

## One step closer towards HCV elimination: Lessons from 25 high intensity point-of-care testing campaigns across 14 prisons in Queensland, Australia

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**Background:** High-intensity testing campaigns are effective interventions to progress towards HCV elimination in high prevalence settings. We assessed HCV prevalence and initiation of treatment among people with current HCV infection following high-intensity point-of-care testing campaigns in prisons in Queensland, Australia between 2020-2025.

**Methods:** An observational cohort study was used to assess HCV prevalence and initiation of treatment following high-intensity testing campaigns at 14 prisons in Queensland, Australia. A study team of a nurse leading five health care and research professionals attended each campaign. Prior to February 2023, all participants received point-of-care HCV RNA testing (Xpert HCV Viral Load Fingerstick assay). After February 2023, participants without prior HCV diagnosis received point-of-care HCV antibody testing (Bioline or INSTI) with reflex point-of-care HCV RNA testing (Xpert HCV Viral Load Fingerstick assay) if antibody positive. HCV treatment was offered to those with current infection.

**Results:** Overall 9,295 people received testing in 25 high-intensity HCV testing campaigns across 14 prisons with facility population median coverage of 61% (IQR 45%-88%), median age 35 years, 557 female (6%), 3738 (40%) Aboriginal and/or Torres Strait Islander, and 5478 (59%) reported injecting drug use history. Overall HCV prevalence was 15% (1,370 of 9,295), with 98% (1,343 of 1,370) initiating treatment. Time to treatment ranged from 2 to 42 days. There were reductions in population level prevalence in the two prisons attended three times (27% to 15% and 39% to 16%).

**Conclusions:** This study demonstrated the potential impact that HCV high-intensity testing campaigns can have on progress towards elimination in prisons. Scale-up of similar campaigns involving stakeholder collaboration and utilizing experienced teams across Australia and globally could have a major impact on progress towards HCV elimination.

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