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Effective prison-based treatment and linkage to care after release

We read with interest Lara Tavoschi and colleagues' Article on the management of infectious diseases in European prisons.[1] The authors describe the high burden of communicable diseases, including hepatitis C virus (HCV), in European prisons and how prioritising health care in this sector has benefits for both prisoners and the broader community. Similarly, in Australia, there is a disproportionately high HCV seroprevalence among people in prison, reaching up to 50% among those who inject drugs.[2]

WHO has prioritised the elimination of HCV as a public health threat by 2030,[3] and the prison setting must be used to engage prisoners living with HCV in care to achieve these targets. The high prevalence in prisons of both HCV infection and people who inject drugs, and the short average length of incarceration, make prisons ideal for diagnosing infection and providing short-duration, highly effective direct-acting antiviral (DAA) therapy. In this setting, we recently described a nurse-led model of care for HCV treatment in prison that was safe and achieved cure rates greater than 95% among prisoners.[4] These data endorse Tavoschi and colleagues' recommendations and show that system-wide prison programmes are feasible and effective. Importantly, more than 80% of these prisoners had never engaged in specialist HCV care in the community, and 68% reported injecting in the month before incarceration. Prison-based health care can engage people who do not traditionally participate in HCV care and interrupt onward-transmission networks.

Another important health-care gap is linkage to care after release from prison. In a pilot study, we evaluated the rate of successful linkage to HCV care among recently released prisoners. All prisoners had a comprehensive HCV assessment while incarcerated and were planned for treatment before release. On release, participants were referred to a local primary care practice with a detailed summary of their clinical work-up to streamline DAA prescription. There were no cost barriers to treatment uptake. The rate of treatment uptake was determined by registration with the national drug authorisation registry, required before DAA treatment can be dispensed. Among 75 former prisoners, only 19 (25%) were prescribed DAAs within 6 months of release. Of these, seven (37%) commenced treatment in prison when re-incarcerated during this period. Re-incarceration was the only predictor significantly associated with DAA initiation.

This period of time immediately after release from prison can be challenging, characterised by competing priorities including renegotiating social networks, finding stable accommodation, and managing recidivism.[5] There is a need for new models of care to optimise linkage to care after release from prison for this vulnerable population.

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Living in the shadows of hepatitis

Viral hepatitis is a substantial public health problem with an annual mortality rate of 1·34 million deaths, which is similar to mortality from HIV (1·1 million) and tuberculosis (1·4 million).[1] The most common causes of viral hepatitis are the five distinct hepatotropic viruses: hepatitis A to E. Hepatitis B and C have been shown to attack the liver and cause both acute and chronic diseases. Globally, an estimated 257 million people have chronic hepatitis B infections and another 71 million suffer from hepatitis C infections.

The prevalence of viral hepatitis infections varies by geographical region, but Middle East and North Africa (MENA) has been identified as the region most affected by viral hepatitis worldwide. The main culprits for this widespread prevalence of viral hepatitis are factors such as socioeconomic conditions, migration, vaccination, and treatment policies. The MENA region shows wide range of viral hepatitis causes, viraemic prevalence, and diversity in hepatitis B and C genotype distributions.[2] Although hepatitis A and

E viruses are behind most waterborne and foodborne epidemics in Asia and Africa, in MENA countries, hepatitis A virus infections are highly prevalent, more so than hepatitis E, and data show an increase in hepatitis A virus seroprevalence among adults in the region.[3]

WHO aim to combat hepatitis B and C and to achieve elimination of viral hepatitis by 2030. However, the elimination strategies under development for the MENA region might be difficult to implement because of a scarcity of reliable and good-quality data on hepatitis in the region.[4] A systematic overview of hepatitis C infection in the Middle East and North Africa showed that data are outdated, imprecise (because data are based on mixed populations of those who are at risk of acquiring hepatitis C and those who are already infected and at various stages of infection), or completely absent for certain regions or groups, such as men who have sex with men or people who inject drugs.[4] This situation proves to be a serious issue in MENA countries because drug injection is driving the ongoing transmission of hepatitis in the region.[5] With Afghanistan being the world's largest opiate producer, this production has a huge effect on the drug injection practices of neighbouring countries. For example, Iran—a direct neighbour of Afghanistan—has been found to have the highest proportion of people who inject drugs in the MENA region.[5]

In-depth data collection needs to be done on a country-by-country level, with at-risk groups being the main focus. Additionally, educational programmes must take centre stage in elimination strategies, and the general public must be informed about vaccination programmes, specifically for hepatitis A, B, and E, and effective antiviral treatment for hepatitis C. For the MENA region, it is important to address the underlying causes of hepatitis infections so to eliminate them. Only through the implementation of tailor-made approaches will hepatitis elimination strategies be able to identify the many people living in the MENA region who are unaware of their hepatitis infection status.

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