Anti-viral treatment levels among treatment-eligible people living with chronic hepatitis B in Australia: The REACH-B Study

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Background: Australian representative data on HBV care cascade, including proportion eligible for antiviral therapy is lacking. REACH-B is a national observational cohort study of people with chronic HBV, planned to enroll several thousand participants. This analysis evaluated baseline characteristics and treatment eligibility in preliminary data from seven of planned 24 study sites.

Methods: HBV-related demographic and clinical data are collected from medical records of participants attending clinical sites at enrolment and follow-up visits. This analysis included participants enrolled from seven sites in New South Wales (n=3), Queensland (n=2), Victoria (n=1), and South Australia (n=1), including hospital-based clinics (n=4), general practice or community clinics (n=2), and prison-based clinic (n=1). Treatment eligibility was evaluated among participants not receiving treatment, based on pharmaceutical benefits scheme (PBS) criteria and one national and five international clinical guidelines (Figure). ALT elevation thresholds recommended by the national guideline were adopted for the PBS criteria (>19 U/L in women; >30 U/L in men)

Results: A total of 964 participants were included (57% male; median age 49 years; 65% born in East or South-East Asia; 8% Aboriginal or Torres Strait Islander). HBeAg positive in 15% (n=143); ALT elevated in 59% (n=566); and 8% (n=81) cirrhosis. HBV DNA undetected or <20 IU/mL in 58% (n=561), 20-2,000 IU/mL in 27% (n=261), and >2000 IU/mL in 14% (n=142). Of participants, 46% (n=445) received antiviral treatment, 51% (n=489) were monitored only, and 3% (n=28) underwent initial assessment. Among participants monitored only (n=489) 11% were eligible for treatment by PBS criteria and 3-13% by clinical guidelines, although this rose to 83% using newer Chinese guidelines (Figure).

Conclusion: In this first REACH-B analysis, 11-13% of untreated individuals were eligible for treatment by national criteria/guidelines. As REACH-B expands and achieves greater representativeness, more comprehensive evaluation will assess factors predicting lack of treatment despite eligibility.

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Figure 1: Proportion of untreated REACH-B participants eligible for antiviral treatment based on national and international criteria and clinical guidelines