

# Hepatitis HAV and HBV in Different Ages and Gender in Hilla City

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## Abstract

In developing countries, including Iraq, liver disease virus infection is a severe health issue. The spread of the disease is triggered by various things (things that make it more likely that someone will get an illness that can spread from person to person). In Hilla's area of control/land area (39 cases from 2257 obtained positive results for HBsAg test, most infections in February), the current research was very skillful to devise (a number) of viral liver diseases A and B infections. The study found that infections with the liver disease B virus were more male (51%) than female (49 percent). The highest number of HBVs among people in the 3 age groups (a big change in numbers that means something important) ( $p>0.05$ ).

**Keywords:** Liver disease B • Hepatitis A • DNA • HBV

## Introduction

Liver disease B (previously) is a liver disease known as a serum liver disease caused by the liver disease B virus (which can be captured easily from others). HBV is a circular hepadnaviridae family of DNA virus which is partly left-alone and helpless [1,2]. The infection from Liver disease B is more transmissible than the infection with HIV and HCV. The C-Virus of liver illness is 50 to 100 times higher than that of HIV and 10 times higher (which can be quickly captured by others). HBV is a secret liver disease that many carriers don't experience (comprehension and realization) that they are infected with the virus [3].

HBVs are the greatest among Asia, Africa and the Pacific developing countries and the least among the developed Americas, Western Europe and Australia. Importance include insecure medically effective injections, blood transfusion, tattooing, mother-to-child transmittal and inappropriate sexual activities [4,5]. Hepatitis A virus is spread via the (poop-related) oral route most often through contaminated water and through tainted water. This is due to inadequate availability of water and poorly (maintaining things clean and disease-free). An infection and hepatitis (World Health Organization 1975) causes liver swellings. Leber disease in developed countries continues to be a significant health issue.

The virus of liver disease (HAV), particularly in areas around the Equator and in the subtropical regions, is a significant source of waterborne liver disease worldwide. The mode of transmission is (poop-related) oral by near personal contact, liver disease A virus (HAV) infection causes a serious disease (which can be contracted by others), which can lead to serious deaths and occasional mortality [6,7].

This virus is worldwide and is (when one number goes one way, the other numbers go the other way around) up to (in relation to the circumstances surrounding or the wellbeing of the earth), (cleansing things and freeing from diseases) and personal (keeping yourself or things cleansed). Liver disease A (previously referred to as liver disease (can easily be captured by

others). It is a sudden, severe liver disease (which can extend by person) caused by liver disease, A (HAV) [8]. Liver disease A every year, about 10 million people worldwide are infected with the virus [9].

Both men and women of various age groups are affected by HBV. The value of HAV and HBV for (identification of or cause of a disease or problem) (related to medicine and science) (identification of the disease or its cause) patients with sudden and serious viral liver dip are now not available in this paper and the numbers of people of various ages and sex groups for liver diseases B are not available.

## Description

### Sampling

The Hilla Teaching Hospital/Babylon/Iraq sample obtained 39 of a total of 2257 HBV samples.

### Serologic test

Both samples were simultaneously collected from the freezer after completion of the sampling and tested in compliance with HBV&HAV instructions from the Kit manufacturer.

### Statistical analysis

Statistical software, SPSS version 16.0 for Windows, was used to evaluate the data and the summary statistics. The findings were seen as rates for all variables (0.05).

## Results

We analyzed 2330 blood samples from Hilla City patients, all of whom had HBV and HAV screening. We examined the participants had a median age of 35 to 75 years. Positive tests of HBV were higher in men than women, but statistically important (Tables 1-3).

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Received date: 22 July, 2021; Accepted date: 05 August, 2021; Published date: 12 August, 2021

**Table 1.** The relative frequency of positive -HAV and anti-HBV among subjects with a clinical correlation.

Months	Age	Hav		Hbv	
		Positive	Negative	Positive	Negative
January	35-50	0	0	6(50%)	600(87.4%)
	50-75	0	0	6(50%)	68(12.6%)
P value		0		0.001*	
Total		0	0	12	668
February	35-50	0	7	12(80%)	200(47.5)
	50-75	0	0	3(20)	421(52.5)
P value		0		0.24	
Total		0	7	15	621
March	35-50	0	0	2(28.5)	150(43.6)
	50-75	0	0	7(71.5)	184(56.4)
P value		0		0.15	
Total		0	0	9	344
April	35-50	0	26	2(100%)	300(79.1)
	50-75			0(0.0)	79(21.9)
P value		0		0.62	
Total		0	26	2	379
May	35-50	0	0	0(0.0)	200(81.6%)
	50-75	0	0	1(100%)	45(18.4%)
P value		0		0.81	
Total		0	0	1	245

Significance \*P<0.05

**Table 2.** The differences of age and BMI between both infected and non-infected persons.

Category	Infected HBV	Non infected HBV	P=Value
Age	40.83 ± 3.18	61.37 ± 3.11	0.001*
BMI	52.66 ± 2.13	65.50 ± 3.73	0.049*

Significance: \*P ≤ 0.05; SE: Standard Error

**Table 3.** Gender distribution and the relative frequency of positive Hbv among subjects with B clinical diagnosis of acute hepatitis.

Gender	Infected HBV	Non infected HBV	P value	OR (CI95%)
Male	20 (51%)	1500(66.4%)	0.018*	0.47 (0.25-0.90)
Female	19 (49%)	757(43.6%)		
Total	39	2257		

Significance: \*P<0.05

## Discussion

The current research was conducted with the goal of defining infection prevalence among the different age groups of the studied groups in order to determine if HBV/HAV infecting is a global health issue with a rising burden on the developing countries such as Iraq. Diagnosed in the health lab of Hilla City during the first five months of this year was 39 HBV cases of 2257 suspected individuals. HBV prevalence in North America, Australia and New Zealand is <15%, Japan 2-4%, China 5-18%, Taiwan and some other South-East Asian countries 15-20% and Taiwan 5-18% [10]. HBV spread by contact with an infected person's blood, semen, and other body fluids [11].

WHO estimated HBV infections were 350 million globally, 75% in the Asia Pacific region, 90% in China alone or 7% in Asia Pacific. In these countries, the disease is prevalent in the most Asian chronically ill countries at a rate of 5–15%, resulting in high levels of traffic in children from mothers [12].

We observed that the 30–40 year age group had more viral hepatitis when examining the prevalence of Hepatitis B seromarkers in blood donors in Basra. The prevalence of HBV among people in 35 years shows statistically relevant results (p>0.05). The age group is one of the highest in individuals. This correlates which recognized the risk of HBV infection by being over 30 years of age [13]. The increased predisposition of HBV with

increased age could be attributable to the duration of prostitution.

With regard to gender, the rate of infection among the male population was higher than that of female women, although there was no indication of a separate incidence in male and female viral hepatitis infections in Baghdad and in Thi Qar, Iraq [14,15]. This gender disproportion is due to many personal and social factors including, intercourse between consumers, tattooing, cushioning, and substance use in (usually illegal) sexual activity both at country and abroad. Our finding is in accordance with a high prevalence (59.1%, 58.3%) has been recorded for men as for women (40.9%, 41.7%) [16,17].

A decreasing rate of infection is caused by a variety of factors including increased socioeconomic status, increased clean water access, and (in many parts of the globe), the availability of epithetic vaccine developed in the 1990s [18]. In several parts of the world the HAV seroprevalence rate is declining [19].

## Conclusion and Recommendations

This study shows the gender prevalence for HBV in the various age groups Male is exposed to risk factors more often compared to female. Similarly, in contrast with older age groups, younger groups have high rates of infection. The government should take proactive measures towards awareness campaigns involving both the media and public sector organizations, to prevent HBV infection in our country. Public awareness that Hepatitis B is a vaccine-preventable disease should be given as well.

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**How to cite this article:** Ewadh, Ruqaya Munther J, Ameer A. Abd Alhussin and Samah Ahmed Kadhum. "Hepatitis HAV and HBV in Different Ages and Gender in Hilla City." *Clin Schizophr Relat Psychoses* 15S(2021). Doi:10.3371/CSRP. ERAA.081221.