

## Plain Package; Can It Affect Health Awareness and Quit Smoking Attempt Behavior?

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### Abstract

**Purpose:** Graphic Pictorial Health Warnings (GPHW) Policy has been implemented in Indonesia since 2014, but the numbers have never shown declining yet. A few countries like Australia and Canada use plain package policy as a new approach to reducing it. Even the plain package policy has been not implemented in Indonesia, this could be preliminary research as an alternative solution.

**Design/Methodology/Approach:** Paired t-test conducted to test the significant difference between smoker's perception about a regular and plain package. Because of a plain package has not implemented yet, we demonstrate a product's prototype and ask them to imagine if the policy has actually implemented. This preliminary research use cross-section methods to gain the data. To test the effect, we collected information from 200 active smokers in Palembang, Indonesia using a questionnaire.

**Findings:** Significant difference ( $< 0.05$ ) occurs between smoker's perception about health awareness and quit smoking behavior at the regular and plain package. There is 9 item to compare each other and two overall variables. Six of a nine-item variable has significant difference each other ( $< 0.05$ ), and also two others ( $< 0.05$ ).

**Practical implication:** As preliminary findings, this significant difference addressed to formulate a better GPHW Policy. It can use to gain more smoker's attention to health awareness and drive quit smoking attempt behavior. And we propose ongoing social marketing campaign related to amplify the effect of a plain package according to research findings.

**Originality/value:** We conduct a preliminary test to compared smoker's perception at the regular package and plain package, even the plain ones have been not implemented yet. To make more realistic about plain package's response, we use a prototype to amplify their visualization. Social marketing campaign related to a plain package ongoing.

**Keywords:** disturbing pictures on cigarettes pack, graphical picture health warning, health awareness, quit smoking attempt behavior, social marketing.

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Note (for consideration): -

### Background

It started in 2014, Indonesian applied Graphic Pictorial Health Warnings (GPHWs) Policy to reduce the number of smokers. This regulation forced each cigarettes package must contain certainly selected pictures to convey the health warning messages. According to the Indonesian Ministry of Health Regulation No.28/2013, there are five certain pictures were selected to display in cigarettes pack. The variants are; Lung cancer, Mouth cancer, Smokers, and skull, Smoke harmful to children and Throat cancer. Although smoking behavior uncontested negatively impact to health because of its harmful materials, the numbers never have shown declining yet. Every year more than 217,400 of Indonesian people are killed by tobacco-caused disease, while more than 2,677,000 children and more than 53,767,000 adults continue to use tobacco each day (Tobacco Atlas, 2013).

GPHW's policy is picture based, it is designed as a packaging policy. Packaging is part of marketing strategy, it is not only to wrap the product. Well-designed packages can in addition to building strong brands and drives sales (Rundh, 2013). In other sides, the packaging strategy it is

the one of effective marketing strategy in order to expose their marketing gimmick. Related to a tobacco product, there are strict rules that must be obeyed, especially about pictorial health warning printed on their package. The rules may vary depending on the country, most of them choose to cover product's identity. The Ineffective issues using regular GPHW's policy lead an advance regulation of health warning messages, such as the implementation of plain packages.

A few countries use a different approach to improve their regular GPHW's policy. Canada, Australia, and Mexico became the pioneer country to implement 'plain' packaging (i.e., no brand logos, colors, typography) (Thrasher et al., 2016). Considering GPHW's is picture base, plain package purpose to reduce "the marketing effect" caused by visualization from the pack. At least, there is similarity purpose of the regulation is to reduce active smoker with increase their health awareness and drive quit smoking attempt behavior.

Quit smoking is a huge decision for smokers, and many smokers prefer to ignore the health risk to continued their smoking behavior. There are many reasons behind that, depression and anxiety have been linked to the initiation and maintenance of smoking (Kassel et al., 2007; and Killen et al., 1996 in (Lemieux et al., 2016)). Specifically, among low-income smokers, they might have occasion to reduce anxiety states and anxiety sensitivity, such as smoking to cope stressful life (Zvolensky et al., 2016). It creates a barrier to quit retention, even they are exposed to anti-smoking messages, smokers seldom encounter the realistic quit strategies smoking cessation messages (Wolburg, 2008).

As one of the countries with huge of smoker numbers in the world, Indonesia has already implemented the regular GPHWs policy. Related to the worrying situation, we need to take an advance step such as adopting the plain package approach. This is worth it to try if we want the number will decrease. A plain package can use to maximize the effect of messages and expected to encourage quit attempt behavior. Moreover, we can combine it with creates a caring group to help smokers achieve some actual action such as reduce consumptions, number of lifetimes quit attempts, and number of strategies used to quit (whether non-pharmacological or pharmacological methods) (Zvolensky et al., 2015).

### **Behavioral Objective and Target Group**

Graphical Picture Health Warning (GPHW's) should be used as a powerful social marketing tool to gain behavior change. As a communication tool, regular GPHW uses to show the dangerous effect of smoking activity, less attention to health awareness is the main obstacle to quit smoking attempt behavior. It can start from making them reduce their consumption, at the end of the goal, we hope smokers can quit and encourage others smokers to follow them. The ineffective issue of regular GPHW makes some country considering to use plain package policy to increase smoker's health attention and drive quit smoking behavior. Using plain package can drive smokers more focused on health warning messages labeled on the package. To test the plain package effectivity than regular ones, we plan on comparing them. Comparing types of packaging policy conduct to test the significant difference between them. As preliminary research, the behavioral objective of this paper is increased a significant difference between regular and plain package until below 0.05 at each item. The target groups are man or woman aged 20-50 y.o., live in Palembang, Indonesia and become active smoker at least one year.

## **METHODS**

### **Evidence of Citizen/Customer Orientation**

In this GPHW's study, we try to compare the significant difference between regular and plain package. There are two main factor compared, i.e. health awareness and quit attempt behavior (see table 1). Each factor contains several items related to smokers respond to GPHW on cigarettes pack. To measure the significant difference, we use 1 to 6 scale from disagreeing to

agree. Using Lemeshow's sampling methods, we use 200 samples to describe and test the variables.

We went to public space to find our respondent, which are a man or woman aged 20-50 y.o., live in Palembang, Indonesia and become active smoker at least one year. We use a questionnaire to help our enumerators to gain specific information related to smokers attitude, beliefs, and behaviors related to the new GPHWs package policy.

**Table 1: Smokers reaction related to health awareness and quit attempt behavior**

Factors	Statement Behavior
Health awareness	I start to look for information related to "Stop smoking"
	I start to look for information related to "Smoking consequence"
	I start to look for information related to "Healthy life"
	I start to avoid behavior related to unhealthy life
Quit attempt behavior	I have learned start to quit smoking
	I might quit smoking someday
	I will share information related to smoking consequence to others
	I have already stop activity related to smoking
	I have already reduced buying cigarette

Note: We use a questionnaire to gain information from active smokers when they are doing smoking activity in public space, such: as a cafeteria, canteen, bus shelter, etc.

As a mentioned before, Plain package policies have not yet been implemented in Indonesia so we use product prototypes to help respondents imagine if the policy has been implemented (see Figure 1). We want to propose plain package as a new approach to reduce smoker's intention to smoking activity, and finally, we want it can generate stop smoking behavior.

**Figure 1: Plain package product prototype (eg. Cigarette pack in Indonesia)**



Note: We design product prototype from the regular pack and cover the label with a sticker. We provide 3 type of product prototype, i.e. Mild, White and Straight (kretek) type.

### The Social Offering

We propose a social campaign based on plain package methods to maximize the effect. Our final goal is to reduce smoking behavior by increasing the health awareness and invite multiple parties to join us. Technically, we design moreover plain product prototype. To complete this action, we plan to create a sharing membership group contains ordinary people (smokers and non-smokers) and public health expert. In this group, we focus on giving care instead of lecturing them about personal health.

There is two-phase of campaign release, the first one related to “increase the smokers health awareness”, and the second one is about “the benefit after quit smoking”. The implementation of campaign design will be like this examples: “If you can’t stop right now, at least reduce your consumption” or “Better life after quit smoking”.

### **Engagement and Exchange**

In case to make intense communication, we use social media or internet messenger such as Whatsapp application to create conversation. Membership group contains active smokers and non-smokers will be created and may invite public health expert occasionally. In this group, we design interactive group contains not only active smokers but non-smokers and public health expert. We expect peer communication occurs between all of the members of the group. Just sharing, not judge about smokers activity. Non-smokers and public health expert expect sharing their daily benefit being life without smoke.

### **Competition Analysis and Action**

Actually, because of the plain package has not been implemented yet in Indonesia, we don't have a direct competitor who offers the similar value. But, in the sense of giving the same value on a different side, we can identify a few of them. On the official side, government plays important roles as a regulator. Their product is a general regulation related to the tobacco industry, health service, etc. And on the independent side, we have a community that concern against the smoking activity. They offer public education related to the negative effect of smoking, and generally they only available at the big city.

### **Segmentation and Insight**

In this study, we are focused on three segments and classified by light users, medium users, and heavy users. We classify our segment by a number of cigarette consumption, < 1 pack for light; 1-2 pack/day for the medium user, and > 2 pack/day for the heavy user. According to this study, segments composition shown: 49.5% light user, 45.5% medium user, and 5.0% are a heavy user.

### **Integrated Intervention Mix**

To achieve goals systematically, we design marketing mix approach strategy. Four dimensions of the marketing mix are designed as follows:

**Product:** We will design a few social campaigns as our product to amplify the plain package method. Our product such as "powerful word" to evoke our target market think about: negative consequence from smoking behavior and creates better life without smoking.

**Price (cost):** Using utilization of information technology, we want cost consumption as low as possible. But cost needs may vary, depend on a number of and type of communication. Physical material campaign object (such as print a t-shirt, banner, etc.) more costly than the virtual campaign.

**Place (convenience):** When we can identify a potential target audience, we want as close as possible to them. Physical and virtual communication design for convenience purpose. This messages exposure must be easy to reach and near of them.

**Promotion (integrated communication activity):** Ideally, we can use all of the promotional tools to amplify the effect of a marketing campaign. We will maximize communication through a mobile device (such as smartphone or tablet pc) and other promotional media (t-shirt, banner, etc.). However, the important things are to integrate all communication activity and complete each other with plain package policy.

### Co-creation through Social Markets

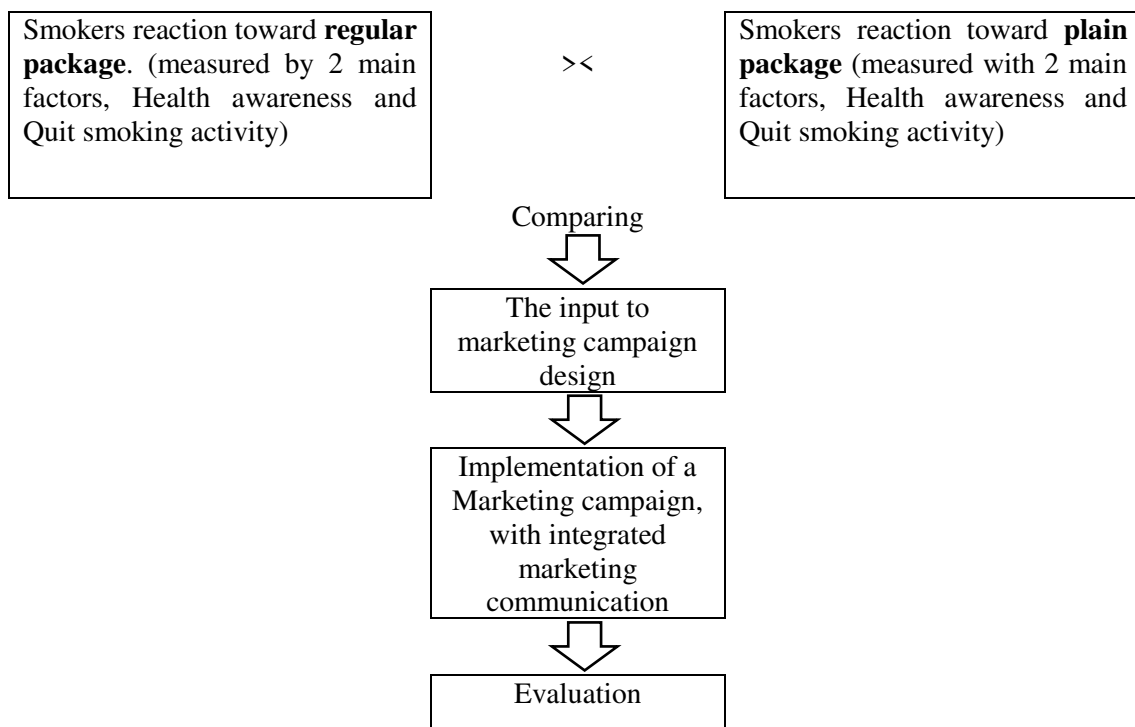
We are really focused to build a conversation about "how about the plain package?" and we want nonsmoker friends more care about others friend's health and help with a public health expert. Using WhatsApp application, we regularly communicate the new GPHWs plain package variant and measure the response. Each program contains two different themes. The first theme about "reduce your quantity" and second is about "better life after quit smoking".

### Systematic Planning

We start from find significant difference between smokers reaction at the regular pack and plain package. This reaction related to their health awareness level and tend to quit the smoking activity. We use integrated marketing communication theory to maximize the effect of the package and combine between personal and public media communication.

### Frameworks

**Figure 2: Study frameworks**



Note: First step is to comparing between regular and plain package, Marketing campaign design based on this findings become the second step. The third step is implementation and overall evaluation as a final step.

### Planning process

The first step is to prepare for gathering information from active smokers to comparing two type of package (plain and regular). Information gathered with a questionnaire from active smokers in public space. We ensure the validity of respondent with asking if he/she is an active smoker and smoking at least one cigarette/day. The filled questionnaire will be processed to initial report and use in campaign design. The second step is to launch campaign program. We plan to launch the program 2 times, and program evaluation held when the program is over. Implementation as a third step, and last overall evaluation conduct to get valuable feedback on the policy.

### Stages of monitoring and evaluation

We plan this program will be running in four months. This stages of monitoring are according to planning process with target, evaluation and time specific (see table 3).

**Table 3: Stage of monitoring and evaluation**

No	Activity	Target	Month				Evaluation
			1	2	3	4	
1.	Gathering information (comparing between regular and plain package)	200 resp./2 weeks	X				Completed
2.	Data processing and reporting	2 weeks	X				Completed
3.	Initial report	1 week		X			Completed
4.	First campaign design	1 week		X			-
5.	Implementation of #1 campaign	2 Weeks		X			-
6.	Evaluation	1 week			X		-
7.	Second campaign design	1 week			X		-
8.	Implementation of #2 campaign	2 weeks			X		-
9.	Evaluation	2 weeks				X	-
10.	Final report	2 weeks				X	-

Note: We plan to conduct two campaign programs, which will be conducted over the next 2 months.

## RESULT

Preliminary research was conducted to test the significant difference between plain and regular package. The result intended as an input to campaign material. To test the difference, two main factor such as health awareness and quit attempt behavior compared. They will answer the main question about "what do you think when viewing this pack?". There are total 9 items was compared and also two factors as an aggregate. Because of the plain package has not implemented, this study will measure smokers reaction to the product prototype. Result as the following table (see table 2 and table 3).

**Table 2: Preliminary Results (comparing regular and plain package)**

Statement Behavior (comparing between regular & plain package)	Mean		t-test value		
	Regular	Plain	t	Sig.	Conclusion
I start to look for information related to "Stop smoking"	3.67	4.25	-4.110	.000	Sign. diff.
I start to look for information related to "Smoking consequence"	3.76	4.23	-3.328	.001	Sign. diff.
I start to look for information related to "Healthy life"	4.03	4.27	-1.654	.100	Insign. diff.
I start to avoid behavior related to unhealthy life	3.89	4.14	-1.666	.097	Insign. diff.
I have learned start to quit smoking	3.75	4.31	-3.866	.000	Sign. diff.
I might quit smoking someday	4.16	4.39	-1.542	.125	Insign. diff.
I will share information related to smoking consequence to others	3.66	4.18	-3.571	.000	Sign. diff.
I have already stop activity related to smoking	3.55	4.21	-4.755	.000	Sign. diff.
I have already reduced buying cigarette	3.64	4.31	-4.565	.000	Sign. diff.

Note: Nine items related to health awareness and quit smoking behavior propose to smokers, we measure their reaction after comparing the pack.

**Table 3: Overall smokers perception about health awareness and quit attempt behavior**

Statement Behavior	Mean			T-test value	
	Regular	Plain	t	Sig. (2 tailed)	Conclusion
Overall smoker's perception about health awareness (comparing between regular and plain package)	3.8363	4.2200	-3.006	.003	Sign. diff.
Overall smoker's perception about quit smoking attempt behavior (comparing between regular and plain package)	3.7490	4.2760	-4.312	.000	Sign. diff.

Note: There are 2 main factors comes from 9 items. Health awareness contains four factors and Quit smoking attempt behavior contains 5 items. To compare the items, we use a 1-6 scale, from disagreeing to very agree

According to table 2, six from nine items has a significant difference to others. Smokers reaction at six items reflected their attitude to health awareness and quit attempt behavior. the items are (1) I start to look for information related to "stop smoking", (2) I start to look for information related to "Smoking consequence", (3) I have learned start to quit smoking, (4) I will share information related to smoking consequence to others, (5) I have already stop activity related to smoking, and (6) I have already reduced buying cigarette.

Besides the significant ones (still in table 2), there is three remain item has an insignificant difference. The items are: (1) I start to look for information related to "Healthy life", (2) I start to avoid behavior related to unhealthy life, and (3) I might quit smoking someday. In this case, smokers reaction were same to the package.

Material campaign: "hey we are plain now! is that makes you consider to find more information about it?"

To produce a marketing campaign material, we need more reliable information. This preliminary research developed and intend to create some powerful word and invite every smoker to share their bad habit experience. Evaluate to the project will be held as soon as possible

## Discussion/Conclusion

### Evaluation

This research is just only conducted as a preliminary research, we will wait until all ongoing marketing campaign program is over to made evaluation. To measure the behavioral effect, we design specific indicators to monitor the changing. We try to make participants database to record the data according to the specific indicator. This indicator such as:

- The number of consumption (per day)
- Amount of money allocated to smoke (per day)
- How many quit attempt occurs?

### Discussion

This program intends to make smokers more aware of their health through cigarette package. We can learn how to understanding smokers perception about smoking activity and how they perceived about cigarette pack. Focus in this study is to giving care and help smokers to leave their smoking activity through cigarette package policy. The very beginning of smoking activity start from buying a cigarette, that is mean they will get the message by seeing the package. That is why we are focused on this entry point.

In the future, we want to expand this program to the potential smokers. This segment is very important if we want to cut the link, which means reduce the number of new smokers. Potential

smokers referred to young people which who do not have mature enough to make a decision. Teenage has a very large curiosity about many things, include to trying a cigarette. Make them understand to "why do not try a cigarette" may prevent they become active smokers in the future.

## REFERENCE

- Lemieux, Olson, Nakajima, Schulberg, & al'Absi. (2016). Life adversity is associated with smoking relapse after a quit attempt. *Addictive Behaviors*, 60, 71–77. <http://doi.org/10.1016/j.addbeh.2016.03.017>
- Rundh. (2013). Linking packaging to marketing: how packaging is influencing the marketing strategy. *British Food Journal*, 115(11), 1547–1563. <http://doi.org/10.1108/BFJ-12-2011-0297>
- Thrasher, Abad-Vivero, Huang, O'Connor, Hammond, Bansal-Travers, ... Hardin. (2016). Interpersonal communication about pictorial health warnings on cigarette packages: Policy-related influences and relationships with smoking cessation attempts. *Social Science and Medicine*, 164, 141–149. <http://doi.org/10.1016/j.socscimed.2015.05.042>
- Tobacco Atlas. (2013). Indonesia Country Fact Sheet.
- Wolburg. (2008). Smoking cessation: why do smokers fail? *Journal of Consumer Marketing*, 25(2), 72–73. <http://doi.org/10.1108/07363760810858800>
- Zvolensky, Farris, Leventhal, Ditte, & Schmidt. (2015). Emotional disorders and smoking: Relations to quit attempts and cessation strategies among treatment-seeking smokers. *Addictive Behaviors*, 40, 126–131. <http://doi.org/10.1016/j.addbeh.2014.08.012>
- Zvolensky, Paulus, Langdon, Robles, Garey, Norton, & Businelle. (2016). Anxiety sensitivity explains associations between anxious arousal symptoms and smoking abstinence expectancies, perceived barriers to cessation, and problems experienced during past quit attempts among low-income smokers. *Journal of Anxiety Disorders*. <http://doi.org/10.1016/j.janxdis.2016.12.003>



**Attachment: Preliminary study documentation**

