Influence of Picture Health Warnings on the Attitudes and Intention to Quit Smoking in Middle School Students

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The potential and advantages of New smokers for the country is not comparable to the loss incurred. As a preventive action, the Ministry of Health published five versions of picture health warnings that circulated in advertisements or on packs of cigarettes. Picture health warnings issued by the health ministry aims as the initial stimulation to prevent the seeds of active smokers and strengthen health awareness in adolescence. Stimuli through visual images are expected to influence the attitudes and intention of adolescents to not smoke. The approach of this research is explanatory research. The type of data in this research is quantitative, while the source of the data used is primary data. The data collection method is by questionnaire. The populations in this study are adolescents aged between 17 - 21 years. The sampling method used is a non-probability sampling method with convenience sampling technique. The data analysis technique used is Univariate ANOVA. Based on the results of the univariate ANOVA test, it can be concluded that there was no significant influence of five versions of picture health warning on the attitudes and intention of adolescents towards smoking.

Key words: *Picture Health Warning, Attitudes of Smoking, Intention of Smoking.*

Introduction

Indonesia is the fifth largest producer of tobacco leaves in the world. The Ministry of Health's Global Adult Tobacco Survey (GATS) data reveals that cigarette consumption in Indonesia was 225 billion cigarettes in 2013. Indonesia is the third largest cigarette consumer in the world. The smoking behaviour in adolescents 15 years and older did not decrease from 2007 to 2013, and showed a tendency to increase from 34.2 percent in 2007, then 34.3 in 2010 and to 36.3 percent in 2013, with 66.0 percent men and 6.7 percent of women still smoking cigarettes in

2013 (InfoDatin, 2014). This showed that cigarette consumption from tobacco use in Indonesia continues to increase every year.

The tendency of smoking in the younger generation is increasing and more worrying is that children have started smoking at a young age. The impact can be seen from the increase of adolescents aged 15-19 years to smoke. The trend at the age of 15-19 increased six-fold from 7.1% to 43.3%, and also, that 10-14 year-olds showed that 17.5% of children started smoking. This was also supported by the latest Global Youth Tobacco Survey (GYTS) data in 2014 which found that 18.3 percent of Indonesian students already had a smoking habit, with 33.9 percent male and 2.5 percent female (Wahyuningsih, 2015).

The data in the discussion above shows the proportion of new smokers and state profits not proportional to the losses incurred. As a preventive measure, the Ministry of Health publishes five versions of picture health warnings or pictures of smoking bans that are circulating now in advertisements or in cigarette packs. A warning image issued by the Ministry of Health aims as an initial stimulus to prevent active smoker seeds and strengthen health awareness in adolescence. The stimulus through visual images is expected to influence the adolescent's belief in not smoking.

The attitude consists of three main components, namely cognitive component, affective component, and conative component. The cognitive component involves thinking, understanding, and awareness. Affective components relates to feeling, evaluating, interest, and desire. While the conative component involves acting, behaviour and purchasing action. Of the three components, evaluation is a component involved with attitude, because evaluation shows whether consumers like or dislike the brand (Assael, 1998).

The theory that explains the relationship between attitudes and behaviour is from the Theory of Reasoned Action (TRA). In TRA that is applied in consumer behaviour, buying behaviour is influenced by intention, attitude towards behaviour and subjective norms. This understanding implies that the norms carried out by the individual are carried out or not. TRA explains that attitudes will influence behaviour through a careful and reasonable decision-making process, and affect three things: (1) behaviour is not only influenced by general attitudes but attitude that is more specific to an object; (2) behaviour is not only influenced by attitudes but also by subjective norms, namely beliefs about what other people want to do something; and (3) attitudes toward behaviour along with subjective norms form intention to behave (Dharmmesta dan Handoko, 2008).

The intention to behave is an expectation or plan to act in a specific way to do a certain behaviour in the future. Blanton et al (2014) stated that graphic effects of cigarette warnings on the intention to quit smoking in young adults, where to measure intention is to use two

indicators namely thinking of smoking in the near future and thinking of smoking when offered by friends. Roxana (2010) examines the effect of message labels on products on consumer attitudes and intentions, where intention is measured through three aspects, namely self congruity factor, perceived awareness factor, and an emotional factor.

Government efforts to change the attitude of smokers by issuing a picture health warning policy, with the hope that smokers understand and reduce smoking habits. Picture health warning displays a number of smoking-related illnesses that appear on 20% of cigarette packs, such as images of oral cancer, images of throat cancer, images of lung disease, and illustrated images that show that smoking can cause death, as well as illustrative images that show that smoking close to children will be dangerous for them. In addition, there are also several texts or writings containing the effects of smoking. This study has the importance of knowing how much impact the picture health warning has had in changing the attitudes of adolescents to smoking so that they can see the extent to which government intervention in changing adolescents' attitudes is successful or not.

Literature Review

Consumer Behaviour

Consumer behaviour is dynamic, meaning that the behaviour of a consumer, consumer group, or wider society is always changing and moving all the time (Simamora, 2000). This is an implication for the study of consumer behaviour, and so is the development of marketing strategies. In terms of the study of consumer behaviour, one of the implications is that the generalisation of consumer behaviour is usually limited to certain periods of time, products, and certain individuals or groups (Setiadi, 2010). Simamora (2010) defines consumer behaviour as the direct action involved to obtain, consume, and spend service products, including the decision process that follows and precedes this action.

Attitude

Attitude is a form of evaluation or feeling reaction, this reaction is based on the evaluation process in the individual who will give conclusions of good and bad values, likes or dislikes and will lead the concept of reaction to the object of attitude (Azwar, 1995). Attitude is a comprehensive evaluation that allows people to respond in a way that is profitable or unfavourable consistently with regard to objects (Setiadi, 2010). Suprapti (2009: 141) explains that attitude is a perception and assessment of consumers of attributes - key attributes or beliefs held in regard to certain attitudes of a commodity. Thus, consumers generally have the attitude of favouring a commodity that they believe has a certain positive level of attributes.

Conversely, consumers will have an attitude that does not like a commodity which they believe has negative attributes (Mihaela-Roxana dan Cho, 2010; Blanton, 2014).

Attitude has several components. The ABC Model of Attitudes emphasises the relationship between knowledge, feelings and behaviour, in this model, Solomon mentions that the components of attitude consist of cognitive and affective components. The cognitive component (perceptual component) is a component that is related to knowledge, views, beliefs, that is, matters relating to how people perceive object attitudes, while affective components are related components with pleasures or dislikes of the object of attitude. Joy is a positive thing, while unhappiness is a negative thing. This component shows the direction of attitudes, namely positive and negative. The cognitive component (perceptual component) is a component that is related to knowledge, views, beliefs, namely things related to how people perceive the object of attitude, while the affective component is a component related to taste happy or displeased towards the object of attitude. Joy is a positive thing, while unhappiness is a negative thing. This component shows the direction of attitude, namely positive and negative (Irlianti dan Dwiyanti, 2014).

Intention

Intention is the desire to do something. According to Jogiyanto (2007), intention is defined as the desire to do behaviour. Intention is the main predictor in determining behaviour. According to Corsini in Primandini (2013) intention is a decision to behave in a certain way, in contrast to Ajzen in Primandini (2013) who define intention as a theory of planned behaviour which is the development of a theory of reasoned action. Ajzen in Utomo (2013) further explained that intention reflects the willingness of individuals to try to do a certain behaviour (Primandini, 2013).

According to Ajzen in Utomo (2013) intention is an indication of how strong a person's beliefs will be to try a behaviour, and how much effort will be used to conduct a behaviour. Intention has a high correlation with behaviour, so it can be used to predict a person's behaviour. According to Zimbardo and Leippe (in Sunengsih, 2014) the intention to behave is an expectation or plan to act in a specific way to do a certain behaviour in the future.

Development of Hypothesis and Conceptual Models

Picture Health Warnings and the Attitude of Quitting Smoking in Adolescents

Picture health warnings on cigarette packaging according to Government Regulation through the regulation of the Minister of Health No. 28 of 2013 is where all cigarette products in Indonesia must include warnings of the dangers of smoking for health with a sinister picture

on cigarette packs of packaging. This is required by both foreign cigarettes and domestic cigarettes and is promoted in several ways such as the following: (1) Health warnings in the form of pictures and writing on each side of the packaging (front-back) is 40 percent; (2) The size of the advertisement on outside media is 72 square meters; (3) Especially for public places, workplaces and other places provide special places for smoking; (4) The Application of the Health Warning needs to be further discussed in the transition period; (5) This transition needs to be promoted by the RPP before the President signs it (Ode, 2018).

Every smoker must know about the picture health warnings on cigarette packs, and every smoker will respond to the smoke warning label on cigarette packaging as a form of reaction to the label. Suprapti (2009, p.141) explains that attitude is a consumer's perception and assessment of key attributes or the beliefs held by him regarding the particular attitude of a commodity. Thus, consumers generally have the attitude of favouring a commodity that they believe has a certain positive level of attributes. Conversely, consumers will have an attitude that does not like a commodity which they believe has negative attributes.

Picture Health Warnings with the Adolescents Intention of Quitting Smoking

Every smoker who knows the picture health warnings on cigarette packs will certainly respond to the picture health warning as a reaction to the image. However, this picture health warning can be successful if it is also supported by the intention of smokers to quit, as stated by Muchtar in Indrawani et al (2014) who states that success in quitting smoking is determined by the amount of intention to quit. Intention is the desire of individuals to perform certain behaviours related to the knowledge (belief) about the behaviour that will be carried out and attitudes towards these behaviours, as well as the behaviour itself as a tangible manifestation of its intentions (Indrawani, Mailani dan Nilawati, 2014). According to Ajzen & Madden in Indrawani et al (2014) the intention to quit smoking is part of a person's knowledge and beliefs about smoking cessation behaviour that is done consciously.

H_0: There is no difference in the attitude and intention of quitting smoking towards picture health warning
H_1: There are differences in the attitude and intention of quitting smoking towards the picture health warning.

Figure 1. Conceptual Model
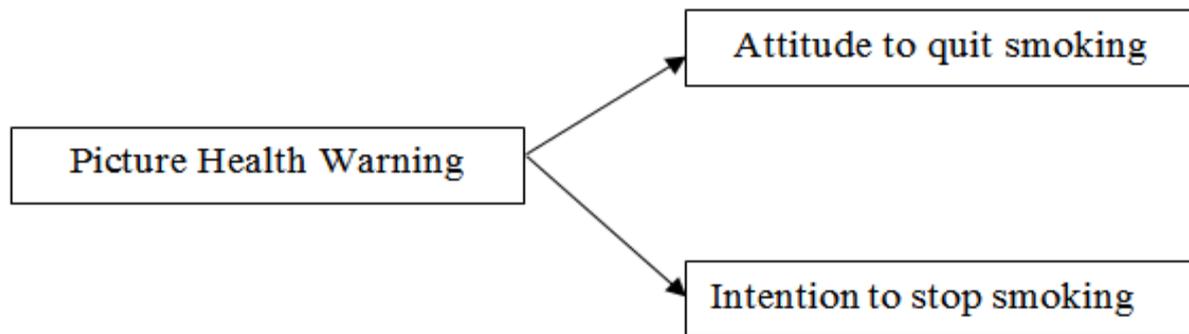
Methodology

Data Collection and Samples

Data collection used questionnaires. According to Sugiyono (2014, p.142) the questionnaire is a way of collecting data by providing a set of list of questions answered. The questionnaire in this study was given to respondents, where the population used in adolescence was aged between 17 years and 21 years (Yusuf, 2011). Some of the populations studied would be selected as samples. According to Sugiyono (2010) the sample is part of the number and characteristics possessed by the population. The method of selecting samples in this study is using a non-probability sampling method with purposive sampling technique that is the technique of determining the sample with certain considerations (Sugiyono, 2012). The criteria used in this study are:

1. Adolescents between the ages of 17 years and 21 years (Yusuf, 2011).
2. Adolescents who have ever smoked.
3. Adolescents who have seen picture health warnings on cigarette packaging in the form of pictures and writing.

In this study, the sample size used is a multivariate type that refers to the sample measurement guidelines according to Hair et. Al. in Ferdinand (2002: 51) which uses 5-10 times the variable indicator. So this study uses a sample of 7x10=70 respondents.

Description of Respondent Characteristics

Respondents obtained from this study are as follows: the sex that dominates the respondents who filled out the questionnaire was 67 men or 95.7%. The dominating age is 18 years old at 38 people (54.3%) and 17 years old at 18 people (25.7%). The monthly allowance obtained by respondents averaged around Rp. 500,000 to Rp. 1,000,000 for 28 people or 40% and ranged from Rp. 1,000,000 to Rp. 2,000,000 for 25 people or 35.7%.

Analysis Technique

The data analysis technique uses Univariate ANOVA, which is used to answer the hypotheses in this study. Before being analysed using Univariate ANOVA, the data assumptions are for normality and homogeneity, if the assumptions are not met using a different non parametric statistical test, namely the ANOVA Univariate test.

There are two test assumptions to be imposed, namely the normality test and the variance homogeneity test:

1. Normality Test: A normality test is carried out to determine whether the distribution of data meets the normal curve. This will be done using the Kolmogrov-Smirnov non-parametric test. Data distribution will be declared normal if the value $p>0.05$ (Ghozali, 2009).
2. Homogeneity Test: The variance is done to find out the dependent variable must have the same variant in each category of independent variables. If there is more than one independent variable, then there must be homogeneity of variance in the cell formed by categorical independent variables. SPSS provides this test with the name Levene 's test of Homogeneity of variance. If the Levene test value is significant (probability <0.05) then the null hypothesis will be rejected that the group has a different variance and this violates the assumption. So what is desired is that it cannot reject the null hypothesis or the Levene test results are not significant (probability> 0.05). Although this same variance assumption is violated, it states that ANOVA can still be used because of the robust ANOVA for small and moderate deviations from homogeneity of variance (Ghozali, 2009). ANOVA was used to test differences in attitudes and intentions in terms of picture health warning.

Data Analysis and Discussion

Univariate ANOVA Test

This test is carried out after testing assumptions which include the normality test and variance homogeneity test are fulfilled, then ANOVA univariate testing will be carried out. This univariate test used a significance level (α) of 0.05. The hypothesis used for testing is:

H₀: there is no difference in attitude and intention in terms of picture health warnings.
H₁: there are differences in attitudes and intentions in terms of the picture health warnings.

The ANOVA univariate test show a significance level (α) of 0.05, seen with a significance level greater than 0.05. This means that H_0 has no significant effect on the five versions of picture health warning on adolescents quitting smoking or there is no significant difference in atitudes by adolescents. The results showed that the appeal fear did not have a significant

impact on teen smokers. Both scary images that show the potential for illness or social impact do not make a significant difference. Initiation for smoking is influenced by parents' attitudes toward smoking, and peer behaviour (Hessandra, Vlachopoulobs, Kosmidoua, 2011), and subsequent activities are due to the social environment, and not due to the problem of images on the packaging. Any frightening images will be difficult to influence the adolescents who are already addicted. Adolescent smoking behaviour provides a variety of threats to the experience of adolescents who will then form attitudes and assessments of smoking and smoking behaviour itself. Smoking experience This teenager needs to be researched and watched out. A pleasant experience about smoking will certainly strengthen and maintain smoking behaviour, and conversely unpleasant experiences should reduce smoking behaviour.

The ANOVA univariate test is used to determine whether there are influences of the five versions of picture health warning towards the intention to quit adolescent smoking with a significance level (α) of 0.05, seen with a significance level greater than 0.05. This means that H_0 does not have a significant effect on the five versions of picture health warnings on the intention to quit adolescent smoking or there is no significant difference in the intention to quit by adolescents. This result also confirms the previous results that the appeal fear on cigarette packaging, both in the language of images and writing, does not affect the intention of adolescents to quit smoking. This is in line with Premananto's (2003) research, that the intention to quit smoking is more due to the social environment and direct experience of illness, not because of the illness suffered by others.

Discussion

Every individual has an attitude which reflects all forms of behaviour that arise, including taking attitudes. There are two possible attitudes that will arise in someone who smokes, that is, smokers can be positive towards smoking hazard warning labels on cigarette packs so that they realise that the cigarettes they smoke can be harmful to their health or vice versa, neglecting the negative effects that arise in smoking on the packaging. This research shows that images and writings do not have an impact on quitting attitudes and intentions. Pictures and writing tend to be ignored, because smoking activity is already in the stage of addicting. This is also obtained from the research of Premananto (2003), that perceptions of the risk of smoking are often defeated by addictive problems.

Initiation for smoking is influenced by parents' attitudes toward smoking, and peer behaviour (Hassandra *et al.*, 2011). Adolescent smoking behaviour provides a variety of threats to the experience of adolescents who will then form attitudes and assessments of smoking and smoking behaviour itself. A pleasant experience about smoking will certainly strengthen and maintain smoking behaviour, and conversely unpleasant experiences should reduce smoking behaviour (Kristianto, Bakar dan Yasmara, 2019).

The regulation to include picture health warnings is contained in Government Regulation No. 109 of 2012 concerning Safeguards of Materials Containing Addictive Substances in the Form of Tobacco Products for Health and Minister of Health Regulation No. 28 of 2013 in hopes of reducing smokers' consumption rates in smoking and protecting public health from the dangers of smoking. However, this picture health warning can be successful if it is also supported by the intention of smokers to quit, as stated by Muchtar in Indrawani et al (2014) who states that success in quitting smoking is determined by the amount of intention to quit.

Conclusion

There was no significant effect on the five versions of picture health warnings and also the old version of the smoking risk text and the new version of adolescent smoking cessation attitudes. This refers to the individual's perception of social pressure which requires or prohibits them from carrying out that behaviour. Every individual has an attitude which reflects all forms of behaviour that arise, including taking attitudes. There may be two attitudes that will arise in someone who smokes, that is, smokers can be positive about the hazard warning label on cigarettes so that they are aware that cigarettes smoked can be harmful to their health or negatively by ignoring the bad effects that arise in smoking as illustrated in packaging. But the perception of cigarettes will often be defeated by the desire to smoke who has been addicted.

Implications

Implications for Smoking Hazard Awareness Movement

Cigarette packaging that provides a fear appeal approach, is not able to influence cigarette consumers who are already loyal. The language of drawing and writing is not good enough to make young smokers quit smoking. For this reason, other methods need to be identified, including if the rational approach has no impact, an emotional approach must be raised. Pictures of smokers carrying their children on cigarette packs have indeed been raised there, but the negative effects are emotionally lacking. Emphasis on stories or public service advertisements or even short films must be more able to touch the emotional aspects of loyal cigarette consumers.

Further Research Limitations

Research can still be further followed for different age groups of smokers, and also for different levels of cigarette addiction (light smokers and heavy smokers). Research can also be further developed by conducting experiments on other ways to educate and influence changes in smokers' attitudes.

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