

# Take-home naloxone program is a priority in Iran

Sir,

Overall, opioid addicts are at least ten folds as likely to die in comparison with their peers in terms of age and gender.<sup>[1]</sup> In a study in eastern Iran, opioids were the most common cause of death in intoxicated patients admitted to a referral intensive care unit.<sup>[2]</sup> However, many of these deaths are preventable if patients receive antidote on time.

An effective drug that reverses the respiratory depression caused by opioids is naloxone, an opioid receptor antagonist.<sup>[3]</sup> Naloxone is used in emergency rooms and by ambulance staff. It is highly effective and cheap at the same time, which is usually administrated intravenously, intramuscularly, and subcutaneously. Although naloxone is a prescription medicine in most countries, it has no abuse potential.<sup>[3]</sup>

Based on the rationale that more opioid-overdose deaths might be preventable if people who witness overdoses realize the serious situation in which the opioid abusers are and were able to administer the overdose-reversal drug.<sup>[4]</sup> Hence, taking naloxone to these opioid abusers or their relatives, their close friends, partners, and families started, and it is known "take-home" naloxone programs.<sup>[4]</sup> Take-home naloxone programs are developed to increase the availability of the antidote in places where overdoses are especially likely to occur. Accordingly, in the occurrence of an opioid overdose, naloxone would be readily available and can be administered to the overdose victim before the arrival of an ambulance. This program was first introduced in the 1990s.<sup>[5]</sup> Nowadays, it is developed in the US, Canada, Australia, and many European countries.<sup>[6]</sup>

Opium addiction is one of the major health problems in Iran.<sup>[7,8]</sup> Afghanistan is the world's leading opium producer, and there is a major drug route between Iran, which lies on its western border. Iran is the primary transit route for drugs trafficking from Afghanistan to Europe.<sup>[9]</sup> Iran has an estimated 2 million opioid addicts, 9%–16% of who are injecting drug users.<sup>[10,11]</sup>

Meanwhile, the mortality rate due to opioids that occur annually in this country is relatively high. On the other hand, naloxone as the antidote of opioids is

readily available, and it is safe. Hence, exerting taking home naloxone in this country is rational. Although there is some concern about inducing withdrawal in opioids addicts with extra use of naloxone, the hazard of withdrawal in these patients is negligible if the mortality rate is decreased. Hence, I strongly recommend to the government to consider this program as a priority in Iran. In this regard, providing naloxone as nasal spray may be considered as the first step.

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## Conflicts of interest

There are no conflicts of interest.

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## REFERENCES

1. Stenbacka M, Leifman A, Romelsjö A. Mortality and cause of death among 1705 illicit drug users: A 37 year follow up. *Drug Alcohol Rev* 2010;29:21-7.
2. Mehrpour O, Akbari A, Jahani F, Amirabadizadeh A, Allahyari E, Mansouri B, *et al.* Epidemiological and clinical profiles of acute poisoning in patients admitted to the intensive care unit in Eastern Iran (2010 to 2017). *BMC Emerg Med* 2018;18:30.
3. Phillips RH, Salzman M, Haroz R, Rafeq R, Mazzarelli AJ, Pelletier-Bui A. Elective naloxone-induced opioid withdrawal for rapid initiation of medication-assisted treatment of opioid use disorder. *Ann Emerg Med* 2019;74:430-2.
4. Farrugia A, Fraser S, Dwyer R, Fomiatti R, Neale J, Dietze P, *et al.* Take-home naloxone and the politics of care. *Sociol Health Illn* 2019;41:427-43.
5. McDonald R, Strang J. Are take-home naloxone programmes effective? Systematic review utilizing application of the Bradford Hill criteria. *Addiction* 2016;111:1177-87.
6. The Lancet. Take-home naloxone: A life saver in opioid overdose. *Lancet* 2019;393:296.
7. Alinejad S, Kazemi T, Zamani N, Hoffman RS, Mehrpour O. A systematic review of the cardiotoxicity of methadone. *EXCLI J* 2015;14:577-600.
8. Alinejad S, Aaseth J, Abdollahi M, Hassanian-Moghaddam H, Mehrpour O. Clinical aspects of opium adulterated with lead in Iran: A review. *Basic Clin Pharmacol Toxicol* 2018;122:56-64.
9. Amirabadizadeh A, Nezami H, Vaughn MG, Nakhaee S, Mehrpour O. Identifying risk factors for drug use in an Iranian treatment sample: A prediction approach using decision trees. *Subst Use Misuse* 2018;53:1030-40.
10. Eskandarieh S, Jafari F, Yazdani S, Hazrati N, Saberi-Zafarghandi MB. Compulsory maintenance treatment

program amongst Iranian injection drug users and its side effects. *Int J High Risk Behav Addict* 2014;3:e21765.

11. Alavi SM, Behdad F. Seroprevalence study of hepatitis C and hepatitis B virus among hospitalized intravenous drug users in Ahvaz, Iran (2002-2006). *Hepat Mon* 2010;10:101-4.

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