ADHERENCE AND VIROLOGICAL OUTCOMES OF HEPATITIS B ANTIVIRAL THERAPY AMONGST INDIGENOUS AND NON-INDIGENOUS PATIENTS IN THE REMOTE TOP END, NORTHERN TERRITORY

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Background: Chronic hepatitis B (CHB) prevalence is four times higher amongst Indigenous than non-Indigenous Australians. Adherence to hepatitis B virus (HBV) antiviral therapy is important to achieve viral suppression and prevent resistance. No studies have described adherence or virological outcomes of HBV antiviral therapy amongst Indigenous Australians.

Methods: We undertook a retrospective analysis of all Indigenous and non-Indigenous people prescribed oral HBV antiviral therapy agents in the Top End, Northern Territory (NT) from 2012 to 2015 using pharmacy dispensing data matched to clinical records. Demographic and baseline clinical characteristics were described for all patients. Patients living outside of Darwin, the capital of the NT, were classified as remote. The primary outcome was viral suppression, with complete virological response defined as undetectable HBV DNA levels, partial response as 20-2000 IU/mL and failure as >2000 IU/mL. Viral suppression and levels of treatment engagement (proportion of people dispensed medication within two months of the end study date or death) were analysed for patients taking HBV antiviral therapy for CHB for at least 12 months.

Results: There were 219 people prescribed HBV antiviral therapy from 2012 to 2015. Of these, 95 people (31 Indigenous and 64 non-Indigenous) had a treatment indication of CHB and were treated for at least 12 months. More than two-thirds of Indigenous patients living in remote areas achieved complete or partial virological response (76%, n=19/25), 56% (n=14/25) achieving complete virological response. Rates of complete virological response amongst Indigenous people in Darwin were 44% (n=4/9), and 88% (n=5/6) and 91% (n=50/55) amongst non-Indigenous people in remote locations and Darwin respectively.

Conclusions: Antiviral therapy treatment for CHB in remote Indigenous communities in the Top End is feasible and can achieve moderate outcomes. However, rates of complete virological response were lower for Indigenous than non-Indigenous people, suggesting a need to further explore factors affecting access to treatment and care.