## **Abstract**

## **Purpose:**

The purpose of this study is to understand the percentage and etiology of central nervous system and peripheral nervous system involvement of Acquired Immumodeficiency Syndrome (AIDS) patients in Taiwan.

## **Method:**

- 1. Retrospective study: During the 1st stage from January 1994 to December 1997, 106 AIDS patients were collected; together with a following 2nd stage till December 1999, 376 AIDS patients were collected; and last stage till December 2002, a total number of 612 patients were enrolled. Data analysis was implemented carried according to chart report on clinical symptoms and related examination report (e.g. serology, cerebrospinal fluid (CSF) examination, nerve conduction velocity study, image study etc) was carried in these AIDS patients who were hospitalized or visited the out patient clinic. These AIDS patients were grouped according to CDC and WHO classification, and analysis was implemented by their cerebrum, spine and peripheral nerve involvement.
- 2. Prospective study: In 2002, we enrolled the AIDS patients who were treated with Non-Nucleoside Reverse Transcriptase Inhibitors (Non-NRTI) and then compared these patients with the previous group of ADIS patients who were treated with Nucleoside Reverse Transcriptase Inhibitors (NRTI). Also, nerve conduction velocity study and neurological examination were utilized to assess their peripheral nerve involvement. Stepwise linear regression models were used for the relationship of drugs and other factors.

Multiple symptoms of neuropathy can be presented in AIDS patients, which are often seen. It may vary from only mild numbness or even to very severe neurological symptoms, which may lead to high mortality. These symptoms according to their presentation have their own etiology. The only solution is to understand it, in order to make early diagnosis and start early treatment. We hereby provide neurological involvement data of the AIDS patients in Taiwan, hoping that we can all improve the present situation in these patients. And this is also the main purpose for this study.

Keywords: AIDS; Neurological problems; prevalence; clinical characteries