

Case series of patients evaluated at University Hospital in Newark, New Jersey, with HIV and SARS-CoV-2 coinfection

Francisco A. De Jesus, MD, Debra Chew, MD, Shobha Swaminathan, MD, Michelle DallaPiazza, MD

Background

SARS-CoV-2 is a virus primarily causing respiratory illness that can cause severe disease in the immunocompromised, the elderly, and those with comorbidities. However, the clinical course of SARS-CoV-2 infection among people living with HIV (PLWH) is not well-defined.

Methods

We identified 19 PLWH with confirmed SARS-COV2 infection evaluated in the inpatient or outpatient setting at University Hospital. We abstracted data from the medical record on demographics, comorbidities, medications, lab results, as well as the symptoms, management, and outcomes of SARS-CoV-2 infection.

Results

Of the 19 cases reviewed, 63% were female, with a median age of 54. The median baseline CD4 count was 794; 2 had CD4 <200. Nearly all (18, 95%) were on antiretroviral therapy (ART) and had undetectable viral load. Of those with a documented exposure risk, 3 had occupation related exposure, 1 was a nursing home resident, 1 was recently incarcerated, 2 had sick contacts, and 2 lived in shelters. Hypertension was the most common comorbidity (68%). Treatment consisted of hydroxychloroquine for 37% and convalescent plasma therapy in 1 (5%). With respect to outcomes, 37% had documented hypoxia, 56% had an abnormal chest radiography, 53% were hospitalized with a median length of stay of 11 days, and only one patient required mechanical ventilation. There were no deaths.

Conclusion

In this case series of 19 PLWH with confirmed SARS-CoV-2, we observed a relatively mild clinical course even among hypoxic patients, and no deaths. It is hypothesized that observed favorable outcomes among PLWH could be the result of activity of ART on the SARS-COV2 virus or from the immune dysregulation associated with HIV that can lead to a less damaging cytokine response to SARS-CoV2. Further evaluation and follow up is needed to better understand the clinical course of SARS-CoV-2 infection in PLWH.