TO STUDY THE CLINICAL PROFILE OF HIV/AIDS PATIENTS

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Article Info: Received 26 April 2019; Accepted 21 May. 2019
DOI: https://doi.org/10.32553/ijmbs.v3i5.253
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Conflict of interest: No conflict of interest.

Abstract:
Background: The Human Immunodeficiency Virus (HIV) is a lenti virus (a subgroup of retrovirus) that causes HIV infection and acquired immunodeficiency syndrome (AIDS). HIV causes progressive impairment in body’s immune system leading to increased susceptibility to tumours and fatal opportunistic infection known as acquired immune-deficiency syndrome (AIDS). The aim of our study was to study the clinical profile of HIV/AIDS patients.

Methods: It was an observational study including 100 HIV positive patients who were willing to be a part of the study. According to the WHO case definition, HIV in adults and children 18 months or older is diagnosed based on positive HIV antibody testing (rapid or laboratory-based enzyme immunoassay).

Results: In this study Fever was the predominant symptom seen in 75% of cases; followed by weight loss (55%), cough with expectoration (36%), haemoptysis (35%), long fever (34%).

Conclusion: The present study found that most of the HIV infected patients were from sexually active age group. Emphasizing the need to strengthen our information education and communication (IEC) strategies to contain HIV/AIDS.

Keywords: Acquired Immuno Deficiency Syndrome (AIDS), Hematological manifestations, Clinical profile.

Introduction

Haematological abnormalities are common findings in patients infected by HIV virus. The common findings include anemia, leukopenia, thrombocytopenia or pancytopenia. These abnormalities may be attributable to the direct cytotoxic effect of the virus on progenitor cells, ineffective hematopoiesis, opportunistic infections immune mechanisms and drug reactions.¹

Anemia is a very common finding in HIV infected patients particularly in individuals with more advanced disease HIV infection alone without other complicating illness can produce anemia in some patients. HIV not only causes low CD4 counts, but is also associated with granulocytopenia, thrombocytopenia, loss of specific cytotoxic lymphocytes and antibody specific response².

Most patients will experience some hepatobiliary manifestations during the course of their HIV disease with abnormal liver function in approximately 80% patients and hepatomegaly and jaundice in 50% patients. HIV can involve the liver directly as demonstrated by presence of HIV P24 in Kupfer cells and endothelial cells and presence of HIV messenger RNA in hepatocytes. The degree of involvement of liver can be demonstrated by measuring alkaline phosphatase, alanine amino transferase, aspartate amino transferase lactate dehydrogenase, creatinine phosphokinase³.

Renal disorders are encountered at all stages of HIV infection, & range from from fluid & electrolyte imbalances commonly seen in hospitalised patients to HIV associated nephropathy which can progress rapidly to end stage renal disease.
MATERIAL AND METHODS

Place of study:
Inpatient and outpatient departments of department of TB and chest (Pulmonary medicine) RNT Medical College Udaipur and associated group of hospital.

Study design:
It was a hospital based observational descriptive study.

Sample size:
The sample size was 100 patients.

Sampling method:
Convenience sampling

Duration of study:
Three year between 1997 to 2000

Inclusion Criteria:
1. The patients diagnosed with HIV-1 &2 reactive by ELISA method (both symptomatic and asymptomatic)
2. age >18 years.

Exclusion Criteria:
1. Patients with previously known hematological disorder prior to HIV infection
2. Patients with hepatic disorders and renal disorders due to other causes was be excluded from the study

Study population:
All the patients who are HIV positive and fulfilling the inclusion and exclusion criteria attending OPD and IPD.

Data collection:
All the patients who are HIV positive and fulfilling the inclusion and exclusion criteria attending OPD and IPD. The patients was evaluated according to predetermined and pretested proforma to record the details of history, physical examination and investigations.

OBSERVATION

Table 1: Age wise distribution of AIDS patients

| Age group (Yrs) | No. of patients | Percentage |
|-----------------|-----------------|------------|
| 10-20           | 2               | 2%         |
| 21-30           | 20              | 20%        |
| 31-40           | 24              | 24%        |
| 41-50           | 25              | 25%        |
| 51-60           | 13              | 13%        |
| More than 60    | 16              | 16%        |
| Total           | 100             | 100%       |

Maximum 25% patients were belong to 41-50 Yrs age group and only 2% patients were less than 20 Yrs.

Table 2: Sex wise distribution of AIDS patients

| Sex     | No. of patients | Percentage |
|---------|-----------------|------------|
| Male    | 73              | 73%        |
| Female  | 27              | 27%        |
| Total   | 100             | 100%       |

73% patients were male and 23% were female.

Table 3: Religion wise distribution of AIDS patients

| Religion | No. of patients | Percentage |
|----------|-----------------|------------|
| Hindu    | 93              | 93%        |
| Muslim   | 7               | 7%         |
| Total    | 100             | 100%       |

93% patients were hindu and 7% were muslim.
Table 4: Marital status wise distribution of AIDS patients

| Marital status | No. of patients | Percentage |
|----------------|-----------------|------------|
| Married        | 95              | 95%        |
| Unmarried      | 5               | 5%         |
| Total          | 100             | 100%       |

95% patients were married and 5% were unmarried.

Table 5: Education wise distribution of AIDS patients

| Education     | No. of patients | Percentage |
|---------------|-----------------|------------|
| Illiterate    | 12              | 12%        |
| Primary       | 36              | 36%        |
| Secondary     | 34              | 34%        |
| Graduate      | 17              | 17%        |
| Post graduate | 11              | 11%        |
| Total         | 100             | 100%       |

36% patients were educated up to primary level.

Table 6: Occupation wise distribution of AIDS patients

| Occupation     | No. of patients | Percentage |
|----------------|-----------------|------------|
| Farmer         | 17              | 17%        |
| House wife     | 7               | 20%        |
| Shop keeper    | 19              | 24%        |
| Laborer        | 55              | 25%        |
| Student        | 1               | 13%        |
| Driver         | 1               | 16%        |
| Total          | 100             | 100%       |

Maximum 55% patients were laborer and only 1% patients was student and driver.

Table 7: Clinical symptoms wise distribution of AIDS patients (n=100)

| Clinical symptoms     | No. of patients | Percentage |
|-----------------------|-----------------|------------|
| Fever                 | 75              | 75%        |
| Vomiting              | 17              | 17%        |
| Diarrohea             | 33              | 33%        |
| Headache              | 20              | 20%        |
| Cough with expectorants| 36             | 36%        |
| Weight loss           | 55              | 55%        |
| Long fever            | 34              | 34%        |
| Haemoptysis           | 35              | 35%        |

In this study Fever was the predominant symptom seen in 75% of cases; followed by weight loss (55%), Cough with expectorants (36%), Haemoptysis (35%), Long fever (34%).

Table 8: Physical finding wise distribution of AIDS patients (n=100)

| Physical finding       | No. of patients | Percentage |
|------------------------|-----------------|------------|
| Pallor                 | 34              | 34%        |
| Jaundice               | 15              | 15%        |
| Clubbing               | 30              | 30%        |
| Generalized lymphadenopathy | 34         | 34%        |
| Oral candidiasis       | 28              | 28%        |
| Skin lesion            | 10              | 10%        |
In this study Physical findings included pallor (34%), generalized lymphadenopathy (34%), clubbing (30%), oral candidiasis (28%), jaundice (15%) and skin lesions (10%).

DISCUSSION

In our study, maximum numbers of patients (25%) belonged to 41-50 years of age group and 2% patients belonged to less than 20 years age group.

Studies done by Sitalakshmi et al., 4 was observed that maximum numbers of patients belonged to 41-50 years of age group. Chanarat et al. 5 also reported similar age group distribution.

Bartholomew Okecuhukwu Ibeh et al. 4 was observed the ages of the HIV+ HAART group 36 ± 10 Yrs.

Males were more commonly affected by the disease (73%) than female (27%) in our study.

Sitalakshmi et al., 5 was observed that male (60%) and female Was (40%).

Chanarat et al., 6 was also observed that male was more effected than female.

In this study Fever was the predominant symptom seen in 75% of cases; followed by weight loss (55%), Cough with expectorants (36%), Haemoptysis (35%), long fever(34%).

The study done by Sitalakshmi et al., 7 most common symptom was weight loss (59%) and vomiting (46%).

M Bhanu Kumar et al 8 was observed that the common symptoms among these patients were fever (79%), weight loss (64%), and oral thrush (24%).

In the study by Chanarat et al., 2 most common symptom was weight loss (60%).

The study conducted by Ramakrishna et al9 Fever was the predominant symptom seen in 59% of cases; followed by weight loss (53%).

Physical findings included pallor (34%), generalized lymphadenopathy (34%), clubbing (30%) oral candidiasis (28%), jaundice (15%) and skin lesions (10%) in our study.

The study conducted by Ramakrishna et al9 founded that anemia (54%), oral candidiasis (30%), generalized lymphadenopathy (25%), and skin lesions (15%).

CONCLUSIONS

The present study found that most of the HIV infected patients were from sexually active age group. Emphasizing the need to strengthen our Information education and communication (IEC) strategies to contain HIV/AIDS.

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