

HEPATITIS C VIRUS (HCV) REINFECTION AND INJECTING RISK BEHAVIOR FOLLOWING ELBASVIR (EBR)/GRAZOPREVRIR (GZR) TREATMENT IN PARTICIPANTS ON OPIATE AGONIST THERAPY (OAT): CO-STAR PART B

Dore GJ¹, Grebely J¹, Altice FL², Litwin AH³, Dalgard O⁴, Gane EJ⁵, Shibolet O⁶, Conway B⁷, Nahass R⁸, Luetkemeyer A⁹, Peng C-Y¹⁰, Iser D¹¹, Gendrano IN¹², Kelly MM¹², Huang H-C¹², Hwang P¹², Barr E¹², Robertson M¹², Platt H¹²

¹The Kirby Institute, UNSW Sydney, Sydney, NSW, Australia; ²Yale University, New Haven, CT, USA; ³Albert Einstein College of Medicine/Montefiore Medical Center, Bronx, NY, USA; ⁴Institute of Clinical Medicine, Akershus University, Oslo, Norway; ⁵Auckland City Hospital, Auckland, New Zealand; ⁶Liver Unit, Department of Gastroenterology, Tel Aviv Medical Center and Tel Aviv University, Tel Aviv, Israel; ⁷Vancouver Infectious Diseases Centre, Vancouver, BC, Canada; ⁸ID Care, Hillsborough, NJ, USA; ⁹University of California, San Francisco, San Francisco, CA, USA; ¹⁰China Medical University Hospital, Taichung, Taiwan; ¹¹St. Vincent's Hospital, Melbourne, VIC, Australia; ¹²Merck & Co., Inc., Kenilworth, NJ, USA

Background: High efficacy was observed in Co-STAR Part A, a phase 3 trial of EBR/GZR for 12 weeks in participants on OAT. HCV recurrence consistent with reinfection was observed in 6/296 participants through follow-up week (FW)24, with a reinfection rate of 3.4 reinfections/100 person years (95% confidence interval [CI]: 1.3, 7.5). We provide further analysis of HCV reinfection and injection drug use risk behavior within the ongoing Co-STAR observational study.

Methods: Co-STAR Part B is a 3-year observational study of participants who received ≥ 1 dose of EBR/GZR in Part A ($n = 296$). During Part B, follow-up occurs every 6 months; if HCV RNA is detected, viral genotype and sequencing are investigated. Participant-reported surveys are also administered at each visit to assess risk behavior.

Results: Of 296 participants treated in Part A, 199 were enrolled in Part B (180 and 43 participants have completed follow-up visits at 12M and 24M, respectively). Urine drug screen (UDS) and reported drug use have remained stable in Parts A and B (58-61% had positive UDS and 45-50% reported drug use in the previous month). A further 3 viral recurrences were identified in Part B ($n=1$ each at the enrollment, 6M, and, 18M visits). Spontaneous clearance was seen in 3 of 5 reinfections detected through FW12 and in none of 4 reinfections detected after FW12. The incidence of reinfection from end of treatment through all completed visits is 2.3 reinfections/100 person-years (95% CI: 1.1, 4.4). Including only those with evidence of persistence of reinfection, the effective incidence of reinfection is 1.5 reinfections/100 person years (95% CI: 0.6, 3.3).

Conclusion: HCV reinfection among participants on OAT following EBR/GZR therapy is uncommon, despite ongoing drug use. Additional follow-up data, including risk factors related to incidence of reinfection and specific risk behaviors, will be reported.

[Abstract = 297 words; limit = 300 words (tables/graphs/pictures not permitted)]

Disclosure of Interest Statement:

This study was funded by Merck & Co., Inc.