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METHAMPHETAMINE (MKPULUMMIRI) USE IN EASTERN NIGERIA: A NEW ADDITION TO DRUG USERS' REPERTOIRE

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ABSTRACT

Media reports indicate that methamphetamine (mkpulummiri) use is growing among young people in Eastern Nigeria, but empirical research has not been conducted. This article reviews the recent media reportage of methamphetamine use in Eastern Nigeria, presents an empirical account of a methamphetamine user, and synthesizes the available evidence, showing the factors facilitating its use. Available evidence shows that drug trafficking and illegal laboratories are the two main factors encouraging current methamphetamine availability and use in Eastern Nigeria. The NDLEA has discovered illegal laboratories where methamphetamine is produced in Enugu and Asaba. These laboratories were established by drug barons from Eastern Nigeria and their foreign counterparts. Therefore, it is logical to conclude that these local laboratories have largely contributed to the growing methamphetamine epidemic. Media reports indicate that youth organizations and vigilante groups apply corporal punishment by flogging identified users in public but do not highlight how effective this sanction is. While empirical data show that weight control motivates methamphetamine use, the grey literature has blamed youth unemployment. There is an urgent need to conduct empirical research to determine methamphetamine prevalence, the sources, motivations for use, and consequences in Eastern Nigeria. This will facilitate the design of effective interventions to reduce the growing trend. Efforts to discover and dismantle illegal laboratories should not only focus on cities because laboratories set up to evade detection may exist in rural settings. It is vital that the government work with all stakeholders to increase public awareness of the dangers of methamphetamine use in

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Nigeria and develop mechanisms to support addiction treatment and rehabilitation to prevent social stigma users may face.

Keywords: Methamphetamine, Mkpulummiri, Drug Use, Drug trafficking, Eastern Nigeria

INTRODUCTION

Drug use is a serious public health problem in contemporary Nigeria. Aside from using cannabis (Dumbili, 2020a; Nelson, 2021), many young Nigerians also use prescription drugs such as tramadol and codeine for nonmedical purposes (Dumbili, 2020b). Based on multiple recent media reports (e.g., News Agency of Nigeria, 2021; Njoku et al., 2021; Ulasi, 2021), many young people in Eastern Nigeria have added methamphetamine to their drug repertoire. This article synthesizes the recent media reportage of methamphetamine use in Eastern Nigeria and highlights the available evidence, showing the factors facilitating its use. The remainder of the article is divided into four sections. First, we present an overview (a brief history) of methamphetamine, tracing its origin and describing the factors that motivate its use and the consequences for users. Second, we summarise methamphetamine use in Sub-Saharan Africa and present empirical data from an interview with a crystal methamphetamine user in Eastern Nigeria. The next section is a summary of how local production of methamphetamine and drug trafficking may be responsible for the current widespread use in Eastern Nigeria. The last section then recommends possible solutions to the growing methamphetamine use prevalence and suggests areas for future research.

History of Methamphetamine, Motivations for Use, and Consequences

Methamphetamine- a derivative of amphetamine - is a central nervous system chemical stimulant that can be ingested orally, injected, snorted, or smoked (Anglin et al., 2000). Methamphetamine's street names include crank, crystal meth, ice, and speed (Sato, 2008), amongst others. Methamphetamine was discovered in 1893 by Nagayoshi Nagai- a Japanese pharmacologist who synthesized it from ephedrine - while his compatriot, Akira Ogata, further synthesized the drug into a crystallized format in 1919 (Sato, 2008). Methamphetamine use was unpopular until World War II (1939-1945) when countries like Germany, Japan, and the United States of America (USA) supplied their soldiers with the substance to enhance their "endurance and performance" (Anglin et al., 2000, p.138).

The misuse of the drug was first recorded in Japan after the war (1945-195), and this was because the surplus from military supplies "flooded the market" (Anglin et al., 2000, p.138). Since then, methamphetamine use has become a global phenomenon. Several countries such as Australia (Degenhardt et al., 2017), the USA (Sommers et al., 2006) and Thailand (German et al., 2006), amongst others, have reported methamphetamine use and its associated harms. Currently, methamphetamine is an internationally controlled, Schedule II or illegal substance in most countries. However, its use is still

widespread worldwide, primarily due to the activities of drug traffickers and illegal manufacturers/laboratories (United Nations Office on Drugs and Crime [henceforth, UNODC], 2017). According to the 2021 World Drug Report, 27 million people used methamphetamine and amphetamine in 2019 globally (UNODC, 2021). Furthermore, the UNODC (2021, p.48) noted that:

the number of countries and territories reporting seizures of methamphetamine rose from 79 in the period 2005–2009 to 111 in the period 2015–2019, suggesting a significant increase in the geographical spread of methamphetamine trafficking at the global level.

Studies have shown the multifaceted factors that influence or motivate methamphetamine use and the drug's effects on users. For example, methamphetamine use can trigger the brain and central nervous system, increasing heart rate and blood pressure; it is also believed to enhance heightened alertness, energy, and concentration (Parsons, 2014). Sensationseeking, pleasure, or fun motivate methamphetamine use (Brecht et al., 2004). According to Anglin et al. (2000, p.137), "the alertness, euphoria, and sense of wellbeing" that methamphetamine use generates "last considerably longer than similar effects resulting from cocaine use and the drug is metabolized by the body at a much slower rate". Among Malaysian men, the main motivations for using methamphetamine include, to enhance "sexual capacity, heighten sexual pleasure and enhance sexual exploration and adventurism", although they also use it to enhance their energy for work performance (Lim et al., 2018, p.1). In the USA, studies have reported that enhancing sexual urge and pleasure motivate methamphetamine use (Sexton et al., 2006), while the drug's easy availability and affordability have been described as the drivers among those who use the substance to self-treat chronic pain and emotional problems (Hansen et al., 2021).

Aside from being highly addictive, methamphetamine use is associated with many negative outcomes, including anxiety, cardiac arrhythmia, hallucinations, insomnia, paranoia, stomach cramps, and stroke (Anglin et al., 2000; Brecht et al., 2004). Other consequences are depression, convulsions, seizures (Sommers et al., 2006), violent/aggressive behaviour, crime (Degenhardt et al., 2008; Sexton et al., 2006) and financial and work-related problems (Brecht et al., 2004), amongst others.

Methamphetamine Use in Sub-Saharan Africa

Methamphetamine use and its consequences have also been reported in Sub-Saharan Africa. For example, the results of the Global School-based Student Health Survey (GSHS) conducted in Benin (2012), Ghana (2016), and Liberia (2017) show that in addition to cannabis, and other drugs, both male and female adolescents in these counties use methamphetamine (Onyeaka et al., 2020). The study further indicated that methamphetamine use resulted in truancy amongst adolescents in three West African countries (Onyeaka et al., 2020). In South Africa, several previous and recent studies have reported methamphetamine use and the associated adverse effects such as aggression and mental health disorders in young people and adults (Okafor et al., 2020; Plüddemann et al., 2010).

Although methamphetamine use has not attracted much scholarly attention in Nigeria, the available evidence shows that the substance is available in the country (Uzuegbu-Wilson, 2019). For example, the UNODC's (2018) National Drug Survey found that in the past 12 months, the estimated prevalence of methamphetamine use was 0.1% (i.e., 89000 users). The survey further reported that the Eastern region had a 0.06% (6700 users) methamphetamine use prevalence (UNO-DC, 2018). While the national and regional prevalence rates were relatively low, the UNODC also reported the misuse of pharmaceutical amphetamines, confirming other studies highlighting amphetamines and other drug use by young Nigerians (Dumbili et al., 2020; Dumbili et al., 2021; Famuyiwa et al., 2011). One study examining access to treatment by female drug users in Southern Nigeria shows that while 12 participants had used methamphetamine (crystal or powder), two had used methamphetamine tablets in their lifetime (Akpabio et al., 2019). A recent clinical case study of a methamphetamine user in Western Nigeria reported that he had acute urinary retention issues following brief usage of the substance to reduce weight (Ojo et al., 2021).

Using methamphetamine for weight reduction purposes was reported by a female interviewee in a fairly recent study of *drug use patterns in Eastern Nigeria.*The interviewee, who also used codeine and cannabis, narrated how she took crystal meth and discovered that it could help her control her eating habits and

weight loss. Following that first experience, she made crystal meth a regular drug of choice for weight control. As she claims in the account below, taking crystal meth facilitated her weight loss:

It helps control my weight... I am on the fat side [she is fat]. I have this early morning hunger pangs that once I feel it, I must eat something, and if I eat, I will eat much. So, I took crystal meth; I didn't remember food throughout that day till the next day... I didn't notice the early morning hunger pang for a week. After that [first time taking crystal meth], I noticed that I shed my weight... I used to be fatter than this, but I am trimming down (Female, 24 years).

She was convinced that the use of methamphetamine had enabled her to lose weight and improve her physical appearance. When she was probed to unpack how she was certain that the use of methamphetamine was facilitating her weight loss, she smiled and noted that she was "100 percent sure". Although she was the only interviewee that used methamphetamine in that study, some male interviewees corroborated her opinion, stating that individuals use the drug to reduce their weight.

Is Local Production Driving Current Mkpulummiri Use in Eastern Nigeria?

According to recent media reports, Eastern Nigeria is facing an epidemic of crystal methamphetamine use among youths. Eastern Nigeria is made up of five states (Abia, Anambra, Ebonyi, Enugu, and Imo). The main ethnic group/language is *Igbo*. Methamphetamine is popularly called Mkpulummiri (Igbo name for ice)

The interview was conducted in 2019. For further details of the study, including ethical approval and methodology, see Dumbili (2020a) and Dumbili et al. (2020).

in Eastern Nigeria (Declan, 2021; National Daily Newspaper, 2021). Between October and December 2021, different media outlets framed the use of crystal meth diversely, and many reasons were suggested as influencing factors (National Daily Newspaper, 2021; Njoku et al., 2021). For example, a national newspaper reported that:

'Mkpulummiri' is the Igbo slang for a very dangerous hard drug called Methamphetamine or Crystal Meth. It is also known as 'Ice'. Nowadays, thousands of Igbo youths are addicted to Mkpulummiri, and it has become a serious issue. If nothing is done to curb this menace, it will lead many more youths astray as it does to the present drug users (National Daily Newspaper, 2021).

In a report published in the Guardian Newspaper, Crystal meth use was attributed to youth unemployment and the associated disenchantment:

Of late, in a bid to evade the burden of joblessness and frustrating lifestyle, some young people treat themselves to celestial ecstasy by consuming Crystalline, Methamphetamine generally nicknamed in Igbo dialect as Mkpulummiri (Ozah, 2021).

Furthermore, investigative journalists with the Guardian Newspaper, who interviewed a former user, drug experts, youth and vigilante leaders, and some inhabitants of Eastern Nigerian communities, reported that Crystal meth use is becoming widespread in the region (Njoku et al., 2021). One common theme in the

media reports is that methamphetamine use is framed as a new phenomenon, and they also highlighted the consequences. For example, one of the interviewees of Njoku and colleagues pointed out a young man who was facing a mental disorder, which they attributed to methamphetamine use:

He was a bus conductor. But he has sold himself to taking the deadly substance called Mkpurummiri (Methamphetamine or Crystal Meth). See what it has turned him into (Njoku et al., 2021).

Another national newspaper also reported the harms associated with methamphetamine use in Eastern Nigeria:

Viral videos are circulated on a daily basis from various communities in the South-East, of victims of Mkpurummiri, with their attendant abnormal behaviours. Some of them were reported to have killed their parents, siblings or burnt their houses under the influence of the drug (Okoli et al., 2021).

Media reports also show that, in many communities, youth associations and vigilante groups are applying corporal punishment to users. Media analysis of several videos posted on social media indicates that public caning of users is the most common punishment that users receive. That is, when users are identified and apprehended by the vigilantes or youth associations, they are tied to a pillar or held by other youths and publicly beaten with canes (Njoku et al., 2021). The public sanction is videoed and posted on social media to deter others

(Chukwuleta, 2021; National Daily Newspaper, 2021). Although corporal punishment is popular in Nigeria, research has not examined its effectiveness in reducing drug use. Unfortunately, one beaten user was reported dead after receiving the sanction in Awka, Anambra state (Chukwuleta, 2021).

In a media briefing, the Ebonyi state Commander of the National Drug Law Enforcement Agency (NDLEA- a government agency responsible for drug law enforcement in Nigeria) stated that between January and December 2021, "we have seized 196 pinches of methamphetamines, including the loose quantity of meth socked with a beverage, and these bring it to 0.506kgs" (News Agency of Nigeria, 2021). Drug use attracts heightened social stigma in Nigeria (Ugwu & Dumbili, 2021); thus, most users disguise their drug use. For instance, Dumbili et al. (2020) reported that young people in Eastern Nigeria mix codeine with soft drinks to avoid stigma. Given the public caning/flogging that methamphetamine use attracts and the associated stigma of being videoed, users will most likely conceal its use from the public eye, which poses a severe threat to public health.

In regard to the supply of methamphetamine, factors such as drug trafficking and increased local production of the drug in illegal laboratories are largely responsible for the growing use. While Njoku et al. (2021) reported that the drug is sourced from northern Nigeria, and it "is far cheaper than other illicit drugs; thus, many youths are embracing it", a UNODC (2013) report casts light on other factors that may be responsible. First, the report shows the route of drug trafficking in West Africa, stating that:

Nigerians, particularly those from the southeast (i.e., the Igbo people) of the country, have traditionally shuttled cocaine and heroin from diaspora communities near production areas (such as Karachi, Sao Paulo, and Bangkok) to diaspora communities in consumer countries (UNODC, 2013, p. 19).

Given the severe punishment and other risks involved in trafficking cocaine and heroin, drug dealers started to set up methamphetamine production sites in West Africa in 2010 (UNODC, 2013). The following excerpts from the UNODC report shed more light on the history of local production of methamphetamine in Nigeria, and the involvement of people from the Eastern region:

In July of 2011, the first operational facility was detected. The Nigerian Drug Law Enforcement Agency discovered a site with the capacity to manufacture 25 to 50-kilogram batches of methamphetamine just outside Lagos. Two men were arrested, both from southeast Nigeria (UNODC, 2013, p. 19).

Eight months later, a second facility was identified in Satellite Town, Lagos. Some 41 kg of ephedrine and almost 5 kg of finished methamphetamine were seized. Three Bolivians and one Nigerian, an Igbo, were arrested (UNODC, 2013, p. 19).

The latest World Drug Report further strengthens the evidence that while the production of methamphetamine is reducing in Asian and American continents, "the number of dismantled

methamphetamine laboratories ally increased in... Africa over the period 2010-2019" (UNODC, 2021, p.52). Furthermore, the UNODC highlighted that in Africa, "most of the methamphetamine laboratories reported in the period 2015-2019 were dismantled in South Africa, followed by Nigeria" (UNODC, 2021, p.59). Again, the report illustrated that the reason for the increase in the production of methamphetamine in Nigeria is because drug traffickers export the drug to Asian countries, where drug enforcement agents have dismantled many laboratories, and Cape Town, where demands exceed local supplies (UNODC, 2021). Similarly, Njoku et al. (2021) reported that the spokesperson of the NDLEA that they contacted revealed that "since the 1990s, the production of Crystal meth has been hijacked by Mexican drug cartels and they came into Nigeria to set up laboratories in 2016" with the help of their local allies.

On November 24, 2021, the Vanguard Newspaper reported that:

In March 2019, the NDLEA discovered a residential building *in Enugu* that turned into a drug factory.... where Methamphetamine (Mkpurummiri) was being produced in commercial quantities for export overseas, particularly to South Africa (Okoli et al., 2021).

On November 27, 2021, another news outlet reported that the NDLEA in Enugu state had uncovered illegal laboratories and arrested three suspects (Ulasi, 2021). Announcing the arrest to journalists, the Enugu state Commander of the NDLEA stated:

Following intelligence report, the Command on Saturday arrested two

suspects with 100kg of Ephedrine, which is used in the production of Methamphetamine. Subsequent follow-up operation led the team to the location of the laboratory at Zion Avenue Phase 6 Trans Ekulu in Enugu East Local Government Area, Enugu, where the third suspect was arrested (Ulasi, 2021).

Again, on December 10, 2021, the Daily Times Newspaper reported that the NDLEA had dismantled a laboratory in Asaba (a boundary city with Eastern Nigeria), arresting eight suspects:

Operatives of the NDLEA have uncovered a huge methamphetaminemaking laboratory in Asaba.... Officials of the agency's Special Enforcement Team (SET) also busted the masterminds of the major drug trafficking organization when they arrested eight suspects, four of them Mexican nationals, four Nigerians. The NDLEA stated that the suspects behind the syndicate were arrested in simultaneous operations in Lagos, Obosi, a town near Onitsha in Anambra State, and at the location of the lab in Asaba (Akenzua, 2021).

Based on the extant evidence reviewed above, it is reasonable to conclude that the local laboratories in Nigeria, particularly those set up by drug traffickers in the Eastern region and neighbouring states, may be responsible for the current rise in methamphetamine use in the region. This is primarily because drug availability encourages consumption and associated harms (Dumbili, 2020a).

Conclusion and Recommendations for Future Research

This paper synthesized the available evidence regarding methamphetamine production, use, and associated harm in Eastern Nigeria. The article has shown abundant evidence of how illegal laboratories set up by drug traffickers may be driving the availability of the substance, which encourages consumption. According to the UNODC (2013, p.19-20), the "manufacturing of methamphetamine requires no advanced technology. Addicts have been known to synthesize the drug in their own kitchens using common decongestants". Therefore, the NDLEA should not only focus on uncovering large laboratories in cities but should also focus on rural communities because drug producers may hide smaller laboratories in rural settings to evade detection. To curtail the production and easy availability of methamphetamine from its roots, the NDLEA and other regulatory bodies should focus on eradicating the importation of, and access to the "precursor chemicals (primarily ephedrine)" used in producing the substance (UNODC 2013, 19-20).

While the dissemination of information regarding the effects of the drug is urgently needed, different communities should focus more on reorienting youths to stop those who have not initiated methamphetamine use and encourage cessation amongst current users. It is vital that the government work with all stakeholders to increase public awareness of the dangers of methamphetamine use in Nigeria and develop mechanisms to support addiction treatment and rehabilitation services (Chikezie et al., 2021). Also, it is essential that the use of punitive measures by vigilante groups be discouraged as there is no evidence that such measures are effective.

This will also help to prevent the stigma faced by affected individuals who are flogged in public. A South African study found that the factors that encourage the initiation of methamphetamine use include lack of employment opportunities, peer influence, easy accessibility, the popularity of the drug, and coping with stress and trauma (Hobkirk et al., 2016). As stated above, a media report in Nigeria also attributed methamphetamine use to joblessness (Ozah, 2021). Indeed, youth unemployment is high in Nigeria, which may be a reason for the growing drug epidemic. While research into this is warranted, the government should also create jobs for the unemployed youths.

Importantly, drug regulations in Nigeria have often followed the draconian- war on drugs - approach (i.e., arrest and imprisonment), but this has not reduced illicit drug availability and use in the country (Ugwu & Dumbili, 2021). Therefore, the government should not focus on applying such methods in regulating methamphetamine use. An evidence-based, multi-stakeholder (e.g., individuals who use the drug, community leaders, mental healthcare providers, policymakers, etc.) approach should be designed and implemented not just in this region but in the whole country. There is an urgent need to conduct studies in all the states in this region to provide empirical evidence on the availability, sources, prevalence, users' profile, motivations, and consequences of methamphetamine use. While quantitative studies are necessary to determine the prevalence, qualitative studies that will help map out the real reason or motivations for using methamphetamine and the social practices (e.g., the sources, cultures, etc.) around its use should not be neglected. In the main, youths should be encouraged to channel their energy to other harmless recreational activities.

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