

Adherence to HAART in Bangalore, India

Project Staff: Maria Ekstrand, Monica Gandhi, Sara Chandy, Girija Singh, Wayne Steward, Deepalika Chakravarty, Thomas Osmand, Prem Pais, Ravindran, Charles Allwin, Matilda JK, Jacob D'Souza, Krishnaveni, Julie Raj, Mary Nandini, Vishwanatha, Anil Lobo.

Project Description: The overall goal of this study is to examine patient and provider antiretroviral therapy (ART) adherence issues at St John's hospital in Bangalore, India. Culturally appropriate adherence measures have been developed, including a measure of delays in prescription refills. Barriers that interfere with adherence to HIV treatment as well as potential avenues to enhance adherence are being examined using both qualitative and quantitative methods. These data will subsequently be used to inform the development of an adherence intervention that can be evaluated in a future clinical trial.

The study includes two phases in which we:

1. Conducted qualitative interviews with 40 patients and 40 physicians at St John's hospital in Bangalore, India to: a) assess prescription patterns and clinical monitoring of toxicity and medication efficacy as well as perceptions of patient adherence; b) explore individual, interpersonal and environmental factors that may facilitate or hinder adherence to HIV treatment regimens among HIV infected clinic patients; c) examine the feasibility and acceptability of US-developed adherence measures and strategies in this setting and determine ways in which these measures and strategies may need to be modified; and d) explore experiences of AIDS stigma and discrimination and their role in treatment seeking and adherence.
2. Recruited and are now following a longitudinal cohort of 229 HIV infected clinic patients for one year using a structured interview which is a) evaluating ART adherence patterns as well as adherence barriers and facilitators; b) examining the relationship between different adherence measures and HIV viral load.

The study also includes a supplement received from the NIH Office of AIDS Research to develop measures of AIDS stigma and discrimination and assess their role in treatment adherence.

Significance: The recent decline in the cost of HIV ART in India and the ongoing competition among generic manufacturers, combined with the 2004 Indian government ART roll out has made first-line ART a viable option for a larger proportion of India's HIV infected individuals. Unfortunately, treatment effectiveness requires high levels of adherence and the adherence literature on other chronic, infectious diseases in India, such as TB and leprosy, indicate that serious adherence barriers may exist. Prior to this study, there have been limited research on ART adherence issues in India. Thus, there is an urgent need for further research to better understand the individual, family, interpersonal, and social forces that influence HIV treatment adherence in this culture. We also need a better understanding of provider behaviors, including the guidelines physicians follow when deciding to prescribe antiretroviral medication, how their decisions are influenced by patient characteristics, how adherence is monitored, and the extent to which these drugs are available to the population of HIV infected individuals in India.

Project End Date: January 2008 (competing renewal application submitted 01/07)