

Healthcare and the Preventable Silent Killer: The Growing Epidemic of Hepatitis C in Pakistan

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Dear Editor,

Twelve years ago, research had proposed that Pakistan was becoming a “cirrhotic state” due to the increasing prevalence of liver diseases (1). Hepatitis C was described as a serious problem even then; in certain areas, up to a fourth of hospital beds were occupied by patients due to the complications of the Hepatitis C virus (HCV) infection. Villages were gripped by fear; no one knew whose life would be taken next by the deadly virus. The government made promises to prevent HCV through stringent regulations after seeing the effects that this deadly disease had. Sadly, they remain undelivered and Pakistan now has one of the highest rates of HCV, second only to Egypt.

It is estimated that 5% -10% of Pakistan’s population up to 19 million people have been infected by HCV (2,3). An epidemic of this scale is unprecedented and is not subsiding anytime soon; there are approximately 240,000 new cases diagnosed in Pakistan every year (2). Neighboring countries do not have Hepatitis C (HCV) rates that come close to this. Iran for example, even with its high rate of injecting drug use (IDU), has an HCV prevalence of less than 0.5% (4, 5).

IDU can often explain a high prevalence of HCV in some countries; it is one of the main risk factors for the disease. Though IDU is present in Pakistan, it is not widespread. Thus, it cannot explain why HCV is so frequent there. Other factors have been attributed to the spread of HCV in Pakistan as well; including blood transfusions and street barbers. Attempts have even been made to tackle some of these issues. For instance, NGOs and provincial governments have tried to regulate blood banks for instance. However, the rates of HCV seem to only keep rising. The question must be asked, “What is different about this coun-

try?” How has this disease been able to get such a strong foothold?

The first step in tackling this problem would be simply looking at a map. Pakistan has four major provinces; Punjab, Sindh, Balochistan and Khyber-Pakhtunkhwa. Punjab and Sindh have the highest prevalence of HCV; about 6.7% and 5%, respectively (6). Balochistan and Khyber-Pakhtunkhwa, on the other hand, face considerably lower prevalence, close to 1% each (2). The discrepancy in HCV prevalence between these provinces is obvious. The provinces that are most pervaded by HCV infection also are the most developed and have the largest population centers, where people are expected to enjoy greatest healthcare resources and thus the best healthcare outcomes. Ironically, it seems that healthcare access and HCV rates seem to go hand in hand; the districts that fare best on the Human Development Index in Pakistan present some of the highest prevalence of HCV (7).

Astonishingly, it seems that healthcare access and HCV prevalence are related in Pakistan; in fact it is estimated that 70% of new HCV infections in Pakistan are attributed to routine medical procedures (3). Particularly concerning are infections caused by contaminated syringes, which are so prevalent in the healthcare settings. With 5-13 injections per capita given yearly, Pakistan has one of the highest rates of injection use in the world (2, 8). In fact, many doctors are considered to be more professional should they give injectable medicines (9). Culture has had an impact, as reused or unsterilized needles have been the major driver of HCV epidemic in Pakistan (3). This cultural misconception, in combination with unsafe injection practices, gives rise to the outbreak of HCV.

There is no evidence of syringe shortage in Pakistan.

And in fact, syringes are rather cheap, going for only about 2-7 rupees (US\$.02- \$.07) each (8). For the most part, physicians do follow the standard guideline of medical procedures, and most patients are aware of the danger of HCV contraction via syringes (10). The real problem is the lack of oversight in private healthcare settings due to lax regulation. Medical staff working in the private sector often lack adequate training to handle and dispose of syringes, leading to more than half receiving needle stick injuries, putting them at a higher risk for HCV infection (11-13). Medical assistants and paramedics often do not have the expertise to properly administer injections. On top of this, few private medical facilities have the means to dispose of used syringes properly, which end up in municipal waste sites or open garbage fields (14). There, scavengers pick them up and in many cases repack and sell them without proper sterilization. All of these factors contribute to a system that is ripe for disease.

The question then becomes how to resolve this issue. As stated previously, HCV infection is not only treatable, but preventable as well. In fact, the incidence of this disease is almost negligible in developed countries. The best practices employed in these countries can also be applied in Pakistan. Firstly, education of medical staff, medical assistants and paramedics in the private sector can be emphasized to ensure proper syringe use and adequate disposal techniques. Secondly, appropriate disposal of used syringes with a strict ban on reusing syringes can be a feasible solution. Thirdly, the integration of HCV services in the existing health care system by providing short-term training of primary physicians with respect to active screening, early treatment and outreach. Fourthly, providing affordable treatment for HCV, which prevents further infections and is itself prevention. Lastly and most importantly, inter-agency collaboration between the government, healthcare system, and communities help disseminate useful information to enhance the public awareness of HCV transmission. By changing the social norm and advocating safe in-

jection practices, HCV epidemic in Pakistan can be greatly reduced.

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