

Evaluating distribution of rapid HCV-antibody self-testing kits to people who inject drugs via needle/syringe vending machines: Outcomes from the VEND-C pilot study

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Background: Hepatitis C virus (HCV) affects approximately 58 million people globally, however, only 20% of those living with HCV are aware of their status. In 2021, the World Health Organization released recommendations for HCV self-testing, stating that it “should be offered as an additional approach to HCV testing services”.

Syringe dispensing machines (SDM) provide sterile needles/syringes to people who inject drugs and may reach sub-populations who do not prefer fixed-site needle and syringe programs. There is a clear rationale for exploring the feasibility and effectiveness of distributing HCV self-testing kits to people who inject drugs via SDMs.

Methods: Between August-September 2022, we dispensed a bespoke HCV-antibody self-testing kit from two syringe dispensing machines in a South-Eastern region of Melbourne, Australia. The kits included a single Orasure oral swab HCV-antibody rapid test, instructions on test use and VEND-C study information. The SDMs automatically recorded time/date order data.

Individuals ordering a self-test kit via the SDM were able to self-complete a web-based, quantitative questionnaire, after which, they could indicate willingness to participate in future research activities, including follow-up quantitative questionnaires and qualitative interviews.

Results: During the two-month pilot period, 63 HCV-antibody self-test kits were successfully distributed via the two SDMs to an estimated 47 individuals (assessed using automatic SDM data).

Only four individuals self-completed the online quantitative questionnaire. Most participants reported that the self-test was ‘very easy’ to perform, though none had yet completed confirmatory testing.

Follow-up quantitative questionnaires and qualitative interviewing continues.

Conclusion: While only a small number of participants completed the quantitative questionnaires, a substantial number of HCV-antibody self-test kits were distributed via the SDMs, indicating feasibility of SDMs as a distribution model. This world-first research project will inform the delivery and expansion of HCV testing modalities internationally, providing crucial data to support ongoing HCV elimination efforts.

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