

Health Education Exposure and Subjective Norms Influence on Female's Intention Early Detection of Cervical Cancer by Visual Inspection of Acetic Acid (AVI) Method

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ABSTRACT

Cervical cancer can be detected early using the AVI method. The accuracy of this test is up to 85%. The attention of productive age women and her surrounding environment to access early cervical cancer detection was relatively low. The study aimed to determine the association between health education exposure and subjective norms to the intention of early detection of cervical cancer. Observational study with cross sectional methods included 93 females as respondents. The data was collected using a set of questionnaire. Health education exposure and subjective norms had proven to be the factors that affected women to take cervical cancer early detection through the AVI method (p-value < 0.05). Creating a supportive environment would give great motivation for women to access the cervical cancer screening program.

Keywords: Health education, Subjective norms, Intention, Cervical cancer, AVI.

1. INTRODUCTION

Cervical cancer is one of the serious health problems experienced by women all over the world. The incidence of cervical cancer in the world in 2012 was 14.1 million, while in 2013, there were 98,692 cases spread across 33 provinces of Indonesia [1]. Cervical cancer is also a cause of death of productive age women caused by Human Papilloma Virus (HPV) types 16 and 18 [2]. Many factors contribute to the occurrence of cervical cancer, such as, too early sexual intercourse, childbearing intensity, sexual behavior, personal hygiene, and smoking behavior. In Indonesia, every 1-hour women die of cervical cancer. Cervical cancer is one of the cancer that can heal if prevention is done early [2].

Early prevention of cervical cancer can be through HPV immunization which can prevent 85% of the potential for cervical cancer than it can be through early detection of cervical cancer. Early detection of cervical

cancer has two methods, namely AVI (Visual Acetate Inspection) and Pap smear. AVI examination in Indonesia still tends to be low. In 2016, the AVI program achievement was far from the national target. Every year, the AVI examination target at Surabaya was not fulfilled. The percentage of women who had done AVI examinations was only 50% [3].

The low level of AVI examination is caused by a lack of knowledge, the spread of examination information and is still considered a terrible examination so they are afraid to carry out AVI examinations. Other obstacles such as the lack of exposure to health education about cervical cancer in women of childbearing age and lack of knowledge of their husbands or less concerned about people around women who do not support women to conduct AVI examinations [4]–[8].

Health promotion efforts can be through the provision of health education to increase public knowledge to prevent and maintain their health [9]. The

scope of health promotion also includes health policy, creating an environment supports, strengthens community action, develops individual skills, and is oriented towards health services [10]. Health promotion is also one of the primary prevention efforts towards infectious and non-communicable diseases through health education. One type of non-communicable disease that can be done with primary prevention is cervical cancer [11].

Analyzing one's intentions to do something can be identified using the Theory of Planned Behavior (TPB), in TPB there are 3 indicators namely attitudes, subjective norms, and perceived behavioral control [6], [12]. Concerning the obstacles in the women's environment, it is important to analyze the subjective norms of women about early detection of cervical cancer through the AVI method. The purpose of this study was to analyze the effect of health education exposure on cervical cancer and subjective norms on women's intention for early detection of cervical cancer through the AVI method.

2. METHOD

This research used a quantitative approach with a cross sectional design. Respondents who participated in this study were 93 females in the working area of Tambakrejo Community Health Center Surabaya City which selected by a simple random sampling technique. The research instrument used questionnaires containing questions about control beliefs and perceived power. The data were analyzed by using logistic regression with the help of the SPSS 22.0 application.

Data on health education exposure, subjective norms, and intention females in early detection collected using self administrated questionnaires. Questionnaires developed by the researcher using closed questions with four choices of answers (strongly agree, agree, disagree, and strongly disagree). Before given to the respondents, the questionnaire tested for validity and reliability. All questions were valid and reliable based on the Pearson Product Moment and Alfa Cronbach test. Data analysis assisted by the application SPSS 22.0.

3. RESULTS

From the research that had been conducted, the health education exposure respondent about cervical cancer was reviewed at Table 1. It showed that most of respondents had exposed cervical cancer health education (56.98%), while unexposed respondent was 40 people or 43.02%.

Table 1. Result health education exposure about cervical cancer

Health Education Exposure	n	Percentage (%)
Exposed	53	56.98
Unexposed	40	43.02
Total	93	100

Respondents got the health information regarding cervical cancer from many resources. Most of respondents answered health workers as their main resource for getting cervical cancer information (37.7%), 28.3% of respondents got cervical cancer information from community health workers, 11.3% of respondents said television as their main resource, and others respondents got cervical cancer information from internet (9.5%), friends (7.6%), and book (5.6%) (Table 2).

Table 2. The health education resources of cervical cancer

Health Education Resources	n	Percentage (%)
Health workers	20	37.7
Community health workers	15	28.3
Friends	4	7.6
Television	6	11.3
Internet	5	9.5
Book	3	5.6
Total	53	100

The result of logistic regression on health education ($p = 0.016$; $p < 0.05$) indicated that health education was factor influencing female intention take cervical cancer early detection through AVI method. Females who exposed health education about cervical cancer have a positive intention to take cervical early detection by AVI method 3.375 times compared with females who unexposed health education about cervical cancer (OR 3.375) (Table 3).

Table 3. Health education exposure influence to cervical cancer early detection intention

Variable	β	Sig.	OR
Health education exposure	1.216	0.016	3.375

The scoring of the subjective questionnaire was categorized based on subjective norms of respondents with good and sufficient category (Table 4).

Table 4. Health education exposure influence to early detection intention of cervical cancer

Subjective norms	n	Percentage (%)
Good	63	67.8
Sufficient	30	32.2
Total	93	100

Table 4 explained that the respondent who had good subjective norms either amounted to 63 people or 67.8%, while those with sufficient subjective norms amounted to 30 people 32.2%.

Table 5. Intention of early detection of cervical cancer

Subjective norms	n	Percentage (%)
Good	74	79.5
Sufficient	19	20.5
Total	93	100

Table 5 explained that the respondent who had good intention either amounted to 74 people or 79.5%, while those with sufficient intention amounted to 19 people 20.5%.

Table 6. Subjective norms influence to cervical cancer early detection intention

Variable	β	Sig.	OR
Subjective norms	3.686	0.000	39.885

The result of logistic regression on subjective norms ($p = 0.0001$; $p < 0,05$) indicated that subjective norms was a factor influencing female intention take early detection of cervical cancer through AVI method. Female who had good subjective norms have a positive intention to take early detection of cervical cancer through AVI method 39,885 times compared with female who having sufficient subjective norms ($OR = 39.885$).

4. DISCUSSION

Health education exposure can be obtained from anywhere, when the mother searches for information on her own via the internet, is exposed to television media, print media, and from counseling conducted by health workers. Not only limited to that, but exposure to information can also be obtained by respondents from closest people such as husbands, as well as neighbors

who have had experience checking themselves through the IVA method.

In this study, most of the respondents had been exposed to information about cervical cancer and early detection of cervical cancer through the AVI method. Exposure to information will also affect knowledge so that it will affect women more or less to decide to examine themselves or not.

The source of information obtained can be through various mass media, both printed and electronic, so various information can be received by the community so that someone who is more often exposed to mass media will get more information and can influence the level of knowledge he has. The highest source of information obtained by respondents was from health workers.

Lawrance Green, in his theory, says that health workers are a driving factor or reinforcement for someone doing a behavior [9]. Based on the results of interviews with several community health workers who have the closeness to health workers already have experience of having a self-examination with the IVA method conversely, the respondents who have the closeness to the community health workers also have experience checking themselves through the IVA method.

Messages or information provided by the media can cause different interpretations in each community that is following with their culture. If individual perceptions change when looking at the information shown by the mass media, then the nature of the interpretation has emerged in the community. The positive or negative perspectives that someone receives from information media depends on the way they use the media, the media that is used well then produces positive values[13].

Subjective norms can be defined as the manifestation of individual perceptions on the views of people who influence their lives or (significant others) about an action taken or not a behavior. This perception is subjective so that it is referred to as a subjective norm. Subjective norms concerning behavior are influenced by beliefs [6], [10].

Subjective norms can be seen as the dynamics between push impulses perceived from the people around him with the motivation to follow their views in doing or not doing this behavior.

Subjective norms are beliefs that are influenced by the opinions of people in the surrounding environment. Two components determine subjective norms are normative beliefs and motivation to comply. The research shows that respondents who have good subjective norms are more compared to sufficient subjective norms [6], [12]. Ajzen and Fishbein theory

states that subjective norms are an impulse from the social environment that is considered influential and good for her but in her social environment such as society, opinions of parents, husbands, teachers, health workers, neighbors are not necessarily those that are related to supporting or does not support certain behaviors to do [7]. In connection with the results of the study, it means that the motivation and support of people in the environment around respondents such as husbands, parents, about health workers are still lacking in efforts to prevent cervical cancer through early detection of cervical cancer in the IVA method.

The role of the husband who is the head of the family is very important to decide their wife's attendance on cervical cancer screening. The research area still has a culture where the husband is the highest position in a family and will influence the taking of skills to conduct AVI examinations.

The neighbor's or friend's role is also important, because when a neighbor or friend has done an IVA examination before, then provides information about AVI examination and invites them to have a self-examination, it will affect women in making decisions to go through the AVI method.

The role of officers in providing education and information about the early detection of cervical cancer through the AVI method is equally important. Health workers are the spearhead in the development of public awareness of health, especially regarding cervical cancer. Providing counseling through Posyandu, Family Welfare Empowerment associations or in Bahasa called PKK, recitals, and cadre meetings can be carried out regularly to the community. Information exposure is the delivery of information or counseling that respondents have received in their environment.

If the respondent (woman) feels that it is her right to determine what she will do and can be determined by other people around her, then she will feel that the person's view of the behavior that she is about to do is appropriate, so that it will cause the intention to do the examination. If an individual feels it is his right to determine what he will do and can be determined by others around her, then he will feel that people's views of the behavior he will do are appropriate, so that raises the intention to carry out early detection of cervical cancer through the AVI method [6], [12].

Respondents who have an adequate support network (friends, family or trustees), this will affect the awareness of individuals if they feel they have a disease, then the individual will seek health services, besides support from the social support network will support individuals to be healthier [10].

The intention of respondents in this study was dominated by good intentions for early detection of cervical cancer through the AVI method. The better the

woman's intention, the higher the possibility of early detection of cervical cancer through the AVI method.

Individual behavior can be influenced by several factors including parents, teachers, siblings, and peers as learning or consideration in carrying out a behavior. This social environment will shape the perceptions of a person and can be used as a benchmark for carrying out a behavior.

The intention is the most important determinant of behavior. Strong or weak intentions are determined by the extent to which a person has a positive attitude to behavior and the degree to which someone chooses to do this behavior [5], [6].

5. CONCLUSION

There is an influence of information exposure and subjective norms on the women's intention of early detection of cervical cancer in the working area of the Tambakrejo Public Health Center in Surabaya.

ACKNOWLEDGMENTS

I am highly thankful to all people who have helped this research and publication process.

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