



AWARENESS OF RISK FACTORS OF HEPATITIS B AND C AMONG PEOPLE

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Abstract

Background: Viral hepatitis exists throughout the world and is a major global public health problem affecting millions of people. Hepatitis B (HBV) and hepatitis C (HCV) virus are the commonest causes of inflammation of the liver leading to chronic liver diseases. According to WHO criteria an estimated 240 million people are chronically affected with hepatitis B.

Objective: Our objective is to assess the current level of knowledge regarding the risk factors of hepatitis among the patients coming to tertiary care hospital.

Study Design: Cross-sectional survey from OPD of Shalamar hospital Lahore Punjab Pakistan.

Setting: A cross sectional study was conducted among the patient presented to the OPD of Shalamar hospital. Total 150 patients aged 17-72 years over the period of 2 months (June-July) were considered for inclusion.

Results: To find out the percentage of awareness of risk factors of hepatitis B and c in 150 patients of OPD room of Shalamar hospital was collected reviewed successfully as sample size and entry was made in the data form specially design for this study. On an average 82% of participants rightly knew the causative factors. In majority of participants knew that vaccine is available.

Conclusion: This study demonstrates awareness about risk factors of hepatitis B and c among people is persuasive. There is still need to educate people regarding some superstitions and environmental factors.

Keywords: Awareness, Hepatitis A, Hepatitis B

INTRODUCTION

The increasing risk of hepatitis B and C has been one of the most debated topics in medical community. Hepatitis C is an infectious disease caused by the hepatitis C virus (HCV) that primarily affects the liver.[1] HCV is spread primarily by blood-to-blood contact associated with intravenous drug use, poorly sterilized medical equipment, needle stick injuries in healthcare, and transfusions.[2][3] Using blood screening, the risk from a transfusion is less than one per two million[1] It may also be spread from an infected mother to her baby during birth.[1] It is not spread

by superficial contact.[4] During the initial infection, people often have mild or no symptoms, and there is typically no symptoms early during chronic infection. This condition can progress to scarring of the liver (fibrosis), and advanced scarring (cirrhosis). Over many years however, it often leads to liver disease and occasionally cirrhosis. [2] There is no vaccine against hepatitis C.[1] Hepatitis B is an infectious disease caused by the hepatitis B virus (HBV) that affects the liver.[5] It can cause both acute and chronic infections.[5] The virus is transmitted by exposure to infectious blood or body fluids.[5] Infection around the time of birth or from contact with other people's blood during childhood is the most frequent method by which hepatitis B is acquired in areas where the disease is common[5].According to WHO 240 million people are chronically affected with HBV. Many people have no symptoms during the initial infection.[5] Some develop a rapid onset of sickness with vomiting, yellowish skin, tiredness, dark urine and abdominal pain.[5] Often these symptoms last a few weeks and rarely does the initial infection result in death.[5][6] It may take 30 to 180 days for symptoms to begin.[1] In those who get infected around the time of birth 90% develop chronic hepatitis B while less than 10% of those infected after the age of five do.[7] Most of those with chronic disease have no symptoms: however, cirrhosis and liver cancer may eventually develop.[8][5] The infection has been preventable by vaccination since 1982.[5][9] Vaccination is recommended by the World Health Organization in the first day of life if possible.[5] Two or three more doses are required at a later time for full effect. [5] This vaccine works about 95% of the time.[5] About 180 countries gave the vaccine as part of national programs as of 2006.[9] It is also recommended that all blood be tested for hepatitis B before transfusion, and that condoms be used to prevent infection.[5]

Sampling technique: Non Probability Sampling (convenient sampling techniques)

Sample size: Sample size is 150

Study variables: Socio-demographic student variables of students Variables for physical activity

Study design: Cross Sectional Study

Study duration: 2 months (June -July 2019)

Study setting: Shalamar Hospital OPD

Questionnaire: The questionnaire is attached. (Annexure-A)

Data collection and entry tools: Structured questionnaire Personal interview

Data analysis: Descriptive Statistics will be calculated by using SPSS version 20.

Ethical consideration: Informed consent taken from all patients and Personal identity of all participants and hospital will not be revealed.

RESULTS

A total of 150 participants who were approached in Shalamar Hospital OPD consented to study participation and completed the questionnaire. All the participants were in the age range of 17 to 72 years. Overall, majority (95%) of the participants had heard about Hepatitis B and c among those who had ever heard about Hepatitis B and C, more than two-third had less awareness about the risk factors of the disease transmission. About 74.7% of the participants had misconception that Hepatitis spreads from contaminated water, 24.3% participants had misconception that flies are also involved in its transmission. 22% participants wrongly opted that hepatitis is transmitted by shaking hands. 52.7% participants had misconception that hepatitis is transmitted by items of daily use. 11.3% of the participants had misconception that some evil doing or black magic is the cause of its transmission.

42.7% of the participants wrongly opted that fecal matter is involved in hepatitis transmission and 35.5% participants had misconception that air pollution is involved in the transmission of Hepatitis. Majority of the participants (82.0%) rightly knew that hepatitis is transmitted by blood transfusion and 92.7% participants knew that hepatitis is transmitted by sharing injections and needles. 72% of the participants rightly opted that hepatitis is transmitted by sexual contact. 64% piercing and 53.3% rightly participants knew that hepatitis is transmitted by unhygienic ear and nose piercing and 53.3% rightly opted that hepatitis is transmitted by unhygienic dental extraction.

	Frequency	Percentage
Have you ever heard of Hepatitis B and C.	147	98%
Hepatitis B and C spread by contaminated water.	112	74.7%
Hepatitis B and C spread by Blood Transfusion.	123	82%
Hepatitis B and C spread by Flies.	44	29.3%
Hepatitis B and C transmit by shaking hand with affected person.	33	22%
Hepatitis B and C transmit by sharing injections and needles.	139	92.7%
Hepatitis B and C transmit by sharing items of daily use.	79	52.7%
Hepatitis B and C transmit by sexual contact.	108	72%
Hepatitis B and C caused by Black Magic.	17	11.3%
Hepatitis B and C spread by nose and ear piercing.	96	64%
Hepatitis B and C spread by dental extraction.	80	53.3%
Hepatitis B and C spread by Feces of infected person.	64	42.7%
Hepatitis B and C spread due to air pollution.	53	35.5%

Majority of the participants rightly knew that hepatitis could be prevented by Vaccination and 83.3% of the participants knew that vaccination for hepatitis B is present and 70.7% had misconception that there is also vaccination for Hepatitis.

	Frequency	Percentage
Is there vaccine for HBV	125	83.3%
Is there vaccine for HCV	106	70.7%

DISCUSSION

Our study exposed significant gaps in knowledge about hepatitis B and Hepatitis C even though the majority of our study population had at least some education. Knowledge was particularly poor about the different mode of disease transmission. Prevalence in blood donor may be an underestimate of the population prevalence if potential donors with high risk profile, like history of jaundice, infection, and drug use, multiple sexual partner, etc. are screen out by questionnaire. Fourteen different studies showed the prevalence rate of 3.93% ± 1.58% in healthy blood donor in Pakistan [10].

A study conducted in Jammu revealed 80 % of women believed drinking save water prevents hepatitis B [10]. Whereas in our study 74% of participants think water contamination is responsible for hepatitis B and C. Most of all patients belong to the middle and lower middle socio economic classes. Knowledge of hepatitis B and C in the general population of Pakistan may be much lower than we report here (11).

Pakistan has one the highest frequency of injection in the world. The average number of injection per person per year is 8.5. Hepatitis B and C are very common infections among the Pakistani population. Knowing the facts and having proper attitude and behaviors are critical to prevent the spread of these infections. The public should be informed about the safe injections and screen the blood transfusion. They should also be informed about the risk of infections through unsafe sex, tattooing and ear and nose piercing. Information should also be provided to public that there is no specific diet recommended for people infected with hepatitis B and C, that hepatitis b is vaccine preventable disease and that no vaccine is available to prevent hepatitis C. Most of the people knew about its

transmission by blood transfusion and sharing injections and needles which is one of the main sources of hepatitis B and C transmission. A study conducted in low prevalence region showed that hepatitis B and C are more common in drug users, health care workers and patients who undergo regular blood transfusion [12][13].

One of the common modes of transmission for hepatitis B and C is sexual contact [14][15][16][17] and fortunately about 2/3 of all participants know about its transmission by sexual contact. The strong epidemiological association between sexual behavior and hepatitis B infection is among homosexual men [14]. Evidence for the sexual transmission of HCV was provided by observation of raised prevalence in homosexual men [15][16][17].

Most of participants knew that hepatitis is transmitted through used razors, needles and injections which were very encouraging as previous research conducted among barbers of Rawalpindi and Islamabad. Only 13% of barbers thought that hepatitis B and C are transmitted by razors. [18]

Most of participants knew about the vaccination of HBV which is very encouraging. A few of participants still have misconception that Hepatitis is transmitted by black magic and evil spirit.

CONCLUSION

This study demonstrates the level of awareness about the risk factors of hepatitis among people is promising. Although there is still need to educate people as there are some misconceptions about its transmission about its pollution and black magic. There is a need for a periodic check to decrease the prevalence of new cases of hepatitis.

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QUESTIONNAIRE

AGE:

GENDER: Male / Female

Q 1: Have you ever heard about hepatitis B and C? 1) Yes 2) No

Q2: Do hepatitis B and C spread by contaminated water? 1) Yes 2) No

Q3: Are hepatitis B and C transmitted by blood transfusion? 1) Yes 2) No

Q4: Do hepatitis B and C spread by flies? 1) Yes 2) No

Q5: Do hepatitis B and C transmit by shaking hand with affected person? 1) Yes 2) No

Q6: Do hepatitis B and C transmit by sharing injection, blades and razors? 1) Yes 2) No

Q7: Do hepatitis B and C transmit by sharing items of daily use i.e. utensils and towel? 1) Yes 2) No

Q8: Do hepatitis B and C transmit by sexual contact? 1) Yes 2) No

Q9: Is there any vaccine for hepatitis B? 1) Yes 2) No

Q10: Can black magic cause hepatitis B and C? 1) Yes 2) No

Q11: Is there any vaccine for hepatitis C? 1) Yes 2) No

Q12: Do hepatitis B and C spread by ear and nose piercing? 1) Yes 2) No

Q13: Do hepatitis B and C spread by dental extraction? 1) Yes 2) No

Q14: Do hepatitis B and C spread by feces of infected person? 1) Yes 2) No

Q15: Do hepatitis B and C spread due to air pollution? 1) Yes 2) No