



Commentary

The U. S. Department of Veterans Affairs (VA) as a model for stronger public health infrastructure to combat HCV and other infectious diseases and reduce disparities

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Hepatitis C virus (HCV) is the leading cause for HCC in the U.S. In this descriptive study of racial inequalities in mortality from hepatocellular cancer (HCC) from 1979 to 2016, Levine et al. reported that mortality from HCC is consistently higher among Blacks than Whites over time and that from 1979 to 1998 this difference in mortality was declining [1]. However, after life-saving but expensive interferon-based treatment for HCV became available in 1998, the disparity in mortality has been increasing [1]. Because data for this study end shortly after the emergence of the much more effective direct-acting antiviral (DAA) treatment for HCV, findings may not entirely reflect current HCC mortality rates and magnitude of disparity.

While the HCV treatment introduced in 1998 resulted in 40% to 70% of patients achieving sustained viral suppression (SVR) [2], most patients required 48 weeks of medication and many had issues with adherence due to tolerability, toxicity, and adverse side effects [3]. In comparison, the DAA treatment approved by the FDA in 2014 typically requires only 8 to 12 weeks of treatment, is tolerated well, has few adverse side effects, and over 90% achieve SVR [2,4].

In response to the advent of DAA in 2014, the U.S. Department of Veterans Affairs (VA), the leader for and largest provider of HCV care in the U.S. [4], ramped up its already aggressive HCV testing efforts in order to treat and cure as many patients as possible. The VA increased HCV treatment capacity, patient tracking and outreach, regional infrastructure, and integrated care for psychiatric and substance use comorbidities [4]. For example, they included automatic HCV RNA testing for any sample that was antibody positive, tailored strategies to regional needs [4], and utilized mobile testing vans for hard to

reach areas. As of Jan 1, 2018, VA had screened more than 80% of veterans in care in the 1945 to 1965 birth cohort [5] and of those with chronic HCV infection who received VA care in 2016, 93% had been linked to HCV care [4].

In the general U.S. population racial disparities in HCV treatment have been noted [6,7] and the Levine et al. study highlights how those disparities also potentially manifest in HCC mortality rates. While the VA provides affordable access to healthcare to veterans, for the majority of the U.S. population access to healthcare varies widely. Approximately 8% of the U.S. population doesn't have health insurance at all [8]; and even for those with health insurance there are barriers to HCV treatment including access to HCV screening, linkage to specialty care providers, and insurance approval criteria and wait times, co-pays, and deductibles [9]. Leaving testing and treatment for HCV and other infectious diseases to individual healthcare and insurance systems and local health departments has proven to be woefully inadequate and not in the best interest of individuals and public health.

The findings and hypotheses presented in this paper represent just one infectious disease and related morbidity and mortality. In 2018 Younossi stated that "it is critical that policymakers bring all the stakeholders together to develop a national policy to eradicate HCV infection from the U.S." [9] Indeed, a national initiative and corresponding increase in infrastructure to combat HCV and other infectious diseases (and the disparities in outcomes that go along with them) have never been more needed.

Declaration of Competing Interest

The authors declare no conflicts of interest.

References

- [1] Levine R, De Grubb MM, Salemi JL, Gonzalez SJ, Aliyu MH, Husaini BA, Zoorob RJ, Hennekens CH. A descriptive study of racial inequalities in mortality from hepatocellular cancer before and after licensure of lifesaving drugs for hepatitis C virus in the United States. *E Clin Med* 2020.
- [2] Seifert LL, Perumpail RB, Ahmed A. Update on hepatitis C: direct-acting antivirals. *World J Hepatol* 2015;7(288):2829–33.
- [3] Butt AA, Wang X, Moore CG. Effect of hepatitis C virus and its treatment on survival. *Hepatology* 2009;50(2):387–92.

The views expressed in this commentary are those of the authors and do not necessarily reflect the position or policy of the Department of Veterans Affairs.

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- [4] Belperio PS, Chartier M, Ross DB, Alaigh P, Shulkin D. Curing hepatitis C virus infection: best practices from the U.S. Department of Veterans Affairs. *Ann Intern Med* 2017;167(7):499–504.
- [5] Park A, Gonzalez R, Chartier M, Rogal S, Yakovchenko V, Ross D, Morgan TR. Screening and treating hepatitis C in the VA: achieving excellence using Lean and system redesign. *Fed Pract* 2018;35(7):24–9.
- [6] Kim NJ, Locke CJ, Park H, Magee C, Bacchetti P, Khalili M. Race and hepatitis C care continuum in an underserved birth cohort. *J Gen Intern Med* 2019; 34:2005–13.
- [7] Vutien P, Hoang J, Brooks Jr. L, Nguyen NH, Nguyen MH. Racial disparities in treatment rates for chronic hepatitis C: analysis of a population-based cohort of 73,665 patients in the United States. *Medicine (Baltimore)* 2016;95(22):e3719.
- [8] U.S. Census Bureau (2019). **Health Insurance Coverage in the United States: 2018**. Accessed 5/3/2020 from <https://www.census.gov/library/publications/2019/demo/p60-267.html>
- [9] Younossi ZM. Disparities in access to direct acting antiviral regimens for hepatitis C virus (HCV): the impact of race and insurance status. *Am J Gastroenterol* 2018;113 (9):1285–6.