

Patients infected with HIV have higher drop-out rate for liver transplantation

January 25 2011

French researchers determined that infection with human immunodeficiency virus (HIV) impaired results of transplant surgery for liver cancer, with more HIV infected patients dropping off the transplantation wait list. The team found that overall survival and recurrence-free survival was not impacted following liver transplantation in patients with controlled HIV disease. Details of this single center study—the largest to date—are published in the February issue of *Hepatology*, a peer-reviewed journal of the American Association for the Study of Liver Diseases (AASLD).

More than 40 million individuals are infected with [HIV](#); of these roughly two to four million and four to five million are also carriers of chronic hepatitis B virus (HBV) and hepatitis C virus (HCV), respectively. With the introduction of highly active antiretroviral therapy (HAART) in 1996 the survival of patients with HIV infection has improved dramatically and now end-stage liver disease has become the principal cause of death among HIV- positive patients co-infected HBV or HCV. Prior studies have shown that 25% of liver-related mortality in HIV-positive patients is attributable to hepatocellular carcinoma (HCC), or [liver cancer](#).

"Liver transplantation is the optimum treatment for HCC and can also be considered for controlled HIV-positive patients with liver cancer," said René Adam, MD, PhD, from Hospital Paul Brousse in France and lead author of the current study. "Our study showed that HIV infection impaired the results of liver transplantation on an intent-to-treat basis but exerted no significant impact on overall survival and recurrence-free

survival following transplantation."

The research team analyzed data from 21 HIV-infected and 65 HIV-negative patients with HCC who were listed for liver transplantation between 2003 and 2008. All HIV-positive patients were treated with HAART and had not experience any AIDS event or opportunistic infections prior to being place on the wait list.

Researchers observed a trend towards a higher drop-out among HIV-positive wait listed patients (23%) compared to patients without HIV (10%). Patients with HIV who dropped out had significantly higher alpha-fetoprotein (AFP) levels at the time of listing than those who received a transplant—98 $\mu\text{g/L}$ versus 12 $\mu\text{g/L}$, respectively. A similar difference in AFP levels was not found in HIV-negative patients—18 $\mu\text{g/L}$ in those who dropped out versus 13 $\mu\text{g/L}$ for those who underwent liver transplantation. Only one HIV-positive patient who did not have increased AFP levels while on the wait list dropped out due to progression from controlled HIV to AIDS.

Medical evidence indicates a major predictive factor for HCC recurrence post-transplantation is an increase in patient's AFP level of more than 15 $\mu\text{g/L}$ per month while on the waiting list. "Our study confirmed the importance of this preoperative factor (AFP levels), as all HIV-positive patients who dropped out displayed a rise in AFP levels," Dr. Adam concluded. "There is clearly a critical need for more effective neoadjuvant therapy in HIV-positive patients with HCC, however there are no objective arguments to contraindicate [liver transplantation](#) in this group if strict criteria are used for selection and patients are closely monitored until surgery."

More information: "Liver transplantation for Hepatocellular Carcinoma: The Impact of HIV Infection." Eric Vibert, Jean-Charles Duclos-Vallée, Maria-Rosa Guigna, Emir Hoti, Chady Salloum,

Catherine Guettier, Denis Castaing, Didier Samuel, René Adam.
Hepatology; Published Online: January 3, 2010 ([DOI: 10.1002/hep.24062](https://doi.org/10.1002/hep.24062)); Print Issue Date: February 2011.

Provided by Wiley

Citation: Patients infected with HIV have higher drop-out rate for liver transplantation (2011, January 25) retrieved 19 April 2024 from <https://medicalxpress.com/news/2011-01-patients-infected-hiv-higher-drop-out.html>

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.