

# CHANGES IN RISK BEHAVIOURS DURING AND FOLLOWING TREATMENT FOR HEPATITIS C VIRUS INFECTION AMONG PEOPLE WHO INJECT DRUGS: THE ACTIVATE STUDY

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**Background:** The potential risk of hepatitis C virus (HCV) reinfection due to continued injecting risk behaviours might remain an important barrier to HCV treatment among people who inject drugs (PWID). We aimed to evaluate changes in injecting risk behaviours during and following HCV treatment among PWID enrolled in the ACTIVATE study.

**Methods:** The ACTIVATE study was an international, multicentre study of treatment for HCV genotype 2 or 3 infection among people with ongoing (past 24 weeks) injecting drug use or on opioid substitution treatment (OST). Between 2012 and 2014, participants were enrolled at 17 sites in Australia, Belgium, Canada, Germany, Norway, Switzerland and the United Kingdom through a network of drug and alcohol clinics (n=3), office-based practices (n=2), hospital clinics (n=9), and community clinics (n=3). Participants were treated with peg-interferon/ribavirin for 12 or 24 weeks and completed a self-administered behavioural questionnaire at each study visit. Longitudinally measured behavioural outcomes were modelled as binary variables using Generalized Estimating Equations.

**Results:** Among 93 enrolled participants (83% male, median age 41 years), 55 (59%) had injected in the past month. Recent (past month) injecting drug use decreased during HCV treatment and follow-up (aOR 0.88 per incremental study visit; 95% CI 0.83-0.95). No significant changes were found in daily injecting (aOR 0.97; 95% CI 0.88-1.07), use of non-sterile needles (aOR 0.95; 95% CI 0.79-1.13), sharing of injecting paraphernalia (aOR 0.87; 95% CI 0.70-1.07) or non-injecting drug use (aOR 1.01; 95% CI 0.93-1.11). Hazardous alcohol use decreased during treatment and follow-up (aOR 0.55; 95% CI 0.40-0.77) and OST increased between enrolment and end of treatment (OR 1.48; 95% CI 1.07-2.04).

**Conclusion:** Recent injecting drug use and hazardous alcohol use decreased, while OST increased during and following HCV treatment among participants with on-going injecting drug use. These findings support further expansion of HCV care among PWID.

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