Frequency of Hepatitis C in admitted patients of Department of Obstetrics & Gynaecology, Ghurki Trust Teaching Hospital, Lahore

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Objective: To assess the frequency of hepatitis C in admitted patients of department of obstetrics and gynaecology Ghurki trust teaching hospital, Lahore. Design: Descriptive study Place and duration of study: This study was conducted on patients admitted in obstetrics and gynaecology ward Ghurki trust teaching hospital, Lahore from 1st January 2005 to 31st December 2005. Patients and methods: A total of 1569 patients of age between 20 to 70 years were admitted in obstetrics and gynaecology ward Ghurki trust teaching hospital, Lahore and were screened for anti-HCV antibodies by 3rd generation ELISA. All positive patients were asked about previous history of jaundice, surgery, blood transfusion, multiple injections and dental procedures. Results: Out of 1569 patients 107 were found to be anti-HCV positive. Mean age of patients was 34.5 years. Frequency of anti-HCV was maximum (38.3%) in 31-40 years age group and in gynaecology patients (12.5%). Previous history of multiple injections and dahi handling were the most commonly associated factors. Co-existent hepatitis B and C was found in only 2 (1.8%) patients. Conclusion: Hepatitis C is becoming an alarmingly common problem in the area of Ghurki Trust Teaching Hospital, Lahore. Its modes of transmission need to be properly evaluated for its control and prevention.

Key words: Hepatitis C, Anti-HCV anti-bodies, Risk factors

Hepatitis C virus is a single stranded RNA virus with properties similar to those of flavivirus. It was first identified in 1988. The virus is chiefly contracted through parenteral exposure by factors like blood transfusion, body piercing and hemodialysis. The risk of sexual and maternal to neonatal transmission is low and is seen in patients with high circulating levels of HCV RNA. Having multiple sexual partners may increase the risk of HCV infection. Transmission via breast milk has not been documented. In many cases the source of infection is unknown. The incubation period averages 6 to 7 weeks and clinical illness is often mild and usually asymptomatic.

HCV is considered to be the main etiological factor for chronic liver disease and accounts for 70-75% cases of chronic hepatitis and 15-20% cases of cirrhosis and hepatocellular carcinoma. WHO estimates that about 170 million people that is 3% of the world’s population are infected with HCV and are at increased risk of developing liver cirrhosis and liver cancer. A prevalence rate of 0.5 to 29 % has been found in the population samples around the world. The prevalence of anti HCV antibodies in blood donors has been reported to be 5.1% from India and 1.5% from Saudi Arabia. Whereas in Pakistan it has been reported from 0.5 to 25.7%. The aim of the study was to assess the frequency of hepatitis C in patients admitted in gynaecology department, in order to assess the magnitude of the problem so that measures can be devised to prevent the spread of this disease.

Place and duration of study:
The study was conducted in the department of obstetrics and gynaecology unit 1 Ghurki trust teaching hospital. A total of 1569 patients were admitted in the gynaecology department with various complaints in the year 2005 and all of them were included in the study. Almost all of the patients did not have any specific symptoms relating to hepatitis C virus infection and were routinely subjected to screening for the presence of anti Hepatitis C virus antibodies. The samples were analysed by ELISA technique and all anti Hepatitis C virus positive patients were asked about previous history of jaundice, surgery, blood transfusion, multiple injections and dental procedures. Majority of the patients did not give any positive history of such exposure. All of them were evaluated for evidence of chronic liver disease by performing liver function tests, PT, APTT, along with a detailed abdominal ultrasound. In addition to Hepatitis C virus all patients were routinely screened for hepatitis B virus by performing hepatitis B surface antigen. All positive patients were thoroughly assessed for fitness for anaesthesia before subjecting them to any surgical procedure. All of them were offered Hepatitis C virus RNA detection by PCR technique for presence of active disease and referred to medical department for further management.

Results:
Of the total of 1569 patients, anti HCV was detected in 107(6.8%). The frequency was higher in gynaecological patients 68 (12.5%) as compared to obstetrical patients 39(3.7%). The frequency of anti HCV was maximum in age group of 31-40 years (38.3%) and declined sharply after age of 60 years (8.4%). Out of 107 anti HCV positive patients only 7 had history of previous surgery and 9 had history of blood transfusion while history of multiple injections (47) and dahi handling in previous deliveries (31) were the most commonly associated factors. Only 5 and 18 patients gave the history of dental procedures and jaundice in the past respectively.

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Deranged liver function tests were found in 20 (18.7%) out of 107 anti HCV positive patients while only 15 (14%) had ultrasonic evidence of coarse echotexture (10) and shrunken liver (5). Only 3 (2.8%) were found to have mild ascites. 69 patients had no biochemical or ultrasonic derangements. 2 (1.8%) out of 107 anti HCV positive patients were also positive for hepatitis B surface antigen.

<table>
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<th>Age</th>
<th>Gynae</th>
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<th>Total</th>
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<td>5</td>
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<td>21</td>
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<td>3</td>
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<tr>
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<td>68</td>
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<td>Obs</td>
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<td>39</td>
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<td>Total</td>
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Conclusion:
Hepatitis C is becoming a very serious health problem in the area of Ghoraki Trust Teaching Hospital, Lahore. Its modes of transmission need to be properly evaluated for its control and prevention. It is essential to know about the frequency of this disease in order to assess the magnitude of the problem. Its prevalence is difficult to come by because it is asymptomatic in its early stages and produces symptoms only when the disease is well advanced, at a time when no treatment is possible. As vaccine against it is not yet available and antiviral therapy is very expensive and most of the people can not afford it, hence prevention is the only way to limit its spread and this can be achieved by increasing awareness among the general public by health education. Practices like shaving and circumcision by barbers, tattooing, ear piercing, use of reusable syringes and reuse of disposable syringes should be discouraged.

References
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