

*HEPATITIS B IN AFRICA: THE CHALLENGES IN CONTROLLING THE SCOURGE

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INTRODUCTION

For far too long, viral hepatitis has been neglected by the international community, policy makers, governments, health care providers and the public. Although the virus was discovered over 50 years ago and an effective vaccine has been available for more than 20 years¹, the complications of chronic hepatitis B infection are still the cause of significant illness and death in Africa. Hepatitis B is a viral infection that attacks the liver. It can cause both acute and chronic disease such as liver cirrhosis and cancer.^{2,3}

Globally, hepatitis B affects 240 million people.⁴ Each year an estimated 650 000 people die from hepatitis B related liver disease or liver cancer. In Africa, there are 75 million people affected by the virus. This ranges from about 13.6% of the population in Nigeria to 11% in Senegal and 5.7% in Ethiopia.⁵⁻⁷ In The Gambia, hepatitis B related liver cancer is the most common cancer among men and the third most common in women.

A multi-faceted approach is needed to address the challenges that have allowed this virus to continue unabated in African communities decades after it has been controlled in Western populations.

Why Africa is Still Gripped by Hepatitis B

There are various reasons why hepatitis B still prevails in Africa. This includes the lack of information about the virus' transmission, inaccurate estimates of the disease's burden and insufficient vaccine coverage. It is well known that the virus is transmitted through contact with the blood or the body fluids of an infected person. However, the role of child-to-child transmission and mother to child transmission is often underestimated.⁸

Unsafe injections from poorly sterilised needles and re-used equipment are a major source of new infections. According to the World Health Organisation, 1.7 million people are infected via unsafe injection practices.¹⁰ These include scarification and cultural body-piercing and tattoo practices using razors and similar sharp objects that are contaminated with infected blood.

But there is a great deal we do not know about hepatitis B in Africa. The burden of the infection and associated diseases is not known. There is inadequate surveillance of the disease's patterns because many African countries lack the resources for appropriate disease surveillance and documentation. Laboratories are insufficiently equipped and health care services are poor. Precise data on the huge disease burden would provide the impetus for change, enhance disease awareness and enable better health care planning.

Vaccination

There are three integral components to controlling hepatitis B. This includes treating infected individuals, interrupting the spread of the infection transmission and reducing the deaths associated with advanced liver disease and liver cancer.

The hepatitis B vaccine is safe and prevents infection in up to 95% of cases if it is administered in childhood. In Senegal, vaccinations have reduced infection rates among children from 18.7% to 2.2%. In The Gambia, the infection rate dropped from 10% to less than 1%.¹¹

Although vaccination is key to preventing new infections, It however, has no impact on people who already harbour infection. It will also not have an impact on prevalence of hepatitis B virus related liver disease until several decades after it has been introduced.

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The cost of the hepatitis B vaccine was a significant obstacle in the worldwide control of the disease. Even at 50 US cents per dose, it was more expensive than other childhood vaccines recommended by the World Health Organisation's Expanded Programme on Immunisation (EPI). But with the support of the World Health Organisation and the Global Alliance for Vaccines and Immunisation, many resource poor African countries have recently initiated universal infant immunisation. They use a single pentavalent vaccine that prevents five childhood infections, including hepatitis B.

A Paradigm Shift in Control

The 2015 World Health Organisation guidelines to manage chronic hepatitis B highlight the importance of adopting a simplified public health approach to controlling the virus.¹² This includes developing publicly-funded screening and treatment programmes and providing universal access to hepatitis B prevention, care and treatment. Scaling up this programme in African countries will do two things. Firstly it will expand access to the general population. And secondly, it will strengthen the diagnostic services and laboratory infrastructure to support care.

Streamlining such viral hepatitis programmes into the existing health programmes around tuberculosis or HIV may allow shared synergies in terms of the programme's success and limit its costs. The burden of hepatitis B is high in countries that can ill afford the cost of dealing with hepatitis B. This is a preventable disease and indeed one that can be eradicated by vaccination. There is an urgent need for governments and international stakeholders to increase the funding for hepatitis B in Africa as was done successfully for HIV, tuberculosis and malaria control.

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