Prevalence and Circumstances of Opiate Overdose Among Injection Drug Users in the Russian Federation

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ABSTRACT Using a self-administered questionnaire, we examined the characteristics of opiate overdose in 16 cities of the Russian Federation. As indicated by responses from 763 injection drug users who took part in this study, 59% experienced an overdose, 81% reported seeing others experiencing an overdose, and 15% stated that they had witnessed a fatal overdose. The most common drug that caused opiate overdose was heroin (74%), although we also found that, in smaller towns, home-produced opiates tended to be a major overdose-causing agent. There were a number of factors that increased the likelihood of overdose, such as mixing opiates with alcohol and tranquilizers or having a longer history of opiate use. We also found that injecting drug users were reluctant to seek medical assistance when their peers experienced an overdose because of the perceived ineffectiveness of ambulance services and fear of police prosecution. At the same time, 57% of respondents admitted that they lacked appropriate skills to treat overdose. We discuss the implications of these findings for overdose prevention programs in Russia.

INTRODUCTION

In the 1990s, there was rapid growth of illegal drug use in the Russian Federation (RF). From 1990 to 1998, the number of people registered as drug users by the Russian Ministry of Internal Affairs (MVD) rose from 52,034 to 255,529. From 1995 to 1999, the number of registered drug users rose from 155,971 to 359,067 in state substance abuse treatment centers. Estimates suggest that there are about 2 million drug users in RF.

Until the late 1990s, the most popular injected opiate was a liquid derived from opium through a complex heating and mixing process usually performed on an apartment stove. The effects of this compound, called chornaya (black) or khanka, are similar to those of heroin. Among more recent trends is the increased supply of heroin on the Russian market and increase in drug injecting throughout the country. As drug injection increased, so did the number of drug-related deaths and overdoses. From 1990 to 1999, the overdose deaths have risen from 587 to 1,393, as registered by the Ministry of Internal Affairs. Because widespread opiate over-
dose is a relatively new phenomenon in RF and state medical services have struggled under limited resources and poor operating conditions, emergency medical services have limited experience and few resources to address overdose cases.

The epidemiology, treatment, and prevention of opiate overdoses have been given little attention in the Russian academic press. In Russia, there are only a few studies of opiate overdose related to prevalence, clinical diagnostics, and medical law. Official medical data only recently started to include the prevalence of drug overdose. During a focus group conducted with members of harm reduction projects prior to this study, one of the problems identified was the poor state of toxicological equipment, particularly the chemicals necessary to examine overdose deaths, in many parts of RF. Monitoring of overdoses takes place in only a few Russian regions, and this monitoring is limited to prevalence data, which fails to address the circumstances of overdose and the effect of broader social and environmental factors.

In this article, based on the results of a survey of opiate users in the RF, we examine the prevalence and circumstances of opiate overdoses among injection drug users (IDUs). Specifically, we attempt to identify the lifestyle and drug-using patterns of IDUs who overdosed, estimate the availability of emergency services to those suffering from overdose, and assess the willingness of respondents to participate in overdose prevention and treatment education programs.

METHODS

The survey was designed and coordinated by the Harm Reduction Training Project of AIDS Foundation East-West and carried out by Harm Reduction projects (mostly syringe-exchange programs) in 16 cities of RF in March–June 2001. The sample included major industrial centers such as Moscow, Ekaterinburg, Volgograd, Saratov, and Omsk, as well as capitals of less heavily industrialized areas such as Astrakhan, Lipetsk, Ulan-Ude, and Yuzhno-Sakhalinsk. As this list of cities indicates, respondents from the European Russia as well as from Siberia and the Far East were included in the sample.

Based on the results of the focus group discussion conducted with staff members of harm reduction projects, a self-administered questionnaire was developed by the AIDS Foundation East-West office in Moscow. The standardized instrument, containing mostly closed-end items on drug use and overdose circumstances, was later distributed among harm reduction projects responsible for selecting respondents and arranging interviews. In most cases, questionnaires were offered to available clients who attended needle exchanges in the respective cities. After the needle exchange, the project staff asked clients to fill out the questionnaire while they were on premises. The response rate was 47%. In total, 763 respondents took part in this study, but it should be noted that a convenience sampling method prevents us from generalizing our results to other IDUs in RF.

RESULTS

Demographic Profile

The demographic profile of respondents is summarized in Table 1. The majority of respondents, accounting for almost three fourths of the sample (71%), were male. There were 84% who were under 31 years of age, while just over a third of the