

## Determinants of HIV outpatient service utilization according to HIV parameters

Paola Di Carlo, Palmira Immordino, Giovanni Mazzola, Pietro Colletti, Ilenia Alongi, Maurizio Mineo, Marco Scognamillo, Francesco Vitale, Alessandra Casuccio

## Abstract

**Introduction:** The increased life expectancy of HIV patients in the era of highly active antiretroviral therapy has had profound consequences for the healthcare systems that provide their care. It is useful to assess whether healthcare resources need to be adapted to the different stages of HIV infection or to patient characteristics [1]. To study how patient features influence utilization of outpatient services, we retrospectively analyzed the electronic health record of HIV-positive patients who had followed day-care programs at the AIDS Center of the University of Palermo, Italy.

**Materials and Methods:** 223 HIV-infected subjects were recruited and divided into two groups according to CD4 cell counts (117 with a CD4 count  $\leq 500/\text{mm}^3$  and 106 with CD4 count  $\geq 500/\text{mm}^3$ ). Data on age, gender, race, lifestyle habits (including educational level, drug abuse history, smoking status, alcohol consumption, sexual behaviour) BMI, HIV-RNA, CD4+ T-cell count, antiretroviral therapy (ART), comorbidities such as HCV co-infection, osteoporosis biomarker, dyslipidemia, diabetes, renal function and systolic and diastolic blood pressure were recorded in a purposely designed database and were analyzed in relation to AIN by uni- and multivariable logistic regression.

**Results:** Table 1 shows the characteristics of enrolled patients; the average age of the recruited patients was  $45.4 \pm 9.5$  years. 163 individuals were male (73%), 26 were immigrants (12%) and 91 (40%) were treatment-naïve. Mean day care access for laboratory tests to evaluate stage of HIV and for treatment monitoring was 6.5 days for CD4 cell count measurements and 9.6 for HIV RNA/drug-resistance testing. When patients were stratified according to CD4 count, mean day care access for laboratory tests to evaluate HIV stage and to monitor treatment was negatively correlated with CD4 cell counts.

**Conclusions:** Only patients with CD4 counts  $\leq 500/\text{mm}^3$  showed higher rates of healthcare utilization; these data may be useful for monitoring and revising implementation plans for the different phases of HIV disease.

(Published: 2 November 2014)

**Citation:** Abstracts of the HIV Drug Therapy Glasgow Congress 2014

Di Carlo P et al. *Journal of the International AIDS Society* 2014, **17**(Suppl 3):19611

<http://www.jiasociety.org/index.php/jias/article/view/19611> | <http://dx.doi.org/10.7448/IAS.17.4.19611>