Socioeconomic Characteristics and Drug Use Disorders
This is a time for science and solidarity, as United Nations Secretary-General António Guterres has said, highlighting the importance of trust in science and of working together to respond to the global COVID-19 pandemic.

The same holds true for our responses to the world drug problem. To be effective, balanced solutions to drug demand and supply must be rooted in evidence and shared responsibility. This is more important than ever, as illicit drug challenges become increasingly complex, and the COVID-19 crisis and economic downturn threaten to worsen their impacts, on the poor, marginalized and vulnerable most of all.

Some 35.6 million people suffer from drug use disorders globally. While more people use drugs in developed countries than in developing countries, and wealthier segments of society have a higher prevalence of drug use, people who are socially and economically disadvantaged are more likely to develop drug use disorders.

Only one out of eight people who need drug-related treatment receive it. While one out of three drug users is a woman, only one out of five people in treatment is a woman. People in prison settings, minorities, immigrants and displaced people also face barriers to treatment due to discrimination and stigma. Of the 11 million people who inject drugs, half of them are living with hepatitis C, and 1.4 million with HIV.

Around 269 million people used drugs in 2018, up 30 per cent from 2009, with adolescents and young adults accounting for the largest share of users. More people are using drugs, and there are more drugs, and more types of drugs, than ever.

Seizures of amphetamines quadrupled between 2009 and 2018. Even as precursor control improves globally, traffickers and manufacturers are using designer chemicals, devised to circumvent international controls, to synthesize amphetamine, methamphetamine and ecstasy. Production of heroin and cocaine remain among the highest levels recorded in modern times.

The growth in global drug supply and demand poses challenges to law enforcement, compounds health risks and complicates efforts to prevent and treat drug use disorders.

At the same time, more than 80% of the world’s population, mostly living in low- and middle-income countries, are deprived of access to controlled drugs for pain relief and other essential medical uses.

Governments have repeatedly pledged to work together to address the many challenges posed by the world drug problem, as part of commitments to achieve the Sustainable Development Goals, and most recently in the 2019 Ministerial Declaration adopted by the Commission on Narcotic Drugs (CND). But data indicates that development assistance to address drug control has actually fallen over time.

Balanced, comprehensive and effective responses to drugs depend on governments to live up to their promises, and provide support to leave no one behind. Health-centred, rights-based and gender-responsive approaches to drug use and related diseases deliver better public health outcomes. We need to do more to share this learning and support implementation, most of all in developing countries, including by strengthening cooperation with civil society and youth organizations.

The international community has an agreed legal framework and the commitments outlined in the 2019 CND Ministerial Declaration. The United Nations Office on Drugs and Crime (UNODC) provides integrated support to build national capacities and strengthen international cooperation to turn pledges into effective action on the ground.

The theme for this year’s International Day against Drug Abuse and Illicit Trafficking, “Better Knowledge for Better Care”, highlights the importance of scientific evidence to strengthen responses to the world drug problem and support the people who need us. It also speaks to the ultimate goal of drug control, namely the health and welfare of humankind. Through learning and understanding we find compassion and seek solutions in solidarity.

It is in this spirit that I present the UNODC World Drug Report 2020, and I urge governments and all stakeholders to make the best use of this resource.
Acknowledgements

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BOOKLET 6  OTHER DRUG POLICY ISSUES
The designations employed and the presentation of the material in the World Drug Report do not imply the expression of any opinion whatsoever on the part of the Secretariat of the United Nations concerning the legal status of any country, territory, city or area, or of its authorities, or concerning the delimitation of its frontiers or boundaries.

Countries and areas are referred to by the names that were in official use at the time the relevant data were collected.

Since there is some scientific and legal ambiguity about the distinctions between “drug use”, “drug misuse” and “drug abuse”, the neutral term “drug use” is used in the World Drug Report. The term “misuse” is used only to denote the non-medical use of prescription drugs.

All uses of the word “drug” and the term “drug use” in the World Drug Report refer to substances controlled under the international drug control conventions, and their non-medical use.

All analysis contained in the World Drug Report is based on the official data submitted by Member States to the UNODC through the annual report questionnaire unless indicated otherwise.

The data on population used in the World Drug Report are taken from: World Population Prospects: The 2019 Revision (United Nations, Department of Economic and Social Affairs, Population Division).

References to dollars ($) are to United States dollars, unless otherwise stated.

References to tons are to metric tons, unless otherwise stated.

The following abbreviations have been used in the present booklet:

- AIDS: acquired immunodeficiency syndrome
- DALYs: disability-adjusted life years
- EMCDDA: European Monitoring Centre for Drugs and Drug Addiction
- GDP: gross domestic product
- LGBTQI: lesbian, gay, bisexual, transgender, queer or intersex
- HIV: human immunodeficiency virus
- MDMA: 3,4-methylenedioxymethamphetamine
- OECD: Organisation for Economic Co-operation and Development
- UNAIDS: Joint United Nations Programme on HIV/AIDS
- UNESCO: United Nations Educational, Scientific and Cultural Organization
- UNODC: United Nations Office on Drugs and Crime
- WHO: World Health Organization
SCOPE OF THE BOOKLET

This, the fifth booklet of the *World Drug Report 2020*, contributes evidence to support the international community in implementing operational recommendations on cross-cutting issues in relation to drugs and human rights, youth, children, women and communities, including the recommendations contained in the outcome document of the special session of the General Assembly on the world drug problem held in 2016. Many of these cross-cutting issues are complex and their analysis would require the mobilization of evidence that is not always readily available. For this reason, this booklet focuses on one issue in particular: the association between socioeconomic characteristics and drug use disorders.

The booklet begins with a discussion of general concepts of population health in order to shed light on ways in which socioeconomic characteristics are associated with drug use disorders. Next it reviews evidence regarding the association between socioeconomic characteristics and drug use disorders, from those characteristics at the macro and population levels to those at the community level that may define more vulnerable neighbourhoods. The influence of individual-level circumstances and indicators of socioeconomic position on drug use and drug use disorders are then addressed.

The booklet subsequently discusses the possible mechanisms that may explain how different factors, including genetic factors, psychological characteristics, family and peer dynamics, adverse life events and stress, social networks and neighbourhood dynamics, may contribute to the risk of developing drug use disorders. The next section addresses the negative consequences of drug use disorders on the socioeconomic status of individuals and the communities in which they live; it then discusses the impact that socioeconomic inequalities have on access to drug treatment services.

The final section of the booklet reviews evidence on subpopulation groups that may be impacted differently by drug use disorders, such as women, sexually diverse groups, indigenous and aboriginal groups, ethnic and immigrant groups, displaced persons, and those living in rural settings.

Protective factors and risk factors for substance use

- **Protective factors**
  - Safe neighbourhoods
  - Physical safety and social inclusion
  - Quality school environment
  - Access to health care
  - Caregiver involvement and monitoring
  - Health and neurological skills: - coping skills - emotional regulation

- **Risk factors**
  - Poverty
  - Conflict/war
  - Homeless, refugee status
  - Social exclusion and inequality
  - Neighbourhood disorders
  - Peer substance use and drug availability
  - Mental health problems
  - Trauma and childhood adversity

Positive physical, social and mental health

Substance use initiation

Harmful use of substances

Substance use disorders
Drug use disorders are multi-factorial and often follow the course of a relapsing and remitting chronic disease. Socioeconomic inequalities, as well as poverty, limited education and marginalization, may increase the risk of developing drug use disorders and exacerbate their consequences. Conversely, drug use disorders contribute to a number of consequences in an individual’s life, family and community that have an impact on individuals’ academic, employment and income prospects, as well as on their families and communities, thus fuelling a vicious cycle. This cycle may be further exacerbated by the increased risk of exposure to adverse psychosocial and environmental circumstances, which can be associated with depressed socioeconomic conditions. Socioeconomic inequalities may have a particularly strong impact on some groups and settings such as people living in urban areas, or people with minority status.\(^1\) Drug use disorder in people in those groups may increase the stigmatizing attitudes surrounding them, which in turn may further limit their accessibility to treatment.

Drug use disorders are the primary focus of the present booklet. However, in some instances in the discussion, data on socioeconomic characteristics and inequalities are analysed in the broader context of drug use, on the assumption that drug use disorders are at the end of a continuum of behaviours that begins with drug initiation and ends with a drug use disorder.

**SOCIOECONOMIC CONDITIONS AND DRUG USE DISORDERS AT THE MACRO LEVEL**

Socioeconomic inequalities in relation to drug use disorders have mostly been studied in high-income settings, where it has been shown that the socioeconomic conditions of individuals, neighbourhoods and communities are associated with patterns of drug use disorders. The rare studies conducted in middle-income and low-income countries suggest that associations between socioeconomic disadvantage and the risk of drug use disorders in such contexts are, however, weaker.\(^2\)

Importantly, in high-income settings, the risk of drug use disorders is not solely concentrated among

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Socioeconomic characteristics at the individual, community and country levels can influence drug use and drug use disorder patterns either directly (e.g. economic recessions and consequent increases in the level of unemployment have been found to be associated with increases in the level of drug use disorders via psychosocial stress pathways) or by means of intermediate mechanisms (e.g. income inequality at the neighbourhood level can be related to levels of opioid overdose via the geographical distribution of health-care facilities).

In addition, characteristics at the individual, family, community and country levels can interact, making certain groups of individuals especially vulnerable to the consequences of socioeconomic inequalities. For example, although the prevalence of drug use disorders is lower among women than among men, women who do suffer from such disorders appear the most disadvantaged groups in society, but follow a socioeconomic gradient: in comparison with the most affluent groups, people who belong to disadvantaged groups have the highest relative level of risk of suffering from a drug use disorder, while those in middle-income groups have an intermediate level of risk.

Several conceptual frameworks have described how socioeconomic inequalities in health integrate both individual and ecological socioeconomic characteristics. The concept developed by Margaret Whitehead and Göran Dahlgren, which is one of the most widely applied, posits that the health of individuals is not only related to their biological, demographic and constitutional characteristics, but also to lifestyle factors, which are partly shaped by social and community networks, and influenced by living and working conditions and broad socioeconomic, cultural and environmental factors.

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Evidence regarding the link between socioeconomic characteristics and drug use disorders

Evidence regarding the link between socioeconomic characteristics and drug use disorders 5

Lastly, socioeconomic inequalities in drug use unfold throughout the course of a person’s life, with the experience of adversity from childhood onwards possibly influencing the risk of both drug use disorder and socioeconomic disadvantage over the long term.9 This illustrates the existence of a vicious cycle between socioeconomic disadvantage and drug use disorders.

Macro-level socioeconomic characteristics and drug use disorders

Data on associations between country-level socioeconomic conditions, such as overall national income level and rates of drug use disorders, present a somewhat paradoxical picture in which levels of drug use tend to be highest in high-income countries in the Americas, Oceania and Europe, whereas the association in terms of injecting drug use and HIV is particularly strong in Eastern Europe and West Asia.10 Moreover, higher country-level income is associated with a higher prevalence of use and

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associated burden of disease, in terms of healthy years of life lost owing to disability and premature death (disability-adjusted life years (DALYs)).\textsuperscript{11}

Within individual countries, the degree of income inequality is related to the prevalence of drug use\textsuperscript{12} such that the countries with the highest levels of socioeconomic inequality tend to have the highest prevalence of drug use disorders. Insufficient investment in public policies and high levels of stress among individuals accompany such income disparities.

In addition, dramatic changes in macroeconomic conditions, such as those arising from a political or economic crisis, result in increases in poverty and unemployment, which in turn influence individuals’ socioeconomic prospects and stress levels, and may also lead to increases in rates of drug use.\textsuperscript{13,14}


\textsuperscript{13} Tim Rhodes and others, “HIV infection associated with drug injecting in the Newly Independent States, Eastern Europe: the social and economic context of epidemics”, \textit{Addiction}, vol. 94, No. 9 (September 1999), pp. 1323–1336.

\textsuperscript{14} Robin Ghertner and Lincoln Groves, “The opioid crisis and economic opportunity: geographic and economic trends”, \textit{ASPE Research Brief} (September 2018).
Evidence regarding the link between socioeconomic characteristics and drug use disorders

Increased unemployment appears to be a key explanation for the increased levels of drug use during periods of economic downturn, resulting from the associated psychosocial distress. Interestingly, when asked about their reasons for increasing their level of drug use during a period of economic recession, people who had used drugs in Catalonia (Spain), England (United Kingdom) and Poland mainly attributed their behaviour to having more free time on their hands, although that finding is not supported by a systematic review of the topic.

In parallel, rapid economic growth and urbanization in some countries have gone hand in hand with increases in levels of drug use or changes in the types of drugs used. In Brazil, for example, the past-year prevalence of cocaine use among the population aged 15–64 increased from 0.7 per cent in 2005 to

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17 Rhodes and others, “HIV infection associated with drug injecting in the Newly Independent States”.
20 Nagelhout and others, “How economic recessions and unemployment affect illegal drug use”.
22 Nagelhout and others, “How economic recessions and unemployment affect illegal drug use”.

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Note: The figure includes data points from 23 countries (16 countries in West and Central Europe, and Australia, Canada, Israel, Japan, New Zealand, Singapore and the United States of America).
1 per cent in 2016. However, the most significant increase was seen in the use of “crack” cocaine, from a past-year prevalence of 0.1 per cent in 2005 to 0.3 per cent in 2016.

In India, the national household survey conducted in 2019 showed that 2.1 per cent of the population aged 10–75 had used opioids in the past year, with the use of heroin being more prevalent (1.14 per cent) than the use of pharmaceutical opioids (1 per cent) and opium (0.56 per cent). Estimated levels of drug use disorders were: 0.1 per cent for opium use; 0.57 per cent for heroin use; and 0.23 per cent for use of pharmaceutical opioids. Compared with the estimates from an earlier survey conducted in the country in 2004, overall opioid use was estimated to be more than five times higher in 2019.

Changes in labour market characteristics, such as increases in unemployment rates, have been linked to increases in drug use and drug use disorders in a relatively consistent way. In an analysis of data collected in the United States of America from almost 9,000 adolescents who participated in the National Longitudinal Survey of Youth 1997, Ramanathan and colleagues found that increases in the unemployment rate at the regional level during the participants’ childhood were associated with increases in cannabis use: an increase of 1 per cent in the unemployment rate predicted an increase in cannabis use by a factor of 1.08. Another study, using vital statistics for the period 2005–2010 collected in 366 metropolitan areas in the United States, showed a 0.23 per cent increase in deaths caused by drug overdoses for each point increase in the unemployment rate. This effect appeared strongest among individuals aged 25–64, with the intention to commit suicide perhaps explaining a fraction of those overdose deaths.

Significant community and neighbourhood-level socioeconomic characteristics associated with drug use and drug use disorders include but are not limited to poverty, violence, income inequality, low levels of neighbourhood attachment and social capital, community norms favourable to drug use, firearms and crime, and the availability of alcohol and other drugs.

Poverty and violence

A study conducted in 10 cities in Spain between 1996 and 2003 found that people living in neighbourhoods (i.e. census tracts) characterized by socioeconomic deprivation were up to seven times more likely to die from a drug overdose than people living in more affluent areas.

UNODC, response to the annual report questionnaire submitted by Brazil.

Evidence regarding the link between socioeconomic characteristics and drug use disorders

The evidence regarding the link between socioeconomic characteristics and drug use disorders is well-established. A systematic review and meta-analysis examining the findings of six studies showed an increase in opioid use, as measured by comparing the number of hospital admissions (in the Islamic Republic of Iran and Lebanon) and drug-related deaths (in Croatia) before and after situations of armed conflict, as well high levels of opioid use among persons displaced as a result of armed conflict (in Pakistan and Afghanistan). The hypothesized mediating mechanisms included lack of economic opportunities, changes in social norms, and increases in the availability of drugs as consequences of upheaval. In qualitative research conducted in Libya, involving a study of 31 people, including 16 who used drugs, increases in drug availability, the disruption of healthy recreational activities, and stress and trauma resulting from armed conflict and political unrest were the most frequently cited reasons for cannabis or opiate use.

A study of 36 internally displaced adolescents and adults living in a camp in Kachin State in Myanmar reported that drug use disorders had been spontaneously identified as one of the main concerns of displaced persons, who had directly attributed a lack of future prospects and depression to the armed conflict. Moreover, among persons who were already using drugs prior to an armed conflict, there is a risk of increase in the occurrence of risky drug-related behaviours. The drug use survey in Afghanistan reported that the majority of injecting drug users had initiated injecting while they were refugees in the Islamic Republic of Iran or Pakistan. Indeed, there is evidence that, in the context of an armed conflict, drug use could significantly contribute to increases in the breakdown of health-care structures, including difficulties in accessing treatment and higher levels of HIV transmission, resulting from increases in needle sharing.

Links between armed conflict and its consequences and drug use disorders

Another macro-level factor related to drug use is violent conflict. A systematic review and meta-analysis examining the findings of six studies showed an increase in opioid use, as measured by comparing the number of hospital admissions (in the Islamic Republic of Iran and Lebanon) and drug-related deaths (in Croatia) before and after situations of armed conflict, as well high levels of opioid use among persons displaced as a result of armed conflict (in Pakistan and Afghanistan). The hypothesized mediating mechanisms included lack of economic opportunities, changes in social norms, and increases in the availability of drugs as consequences of upheaval. In qualitative research conducted in Libya, involving a study of 31 people, including 16 who used drugs, increases in drug availability, the disruption of healthy recreational activities, and stress and trauma resulting from armed conflict and political unrest were the most frequently cited reasons for cannabis or opiate use.

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References:

characteristics that are more strongly linked to substance use behaviours.

**Income inequality, community disorganization and low social capital**

Although there are no global studies on the association between income inequality, community disorganization, low social capital and drug use disorders, research conducted in high-income countries suggests that, in addition to low levels of individual resources, neighbourhood- or community-level characteristics other than poverty can further influence drug use disorder patterns. Research conducted in New York City shows that people living in neighbourhoods with high levels of income or educational inequality are more likely to use cannabis than those who live in areas with more socioeconomic equality, even when controlling for individual socioeconomic position.\(^{32}\)

One of the mechanisms hypothesized to explain this association between socioeconomic inequality at the city or country level and drug use disorders is social capital, defined as the extent to which people in a community trust and support one another and the institutions that govern them. Social capital can be ascertained in surveys in which participants are asked to describe their neighbourhood and the extent to which they trust other people or the institutions that govern them, but it is also sometimes measured using proxies, such as the level of voter participation in local elections. A study conducted between 2003 and 2010 among all residents of Sweden aged 15–44 included 1,700,896 men and 1,642,798 women. In neighbourhoods where there was a low level of voter turnout in local elections, which was interpreted as a sign of low community social capital, rates of diagnosed drug use disorders recorded in the national health insurance register were 1.5 times higher than in neighbourhoods with a high voter turnout, even after accounting for socioeconomic deprivation at the area and individual levels.\(^{33}\)

Similarly, a study in the United States, based on a national survey from 2000, carried out among 19,430 adolescents aged 12–17, showed that those living in neighbourhoods characterized by social disorganization (i.e. those with a high occurrence of crime, drug sales, abandoned buildings and graffiti, and a transient population), or low social capital (ascertained on the basis of residents’ limited social networks) had a higher prevalence of opioid use than adolescents living in more stable areas.\(^{34}\)

**Community norms regarding drug use and drug and alcohol availability**

Neighbourhood disorganization can be a source of stress and can shape individuals’ social networks and norms regarding drug-related behaviour.\(^{35}\) For example, in disadvantaged neighbourhoods that are

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\(^{35}\) World Drug Report 2018: Drugs and Age – Drugs and Associated Issues among Young People and Older People (United Nations publication, Sales No. E.18.XI.9 (Booklet 4)).
Evidence regarding the link between socioeconomic characteristics and drug use disorders

characterized by low social capital and disorganization, individuals may consider engagement in risky behaviour as normal, which is less likely to be the case in neighbourhoods that are more organized.\(^{36}\)

Beyond place of residence, other important contexts in which people live are, with regard to young people, schools and universities and, with regard to adults, workplaces. Representative studies of adolescents in the United States and Sweden have shown that, while levels of drug initiation and occasional use appear to be highest among students in affluent schools, drug use disorder levels are highest among students attending technical or vocational, as opposed to general, training institutions.\(^{37, 38}\)

In adulthood, while the overall levels of drug use disorders are higher among people who are not employed than among those who are,\(^{39}\) drug use disorder patterns can vary across occupations. In particular, according to a national population survey from 2000, the prevalence of drug use disorders in the United States was highest among people working in food services (16.9 per cent in the preceding 12 months), construction (14.3 per cent), entertainment (12.9 per cent) and the mining industry (11.8 per cent).\(^{40}\)

Within the broad industry categories used in the survey, certain occupations (truck drivers,\(^{41}\) dock workers\(^{42}\) and health-care workers\(^{43}\)) appear to be at a particularly high risk of drug use disorders. These variations partly reflect the particular characteristics of people employed in certain trades, but there is also evidence that workplace climate and permissive attitudes towards drug use in the workplace, or outside it, also influence drug-related behaviours.\(^{44}\)

Individual socioeconomic circumstances and drug use disorders

Most research on socioeconomic inequalities in relation to drug use disorders has been aimed at identifying relationships between individual-level indicators of socioeconomic position and drug use patterns. Among adolescents, while high socioeconomic position appears to be associated with drug initiation and occasional use,\(^{45}\) those who come from less advantaged backgrounds are more likely to engage in polysubstance use\(^{46}\) or have drug use disorders.\(^{47}\) Adolescents from disadvantaged backgrounds may have higher vulnerability to drug use

40 Donna M. Bush and Rachel N. Lipari, “Substance use and substance use disorder, by industry”, in The CBHSQ Report (Rockville, Maryland, United States, Substance Abuse and Mental Health Services Administration, 2013).
disorders than those from more advantaged backgrounds. They may also be more likely to have a family history of drug use disorders.\(^{48}\) Moreover, research increasingly points to the role of other risky health behaviours such as “sleep disparity”,\(^{49}\) which could partly mediate the effects of socioeconomic inequalities in young people.\(^{50}\)

Considering the academic performance of students as an indicator of their socioeconomic status and future prospects, research has consistently found that young people who underperform have higher levels of drug use than those who obtain good academic results,\(^{51}\) with obvious possibilities for causality to run in either direction or from third variables to influence both of those outcomes. For example, in a study conducted among 500 adolescents in Ibadan in south-west Nigeria, it was found that students earning low grades in school were over three times more likely to use psychoactive substances than those with high grades.\(^{52}\)

Among adults living in high-income countries, drug use disorders tend to be more prevalent among those who experience socioeconomic disadvantage, which is most frequently measured in terms of low educational level, low income level or unstable employment status, or a combination of these factors. These socioeconomic inequalities have been observed both in the general population and in samples of high-risk populations. A review of studies conducted in Germany found that low levels of educational attainment were associated with the use of cannabis and other drugs among young adults.\(^{53}\) Similarly, a study of


\(^{49}\) Nirav P. Patel and others, “Sleep disparity’ in the population: poor sleep quality is strongly associated with poverty and ethnicity”, \textit{BMC Public Health}, vol. 10 (2010).

\(^{50}\) Judith Owens and others, “Association between short sleep duration and risk behavior factors in middle school students”, \textit{Sleep}, vol. 40, No. 1 (January 2017).


\(^{52}\) Olayinka Atilola, Olatunde O. Ayinde and Oluwaseun Adetan, “Beyond prevalence and pattern: problematic extent of alcohol and substance use among adolescents in Ibadan South-West Nigeria”, \textit{African Health Sciences}, vol. 13, No. 3 (September 2013), pp. 777–784.

\(^{53}\) Dieter Henkel and Uwe Zemlin, “Social inequality and sub-
Evidence regarding the link between socioeconomic characteristics and drug use disorders

more than 2,000 young adults living in Australia found that non-completion of high school predicted drug use. Similar data have been published in the Islamic Republic of Iran, Saudi Arabia and the United States. In a study conducted among 2,200 people in prison across seven provinces in the Islamic Republic of Iran, individuals who had a drug addiction were, on average, less educated than those who did not.58

In France, in a study conducted among 1,200 young adults, the experience of unemployment predicted an increase in the risk of cannabis use and abuse, in particular among individuals who had a low level of educational attainment and who may have had the lowest employment prospects.59 Likewise, in Spain, the experience of unemployment has also been found to be associated with heavy cannabis use in both men and women.60 There is also evidence that low income levels and poverty are associated with drug use behaviours, both in the general population and in specific subgroups, as demonstrated in a study conducted among 1,000 people treated for tuberculosis in South Africa, in which participants who were experiencing poverty were more likely to have drug use disorders than those who were not.62 Moreover, in a sample of 1,400 women living with HIV in Canada, the experience of economic hardship was significantly related to higher levels of drug use.63

Above and beyond an individual's socioeconomic position at a particular point in time, his or her socioeconomic trajectory from childhood to adulthood is also associated with the risk of drug use disorder. In the study conducted in France mentioned above, the level of cannabis use disorder among participants who experienced a persistently low socioeconomic position, or downward socioeconomic mobility in relation to their parents' circumstances, was double the level among those who had enjoyed favourable socioeconomic circumstances throughout their life course.64 Additionally, the experience of food insecurity, which is related to an individual's income level, has also been found to be associated with drug use disorder risk, even when adjusting for other socioeconomic characteristics.65

To date, most of the data on the relationship between individual socioeconomic circumstances and drug use have come from high-income countries. Recent evidence from low- and middle-income countries suggests that socioeconomic disparities in relation to drug use disorders tend to be less significant in such countries than in high-income countries. For example, in a representative population survey conducted in Brazil, individuals with a higher level of schooling were more likely to report...
lifetime drug use, with the most prevalent substances used being cannabis and cocaine, followed by solvents. The prevalence of lifetime drug use was 8.2 per cent among people who had not completed elementary education, compared with 16.6 per cent among those holding a university degree. However, the relationship between the participants’ educational attainment and recent drug use was not statistically significant.66

A recent systematic review examining the relationship between socioeconomic position and drug use disorders in India reported only three studies showing that workers in certain manual occupations appear to be at high risk.67 A national drug survey, conducted in Pakistan in 2013, found that, among people reporting regular opioid use, 35.7 per cent engaged in casual work (compared with 4.1 per cent of casual workers who did not use opioids) and 39.8 per cent did not work (compared with 19.7 per cent who did not use opioids).68

The studies mentioned above provide evidence of links between socioeconomic characteristics and drug use disorders without making a clear inference regarding cause and effect. However, drug use disorders can have an effect on an individual’s educational attainment and socioeconomic standing. Research conducted among adolescents has clearly shown that the use of psychoactive drugs such as cannabis, in particular early on in life and frequently, and/or in large quantities, can have detrimental effects on school performance69 and educational achievement.70 For example, in the United States, data from a national study, in which high school students were observed until adulthood, show that frequent cannabis use (six or more times in a month) predicts a lower probability of obtaining a university degree.71 This association could be due to the biological effects of cannabis on brain

66 Francisco Inácio Bastos and others, 3rd National Survey on Drug Use by the Brazilian Population (2017).
67 Cheng and others, “Social correlates of mental, neurological, and substance use disorders in China and India”.
68 UNODC and Pakistan, Ministry of Interior and Narcotics Control, Drug Use in Pakistan 2013 (Islamabad, 2013).
70 Maria Melchior and others, “Early cannabis initiation and educational attainment: is the association causal? Data from the French TEMPO study”, International Journal of Epidemiology, vol. 46, No. 5 (October 2017), pp. 1641–1650;
71 Maggs and others, “Predicting young adult degree attainment by late adolescent marijuana use”.

FIG. 11 Drug use in Brazil, by education level, 2017

Source: Francisco Inácio Bastos and others, 3rd National Survey on Drug Use by the Brazilian Population (2017).
functioning (i.e. decreases in memory, concentration and attention), as well as to the progressive disinvestment of adolescents in school, both of which may lead to academic failure. As educational attainment is important in terms of long-term job prospects in many settings, the chances for adolescents with drug use disorders to achieve socioeconomic integration can be permanently reduced.

In adults, persistent cannabis use has been shown to contribute to downward social mobility, financial difficulties and workplace difficulties in midlife, even after accounting for socioeconomic adversity or family problems early on in life. A study conducted in China among 1,347 people who injected drugs found low levels of education and a high likelihood of criminal behaviour. Likewise, a review of 130 studies published in 2011 concluded that having a drug use disorder increases the chances of unemployment and job loss, and showed that unemployment increases the risk of relapse after drug addiction treatment, suggesting a self-reinforcing circle.

It is important to note here that the impact of drug use disorders on socioeconomic prospects – in particular the increased risk of unemployment, poverty and homelessness – may be associated with stigmatizing attitudes and, additionally, with consequences within the criminal justice system. Stigmatizing attitudes contribute to a lack of access to health and social services for people who use drugs, thus exacerbating the potential harms of substance use behaviours.

For people who use drugs or who are diagnosed with a drug use disorder, experiences in the criminal justice system can further influence their living circumstances after they are released. Such experiences often worsen their socioeconomic situation and increase their stress levels and their risk of not only continuing to use substances but also of being reincarcerated.

MECHANISMS UNDERLYING THE INTERACTION BETWEEN SOCIOECONOMIC DISADVANTAGE AND DRUG USE DISORDERS

Following the theoretical model proposed by Dahlgren and Whitehead, mentioned above, several mechanisms may underline the interaction between socioeconomic disadvantage and drug use disorders: genes, psychological characteristics, adverse life events and stress, social networks and neighbourhood dynamics.

Genetic factors

Several recent studies have found genetic contributions to individuals’ educational attainment, income or neighbourhood social deprivation, as harm reduction linked to non-fatal overdose amongst sex workers who use drugs: results of a community-based cohort in Metro Vancouver, Canada. International Journal of Drug Policy, vol. 76 (2020).

72 OECD, Data, “Employment by education level”.
77 Shira Goldenberg and others, “Police-related barriers to
well as their offspring’s educational attainment and well-being, possibly due in part to innate differences in cognitive ability and intelligence. There also seems to be some overlap between the genetic risk of socioeconomic deprivation and substance use disorders, although to date this has not been studied extensively in the context of the use of controlled drugs.

Genetic influences, which can heighten overall vulnerability to drug use disorders, become increasingly evident throughout adolescence and may play a role in propelling individuals from drug initiation into more established patterns of use. Lastly, evidence gathered in recent years indicating that interactions between genes and environmental characteristics and epigenetic mechanisms play a key role in determining vulnerability to drug use disorders, indicates that environmental characteristics control the extent to which innate factors can influence the risk of drug use disorders. This implies that protecting individuals from adverse experiences will reduce the likelihood of the genetic potential of drug use disorders becoming expressed.

Family and peer dynamics

The family can influence an individual’s risk of using drugs and being diagnosed with a drug use disorder, partly via genetic but mostly via environmental mechanisms. In families characterized by a low socioeconomic position and parental drug use, and perhaps by single parenting, a higher risk of substance use behaviours has been found. As evidenced by data from an international study of adolescents in Europe, parental supervision and monitoring, which could be related to low levels of drug use among young people, are less common among families that experience socioeconomic difficulties than among families that do not. A lack of pleasurable, drug-free activities among young people growing up in socioeconomically disadvantaged families has also been found to contribute to higher levels of drug use. Moreover, among adults, members of groups characterized by socioeconomic disadvantage tend to have more positive attitudes regarding drug use, which could potentially contribute to higher levels of drug use and related disorders.


Adverse life events, stress, lack of support networks and resources, and their psychological consequences

The impact of socioeconomic inequalities on drug use disorders can also be examined from the perspective of heightened exposure to adverse life events (e.g., emotional and physical abuse and neglect, and community violence) and chronic stress. These life experiences can shape an individual’s perception of his or her environment and fuel psychological processes such as impulsivity and fatalism, which in turn can contribute to the risk of developing drug use disorders.

Moreover, it has also been suggested that the experience of poverty has a direct, negative impact on cognitive functions, thereby narrowing an individual’s decision-making skill development. The experience of socioeconomic adversity in early life has been shown to shape brain structures associated with the regulation of emotions, which could also be involved in an elevated risk of drug use disorder.

Later in life, suggesting that the relationship between early life adversity and later risks could at least in part be mediated via biological pathways.

Community-level consequences

In addition to having negative consequences for individuals, a high prevalence of drug use disorders can have an impact on communities and neighbourhoods. In particular, negative outcomes among children and young people growing up in families and communities characterized by drug use disorders have been documented. Two ecological studies conducted in the United States found that rates of drug-related arrests and hospital discharges related to opioid overdoses were associated with rates of child maltreatment. It was also observed that the

Socioeconomic consequences of drug use disorders

The relationship between socioeconomic inequality and drug use is not deterministic. In addition to the direct effects of socioeconomic circumstances on an individual’s patterns of drug use disorders, it is also important to take note of the finding that drug use, particularly if frequent and in high amounts, can have negative consequences for an individual’s socioeconomic status and community.


100 Jennifer Price Wolf and others, “Are community level prescription opioid overdoses associated with child harm? A
increase in overdoses caused by prescription opioids between 2001 and 2011 in the United States coincided with a 2 per cent increase in hospital discharges related to child maltreatment and a 1 per cent increase in those related to child injury.\textsuperscript{101}

Lastly, drug use may influence the socioeconomic characteristics of neighbourhoods. The illicit drug market provides economic opportunities that can lead individuals to disengage from the legal labour market and discourages official businesses, thereby perpetuating a cycle of poverty and social disorganization that can fuel further drug use disorders.\textsuperscript{102}

\section*{SOCIOECONOMIC INEQUALITIES IN ACCESS TO EFFECTIVE DRUG TREATMENT}

Estimates suggest that only one out of every eight people with a drug use disorder worldwide has access to treatment, although there are large geographical disparities in that regard.\textsuperscript{103} Access to treatment for drug use disorders tends to be more limited in countries with a low or intermediate level of economic development than in those with higher levels of development, which may be the result of a combination of ignorance about drug use disorders and inadequate access related to limited financial resources.\textsuperscript{104} For example, global mental health surveys show that, among people who meet the criteria for a drug use disorder, 43.1 per cent of those in high-income countries, 35.6 per cent of those in upper-middle-income countries and 31.5 per cent of those in lower-middle-income countries reported needing treatment.

Exaining actual access to minimally effective treatment (defined as four or more sessions with a mental health and/or general practice physician and six or more sessions with a non-medically trained professional), the same study reported an average access rate of 7.1 per cent, with significant disparities across regions: 10.3 per cent in high-income countries, 4.3 per cent in upper-middle-income countries and 1 per cent in low- to lower-middle-income countries. The insufficient availability of treatment services is the main explanation for such country-level differences in access.

Moreover, access to HIV interventions, including anti-retroviral therapy, is limited in several countries. For example, a systematic review found that, in 2017, needle and syringe programmes had distributed just 33 needles and syringes per person per year to injecting drug users, and only 16 per cent of injecting drug users had access to medication-assisted therapy.

Less than 1 per cent of injecting drug users lived in countries where the coverage of both of these key interventions was high. Furthermore, in most of the 54 countries reporting data to the Joint United Nations Programme on HIV/AIDS, the coverage of needle and syringe programmes and opioid substitution therapy remained low between 2014 and 2018.\textsuperscript{105, 106}

At the individual level, a lack of, or insufficient, health insurance coverage,\textsuperscript{107} low income\textsuperscript{108} and educational levels are also associated with low levels of access to drug use treatment.\textsuperscript{109} Moreover, indi-

\textsuperscript{101} Ibid.
\textsuperscript{103} See Booklet 2 of the present report.
\textsuperscript{105} Sarah Larney and others, Global, regional, and country-level coverage of interventions to prevent and manage HIV and hepatitis C among people who inject drugs: a systematic review”, Lancet Global Health, vol. 5, No. 12 (December 2017), pp. e1208–e1220.
\textsuperscript{106} UNAIDS, Health, Rights and Drugs: Harm Reduction, Decriminalization and Zero Discrimination for People Who Use Drugs (Geneva, 2019), figure 2.
\textsuperscript{108} Atilola, Ayinde and Adeitan, “Beyond prevalence and pattern”.
\textsuperscript{109} S. Evans-Lacko and others, “Socio-economic variations in the mental health treatment gap for people with anxiety, mood, and substance use disorders: results from the WHO World Mental Health (WMH) Surveys”, Psychological
viduals who experience incarceration may have particular difficulties in accessing treatment, as suggested by a study conducted in Canada among 2,700 people who injected drugs, which showed that the existing treatment options were insufficient to meet existing needs.

Stigmatizing attitudes represent one of the barriers preventing people with drug use disorders from gaining access to health and social services. Such attitudes may be further exacerbated by the additional stigma attached to low socioeconomic status or association with the criminal justice system. For example, a qualitative study conducted among a sample of homeless people in Kingston, Ontario, Canada, showed that those with drug use disorders frequently reported having experienced stigmatizing and shaming experiences when in contact with health-care services. This in turn could lead them to forego or abandon access to care. Other research, conducted in Nigeria, showed that 40 per cent of people who self-identified as participating in high-risk drug use behaviours wanted treatment but were unable to get it, with a lack of financial resources and available treatment services and fear of stigma being the main barriers to accessing such treatment.

Sometimes, even when they do access appropriate health services, people with drug use disorders who have a low level of education or income or insufficient health insurance coverage have difficulty accessing quality, evidence-based treatment or have difficulty adhering to the treatment regimen. This may be the case in particular when the health-care system is fragmented and therefore difficult for individuals to navigate.

Women

Although the prevalence of drug use disorders is generally lower among women than men, women who do have a drug use disorder appear to be particularly vulnerable. First, compared with men, women who have a drug use disorder are more likely to have a co-morbid psychiatric disorder. For example, in a study conducted among 226 women who were injecting drug users in five different countries in Europe (Austria, Italy, Poland, Spain and the United Kingdom of Great Britain and Northern Ireland (Scotland)), 87 per cent had a psychiatric co-morbidity (mainly depression, panic disorder and post-traumatic stress disorder) and 68 per cent had experienced interpersonal violence in their current or most recent intimate relationship in the preceding 12 months. Second, women face particular risks in terms of sexual and reproductive health, as well as the experience of sexual violence, particularly in contexts of poverty and drug use.

A study conducted in Delhi found that women who injected drugs had difficulty using contraceptives reliably, owing to gender imbalances and difficulties in imposing their will, which could lead to a limited capacity to act and heighten the risk of exposure to violence.

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112 UNODC, Drug Use in Nigeria 2018 (Vienna, 2019).
119 Vartika Sharma and others, “Women and substance use: a qualitative study on sexual and reproductive health of...
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Women who have a partner who also has a drug use disorder can suffer as a result of the partner’s addiction, as well as its consequences. For example, a study conducted among women whose partners were incarcerated, in many cases for drug-related reasons, found that the women who had been “left behind” had seen their financial resources decrease significantly, leading them to engage in transactional sex.120

Women who are mothers are additionally vulnerable because their children’s welfare can also be affected by their drug use.121 In particular, there is evidence that, among women who use psychoactive drugs, the likelihood of loss of child custody is related to low socioeconomic status and involvement in the criminal justice system (i.e. problems with the police or a history of incarceration).122 This may reflect the effects of an accumulation of stresses and difficulties among mothers who use drugs and who have socioeconomic or criminal justice-related problems in parallel, which altogether impedes their parenting abilities. Lastly, being a mother can reduce the chances of successfully entering treatment for a drug use disorder, owing to conflicting demands, a lack of adequate child-care services provided by the health-care facility, or fear of loss of child custody.123

Sexually diverse populations

In general, the relationship between belonging to lesbian, gay, bisexual, transgender, queer or intersex (LGBTQI) groups and levels of drug use disorders is not well described globally.

Studies of sexual minorities in a few countries have shown that adolescents and adults who have sexual relations with people of the same sex or who identify as lesbian, gay, bisexual transgender, queer or intersex are more likely to have drug use disorders than people who identify as heterosexual.124

In the United States, according to a nationally representative monitoring study of youth, 50 per cent of high school students who identified as non-heterosexual had used cannabis, compared with 35 per cent of those who identified as heterosexual; when asked about current cannabis use, 30 per cent of non-heterosexual students responded positively, as compared with 19 per cent of heterosexual students. Similar patterns were observed for other controlled drugs: 11 per cent versus 6 per cent for lifetime use of hallucinogenic drugs; 8 per cent versus 4 per cent for lifetime cocaine use; 18 per cent versus 7 per cent for lifetime inhalant use; 9 per cent versus 3 per cent for lifetime methamphetamine use; 9 per cent versus 3 per cent for lifetime MDMA (“ecstasy”) use; and 6 per cent versus 1 per cent for lifetime heroin use.125

Similar trends were observed in a study conducted in eight European countries, where 15-year old children who reported being attracted to young people of the same sex, or to both those of the same and those of the opposite sex, had levels of cannabis use nearly two times higher than those who were only attracted to young people of the opposite sex.126 In adulthood, these differences in drug use persist: a study conducted in the United States found that...
overall rates of drug use disorder were 50 per cent higher among non-heterosexual persons than among heterosexual persons, with the difference between those rates being greater for women.\textsuperscript{127} In these studies, this increased risk of drug use disorders appeared to be higher among women who were not heterosexual than among men;\textsuperscript{128} it was also elevated among individuals who were transsexual.\textsuperscript{129}

Transgender people represent another group at high risk of drug use: data from 406 transgender study participants in Canada showed a prevalence of use of controlled drugs of 12.3 per cent, a prevalence of cocaine use of 7.3 per cent (compared with 1.3 per cent in the general population) and a prevalence of amphetamine use of 1.3 per cent (compared with 0.3 per cent in the general population) in the past year.\textsuperscript{130} This increased risk of drug use among individuals who belong to LGBTQI groups may be explained in part by the stigma and discrimination, whether real or perceived, that such individuals often face from an early age.\textsuperscript{131} The experience of socioeconomic disadvantage among people who belong to LGBTQI groups and – a situation that appears more commonly among people who identify as bisexual or who are not sure about their sexual orientation than among those who identify as heterosexual\textsuperscript{132} – may compound the risk of drug use disorders.

### Indigenous and aboriginal peoples

There is extensive evidence documenting the increased risk of drug use disorders among individuals who are members of indigenous and aboriginal peoples. For example, in the United States and Canada, cannabis use disorders are 20–50 per cent more common among indigenous peoples than among Caucasians.\textsuperscript{133} In terms of mortality, up until 2010, Native Alaskans represented the ethnic group in North America with the highest rate of drug-related deaths (15.6 per 100,000 population).\textsuperscript{134} The elevated rate of death among indigenous peoples in North America seems to be particularly related to psychostimulant use; importantly, this rate has increased in recent years.\textsuperscript{135}

In Australia and Oceania, mental and drug use disorders are the leading cause of non-fatal burden of illness among people belonging to indigenous groups.\textsuperscript{136} It has also been suggested that the rates of use of certain drugs such as inhalants are elevated among the native populations of Alaska and the Arctic.\textsuperscript{137} Review studies suggest that this increased

\textsuperscript{127} Kahle and others, “Functional and structural social support, substance use and sexual orientation”.
\textsuperscript{137} Venla Lehti and others, “Mental health, substance use and
risk may be due to disadvantaged socioeconomic circumstances\textsuperscript{138} and high levels of stress and poor family cohesion.\textsuperscript{139}

**Ethnic groups and immigrants**

The data relating to ethnic differences are particularly complex. For example, in the United States, compared with their Caucasian counterparts, rates of cannabis use among African-American adolescents, in particular female adolescents, tend to be lower. However, these trends tend to converge upon reaching adulthood\textsuperscript{140} and over time.\textsuperscript{141} The level of opioid mortality is also lower among African-Americans than among Caucasians,\textsuperscript{142} but the levels of cocaine use and cocaine use disorder are higher among African-Americans than among other ethnic groups.\textsuperscript{143}

In other settings, variability in levels of drug use disorders across ethnic groups has also been observed. In Germany, the level of cannabis use tends to be higher among Turkish-German young people than among young people who do not have an immigrant background.\textsuperscript{144} Similarly, in the United Kingdom, black and “mixed-race” people are also at higher risk of cannabis use than white people, but this risk is low among people who originate from South-East Asia, particularly women.\textsuperscript{145} Despite the dearth of data from other settings, it is important to note that levels of drug use have been found to vary across ethnic groups in other countries; for example, they appear to be elevated among young people belonging to hill tribes in northern Thailand.\textsuperscript{146}

Differences in drug use disorders across ethnic and immigrant groups may in part reflect differences in socioeconomic difficulties, as well as the general experience of stigma and discrimination. For instance, a study conducted among 2,315 African-American and white college students in the United States showed that African-American women who reported having experienced discrimination in the past were more than three times more likely than those who did not to report recent cannabis use.\textsuperscript{147} In parallel, the rate of cannabis use was also elevated among black women who reported being homosexual, suggesting that discrimination associated with different types of minority status identities can accumulate and potentially synergize, consistent with the intersectional framework of health.\textsuperscript{148}

Although findings regarding the elevated risk of drug use and drug use disorder across ethnic groups are mixed and generally come from high-income countries, there is clear evidence that, in cases of drug use disorder, people from ethnic groups are less likely to receive optimal health care. For instance, a study conducted among 789 opioid users, recruited across...
the United States, found that, two years after the initiation of treatment, accounting for other characteristics including sociodemographic factors, participants who were Hispanic or African-American were less likely to receive buprenorphine than those who were white.\textsuperscript{149} Some of the most common barriers observed were lack of health insurance coverage, difficulties in access and high prices. Other research has confirmed that access to and completion of treatment for opioid use also vary across ethnic groups.\textsuperscript{150}

Studies conducted among immigrant populations, who tend to experience high levels of socioeconomic difficulty, provide additional insights into the socioeconomic and contextual factors that can influence drug use patterns. For example, a study comparing a small sample of young Brazilians living in Brazil (n = 161) and the United Kingdom (n = 164) found that levels of drug use were higher among the latter group. Moreover, patterns of drug use reported by the Brazilians living in the United Kingdom were shaped by socioeconomic characteristics, such as low educational level, which did not seem to be the case among those living in Brazil.\textsuperscript{151}

In other research, based on observations conducted on the border between the United States and Mexico in San Diego and Tijuana, it has been reported that immigrants are at high risk of drug use in circumstances where they mix with the local population, if they also experience unfavourable socioeconomic circumstances.\textsuperscript{152} Moreover, the impact of migration can be passed down to the next generation: in particular, a recent systematic review and meta-analysis found that the children of immigrants who are left behind when their parents emigrate are 1.24 times more likely to use psychoactive drugs than the children of non-immigrants.\textsuperscript{153}

In addition, immigrant status can compound risks associated with unfavourable socioeconomic circumstances. For example, among women engaged in sex work on the border between Mexico and Guatemala, there is evidence that those with immigrant status have a higher likelihood than non-immigrants of engaging in drug use.\textsuperscript{154} Similarly, several studies suggest elevated levels of risky drug-related behaviours among immigrants who use drugs, for instance, those who have migrated from the former Soviet Union to Germany\textsuperscript{155} or from Myanmar to China.\textsuperscript{156} Naturally, there is great heterogeneity among immigrant populations, their contexts and their drug use risks, and there are still large gaps in related research. There is a need to study these aspects in detail in specific settings in order to yield information that is relevant for policy and programme design, as well as the implementation of effective health services.

### Displaced persons

Displaced persons are people who have been forced to leave their homes because of armed conflict, generalized violence, human rights violations or environmental disasters, and who have moved to another area within their own country (internally among migrant populations: a narrative review\textsuperscript{156} among migrant populations: a narrative review, Substance Use & Misuse, vol. 53, No. 9 (July 2018), pp. 1558–1570.}

\textsuperscript{153} Gracia Fellmeth and others, “Health impacts of parental migration on left-behind children and adolescents: a systematic review and meta-analysis\textsuperscript{154}, Lancet, vol. 392, No. 10164 (December 2018), pp. 2567–2582.}

\textsuperscript{154} Teresa Rocha-Jiménez and others, “The influence of migration in substance use practices and HIV/STI-related risks of female sex workers at a dynamic border crossing\textsuperscript{155}, Journal of Ethnicity in Substance Abuse (February 2019), pp. 1–18.}

\textsuperscript{155} Lineke Derks and others, “Risk behaviours and viral infections among drug injecting migrants from the former Soviet Union in Germany: results from the DRUCK-study\textsuperscript{156}, International Journal on Drug Policy, vol. 59 (September 2018), pp. 54–62.}

\textsuperscript{156} Xin Chen and others, “Burmese injecting drug users in Yunnan play a pivotal role in the cross-border transmission of HIV-1 in the China-Myanmar border region\textsuperscript{5}, Virulence, vol. 9, No. 1 (2018), pp. 1195–1204.}
displaced persons), or to another country (refugees).\textsuperscript{157} Although a review published in 2012, based on data collected between 1971 and 2007 in Afghanistan, Bosnia and Herzegovina, Croatia and Pakistan, found weak evidence of elevated levels of drug use among displaced persons,\textsuperscript{158} more recent data suggest that forced displacement is related to drug use disorders. A study conducted in Colombia found a high lifetime prevalence of use of cannabis (11 per cent), cocaine (3.5 per cent), coca paste (2 per cent), inhalants (2.3 per cent) and injected drugs (0.7 per cent) among persons who were displaced.\textsuperscript{159}

Factors that are likely to increase the risk of drug use among displaced persons include exposure to trauma\textsuperscript{160} and lack of economic opportunities.\textsuperscript{161} Access to drug treatment for displaced persons is a major challenge, in particular for those who migrate to a different country.

**People in rural settings**

Although global data on this issue are lacking, people living in rural areas may face specific challenges in accessing adequate treatment in cases of drug use disorder. For instance, a study conducted among more than 1,600 people registered as drug users in Hunan Province, China, found that those residing in rural settings were generally less likely to report past participation in drug treatment than those living in urban settings (2.8 per cent versus 6.8 per cent).\textsuperscript{162}

Similar results have been observed in Australia, where people who use drugs residing in rural areas are less likely to access information and services for the prevention of adverse health consequences of drug use and treatment of drug use disorders than those living in urban settings.\textsuperscript{163}


\textsuperscript{158} Nadine Ezard, “Substance use among populations displaced by conflict: a literature review”, *Disasters*, vol. 36, No. 3 (July 2012), pp. 533–557.


\textsuperscript{160} Danielle Horyniak and others, “Epidemiology of substance use among forced migrants: a global systematic review”, *PLOS One*, vol. 11, No. 7 (2016).

\textsuperscript{161} Ezard, “Substance use among populations displaced by conflict”.


ampheta
type stimulants — a group of sub-
stances composed of synthetic stimulants controlled
under the Convention on Psychotropic Substances
of 1971 and from the group of substances called
amphetamines, which includes amphetamine, meth-
amphetamine, methcathinone and the
“ecstasy”-group substances (3,4-methylenedioxy-
ethamphetamine (MDMA) and its analogues).

amphetamines — a group of amphetamine-type
stimulants that includes amphetamine and
methamphetamine.

annual prevalence — the total number of people of
a given age range who have used a given drug at
least once in the past year, divided by the number
of people of the given age range, and expressed as a
percentage.

coca paste (or coca base) — an extract of the leaves
of the coca bush. Purification of coca paste yields
cocaine (base and hydrochloride).

“crack” cocaine — cocaine base obtained from
cocaine hydrochloride through conversion processes
to make it suitable for smoking.

cocaine salt — cocaine hydrochloride.

drug use — use of controlled psychoactive substances
for non-medical and non-scientific purposes, unless
otherwise specified.

fentanyls — fentanyl and its analogues.

new psychoactive substances — substances of abuse,
either in a pure form or a preparation, that are not
controlled under the Single Convention on Narcotic
Drugs of 1961 or the 1971 Convention, but that
may pose a public health threat. In this context, the
term “new” does not necessarily refer to new inventions but to substances that have recently become available.

opiates — a subset of opioids comprising the various
products derived from the opium poppy plant,
including opium, morphine and heroin.

opioids — a generic term that refers both to opiates
and their synthetic analogues (mainly prescription
or pharmaceutical opioids) and compounds synthe-
sized in the body.

problem drug users — people who engage in the
high-risk consumption of drugs. For example,
people who inject drugs, people who use drugs on
a daily basis and/or people diagnosed with drug use
disorders (harmful use or drug dependence), based
on clinical criteria as contained in the Diagnostic
and Statistical Manual of Mental Disorders (fifth edi-
tion) of the American Psychiatric Association, or
the International Classification of Diseases and Related
Health Problems (tenth revision) of WHO.

people who suffer from drug use disorders/people with
drug use disorders — a subset of people who use
drugs. Harmful use of substances and dependence
are features of drug use disorders. People with drug
use disorders need treatment, health and social care
and rehabilitation.

harmful use of substances — defined in the Interna-
tional Statistical Classification of Diseases and Related
Health Problems (tenth revision) as a pattern of use
that causes damage to physical or mental health.

dependence — defined in the International Statistical
Classification of Diseases and Related Health Problems
(tenth revision) as a cluster of physiological, behav-
ioural and cognitive phenomena that develop after
repeated substance use and that typically include a
strong desire to take the drug, difficulties in control-
ing its use, persisting in its use despite harmful
consequences, a higher priority given to drug use
than to other activities and obligations, increased
tolerance, and sometimes a physical withdrawal
state.

substance or drug use disorders — referred to in the
Diagnostic and Statistical Manual of Mental Disorders
(fifth edition) as patterns of symptoms resulting
from the repeated use of a substance despite experi-
encing problems or impairment in daily life as a
result of using substances. Depending on the
number of symptoms identified, substance use dis-
order may be mild, moderate or severe.

prevention of drug use and treatment of drug use dis-
orders — the aim of “prevention of drug use” is to
prevent or delay the initiation of drug use, as well
as the transition to drug use disorders. Once a person
develops a drug use disorder, treatment, care and
rehabilitation are needed.
The *World Drug Report* uses a number of regional and subregional designations. These are not official designations, and are defined as follows:

- **East Africa**: Burundi, Comoros, Djibouti, Eritrea, Ethiopia, Kenya, Madagascar, Mauritius, Rwanda, Seychelles, Somalia, South Sudan, Uganda, United Republic of Tanzania and Mayotte
- **North Africa**: Algeria, Egypt, Libya, Morocco, Sudan and Tunisia
- **Southern Africa**: Angola, Botswana, Eswatini, Lesotho, Malawi, Mozambique, Namibia, South Africa, Zambia, Zimbabwe and Reunion
- **West and Central Africa**: Benin, Burkina Faso, Cabo Verde, Cameroon, Central African Republic, Chad, Congo, Côte d’Ivoire, Democratic Republic of the Congo, Equatorial Guinea, Gabon, Gambia, Ghana, Guinea, Guinea-Bissau, Liberia, Mali, Mauritania, Niger, Nigeria, Sao Tome and Principe, Senegal, Sierra Leone, Togo and Saint Helena
- **Caribbean**: Antigua and Barbuda, Bahamas, Barbados, Cuba, Dominica, Dominican Republic, Grenada, Haiti, Jamaica, Saint Kitts and Nevis, Saint Lucia, Saint Vincent and the Grenadines, Trinidad and Tobago, Anguilla, Aruba, Bonaire, Netherlands, British Virgin Islands, Cayman Islands, Curacao, Guadeloupe, Martinique, Montserrat, Puerto Rico, Saba, Netherlands, Sint Eustatius, Netherlands, Sint Maarten, Turks and Caicos Islands and United States Virgin Islands
- **Central America**: Belize, Costa Rica, El Salvador, Guatemala, Honduras, Nicaragua and Panama
- **North America**: Canada, Mexico and United States of America, Bermuda, Greenland and Saint-Pierre and Miquelon
- **South America**: Argentina, Bolivia (Plurinational State of), Brazil, Chile, Colombia, Ecuador, Guyana, Paraguay, Peru, Suriname, Uruguay, Venezuela (Bolivarian Republic of), Falkland Islands (Malvinas) and French Guiana
- **Central Asia and Transcaucasia**: Armenia, Azerbaijan, Georgia, Kazakhstan, Kyrgyzstan, Tajikistan, Turkmenistan and Uzbekistan
- **East and South-East Asia**: Brunei Darussalam, Cambodia, China, Democratic People's Republic of Korea, Indonesia, Japan, Lao People's Democratic Republic, Malaysia, Mongolia, Myanmar, Philippines, Republic of Korea, Singapore, Thailand, Timor-Leste, Viet Nam, Hong Kong, China, Macao, China, and Taiwan Province of China
- **South-West Asia**: Afghanistan, Iran (Islamic Republic of) and Pakistan
- **Near and Middle East**: Bahrain, Iraq, Israel, Jordan, Kuwait, Lebanon, Oman, Qatar, Saudi Arabia, State of Palestine, Syrian Arab Republic, United Arab Emirates and Yemen
- **South Asia**: Bangladesh, Bhutan, India, Maldives, Nepal and Sri Lanka
- **Eastern Europe**: Belarus, Republic of Moldova, Russian Federation and Ukraine
- **South-Eastern Europe**: Albania, Bosnia and Herzegovina, Bulgaria, Croatia, Montenegro, North Macedonia, Romania, Serbia, Turkey and Kosovo
- **Western and Central Europe**: Andorra, Austria, Belgium, Cyprus, Czechia, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Liechtenstein, Lithuania, Luxembourg, Malta, Monaco, Netherlands, Norway, Poland, Portugal, San Marino, Slovakia, Slovenia, Spain, Sweden, Switzerland, United Kingdom of Great Britain and Northern Ireland, Faroe Islands, Gibraltar and Holy See

Oceania (comprised of four sub-regions):
- **Australia and New Zealand**: Australia and New Zealand
- **Polynesia**: Cook Islands, Niue, Samoa, Tonga, Tuvalu, French Polynesia, Tokelau and Wallis and Futuna Islands
- **Melanesia**: Fiji, Papua New Guinea, Solomon Islands, Vanuatu and New Caledonia
- **Micronesia**: Kiribati, Marshall Islands, Micronesia (Federated States of), Nauru, Palau, Guam and Northern Mariana Islands

164 All references to Kosovo in the *World Drug Report* should be understood to be in compliance with Security Council resolution 1244 (1999).
Presented in six separate booklets, the *World Drug Report 2020* provides a wealth of information and analysis to support the international community in implementing operational recommendations on a number of commitments made by Member States, including the recommendations contained in the outcome document of the special session of the General Assembly on the world drug problem, held in 2016.

Booklet 1 provides a summary of the five subsequent booklets by reviewing their key findings and highlighting their policy implications. Booklet 2 focuses on drug demand and contains a global overview of the extent of and trends in drug use, including drug use disorders, and its health consequences. Booklet 3 deals with drug supply and presents the latest estimates and trends regarding the production of and trafficking in opiates, cocaine, amphetamine-type stimulants and cannabis. Booklet 4 addresses a number of cross-cutting issues, including the macrodynamics that are driving the expansion and increasing complexity of the drug markets, and describes some of the rapidly evolving drug-related concerns: the latest, multifaceted global opioid crisis; rapid market changes; the market for new psychoactive substances; the use of the darknet for supplying drugs; and developments in jurisdictions that have measures allowing the non-medical use of cannabis. Booklet 5 looks at the association between socioeconomic characteristics and drug use disorders, including at the macro-, community and individual levels, with a special focus on population subgroups that may be impacted differently by drug use and drug use disorders. Finally, booklet 6 addresses a number of other drug policy issues that all form part of the international debate on the drug problem but on which in-depth evidence is scarce, including access to controlled medicines, international cooperation on drug matters, alternative development in drug cultivation areas, and the nexus between drugs and crime.

As in previous years, the *World Drug Report 2020* is aimed at improving the understanding of the world drug problem and contributing to fostering greater international cooperation in order to counter its impact on health, governance and security.

The accompanying statistical annex is published on the UNODC website: wdr.unodc.org