

AIDS and COVID-19 infections: impact on vulnerable Indian population

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Abstract

The co-existence of AIDS and COVID-19 infections is poorly understood. India, the second-most populous nation, is home to 23.49 lakh people living with HIV/AIDS, and the country has no specific policy in this regard. COVID-19 pandemic has created a significant burden on these vulnerable populations in terms of financial aid, availing health services, and psychological issues (fear, anxiety, depression). Therefore, India needs to have a specific policy for these vulnerable populations to cope with any such pandemic.

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The mortality risk in HIV/AIDS-infected people and their susceptibility to COVID-19 infection is poorly understood. I read the mini-review entitled “Human immunodeficiency virus (HIV) and coronavirus disease 2019; impact on vulnerable populations and harnessing lessons learnt from HIV programmes” published by Cordie et al. [1] with utmost interest. It is interesting to see that the group has rightly pointed out the spread of COVID-19 has severely affected the control measures taken by countries to limit HIV. As the disease progresses, the immune system becomes more susceptible to the viral attack and destroys its

own CD4 cells. Despite this fact and severity of the diseases, there are a minimal number of studies describing the coexistence of COVID and HIV. As of May 4, 2021 (4:20 PM CEST), globally, there have been 3,209,109 deaths due to COVID-19 [2], and there are inadequate data on the number of deaths resulting due to COVID-19 and other comorbidities. Both the pandemic (AIDS and COVID-19) coexisting together is called a syndemic [3]. Both the infections share an animal origin with RNA virus as their genetic constitutions.

With regards to India, the country with a 1.36 billion population made a significant improvement where the number of new HIV infections declined in 2019 by 37% from 2010 and by 86% from 1997 [4]. India is the third most affected nation with HIV/AIDS population. In accordance with the national report (2019), a total of 23.49 lakh people (17.98 – 30.98 lakh) are living with HIV/AIDS in India. Adults (15-49 years) account for 0.22% (0.17% - 0.29%), whereas children comprised 3.4% [4]. The country does not have any dedicated hospitals for these patients. Maharashtra, with 3.96 lakh infections, and Andhra Pradesh with 3.14 lakh infections are the two most HIV/AIDS-affected Indian states. However, till July 2020, there were 570 ART centres and 1264 link ART centres running under the National AIDS Control Programme of the government of India [4]. In these challenging times of COVID-19, the pandemic has severely affected the lives of these HIV-infected immunocompromised patients, and it looks like that the AIDS patients are fighting against several pandemics of the virus, including COVID infection, access to food, nutrition, treatment and their social life. All the resources and infrastructure made towards managing HIV/AIDS have been shifted towards COVID-19. This has completely disrupted the services implemented for the management and prevention of HIV infection [5]. Many countries, especially the low- and middle-income countries, imposed a lockdown to combat COVID-19, but the situation worsened the AIDS patients who need continuous monitoring and regular health check-ups. The HIV patients find it difficult to get anti-viral therapies, increased stress or fail to visit the doctors.

A preliminary study carried out in 167 HIV patients in the Pune region of India found that they had a greater burden of anxiety due to COVID lockdown [6]. In such a situation, HIV self-testing and accessing is important, but India has no such policy. Similarly, a survey conducted by Gilead Sciences and AIDS Society of India in the Asia Pacific region (with ten countries, including India) found that 46% of the high-risk population reported a reduction in undergoing HIV confirmatory tests, and more than 80% of the prescribers had reduced preventive prescriptions. The two most important reasons for

the decline in the testing were fear of COVID-19 infection (62%) and travel restrictions (46%) [7].

A mathematical modelling-based study conducted by WHO in the sub-Saharan African region concluded that any obstruction in the supply of ART drugs and other HIV prevention and control services is likely to make the situation worse, thereby increasing the possibility of HIV-related deaths and new incidences [8]. A meta-analysis study suggests that HIV/AIDS-infected people had greater chances of COVID-19 infection (risk ratio 1.24; CI 95% 1.05-1.46) [9]. Ssentongo et al. concluded that the people living with HIV infection in the USA, UK and South Africa had an 80% higher risk of mortality due to COVID-19 infection, where the pooled risk ratio was 1.78 (CI 95% 1.21-2.60) [9]. However, there are no such studies on the Indian population. As India is experiencing a devastating second wave of COVID-19, it may create a significant burden on these vulnerable populations in terms of financial aid, availing health services and psychological issues (fear, anxiety, depression). Therefore, it is the need of the hour for a country such as India to have a policy in this regard so that these people can be given priority and accessibility of resources during any such pandemic.

Conflict of interest

No conflict of interest exists.

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