theory of Reasoned Action

Theory of reasoned action which was developed by Fishbein and Ajzen (1975) states that action is the product of individual intention. Action will be performed in accordance with the following assumptions: humans perform an action that can meet their logics, humans consider all types of information before taking an action, humans weigh on the implications of their action. The intention to perform certain action is an individual's basic function and consideration, i.e. such intention shall be linked to individual factor and social influence. The determining factor governing individual action is the attitude towards such action. Such attitude reflects individual belief or feeling –either positive or negative – if one is expected to perform certain action, whereas the the determining factor governing social influence is subjective norm. *Subjective norm is closely linked to* the prescription of normative perception, i.e. individual belief towards social pressure which affects individual intention to perform certain action or not.

The outlines of reasoned action are grouped into three kinds of relation, i.e.: **first,** the relation between belief and action. The belief integrated by action is a component which includes knowledge. Knowledge may bring either positive or negative implication because it influences individual action. Belief affects attitude because knowledge may either bring positive or negative impact, or in other words individual attitude towards certain action is shaped by the knowledge he/she has. As a consequence, individual may show positive or negative attitude, based on the knowledge constructing his/her belief. **Second,** the relationship between normative belief and subjective norm. Normative belief of an attitude is the component of individual knowledge. Normative belief reflects other individuals' belief which affects one's life and determines whether an individual must be involved in certain action or not. Subjective norm towards an action shall be one's sole decision after weighing on others' perception towards his/her action. The fact that individual will be influenced by such belief depends on individual's strength in facing the perceptions of others. **Third,** the relationship between subjective attitude/norm and intention to perform certain action. The intention to perform certain action is driven by the motif of such action, and such intention is formed by the attitude towards respective action and the subjective norm influencing such action. This theory supports the premise that individuals will perform an action in the event that they have positive perception towards such action and believe that other individuals encourage them to do such action.

2.2. Usefulness of Accounting *Information*

Usefulness accounting information is *relevant* and *reliable* (Scott, 2015), contains certain value which may improve the knowledge and confidence about the potentials to gain profit, meet certain expectation during

uncertain condition; and change the decision or attitude of the users (Suwarjono, 2008). *Financial Accounting Standard Board*/FASB (1980) has been managed to establish qualitative standards of financial statement/ report in *Standard Financial Accounting Concepts* (SFAC) No 2 regarding "*Qualitative Characteristics of Accounting Information",* the conformity to such standards shall be the major requirement to meet so as to the objective of information is in accordance with SFAC No 1. The characteristics of well-qualified accounting information require that a financial statement shall display the following values:

(a) Primary Qualities

SFAC No 2 states that major requirements needed from a well-qualified financial statement which can be used as the basis for decision making are its relevance and reliability. Relevance means accounting information must be able to make a difference to a decision. To be relevant, accounting information must have predictive value, feed back value and on time. Reliable means the information must be dependable, free from error, deviation, and displayed honestly. To be reliable, accounting information must have some characteristics like examinable, fairly reported, and neutral.

(b) Secondary Qualities

Financial information will be more valuable if it meets some secondary qualities like: comparable and consistent.

(c) Limitations of Financial Statement

Financial information will be beneficial if it reaches minimum limit of relevance and reliability standards. This fact proves that information has limited values. The characteristics of such limit are among others *cost and benefit,* and materiality.

2.3. Belief Revision

Fishben and Ajzen (1975) categorizes perception about belief as the component which covers the knowledge about X. This component can contribute either positive or negative influence, resulting from its participation in X. X knowledge is the opinion about certain thing that is not always be in line with the reality. In accounting context, belief is a component which critically exposes the decision making process and determines the nature of decision making process (Beaver, 1989). Information changes investors' belief so as to the decision will be changed if new information is available. Investors belief can't be observed directly. Stock price can be perceived as the reflection of the balance process resulting from investor's belief.

Belief revision shows that investors revise their belief regarding the stock price when they receive information in form of divident and *earnings surprises* (Hogarth and Einhorn's, 1992). The developed assumption regarding ths matter is every individual may change his/her belief after undergoing *anchoring and adjustment processes. Present belief serves a function as* preliminary belief which may be adjusted into a new belief and may be developed in sequence. This theory also considers about the power of preliminary belief (*anchor)* and predicts that high amount of *anchor may experience more reduction* due to negative information, and vice versa. Such condition is called *anchoring effect*. Scott (2015) makes a prediction regarding investors' attitude in responding to the information reported in a financial statement:

(a) Investors have their confidence on *return* and *risk of emitents' expected stocks*. This confidence is based on the information available in the market which covers from anything related to market price to the information furnished after *current net income* has been issued. Nonetheless, each investor may have different confidence because each of them treats financial information differently and adopts different way of interpretation.

(b) After the issuance of *net income information of certain budget year*, investor will grow the level of his/her knowledge after analyzing the amount of such *income*. *For example*, if *net income is higher than* the amount expected, that will be a *good news*. Some investors will revise their belief regarding *earning power* and future *return*. Other investors who have high confidence on present *net income* may interpret high amount of *net income as* a *bad news*. Investors who have revised their belief/confidence regarding high level of future profit may decide to buy the stock with recent price.

2.4. Risk Perception

Perception shall be defined as individual view in observing an object or event through five senses. This perception has been developed from the exposure to object, and interpretation or analysis of a message. Perception is subjective and situational in nature because object of perception depends on space and time framework and individual perception towards certain object may differ from the perception developed by other individuals towards the same object (Arrozi, 2010; Arrozi, 2014; Matlin, 1998).

Investment risk shall be defined as the deviation from expected profit. Such risk correlates with the deviation of received *outcome from expected outcome*. Due to uncertainty, investors may receive undefined amount of future *return* (Hartono, 2008). To minimize the risk of investment, market makers have to identify the risks, *systematic risk* and *unsystematic risk* (Arrozi, 2010; Arrozi, 2014).

Basic stock risk, according to the analysts, shall be defined as the risk of stock selection, i.e. the selection of stock with poor level of *return* deviation (*adverse selection return)* which is lower than average return received by the company with the same scale or industry (Selva, 1995). Analysts minimize the risk by comparing the prospect of companies within similar industry and select stocks of which future price may exceed the increase of stock index. Analysts perform *firm of size, capital structure,* and *geographical segments analyses to observe the level of industrial risk*. Those investors hope that risk level influences *future earnings* and *balance the price hike* with the rising of *earnings.*

Risk perception has some subjective components like: belief, attitude, and feeling towards risk for uncertain situation, and showing the *hazard.* Thus, risk perception is displayed from individual perception regarding the possibility that he/she will be exposed to financial risk after the use of financial statement (Koonce, 2004; Arrozi, 2014). Risk perception is an integrated model which combines the characteristics of attitudinal risk and the risk quoted in *standard of deviation theory* (probability and expected value) which correlates with *loss* and *gain. This reseach develops the premise that financial statement users' perception shall be developed by observing the characteristics of* attitudinal risk.

2.5. Mental Discounting

Mental discounting shall be defined as cognitive process to perform estimation towards *discount rate* or *return* (Wahlund and Gunnarsson, 1996). *Mental discounting* as the reflection of *mental attitude must be supported by*

three factors: first*, determination*: the presence of strong motivation, intention, dan goal. Second*, self dicipline*: knowing what to do and when to perform certain action. Third*, fighting*: hard work, smart work, and time management. M*ental discounting process requires* high individual capability that may cover cognitive, affective, and conative aspects like; financial and non-financialue information processing, the implementation of investment knowledge from fundamental and technical aspects, adjustment of investment preference, *risk* and *return perceptions*, and investment process learning. With regards to this study, *mental discounting shall be defined* as the trend to select stock candidates, which shall be based on the confidence of securities analysts in estimating the amount of stock *return*.

Mental discounting must be implemented in investment process and the implementation of which requires the knowledge on securities, investment *timing*, *risk,* market, prospect, and *expected value* (Nofsinger, 2005; Nyhus in Altman, 2006). This fact is closely retaliated with investment goals and strategies selected by market makers and the amount of expected *return*. Thus, we may infer that *cognitive process to determine the most appropriate investment strategy may differ between* individuals. Such variation is triggered by the variation of *return* and *risk preferences*. As a consequence, users have *return* selection in form of divident, *capital gain*, or both of them.

M*ental discounting process within the* market makers needs to be developed so they will gain special skill to grow their confidence on the performance of their selected stocks (Snelbecker *et al.,* 1990; Nofsinger, 2005) the knowledge they should know are among others the knowledge about economical analysis, industrial analysis, fundamental analysis, technical analysis, and portfolio analysis. When performing stock selection, fundamental analysis will be used to analyze the performance and prospect of the company. The assumption will be *value of the firm, or the value of the company will be reflected in the price of* its issued securities (Nofsinger, 2005). Such analysis reveals information content of financial statement. Other analyses that must be performed are economical and technical analyses which shall be based on the movement of selected stocks (Arrozi, 2010).The aims of those analyses are to get the estimation of *return* and *risk* of the selected stocks. Due to the fact that *financial asset is risky*, users tend to compare the amount of the return of financial asset with the *return from risk-free asset*s. The comparation reveals that the stock with highest amount of return will be determined with regards to *return rank* and *risk*.

2.6. Hypothesis Development

2.6.1. The Correlation between Usefulness of Accounting Information and Belief Revision

Scott (2015) and Beaver (1989) declare that accounting information has the real information if such information helps the investors to revise their belief regarding the decision to buy or sell their stocks. Investors revise their belief regarding *earning expectation they want to gain* and proxied to price and stock trading volume adjustment. The study performed by Easton and Zmijewski (1989) discloses that for every $1 *good news* or *bad news* in *earnings reported by the analysts,* they have to increase or decrease the amount of *earnings prediction for the next quarter* in the amount of 34 cents above the average and indirectly state that company financial statement is informative. The result of the study performed by Stuerke (2005) reveals positive correlation between analyst's revision to his/her prediction positif and *earning interim announcement*. As a result, *earning* announcement correlates with new information, ERC innovation, and *earnings uncertainty*. The result of the study performed by Barberis and Thaler (2003) shows that investors tend to be rational

and consistent towards their belief. When investors receive new information, investors change their belief and make decision (Arrozi, 2010; 2014). It does not only reveal that investors process information appropriately but also receive it correctly.

Different findings are shown by Eipsten (1975) that 45.2% of share holders do not base their decision to the financial statement and such financial statement is failed to provide useful information to the share holders. Chen and Hsu (2005) show that *company news* and *advice give higher contribution than* the information presented in the financial statement in changing investors' confidence and action. Hong Kong investors' perception reveals that relevance is more important than reliability-causality.

In accordance with theoretical background and empirical findings, the following hypothesis is constructed:

H_1: The usefulness of accounting information affects belief revision.

2.6.2. The Relationship between the Usefullnes of Accounting Information and Risk Perception

The result of the study performed by Lambert and Verrechia (2005), also Ferris *et al.* (1990) display that users do not have belief towards the benefit of accounting information in providing risk alert. Accounting information shows the performance, prospect, risk potentials, and company value but those information do not trigger positive or negative towards company stock. This fact reveals that users reduce their dependency to the performance of the company because such performance cannot measure the amount of accounting risk and tend to perform speculative trading.

Different findings are formulated by Beaver *et al* (1970), Lee (1999), Arrozi (2010; 2014) Koonce *et al* (2004), and Capstaff (1992). Users are confident that company is facing financial problem, *illiquid, it has very poor financial condition so* risk perception shall be implemented. Users control *unsystematic risks by performing stock diversification* from varied companies, industries, and compositions. Thus, users tend to react towards the risk with regards to risk preferences like: *risk averter, risk seeker,* or *risk neutral.*

In accordance with theoretical and empirical studies, the following hypotheses is constructed:

H_2: The Usefulness of Accounting Information Affects Risk Perception.

2.6.3. Correlation between Belief Revision with Mental Discounting

The result of the study performed by Wahlund and Gunnarsson (1996) reveals that *mental discounting process is influenced by* cognitive capacity and type of investment decision making. Different cognitive capacity shows the limitation of memory capacity in performing information processing. It reveals that every individual understand on how to conceptualize an event and interpret it based on certain information. Due to cognitive limitation, every individual will make different decision.

Different findings are found in Blanthorne (2000) research which shows that there is a negative and significant correlation between belief revision and the intention to do certain act. The result of the study reveals that *ethical beliefs gives negative and great influence* towards the intention to do violations. The result of the study reveals that *ethical beliefs brings negative and great impact to the intention to do violation.*

In accordance with theoretical and empirical studies, the following hypotheses is made:

H_3: Belief Revision Affect *Mental Discounting.*

2.6.4. *Correlation between Risk Perception and* Mental Discounting

Risk perception reflects user perception regarding *loss potentials found in* the items of financial statement which may risk the stock price of the company (Koonce *et al.,*2004). Prisk perception displays company's poor performance and prospect. As a result, users perform stock performance evaluation. Poor individual stock performance will be released and changed with other stocks which have good performance and prospect so investors' intention to take decision during stock selection process will escalate (Chen and Steiner, 1990; Gibson *et al,* 1997).

Different research findings are formulated by Hsu *and* Chiu (2004), they find out that users never pay their attention to the unexpected consequences. The study performed by Charness *and* Gneezy (2003) discusses about stock decision making and shows that *illusion of control* and *ambiguity treatment do not influence* investors attitude in making investment decision. When it is perceived from the perspective of *myopic loss aversion, the participants of that research has* their freedom to adjust their investment notwithstanding the fact that they have to pay more fund to adjust the same.

In accordance with theoretical and empirical studies, the following hypothesis is constructed:

H_4: Risk Perception Affects M*ental Discounting*.

2.6.5. *Correlation between Subjective Norm and* Mental Discounting

The result of the studies performed by Bhattacherjee (2000), BEJ (1997), Hailu *et al.* (2005), Hite (1988), and Shin *et al.* (1995) prove that subjective norm influences investors' intention to take decision. The higher the volume of social pressure coming from the experts, the higher the degree of approval to the intention to perform stock decision making. On the contrary, the researches performed by Tan *and* Teo (2000), Hartwick *and* Barki (1994), also Hsu *and* Ciu (2004) prove that subjective norm does not influence the intention to perform investment decision making. This finding reveals that social pressure coming from the experts will not influence users' decision to take investment action.

In accordance with theoretical and empirical studies, the following hypotesis is constructed:

H_5: Subjective norm affects *mental discounting*.

3. RESEARCH METHOD

3.1. Population, Sample, and Sample Collection Technique

The population of this research is a group of securities analysts working in *research and development division of stock companies and affiliated in* the Association of Indonesian Securities Analysts (AAEI). The sample size according to Hair *et al.* (1998) shall be 5 – 10 times of the number of variables and applies *maximum likelihood estimation* ranging between 100 - 200 and in this regards the researcher sets 186 as the value of *maximum likelihood estimation*. Samples are collected randomly by applying *simple random sampling* technique, i.e. each securities analyst has similar chance to be selected as the sample of this research.

3.2. Operational Definition and Variable Measurement

3.2.1. *The Usefulness of Accounting Information*

The benefit of accounting information shall be defined as the degree of positive or negative aspect which is determined by the confidence of securities analysts on the criteria of well-qualified information

that may benefit decision making process. The instrument to measure this correlation is developed by the researcher from IAI-SAK (2007); Ho and Wong (2005); also Arrozi (2010, 2014).. Question items are assessed by using scale 1 (very unuseful) until 5 (very useful), the questionnaires cover 15 test items.

3.2.2. Risk Perception

Risk perception shall be defined as the perspective of securities analysts about the possible effect towards the items cited in observed financial statement and los*s* potential of the company's *outcomes. The* instrument used to measure *risk perception consists of* 7 indicators developed from the previous model used by Koonce *et al.* (2004) and Arrozi (2014). Question items are assessed by a set of score ranging from 1 (not risky at all) until 5 (very risky) and consist of 6 test items.

3.2.3. Belief Revision

Belief revision shall be defined as securities analysts' perception towards accounting information which motivates them to change their preliminary belief. The instrument to measure this aspect is developed by the researcher from Hogarth dan Einhorn's (1992), Arrozi (2014), also Scott (2015)'s model. Question items are assessed by using a set of score ranging from 1 (very uncertain) to 5 (very certain) and consists of 4 question items.

3.2.4. Subjective Norm

Subjective norm reflects securities analysts' perception on the power of financial investment experts' influence towards investors' motivation to make stock decision. The variables of subjective norm are developed from Chow and Chan (2008), Arrozi (2016), also East R. (1993). Question items are assessed by using a set of score ranging from 1 (very discouraging) to 5 (very encouraging) and consists of 4 question items.

3.2.5. Mental Discounting

Mental discounting shall be defined as the fact that the intention to perform stock selection will be influenced by the belief/confidence of securities analysts towards the estimation of stock *return*. The test instrument is developed from Wahlund and Gunnarsson (1996). Question items are assessed by using a set of score ranging from 1 (strongly disagree) to 5 (strongly agree) and consists of 32 question items.

3.3. Data Analysis

Hypotheses of this research are tested by using *Structural Equation Model* (SEM) and *Analysis of Moment Structure* (AMOS) application program version 4.01. According to Arbuckle (1997) a good model shall meet the criteria of good structural equation model, i.e.:*Degree of Freedom* (DF) must be positive; Non significant *Chi-Square must display certain value exceeding the required value* (p=0.05) and above accepted conservative limit (p=0.10); *Incremental fit value must be above* 0.90 or GFI (*Goodnes of fit Index*), and *Adjusted GFI* (AGFI); *Tucker Lewis Index* (TLI) also *Comparative Fit Index shall exceed* 0.95; and RMR (Root Mean Square Residual) value as well as RMSEA (Root Mean Square Error of Approximation) lower limit of 0.08.

3.4. Research Model

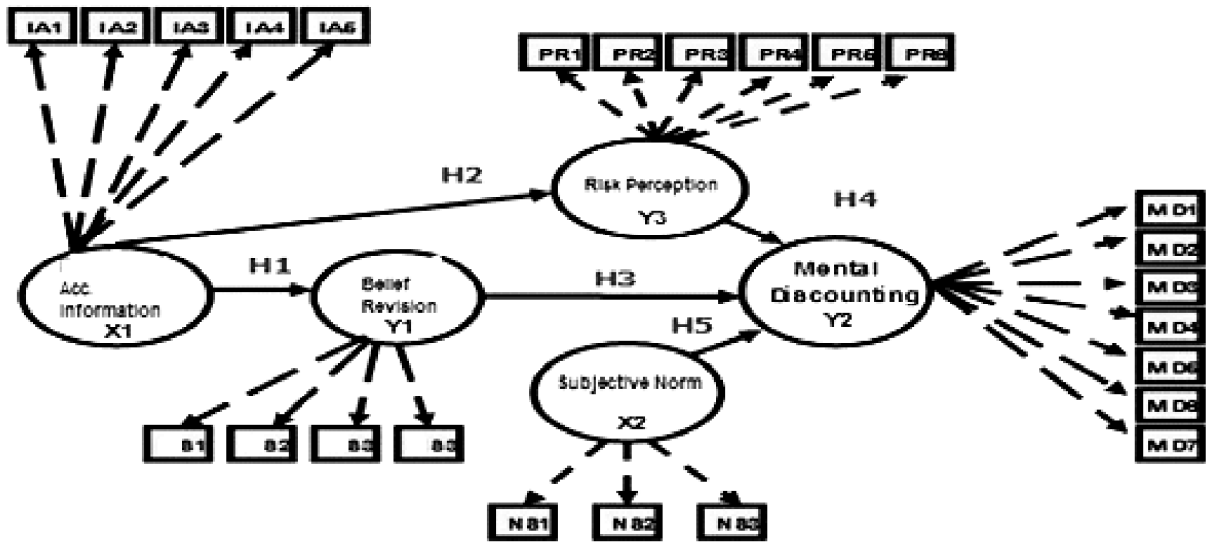

Image 1: Research Model

4. DATA ANALYSIS AND DISCUSSION

4.1. Respondent Demographics

The amount of distributed questionnaires is 250 sheets and 192 of them are returned. The *respond rate* is amounted to 73 %. The illustration of questionnaire submission is displayed on Table 1. Securities analysts demographics are recorded in Table 2 which displays general characteristics of: 31-35 year old; male; having under-graduate (S1) educational background; have joined *forecasting and valuation of stock course;* have worked for 6-10 years; their main tasks are doing research, analysis, and recommendation; having the Indonesian Stock Brokers Licanse (WPPE); and belong to fundamental analyst type.

Table 1
Illustration of Questionnaires Distribution and Submission

Note	*Number*
Delivered Questionnaires	250 copies
Return due to wrong address	9 copies
No. of Received Questionnaires	241 copies
Returned Questionnaires	192 copies
Percentage of Returned Questionnaires	79.66 %
Usable Questionnaires	186 copies
Percentage of Usable Questionnaires	77 %

Table 2
Respondents Demographics

Note	*Number*
Respondents Age	
20 – 25 year	10.7%
26 – 30 year	14.9%
31 – 35 year	40.5%
36 – 40 year	14.9%
41 – 45 year	8.6%
46 – 50 year	10.6%
Sex	
Male	76.6%
Female	23.4%
Formal Education	
Undergraduate (S1)	76.7%
Graduate (S2)	21.3%
Post Graduate (S3)	2.1%
Capital Market Education	
Advance Training	10.5%
CFA	8.4%
Forecasting and Valuation	44.7%
Financial Modelling	10.5%
Risk Management	4.2%
Securities/Stock Workshop	23.3%
Stock Market Work Experience	
1 – 5 years	21.5%
6 – 10 years	65.8%
11 – 15 years	2.1%
16 – 20 years	10.6%
21 – 25 years	–
Main Task of Analyst	
Research, Macro and Micro Analysis, and Stock Recommendation	85.1%
Marketing	4.3%
Trader	10.6%
Certification	
CFA	6.3%
MI	15.7%
WMI	14.9%
WPPE	19.1%
WPEE	17%
All (WMI,WPPE,WPEE,CFTE)	27%
Category of Analyst	
Fundamental Analyst	89.4%
Technical Analyst	–
Both	10.6%

4.2. Reliability and Validity Tests

Reliability test is performed by calculating *cronbach alpha* and the score of which ranging from 0.742 to 0.948 and it has been found out that this research is *reliable because it* achieve the value of 0.60 (Nunnally, 1978). Whereas validity test applies certain analysis factor of which MSA value ranging from 0.634 to 0,837 and it is valid because it can reach the value of 0.50 (Kaiser an Rice, 1974). The result of reliability and validity test are shown in Table 3.

Table 3
Result of Reliability and Validity Variables Test

Variable	*Reliability*	*Validity*
Benefit of Acc. Information	0.870	0.801
Belief Revision	0.791	0.751
Risk Perception	0.742	0.634
Subjective Norm	0.808	0.777
Mental Discounting	0.948	0.837

4.3. Goodness-of-fit Test

The result of *Goodness-of-fit Test is displayed* on Table 4 and shows the value of *probability level* of the model in the amount of 0.211, above the required maximum value of 0.05. *Chi-Square value,* RMSEA, GFI, AGFI, CMIN/DF, TLI, and CFI earned are 299.773, 0.019, 0.984, 0.966, 1.066, 0.976, and 0.960. Broadly speaking, this research model is accepted.

Table 4
Structural Equation Model (SEM) Fitness Indices

Criteria	*Cut of Value*	*Result of Calculation*	*Note*
Chi-Square (χ^2)	Expected Low	299.773	χ^2 with df = 281 is 322, Accepted
Sig. of Probability	≥ 0.05	0.211	Accepted
RMSEA	≤ 0.08	0.019	Accepted
GFI	≥ 0.90	0.984	Accepted
AGFI	≥ 0.90	0.966	Accepted
CMIN/DF	≤ 2.00	1.066	Accepted
TLI	≥ 0.95	0.976	Accepted
CFI	≥ 0.95	0.960	Accepted

4.4. Hypothesis Testing and Discussion

The result of analysis performed by using AMOS program is depicted in Table 5. This result reveals that each correlation between variables H_1 to H_5 shows significant probability value (p) amounted below 0.05, and the tested hypothesis is accepted significantly.

Table 5
Estimation of Structural Model Parameter

Variable	*Estimate*	*S.E.*	*C.R.*	*Prob.*	*Hypothesis*	*Note*
Use. Acc. Info (X1) → Belief Revision (Y1)	0.4231	0.1665	2.540	0.0110	H1	Sig.
Use. Acc. Info (X1) → Risk Perception (Y3)	1.4395	0.2634	5.463	0.0000	H2	Sig.
Belief Revision (Y1) → Mental Discounting (Y2)	1.1265	0.4594	2.451	0.0142	H3	Sig.
Risk Perception (Y3) → Mental Discounting (Y2)	0.9090	0.2460	3.694	0.0002	H4	Sig.
Subjective Norm (X2) → Mental Discounting (Y2)	0.6021	0.2538	2.372	0.0176	H5	Sig.

4.4.1. Hypothesis 1

Usefulness accounting information positively affects belief revision with path coefficient amounted to 0.4231, CR value amounted to 2.54, and significance probability value (p) of 0.0110. This study finds out that securities analysts tend to give positive reaction towards company's financial statement and use it for analysis, so revision belief on performance, prospect, and *earning power in the future*. Usefulness accounting information must have benefit and information content lest it will be understandable, relevant, and *reliable for decision making* process. This information is valuable because it can improve the confidence regarding dividend profitability expectation. Securities analysts set the amount of expected performance based on dividend profitability because emitent performance needs to be so good that it can produce prospective divident. In addition to that, securities analysts consider their preliminary belief as *anchoring effect. It is assumed that securities analysts use low level of preliminary belief* because prospective investment they want to establish has quite long time frame and fundamentally their emitents have future performance and prospect. Hence, any single positive information may trigger ultimate change which causing the adjustment of preliminary belief. Belief revision adopts certain way to adjust with prediction and target realization. Based on information, securities analysts prepare their decision.

Securities analysts act *sophisticatedly in preparing and interpreting* any information which have economical value. They do it in certain way that financial statement will provide *usefulness* for them. Thus we may conclude that information will provide valuable information for securities analysts and accounting information will be beneficial for investment decision making (*decision usefulness).* This finding is in accordance with the result of the study performed by Beaver (1989), Barberis and Thaler (2003), Arrozi (2010;2014;2016), also Stuerke (2005).

4.4.2. Hypothesis Testing 2

Usefulness of accounting information positively influences risk perception with path coefficient amounted to 1.439, CR value amounted to 5.463, and significance probability value (p) of 0.000. The finding of this study reveals that securities analysts react positively towards accounting information and risk perception. It is because accounting information has the ability to display prediction and realization of the expected analysis and prove the belief that company stocks will be risky if company's financial condition is also risky, trigger negative impact, uncontrollable, and very prone to danger. Such condition takes place because company's stocks are owned by certain industry or sector within the jurisdiction area of the state and very sensitive to conjuncture and turbulence resulting from dynamic change. Thus, those stocks will be affected by market risk which cannot be avoided by adjusting some factors. In addition to that, securities analysts

use accounting information to prepare the prediction of emitents' stock but the realization of which will not always meet their expectation. The deviation between expectation and realization is triggered by the fact that the stocks of respective emitents are placed in unprofitable industry or sector. Such industry or sector displays the decrease of performance and make target profit of the company inachievable. As a result, that company is prone to bear certain amount of loss. By implementing such risk implementation. By adopting such risk interpretation, securities analysts will grow an understanding that every emitent stock distributed in stock market may be affected by risk indication, in accordance with the risk preference of the *risk seeker, the risk averter,* or the *risk neutral. The result of this study shows that the financial condition of some company is risky*. This empirical finding supports the findings formulated by Koonce *et al.,* (2004), Capstaff (1992), Lee (1999), Beaver *et al.* (1970), and Arrozi (2010;2014).

4.4.3. Hypothesis Testing 3

Belief revision positively affects *mental discounting with path* coefficient amounted to 1.1265, CR value of 2.4517, and significance probability value (p) of 0.0142. The finding of this study displays the preliminary belief to adjust stock selection is positive so it will support the intention to do stock selection. Positive response towards belief revision is triggered by the confidence that company's net profit and dividend contain news and information, and the satisfaction towards the performance of financial statement is a *signal of good news. Such belief determine decision making action* performed by securities analysts – the action to interpret information *signal* and perform further analysis to observe whether such *signal* is valid, reliable, having economical value and information content. This information is reflected in the *value of the firm which makes* the price stock increase or decrease in stock trade transaction. As a result, decreasing stock proce will be revised with the stock with high price. This process reveals that securities analysts have intention to do investment, knowledge on financial investment, as well as investment plan and control. M*ental discounting attitude is affected by confidence which* covers fundamental knowledge and the attitude towards such action grows as the market maker increases his/her confidence on doing stock selection. This knowledge may bring either positive or negative consequence and affect the attitude to do stock selection (positive) or not doing stock selection (negative). This result proves that the influence of *mental discounting is very strong towards securities' analysts intention to* perform stock selection because they need to perform *sophisticated* information processing and analysis. This finding is consistent with the finding formulated by Wahlund and Gunnarsson (1996), Bruns (1968), Hunton and McEwen (1997), also Arrozi (2010; 2014) in their researches.

4.4.4. Hypothesis Testing 4

Risk perception positively affects *mental discounting with path* coefficient of 0.9090, CR value of 3.6944, and significance probability value (p) of 0.0002. Research analysts assume that stocks are high-risk financial intrument which are sensitive to every single event and information, and risk perception is perceived as a *signal* of *bad news* which may decrease emitent's stock value because it shows that there is something wrong with company's perfoemance and prospect. Securities analysts observe on the value of such company's bad performance of certain industry or sector. An industry which contributes bad effect to state revenue will have poor performance and low stock market. Securities analysts analyze financial statement submitted by each emitent of the industry and take action towards accounting information recorded in the stock value of the company. As a result, securities analysts prefer to own the stock based on *adverse selection return* or release the stocks of which return *deviation may trigger loss and be lower than* the average *return* given by the

company with the same size. Analysts minimize the risk of stock selection by comparing the prospect of two companies running same kind of business. This method is implemented by securities analysts so that the stock selection will be performed in rational, careful way and do not only follow investments' intuition, and tough in facing company's stock price *volatility*.

Fundamental securities analysts perform *mental discounting in accordance with* the preferences of time frame and long-term prospect, self control, and the attitude towards neutral risk taking attitude. Securities analysts tend to be *prudent* and rational in stock decision making. Securities analysts perform work evaluation to stock candidates and take decision in accordance with their investment intention and attitude towards risk preference. Investors decision will depend on the information cited in the financial statement. Securities analysts tend to be ignorant towards risk and adopt *risk neutral preference*. This finding is in accordance with the result of Gibson *et al.* (1997), Arrozi (2010; 2014), also Chen and Steiner (1999)'s studies.

4.4.5. Hypothesis Testing 5

The result of the study displays that subjective norm positively affects *mental discounting*- with path coefficient of 0.6021, CR value of 2.3720, and signification value (p) of 0.017. Securities analysts show positive attitude towards the the power of observers' influence, friends' influence, and regulators' influence during stock selection process. This study finds out that friends influence has highest tendency to affect the intention of stock selection. Social environment around securities analysts give very strong contribution in affecting securities analysts' suggestion regarding stock selection. Friends' influence contribute very significant contribution to stock candidate selection and stock performance. Due to the fact that different securities analyst implement different *cognitive*, there is a trend that each analyst's friend will provide different guidance and descriptive analysis in showing the performance of each type of stock. Securities analysts prefer to follow their friends' opinion and suggestion about certain type of stock because they assume that the degree of righteousness of such opinion or suggestion is higher than the one provided by observers and regulators. Increasing figure is observed in the motivation to take action resulting from high social pressure from friends and to get friends' approval towards such action. The attitude towards the decision regarding stock selection may either be positive or negative because it has been emerged from the experience and knowledge of the friends of the analysts. Friends' influence may change the direction of investment. This finding is in accordance with the result of the researches conducted by Bhattacherjee (2000), Hailu *et al.* (2005), Hite (1988), Shin *et al.,* (1995), BEJ (1997), Arrozi (2010; 2014).

5. CONCLUSION, LIMITATION, AND RECOMMENDATION

5.1. Conclusion

The finding of this reseach supports the truth of hypotheses 1, 2, 3, 4, and 5. *Mental discounting in stock selection may be adjusted due to* information and individual attitude factors. The benefits of accounting information are first and foremost related to individual factor, followed by belief revision, risk perception, and subjective norm. Theoretical *framework developed in this research* is applied to test the hypothesis that securities analysts select stocks based on accounting information and such hypothesis is accepted. Stock selection depends on the fluctuation of stock price which reflects all information regarding such stock. Thus, securities analysts adjust their confidence and decision, selected stock repositioning is conducted

due to the accounting information containing in such stocks. The intention to do stock selection is shaped from the number of actions prepared, the usefulness of accounting information, belief revision, risk perception, and subjective norm.

This finding shall be interpreted as the fact that securities analysts tend to perform *sophisticated action* in analyzing accounting information which will be made as the basis of rational economic decision making. Fundamental analysts avoid the spreading of speculations, misleading issues and rumours. This serves an evidence for the fact that accounting information shall be *relevant, reliable*, and *useful for its users* and understand the need and problem (*decisión usefulness) faced by users*. In addition to that, the intention to select certain type of stock shall be in accordance with the knowledge and experience of the users as well as others. Hence, securities analysts tend to display *prudent, sophisticated, volitional attitudes* and *risk neutral preference*.

5.2. Limitation

Some limitations that may constrain the implementation of this research are among others:

1. Global economic crisis in the United States and Europe constrains operational mechanism of world capital market, including IDX and leaves capital market in *bearish condition. Such condition* triggers pessimism of the users and the drastic increase of risk potential.
2. The samples used in this research are limited to the ones collected from securities analysts. Such condition makes perception of samples somehow limited. Homogenity of the samples greatly affects the findings of this research.
3. Researcher only has limited understanding on *sophisticated attitude of securities* analysts during decision making process. As a matter of fact, such understanding may provide explanation on the factors that may affect the level of analysts' sophisticated attitude. Researcher may also observe other factor contributing in shaping the understanding of those analysts: the influence of *hallo effect* factor shall also be considered.

5.3. Recommendation

With regards to the above-mentioned conclusion and limitation, I would like to propose some recommendation for the next study:

1. Develop the research model by using induction variables like environment uncertainty, investment motif, investment interest, investment strategy, decision model, and other internal factors, whether as intervening or moderating variables for the intention to do stock selection. Those variables will depict the real case because they will help to explain about securities analysts' motif and intention to perform certain action during stock selection process and the most appropriate action the analysts must take when giving stock advice to their investors.
2. Perform a research when the stock market is in *bearish condition* and conducive economic condition. This researcn will provide comprehensive and structured explanation about the attitude of securities analysts.
3. Different samples for 'attitude' and 'implication of action' variables are needed. It is suggested that the next research takes samples from investment managers, investment advisors, brokers and investors.

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