

UNDERSTANDING AND ACCEPTANCE OF COVID-19 VACCINE AMONG YOUNG WOMEN: A QUALITATIVE STUDY

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Abstract

Although Malaysia has launched an immunization campaign for Malaysians, there are still some who try to dispute the validity and legality of the vaccine. Apart from that, there are also Malaysians who do not believe in the effectiveness of the vaccine and are afraid to take it voluntarily. This initial survey study was conducted involving eight women participants (Malay, Indian, Chinese) aged between 18-35 years old who worked in the public and private sectors. The influence of cultural diversity and religious beliefs, and the implementation of health communication campaigns by governments and states on the effectiveness of Covid-19 vaccine has provided diverse and interesting insights especially in the information sources used by participants to gauge the level of understanding and perception on the effectiveness of the Covid-19 vaccine. This study aimed to (i) to explore the understanding of young Malaysian women on health communication campaigns related to the Covid-19 vaccine. (ii) to review the sources of information used by study participants in obtaining information related to the vaccine and Covid-19 (iii) to explore the attitudes of study participants towards their acceptance of Covid-19 vaccine. This preliminary study used qualitative data collection methods through in-depth interviews. The study found that the majority of participants obtained information sources related to vaccines and Covid-19 through social media compared to the major mass media such as television, radio or newspapers. Malaysian women are very concerned about their families and decision to receive the Covid-19 vaccine can pose a dilemma to them.

Keywords: *Health Communication, Covid-19 Vaccine, Preliminary Survey of Young Malaysian Women*

1.0 Introduction

The world has witnessed changes towards a new normal as a result of the Covid-19 pandemic. Covid-19 has become a major threat to human life worldwide. It spread so quickly and had infected thousands of people in the first week it was discovered. On January 30, 2020, the World Health Organization (WHO) stated that a coronavirus outbreak had caused a global health emergency. On March 11, 2020, the WHO declared Covid-19 a global pandemic. The whole world is affected by a pandemic that has had a huge impact on the economy, society and has transformed ordinary life into a new norm. In Malaysia, the total daily amount recorded was 363,940 as at 13 April 2021 (Ministry of Health Malaysia, 2021)

Malaysia has received the first batch of Covid-19 Pfizer-BioNTech vaccine which arrived at Kuala Lumpur International Airport (KLIA) via flight MH604 at 10.00 am on 21 February 2021 (Adnan, 2021). Major local media channels as well as social media provided extensive coverage on the arrival of the vaccine in Malaysia.

Prior to the arrival of the vaccine to Malaysia, media channels including social media and alternative media in Malaysia were flooded with information related to the effectiveness of the vaccine. According to the Director General of Health, Tan Sri Dr Noor Hisham Abdullah, every decision made by the Ministry of Health (MOH) relating to Covid-19 is based on scientific evidence including looking at the third phase study of each vaccine. The public is advised to get authentic views and information regarding Covid-19 vaccine from experts (Ruzki Mat, 2021). However, there are those who do not wish to get vaccinated and that can influence others and this group is called the anti-vaccine group (Bernama, 2021). The Malaysian government has requested the public to assist the government in disseminating information on the importance of this vaccine and combat the perverse propaganda of the anti-vaccine group (Azmi Tarmizi, 2021).

2.0 Problem of the Study

Health communication plays a role in determining an individual's health status aside from the individual's physical activity behaviour, diet and lifestyle. Since most diseases stem from human lifestyle practices, health communication has a big role in conveying a variety of information so that individuals can practice healthy habits and have good levels of health (Rimal & Lapinski, 2009).

According to Bandura (2001), the first step in health care and disease prevention is through the input of information that will trigger knowledge to bring about changes in attitudes and lifestyles of individuals. According to Loken and Hornik (Wakefield et al., 2010), health communication has an important role to assist in the process of information transfer from health authorities to the general public. The importance of health communication is also supported by UNICEF (2005), which states that good health programs will help to achieve public health goals.

Although health communication campaigns have conveyed much information about the importance of health care, the expected changes in health behaviours are too small (H. et al., 2009; Snyder et al., 2004). Not all information conveyed by health communication campaigns are accepted by the public and used to change health practices (Pasick & Wallack, 1990).

A study by Su et al. (2020) titled "A race for a better understanding of Covid-19 vaccine non-adopters" has underscored the need for a deeper understanding of the subtle differences between vaccine users. The availability of a vaccine does not translate into its de-facto use, a phenomenon that may be more pronounced in "Operation Warp Speed"-it is important for public health professionals to fully understand their "customers" (i.e., end users of Covid-19 vaccine) to ensure satisfactory vaccination rates and to protect the society at large. "Operation Warp Speed" refers specifically to the American Covid-19 vaccine program, i.e., speed has been the focus (Mullard, 2020), for most programs since the Covid-19 vaccine was first approved.

Although Malaysia has launched an immunization campaign for Malaysians, there are still some who try to dispute the validity and legality of the vaccine (Ismail Sualman, 2021). In addition, there are also Malaysians who do not believe in the effectiveness of the vaccine and are afraid to take it voluntarily. The information channelled to them is disputed for its authenticity and is said to have been manipulated at the source by the local media (Hasimi Muhamad, 2021). In addition, the Ministry of Health Malaysia (MOH) has warned any party who does not agree with the Covid-19 vaccination to not run a campaign to reject the injection.

Malaysian women have a more cautious attitude in receiving the vaccine as they have children and husbands to take care of. A report by Reuters has informed that pregnant women are at high risk of developing severe Covid-19 infection and many public health officials recommend pregnant women involved in high-risk employment sectors to get vaccinated despite its unknown safety level.

A study by Bunders and Altfeld (2020) stated that studies from other viral infections have shown that females can mount stronger immune responses against viruses than males. Emerging knowledge on the basic biological pathways that underlie differences in immune responses between women and men needs to be incorporated into research efforts on SARS- CoV-2 pathogenesis and pathology to identify targets for therapeutic interventions aimed at enhancing anti-viral immune function and lung airway resilience while reducing pathogenic inflammation in Covid-19.

Therefore, the National Institute of Health of the United States (US) urges that a thorough study be done on the effects of Covid-19 vaccine on pregnant women and those who are breastfeeding (Adlinahani Khalil, 2021). A study by Gray et al. (2021) proposed that when considering vaccination during pregnancy, evidence on maternal and foetal benefits, as potentially harmful to mother and foetus and the impact of pregnancy outcomes should be carefully considered. It is because the risk of Covid-19 is severe to pregnant women and the pregnancy. This study aims to identify the extent of understanding and factors of acceptance of the Covid-19 vaccine among young working women.

3.0 Objectives of the Study

This study focused on young women (aged between 18 to 35 years old) in Malaysia because their level of understanding related to vaccination differ from other age groups of women based on their experience, health and lifestyle.

- i. Exploring young Malaysian women's understanding of Covid-19 vaccine-related health communication campaigns
- ii. Review the sources of information used by young women on the Covid-19 vaccine
- iii. Identify young women's acceptance of the Covid-19 vaccine

4.0 Framework of the Study

In the context of public health campaigns, several commonly used models are such as the Health Belief Model (Becker et al., 1974), Causal Action Theory (Fishbein, 1967) and Planned Behaviour Theory (1985). In general, these models assume that individuals make decisions based on rational principles in which there is a sequence of relationships between demographic factors, attitudes and behaviours.

Yet public health communication strategies in many cases do not show the impact of the expected health behavioural change. Moges and Amberbir (2011) have surveyed the willingness of pregnant women to undergo voluntary HIV screening tests to prevent HIV/ AIDS (Human Immunodeficiency Virus/ Acquired Immunodeficiency Syndrome) infection from pregnant mothers to unborn children. The study involved a total of 418 pregnant mothers who attended antenatal sessions and was followed by four focus group discussions as well as five in-depth interview sessions. The results of the study showed that most women had a very low risk perception and a high barrier perception to undergo a voluntary HIV blood test. This situation does not encourage respondents to seek HIV screening testing services. Based

on the models and theories mentioned below (figure 1), the conceptual framework of the study is designed to unravel the findings of this research study.

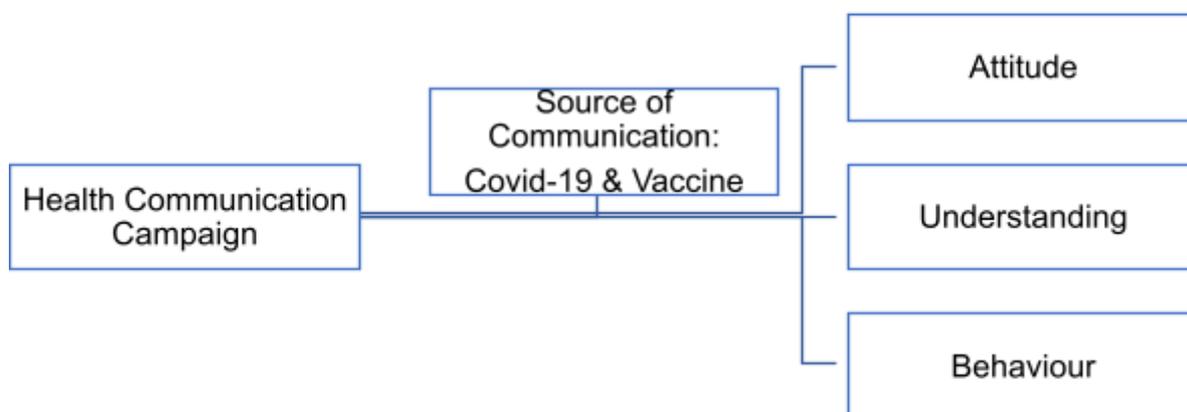


Figure 1: The conceptual framework of the study was adapted from the Health Belief Model (Becker, Drachman, & Kirscht, 1974), Causal Action Theory (Fishbein, 1967) and Planned Behaviour Theory (1985)

5.0 The Role of Covid-19 Related Health Communications

When the Movement Control Order (MCO) was announced, the official media played a role in providing status updates and reports related to the MCO and urged all individuals across the country to stay home, reduce unnecessary travels, practice personal hygiene, and maintain social distance throughout the period. Strict enforcement has increased adherence to the MCO in the second and third phases (Zolkepli, Farik, 2020).

Tang (2020) did a study on brief communication which aims to provide an overview of the measures taken by the Malaysian government in response to Covid-19 and the effectiveness of the MCO. The findings of his study were that at the onset of the Covid-19 outbreak, Malaysia had initiated travel restrictions and quarantine; but with the continued increase in new cases, the MCO was launched on 18 March 2020, requiring the closure of all businesses except those providing essential services and goods. Enforcement of the order was progressively tightened, resulting in a significant increase in compliance, while other interventions such as the detection of potential contacts and medical examinations were underway, and the media continued to provide up-to-date information and general advice. The number of new and active Covid-19 cases began to show a clear declining trend beginning mid-April, thus demonstrating the effectiveness of the MCO and its compliance.

A study by Ismail Sualman (2020) stated that the most affected due to COVID-19 were 17.5% closing of businesses for three months, followed by 16.1% of income affected by half and layoffs (9.1%). The rest were traders who incurred rental payments (8.6%), incurred debts (7.5%), losing a job (7.3%) and working from home (5.1%). The most significant impact was on businesses as they had to close their businesses for three months to comply with the MCO directive from the government. This contributes to other effects such as layoffs and rental burdens as well as incurring high debts. Respondents were also asked what measures they thought were necessary to address the impact of the Covid-19 outbreak in Selangor. The majority of respondents agreed that they need to change their business strategy (11%), run an online business (12.5%), renovate their business (12.1%), find new opportunities (12.5%), create joint ventures (10.9%) and find new marketing approaches (12.5%). These are appropriate methods and steps in doing business in a new normal at this time. They need to change the way they work and adapt to

current changes, especially in the digital world to ensure the survival of their businesses and jobs. This is to make sure that they would be able to absorb the economic impact on their business and employment.

A study by Paul et al. (2021) titled “Attitudes towards vaccines and intention to vaccinate against Covid-19: Implications for public health communications” that was conducted on 32,361 adults in the UCL Covid-19 social study found that 6% of respondents showed a high level of distrust about vaccines in one or more domains. Distrust of vaccination is higher among individuals from minority ethnic backgrounds, with lower levels of education, lower annual incomes, poor knowledge of Covid-19, and poor compliance to government Covid-19 guidelines. Overall, 14% of respondents reported not being willing to receive the vaccine for Covid-19, while 23% were unsure. The whole study shows negative attitudes towards vaccines which is a major public health concern in the UK.

General distrust of the vaccine and concerns about future side effects in particular will be barriers in achieving population immunity to Covid-19 through vaccination. Public health messages should be tailored to address this issue and specifically to women, ethnic minorities, and people with lower levels of education and income. Harapan et al. (2020) conducted a brief online survey in Indonesia between 25 March - 6 April 2020. The study found that among 1,359 respondents, 93.3% of respondents (1,268 / 1,359) wanted to be given vaccines with 95% efficacy, but the acceptance was only 67.0% (911 / 1,359) for vaccines with 50% efficacy.

The acceptance of Covid-19 vaccine in Indonesia is influenced by the efficacy of the vaccine. If the Covid-19 vaccine has lower efficacy, the Indonesian government should introduce more strategies including health communication to convince their population to be vaccinated. This is because knowledge about vaccination for Covid-19 and the associated risks are important in reducing perceived risks in the community.

6.0 Study Methodology

This study selected samples by purposeful sampling, assisted by criterion-based selection and utilized theoretical sampling. In this study, the sample was chosen deliberately because it has characteristics that show a lot of information, details and in-depth understanding of the problems and questions. The samples should be able to provide answers to the objectives of the study. The sample should also take into account the diverse factors that exist in the hope that it will have a diverse effect on the data to be obtained (Ritchie, Lewis, & Elam, 2003).

Theoretical sampling process means that the initial process is similar to other types of sampling, which is to select participants who meet certain criteria so that it is able to produce information-rich data. However, the number of participants or the sample was not determined at the initial stage of the study. This technique was first pioneered by Glaser and Strauss (1967) in Cannon (1998).

It means a process of data collection to generate a theory in which the process of analysis is made by one sample to another sample continuously. The data obtained from the first sample will determine the criteria of the next sample. If the data obtained are still insufficient for the purpose of generating and completing the theory, then the next sample will be selected and analyzed.

This process runs continuously until the selected samples produce data that can generate a theoretical development, or form a new hypothesis. After the data is collected continuously and theoretical constructs are increasingly emerging, the isolated cases that deviate (negative-case selection and discrepant-case selection) can be excluded from the results of the study.

6.1 Selection of Study Participants

Participants for this study were also selected using purposive sampling but below the maximum variation type as well as through a critical sampling process as described previously. Maximum variation sampling means that although the selected sample is small, it is selected from various characters so that

the results of the study are diverse (Meriam, 1998). Participants consisting of an audience of adolescents were selected based on several criteria (criterion-based selection) as follows:

- i) Women must be between 18 to 35 years old
- ii) Consists of Malay, Chinese or Indian.
- iii) Have high level of education and understanding of scientific terms
- iv) Willingly and voluntarily participate in this study

6.2 Research Instruments: Researchers as Instruments

The ‘instrument’ of this study is the researcher himself. This is because the researchers themselves are involved in all data collection processes from the beginning, namely tracking the field until the last activity in the field. According to Morse and Richards (2002), the role of researchers as research instruments is that they create data on events related to their research problems and questions. Data is in the self (insight) of the human being or events or materials that are the focus of the study.

6.3 Pre-Test

A first in-depth interview with Malay adolescent women was the pre-test interview. It was handled by the researcher himself. Audio and visual recordings were made and the recordings were transcribed and analyzed to see whether the questions posed and the contents of the discussion were sufficient to answer the problems and research questions. After doing the analysis, it was found that the data were sufficient to answer all the questions of this study. The one-hour interview managed to produce themes that were able to answer all the problems and research questions. Therefore, the data for this pre-test group were also used for the actual study. No corrections had to be made to the interview protocol. Extra care was exercised when conducting actual interviews.

6.4 Data Collection and Analysis Process

The technique of collecting data for this study was by interview or in-depth interviews. A total of eight participants were involved in the study and the theoretical sampling process was used to determine the number of participants involved.

TABLE 1
Background of Study Participants

Participant	State	Academic Level	Course	Race
P1	Selangor	Degree	Information Technology	Chinese
P2	Sarawak	Master	Education	Indian
P3	Selangor	Degree	Business	Malay
P4	Perak	Degree	Education	Malay
P5	Johor	Diploma	Marketing	Malay
P6	Selangor	Degree	Accounting	Chinese
P7	Negeri Sembilan	Diploma	Public Administration	Malay
P8	Putrajaya	Degree	Civil Engineering	Indian

Immediately after the completion of the data collection process for the first group, the data were transcribed with the help of audio and visual recording materials. At each completion of the collection and transcribing process, the data were analyzed using the constant comparative method. Themes and categories were formed based on the research questions.

6.5 Validity and Reliability Strategies

To obtain internal validity, a peer examination strategy was used. In order to obtain external validity, a detailed and information-rich report or rich and thick description was done. Detailed reports were provided in the study design section up to the data analysis process. The reliability strategy for this study was achieved through the trail audit method.

This qualitative study used interviews conducted in Malaysia involving eight participating young women (Malay, Chinese, Indian) aged between 18 to 35 years old who worked in the technology, education and business sectors in Selangor, Perak, Negeri Sembilan, Putrajaya, Johor and Sarawak. Cultural diversity, religious beliefs and the implementation of health communication campaigns by the government and states on the effectiveness of Covid-19 vaccine and Covid-19 prevention have provided diverse and interesting insights especially in the information sources used by participants to understand the effectiveness of the Covid-19 vaccine.

In addition, information related to Covid-19 and the vaccine were obtained from various sources and the information received by them have led to the attitudes and behaviors of the participants towards the national immunization campaign program and the effectiveness of the vaccine.

The use of this method is to capture highly descriptive data on how people think and behave. Therefore, an average of 90-minutes of actual interviews were used to explore understanding, attitudes as well as review sources of information related to Covid-19 and their acceptance of the vaccine. Analysis of the interview data as primary data involves systematic processes such as preparation of field notes and transcripts, coding, tracking and constructing of main themes, constructing of sub-themes and sub-sub-themes (Welman, Kruger & Mitchell, 2005).

Researchers should be open in the formation of this theme. The data released in the form of transcripts will then be formed into verbatim data. This verbatim data is entered in Atlas Ti 10 computer software to detect the main themes and sub-themes involved and the analysis used is thematic analysis (Othman Talib, 2019). This preliminary survey study was conducted from 22 February 2021 to 15 March 2021 in person and online using the Google Meet application.

7.0 Results of the Study

Study participants were eight young, working women and their identities were kept secret to protect their rights to their personal views and privacy. The results of this study were divided into four main categories, namely (i) women's understanding of Covid-19 and vaccines (ii) behavior towards vaccines (iii) communication sources related to Covid-19 and vaccines (iv) selection of information sources which are vaccine-related.

7.1 Women's Understanding of Covid-19

Overall, the participants knew the concerns about Covid-19 and also understood the need for vaccines as a measure of prevention and control of this disease (P1, P3, P5, P6, P7, P8). Among the matters related to Covid-19 was the cause of the disease, the effect of this disease on society and the symptoms of the disease. The themes for this category are as in Table 2.

Among others, this study found that the participants complied with the government's move regarding a new normal, namely the Movement Control Order (MCO) as well as Standard Operating Procedures (SOPs), which are procedures that must be followed for preventive measures. They also acknowledged that they understood the need for control of movement and physical and social distancing, the need to use face masks in crowded places and the use of hand sanitizers from time to time (P1, P2, P4, P6). They also understood that people need to comply with the Movement Control Order which was in effect until 31 March 2020 to curb the pandemic. These control measures involve strict procedures and

controls placed under the National Security Council (NSC) which requires all parties to be highly committed.

At the same time, the participants of this study also complied with the instruction to stay at home (P1, P2, P3, P4, P5, P6, P7). Something that has never been experienced before was when offices, schools and non-essential business and industrial activities were not allowed to operate during the MCO. People who fail to comply with the MCO's directives can be imprisoned.

They also said that quarantine does not mean not doing anything to increase productivity. Working from home has become a new normal and this is a good time to focus on work while strengthening family bond and mutual love at home (P2, P4, P8).

TABLE 2
Covid-19 Understanding Category Themes

Themes
<ol style="list-style-type: none"> 1. The increase in cases from time to time is frightening. 2. A lot of misleading information especially in social media. 3. Lots of fake news about Covid-19. 4. Covid-19 causes a lot of job losses. 5. Covid-19 caused businesses and factories to close. 6. Covid-19 caused the economy to suffer. 7. Increased online sales during Covid-19. 8. Coronavirus (CoV) is a type of virus that can cause respiratory tract infections. 9. The latest coronavirus found in China is Coronavirus 2019 (Covid-19). 10. Coronavirus infection can cause a spectrum of symptoms from the common cold to severe pneumonia. 11. The mode of transmission of Coronavirus (Covid-19) has not yet been identified. However, human-to-human transmission has been confirmed to occur. 12. People are advised to always be vigilant and practice good personal hygiene. 13. Wearing a surgical mouth-and-nose mask or 3-ply face mask is recommended as it helps reduce the spread of the virus and is more practical for use by the general public. 14. It is to prevent the exposure of others to the drops and splashes of saliva of people who wear this mouth-and-nose mask. 15. Symptoms of Covid-19 pneumonia are fever, cough and difficulty breathing. 16. In the early stages there is no specific treatment or antiviral drug for Covid-19 infection. 17. Treatment is given only to alleviate the symptoms experienced by the patient. 18. Covid-19 has the potential to cause severe illness and death, especially in the elderly and people with health problems or low immune systems. 19. Citizens must obey government directives for Covid-19 control. 20. Need to comply with SOPs. 21. Stay at home. 22. Control by authorities. 23. No cross-county and state. 24. New Normal Relook Reset. 25. Know what should be done in daily life during MCO. 26. Quarantine, work from home. 27. Administrative and industrial operations came to a halt. 28. Houses of worship also cannot be visited during MCO. 29. There are still those who are stubborn and disobedient to instructions. 30. Stay away from Covid-19 infection sites as they are dangerous. 31. The process of Covid-19 mutation needs to be taken into account. 32. The Covid-19 effect causes fear of facing the public.

For them, this is also the time for them to reset, relook and review all the work that was delayed due to time constraints (P1, P3, P6). They also said that they could increase family activities, repair minor damages, or review tax documents and conduct bill payments online (P7, P8). A lot of backlog work can be done at this point. For those who were instructed to work from home, the priority is to do the task as though they were working in the office. They need to adhere to best practices in civil service or in any other profession. Productivity must be prioritized in any situation (P2, P4, P5).

For some participants, the announcement made by the Prime Minister for a lockdown or partial curfew was not a curfew or full or complete lockdown (P2, P5, P7, P8). They were also aware that the action taken by the Malaysian government in the MCO created difficulties to daily lives (P4, P5). This action must be taken by the government to curb the spread Covid-19. Participants said that the Covid-19 pandemic has increased the workload for women at home (P1, P2, P3, P5, P6). The workload for women has tripled, including earning a living for the whole family. It turns out that Covid-19 has affected a large number of family incomes and women have played a role in helping to earn a living for survival.

7.2 Understanding Vaccines

Overall, the study showed that the participants had varying levels of understanding about the vaccine and they needed to get the details from time to time. The themes that arose in the interviews are as in Table 3. Among others, the theme of this study says that the use of authentic information related to vaccines are necessary (P1, P2, P5, P4). Based on the findings of this study, it was found that information on vaccines can be disseminated to their families (P2, P3). Study participants understood that not taking the vaccine could endanger one's self and could be fatal (P1, P2, P3, P4, P5, P6, P7, P8).

TABLE 3
Vaccine Understanding Category Themes

Themes
<ol style="list-style-type: none"> 1. Covid-19 vaccine is given to control the transmission of Covid-19 disease. 2. More and more people receiving the vaccine will form antibodies and in turn reduce the likelihood of more severe Covid-19 effects. 3. Indirectly it can protect at-risk groups who are not eligible for vaccination. 4. All eligible Malaysians over the age of 18 can receive the Covid-19 vaccine. 5. Priority is given to frontline personnel, those who are at high risk of getting Covid-19 infection such as the elderly, patients with medical problems such as heart patients, diabetes, high blood pressure, asthma, cancer and so on. 6. Vaccines are not necessary for those with a history of hospitalization as a result of severe allergies. 7. Those who experienced a severe allergic reaction after receiving the first dose of a particular brand of vaccine; and have a severe allergic reaction to any vaccine that has been received before do not need to take the vaccine. 8. Those who are pregnant; or are breastfeeding are not recommended to take the vaccine. 9. As a whole, the participants agreed to take the vaccine except for the problematic ones. 10. But some also consider vaccines as scary. 11. Vaccination is not mandatory for all Malaysians 12. Those who want to get the vaccine must register with MySejahtera. 13. Need to help those who do not have access, especially in the interior. 14. There are still doubts about the source of the vaccine which is said to be not halal. 15. Vaccines can be given first to prisoners as an experiment. 16. Take the necessary vaccines to move freely. 17. The vaccine causes the rate of Covid-19 virus infection to be low. 18. Taking the vaccine can boost self-confidence. 19. Vaccines do not guarantee safety. Still need to comply with SOPs.

They understood that vaccines do not guarantee absolute immunity and still need to adhere to SOPs and observe hygienic practices. The level of understanding of the vaccine was good and the majority of the participants understood the need to get vaccinated. Two participants did not understand the vaccine and one participant was uncertain (P6, P4). This is because there is so much information about vaccines that it becomes confusing to them.

7.3 Behaviour Towards Vaccines

Several of the study participants agreed that all citizens should receive the vaccine because they understand that the vaccine is important to improve personal and community immunity (P4, P5, P6, P8). The participants were also impatient to receive the vaccine and were positive to receive it (P1, P2). However, some netizens have distorted the news and channeled unauthentic information as well as the

existence of anti-vaccine groups causing some study participants to "wait and see" and do not agree to take the injection (P3). When this happens, it causes diverse behaviors among study participants between the positive, uncertain and negative lines. This is also partly out of fear of the risks (P1). A person may choose not to take the vaccine because they are breastfeeding (P3). However, the study participants suggested that the vaccination should be mandatory for all Malaysians except those with high risks.

TABLE 4
Behavioural Themes Towards Vaccines

Themes
<ol style="list-style-type: none"> 1. Participants agree to take the vaccine. 2. Some participants did not agree to take the vaccine. 3. Comply with the instructions for receiving the vaccine. 4. The government should make vaccinations mandatory unless there are health problems. 5. Vaccination should be expedited. 6. Some participants sought authentic information about vaccines. 7. Vaccine references should be authentic and accurate. 8. Many can't wait to get the vaccine. 9. While receiving the vaccine, SOPs need to be adhered to. 10. Somewhat disappointed with the anti-vaccine party. 11. Netizens are also the ones who twist information about vaccines. 12. Overall be positive with the vaccine. 13. The government's move to address vaccines is to be commended. 14. Disagree with those who cut the line in receiving injections. 15. The frontliners should receive the vaccines first. 16. Vaccination if not successful can end the family legacy. 17. Vaccines do not have a halal mark due to foreign products. 18. The elements of a vaccine need to be described and clarified. 19. Vaccine law is a must. 20. Vaccines for personal protection. 21. Some participants disagreed with vaccine recommendations to family members. 22. Vaccines should be compulsory for all citizens. 23. Special vaccine campaign to deepen understanding.

The study also found that participants were upset with anti-vaccine groups that “incited” and intimidated the public with misrepresented information (P2, P4, P6). While in fact this vaccine is very useful for the prevention and treatment of Covid-19 (P2, P3, P4, P7). The majority supports the government’s vigorous action in tackling this pandemic and ensure that the people receive the vaccine in stages (P3, P5, P7). In fact, they praised the government's commitment in ensuring that the people receive the vaccine.

7.4 Sources of Information

The study found that most participants obtained information from the mass media and social media sources. They had to get the information because to them the Covid-19 disease could be fatal. The main sources referred to were the Ministry of Health Malaysia and daily announcements and reports on television and radio (P1, P2, P3, P4, P5, P6, P7, P8).

TABLE 5
Information Source Themes

Themes
<ol style="list-style-type: none"> 1. The media is the main source of information about Covid-19. 2. While referring to the media, try to understand the message of Covid-19. 3. Television is the main source. 4. Social media - Facebook, Twitter, Youtube and Instagram contribute to Covid-19 information. 5. Newspapers and radio are sources but less referred to. 6. Friends and close relatives are also identified sources. 7. Frontliners become an unfiltered source. 8. Foreign news are more authentic. 9. WHO because it is an internationally recognized body. 10. MySejahtera as main reference. 11. Schools are also a source of reference. 12. Foreign media. 13. Official government sources - Ministry of Health, Malaysia.

Sources of information on Covid-19 and the vaccines were also obtained from social media such as Facebook, Twitter, Youtube and Instagram (P1, P2, P4, P5, P6, P8). However, the rapid development in technology has its own challenges as society needs to be educated to be able to filter information and ensure that the information is true. Some participants obtained information from colleagues, schools and frontliners that are not filtered (P2, P4). Study participants also sourced information from the international media and WHO because it is said that local and foreign media reporting are different (P3, P5). Regardless, the majority of study participants were dependent on the MOH through the MySejahtera Application to obtain fast and up-to-date information related to Covid-19 and vaccines (P4, P5, P7, P8).

7.5 Selection of Information Sources

This study found that the main source of reference is the Ministry of Health, Malaysia (MOH). What's more, the MOH makes a media statement every evening during the MCO until now (P1, P2, P3, P4, P5, P6, P7, P8). The majority of study participants chose the MOH as a main source based on the integrity of the reporting, and confidence in the authenticity of the reports (P1, P2, P3, P4, P5, P6, P7, P8). Several study participants chose foreign media and WHO to add to their confidence in the news presented by local media related to Covid-19 and vaccines (P2, P4, P8).

TABLE 6
Information Source Selection Themes

Themes
<ol style="list-style-type: none"> 1. The Ministry of Health is the main source. 2. Participants often follow developments from time to time regarding the number of cases. 3. Covid-19 information in the early stages is diminished. 4. Over time a lot of information is obtained. 5. Television mass media is more authentic and complete than others. 6. A lot of misleading and false information especially on social media. 7. Misleading information causes anxiety. 8. False information is widespread. 9. Information specific to women is less available. 10. Information on the effects of vaccines on pregnant and women with health problems is less available. 11. Propose to create a special vaccination session for women. 12. Local media sometimes provide only basic information. 13. Foreign media is more reliable. 14. Information from international organizations such as WHO is more accurate.

Regardless of the selection of sources used, information is vital for a person's self confidence in the face of the Covid-19 pandemic and the acceptance of the vaccine (P4, P5, P6). Participants also said a lot of misinformation can cause anxiety and frighten the community (P2, P4, P5, P6). The majority wanted special information on vaccines to be made for women because it requires specific health education campaigns especially for pregnant and breastfeeding women (P1, P2, P3, P4, P5, P6, P7, P8). This study found that sources of information on vaccines from abroad are believed to be more accurate, complete, authentic and reliable compared to information from within the country. Overall, this study found that efforts to increase the confidence of women would depend on the quality and comprehensive delivery of information on vaccines.

8.0 Discussion and Conclusion

The effectiveness of vaccine immunization campaigns needs to be analyzed in stages and divided into several phases of evaluation. Based on the findings of the study, the participants' understanding of Covid-19 was at a good level as the statements showed that the participants understood the effects of Covid-19 and the vaccine on themselves, their families and the local community. Therefore, the findings of this study should be taken into account by those responsible to identify the target groups more clearly in order to channel information and conduct health campaigns.

The registration rate for vaccination is not very encouraging at the moment, due to the 'wait and see' attitude among the people of this country. Therefore, continuous and systematic campaign efforts using "social marketing" should be a priority. A social marketing approach that covers products, promotions, venues, and prices can ensure that health campaigns are more comprehensive and effective. The approach of registering through MySejahtera is also not enough. It is suggested that there should be a more comprehensive interpersonal approach. This is due to the digital divide whereby some places do not get internet coverage especially in rural and inland areas.

The study also suggests that campaigns targeting women be created because of the uniqueness of women who are at risk if they do not know the effects of vaccines on them specifically. Messages and promotions as well as special clinics can be created to provide information as well as having specific vaccination segments for women.

Future studies can be expanded in scope by focusing on participants who are in the B40 group and have low levels of education to gain understanding of vaccine reception in that group. Besides that, entertainment education initiatives by using PCI Media, BBC Media Action, and Sesame Workshop (Riley et al., 2021) can be examples of initiatives to be adopted and modified towards greater immunisation campaign among women in Malaysia.

Overall, this study found that the need for information on diseases and vaccines is very important for receptive decisions among women. Although this is a qualitative preliminary study, the findings of this study highlight the real problems faced by women regarding the Covid-19 vaccine.

9.0 References

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